

Enjoyable Sanskrit Grammar Series

Volume 2 Phonetics & Sandhi

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Enjoyable Sanskrit Grammar

Volume **2**
Phonetics and Sandhi

Medhā Michika

AVG Anaikkatti, 2017

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Topic I

Phonetics

शिक्षा [śikṣā]

शिक्षा [śikṣā], phonetics, comes first among the वेद-षड्-अङ्गानि [veda-ṣaḍ-aṅgāni], six limbs or disciplines auxiliary to the study of Veda. Because the teaching tradition is कर्ण-परम्परा [kaṛṇa-paramparā] (orally passed down), before studying any other disciplines it is very important to be aware of how the sounds are produced by the organ of speech before studying any other disciplines. As सन्धि [sandhi] deals with phonetic changes, शिक्षा [śikṣā] is very much relevant and thus should be understood properly by students.

1. Classification of the sounds

As seen in Table 1, all the sounds used in Sanskrit are classified in terms of two aspects.

A. Points of articulation (स्थानानि [sthānāni])

There are six points of articulation.

1. Throat, 2. Palate, 3. Roof, 4. Teeth, 5. Lips, 6. Nose

B. Efforts of pronunciation (प्रयत्नाः [prayatnāḥ])

There are two types of efforts:

- i. Internal efforts, which are made before pronunciation
 1. Contacted, 2. Slightly contacted, 3. Slightly open, 4. Open, 5. Tight
- ii. External efforts, which are made during pronunciation
 - Soft or hard
 - Aspirated or non-aspirated
 - Accents

Details follow after the table.

Table 1: Letters/Sounds used in Sanskrit

B. Efforts A. Points (Names of sounds by the point)	Contacted					Slightly contacted	Slightly open		Open
	Hard		Soft			Hard	Soft		
	Non- aspirate	Aspirate	Non- aspirate	Aspirate	Non-aspirate		Aspirate		
	1 st of the class	2 nd of the class	3 rd of the class	4 th of the class	5 th / (Nasals)	Semi vowels	Sibilants		Vowels
Throat (Gutturals)	क ka	ख kha	ग ga	घ gha	ङ ṅa			ह ha	अ* / आ a / ā
Palate (Palatals)	च ca	छ cha	ज ja	झ jha	ञ ña	य ya	श śa		इ / ई i / ī
Roof (Cerebrals)	ट ṭa	ठ ṭha	ड ḍa	ढ ḍha	ण ṇa	र ra	ष ṣa		ऋ / ॠ ṛ / ṝ
Teeth (Dentals)	त ta	थ tha	द da	ध dha	न na	ल la	स sa		ॠ ḷ
Lips (Labials)	प pa	फ pha	ब ba	भ bha	म ma	व** va			उ / ऊ u / ū

Throat & palate (gutturo-palatals) – ए e, ऐ ai

Throat (guttural) – अः ḥ

Nose (nasal) – अं ṁ (anusvārah)

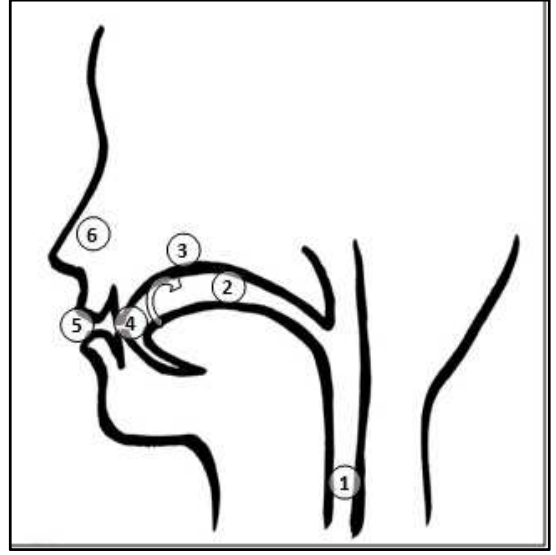
Throat & lips (gutturo-labials) – ओ o, औ au

* Effort of अ a – Tight

** Teeth & lips (dento-labial) – व va

A. Points of articulation (स्थानानि [sthānāni])

1. Throat (कण्ठः [kaṅṭhaḥ])
2. Palate (तालु [tālu])
3. Roof (मूर्धा [mūrdhā])
4. Teeth (दन्ताः [dantāḥ])
5. Lips (ओष्ठौ [oṣṭhau])
6. Nose (नासिका [nāsikā])



Names of sounds pronounced from each point:

1. Gutturals (कण्ठ्याः [kaṅṭhyāḥ]) are the sounds pronounced from the throat.
2. Palatals (तालव्याः [tālavvyāḥ]) are the sounds pronounced from the palate.
3. Cerebrals (मूर्धन्याः [mūrdhanyāḥ]) are the sounds pronounced from the roof.
4. Dentals (दन्त्याः [dantyaḥ]) are the sounds pronounced from the teeth.
5. Labials (ओष्ठ्याः [oṣṭhyāḥ]) are the sounds pronounced from the lips.
6. Nasals (अनुनासिकाः [anunāsikāḥ]) are the sounds pronounced from the nose.

The classes (वर्गाः [vargāḥ])

25 (5 x 5) consonants are classified into five classes corresponding to five points of articulation.

1. Five gutturals क, ख, ग, घ, ङ are classified to क-वर्गः [ka-vargah], or कु [ku].
2. Five palatals च, छ, ज, झ, ञ are classified to च-वर्गः [ca-vargah], or चु [cu].
3. Five cerebrals ट, ठ, ड, ढ, ण are classified to ट-वर्गः [ṭa-vargah], or टु [tu].
4. Five dentals त, थ, द, ध, न are classified to त-वर्गः [ta-vargah], or तु [tu].
5. Five labials प, फ, ब, भ, म are classified to प-वर्गः [pa-vargah], or पु [pu].

B. Efforts (प्रयत्नः [prayatnāḥ])

Efforts are twofold: i. Internal efforts and ii. External efforts

i. Internal efforts

Internal efforts are made before pronunciation takes place.

There are five types of internal efforts according to how the points of articulation are closed or opened. They are indicated in the top line of Table 1.

1. Contacted

- The स्थान [sthāna] is fully touched (स्पृष्टम् [sprṣṭam])
- Sounds with such effort are the 25 consonants belonging to the five classes (क-वर्गः, च-वर्गः, ट-वर्गः, त-वर्गः, and प-वर्गः), and they are called “5 x 5 consonants”, or स्पर्शाः [sparśāḥ].

2. Slightly contacted

- The स्थान [sthāna] is slightly contacted/touched (ईषत्-स्पृष्टम् [īṣat-sprṣṭam]).
- Sounds with such effort are य, व, र, and ल, and they are called semi-vowels, or अन्तःस्थाः [antaḥsthāḥ].

3. Slightly open

- The स्थान [sthāna] is slightly open (ईषद्-विवृतम् [īṣat-vivṛtam]).
- Sounds with such effort are श, ष, स, and ह, and they are called sibilants, or ऊष्माणः [ūṣmāṇaḥ].

4. Open

- The स्थान [sthāna] is open (विवृतम् [vivṛtam]).
- Sounds with such effort are आ, इ, ई, उ, ऊ, ऋ, ॠ, ए, ऐ, ओ, and औ, and they are called vowels, or स्वराः [svarāḥ].

5. Tight

- Only for the short अ, the स्थान [sthāna] is tight (संवृतम् [saṃvṛtam]).

ii. External efforts

External efforts are made during pronunciation. They are divided into three categories.

Category 1: Soft/hard distinction among consonants

- Soft consonants
 - Vocal cord is vibrating while pronouncing soft consonants.
 - 3rd, 4th, and 5th of the classes, semi-vowels, and ह् are soft consonants.
- Hard consonants
 - Vocal cord is not vibrating while pronouncing hard consonants.
 - 1st and 2nd of the classes, and श, ष, स are hard consonants.

Category 2: Aspirated/non-aspirated distinction among consonants

- Aspirated consonants (महा-प्राणा: [mahā-prāṇāḥ])
 - Air is felt moving forcefully past the lips while pronouncing aspirated consonants.
 - 2nd and 4th of the classes, and sibilants are aspirated consonants.
- Non-aspirated consonants (अल्प-प्राणा: [alpa-prāṇāḥ])
 - Almost no air moves past the lips while pronouncing non-aspirated consonants.
 - 1st, 3rd and 5th of the classes, and semi-vowels are non-aspirated consonants.

Category 3: Accents on vowels

- Middle
- Low
- High

2. Varieties of Vowels

Vowels vary in relation to 3 factors:

- Length

1. Short (ह्रस्वः [hrasvaḥ]) = 1 count (1 मात्रा [mātrā]) e.g., अ, इ, उ
2. Long (दीर्घः [dīrghaḥ]) = 2 counts (2 मात्राs) e.g., आ, ई, ऊ
3. Elongated (प्लुतः [plutaḥ]) = 3 counts (3 मात्राs) e.g., आ३, ई३, ऊ३

- Accent

1. Middle (उदात्तः [udāttaḥ]) e.g., अ, आ, इ, ई
2. Lower (अनुदात्तः [anudāttaḥ]) e.g., अँ, आँ, इँ, ईँ
3. Higher (स्वरितः [svaritaḥ]) e.g., अँ, आँ, इँ, ईँ

- Nasalized or non-nasalized

1. Nasalized (अनुनासिकः [anunāsikaḥ]) e.g., अँ, आँ, इँ, न, म, अं (अनुस्वारः)
2. Non-nasalized (अननुनासिकः [ananunāsikaḥ]) e.g., अ, आ, क, त, प्

अ has 18 varieties. (3 lengths x 3 accents x 2 (nasalized and non-nasalized))

Table 2: Variety of vowel

	अननुनासिकः			अनुनासिकः		
	ह्रस्वः	दीर्घः	प्लुतः	ह्रस्वः	दीर्घः	प्लुतः
उदात्तः	अ	आ	आ३	अँ	आँ	आँ३
स्वरितः	अँ	आँ	आँ३	अँ	आँ	आँ३
अनुदात्तः	अँ	आँ	आँ३	अँ	आँ	आँ३

Similarly, इ and उ have 18 varieties.

ऋ and ॠ are considered to be स्वर्ण (similar sound, see the next section) to each other.

Thus, they both have 30 varieties. (ऋ has 18 = 3 lengths x 3 accents x 2, and ॠ has 12 = 2 lengths x 3 accents x 2, because of the absence of दीर्घ)

ए, ओ, ऐ, औ have 12 varieties (2 lengths x 3 accents x 2, because of the absence of ह्रस्व).

3. Similar sounds (सवर्णाः [savarnāḥ])

Sounds are considered similar, सवर्ण [savarna], to each other when their points of articulation (स्थान [sthāna]) and internal efforts are the same.

Table 3: List of similar sounds

These sounds are सवर्णाs to each other	Point of articulation (स्थानम् [sthānam])	Internal effort (प्रयत्नः [prayatnaḥ])
18 varieties of अ	कण्ठः [kaṅṭhaḥ]	विवृतः [vivṛtaḥ]
18 varieties of इ	तालु [tālu]	विवृतः [vivṛtaḥ]
18 varieties of उ	ओष्ठौ [oṣṭhau]	विवृतः [vivṛtaḥ]
18 varieties of ऋ and 12 varieties of ॠ	मूर्धा [mūrdhā]	विवृतः [vivṛtaḥ]
	दन्ताः [dantāḥ]	विवृतः [vivṛtaḥ]
12 varieties of ए	कण्ठतालु [kaṅṭhataḷu]	विवृतः [vivṛtaḥ]
12 varieties of ओ	कण्ठोष्ठम् [kaṅṭhoṣṭham]	विवृतः [vivṛtaḥ]
12 varieties of ऐ	कण्ठतालु [kaṅṭhataḷu]	विवृतः [vivṛtaḥ]
12 varieties of औ	कण्ठोष्ठम् [kaṅṭhoṣṭham]	विवृतः [vivṛtaḥ]
(ह् has no सवर्ण)	कण्ठः [kaṅṭhaḥ]	ईषद्विवृतः [īṣadvivṛtaḥ]
य and यँ	तालु [tālu]	ईषत्स्पृष्टः [īṣatsprṣṭaḥ]
व and वँ	दन्तोष्ठम् [dantoṣṭham]	ईषत्स्पृष्टः [īṣatsprṣṭaḥ]
(र् has no सवर्ण)	मूर्धा [mūrdhā]	ईषत्स्पृष्टः [īṣatsprṣṭaḥ]
ल and लँ	दन्ताः [dantāḥ]	ईषत्स्पृष्टः [īṣatsprṣṭaḥ]
क् ख् ग् घ् ङ्	कण्ठः [kaṅṭhaḥ]	स्पृष्टः [sprṣṭaḥ]
च् छ् ज् झ् ञ्	तालु [tālu]	स्पृष्टः [sprṣṭaḥ]
ट् ठ् ड् ढ् ण्	मूर्धा [mūrdhā]	स्पृष्टः [sprṣṭaḥ]
त् थ् द् ध् न्	दन्ताः [dantāḥ]	स्पृष्टः [sprṣṭaḥ]
प् फ् ब् भ् म्	ओष्ठौ [oṣṭhau]	स्पृष्टः [sprṣṭaḥ]
(श् has no सवर्ण)	तालु [tālu]	ईषद्विवृतः [īṣadvivṛtaḥ]
(ष् has no सवर्ण)	मूर्धा [mūrdhā]	ईषद्विवृतः [īṣadvivṛtaḥ]
(स has no सवर्ण)	दन्ताः [dantāḥ]	ईषद्विवृतः [īṣadvivṛtaḥ]

4. गुणः [guṇaḥ] and वृद्धिः [vṛddhiḥ]

गुणः [guṇaḥ] and वृद्धिः [vṛddhiḥ] are technical names assigned to certain vowels in order to facilitate explanations of certain grammatical operations.

- अ, ए, ओ are termed गुणः [guṇaḥ]
- आ, ऐ, औ are termed वृद्धिः [vṛddhiḥ]

Table 4: List of guṇa and vṛddhi letters

गुणः (guṇaḥ)	अ [a] (guttural)	ए [e] (gutturo-palatal)	ओ [o] (gutturo-labial)
वृद्धिः (vṛddhiḥ)	आ [ā] (guttural)	ऐ [ai] (gutturo-palatal)	औ [au] (gutturo-labial)

These terms are used mainly for explanations of two types of changes:

- in the change of sounds when two sounds meet. (sandhi rules).
- in the change of stems when suffixes are added to them.

Assignment I:

Add these important words to your Sanskrit vocabulary:

- 6 स्थानः: कण्ठः, तालु, मूर्धा, दन्ताः, ओष्ठौ, नासिका
- 6 types of sounds: कण्ठ्याः, तालव्याः, मूर्धन्याः, दन्त्याः, ओष्ठ्याः, अनुनासिकाः
- 5 classes: क-वर्गः, च-वर्गः, ट-वर्गः, त-वर्गः, प-वर्गः
- महा-प्राणाः, अल्प-प्राणाः, ह्रस्वः, दीर्घः, प्लुतः, अनुनासिकः, अननुनासिकः

Topic II

Māheśvarasūtrāṇi

माहेश्वरसूत्राणि

1. Māheśvarasūtrāṇi (माहेश्वरसूत्राणि)

Sage Pāṇini is said to have received fourteen sūtras, which are called माहेश्वरसूत्राणि [māheśvarasūtrāṇi] directly from the Lord Śiva. They are:

अथ माहेश्वरसूत्राणि [atha māheśvarasūtrāṇi]

Now *Māheśvarasūtras* begin.

- | | | |
|-----------------|--------------------|--------------------------|
| 1. अ इ उ ण् । | 6. लँ ण् । | 11. ख फ छ ठ थ च ट त व् । |
| 2. ऋ लृ क् । | 7. ज म ङ ण न म् । | 12. क प य् । |
| 3. ए ओ ङ् । | 8. झ भ ञ् । | 13. श ष सर् । |
| 4. ऐ औ च् । | 9. घ ढ ध ष् । | 14. हल् ॥ |
| 5. ह य व र ट् । | 10. ज ब ग ङ द श् । | |

इति माहेश्वराणि सूत्राणि । [iti māheśvarāṇi sūtrāṇi]

Thus *Māheśvarasūtras* are completed.

All the sounds used in Sanskrit language are represented by these fourteen sūtras.

From ह् in the 5th sūtra onwards, only the consonants are intended. अ is added just for pronunciation.

The last consonant of each sūtra is termed इत् [it]. इत् [it] letters are known as indicatory letters. Their purpose is discussed in the following section.

Topic II – Māheśvarasūtrāṇi (माहेश्वरसूत्राणि)

The letters in माहेश्वरसूत्रs are arranged for making प्रत्याहारs [pratyāhāra]s, abbreviations, for groups of letters. This arrangement is easily understood in Table 5.

Table 5: Māheśvarasūtrāṇi

V O W E L S	Simple vowels	अ इ उ ण ऋ लृ क्
	Diphthongs	ए ओ ङ् ऐ औ च्
C O N S O N A N T S	हृ + Semivowels	हृ य व र ङ् लृ ण्
	5 th of the class (= Nasals)	ज म ङ् ण न म्
	4 th of the class	झ भ ङ् घ ढ ध ष्
	3 rd of the class	ज ब ग ङ् द श्
	2 nd of the class	ख फ छ ठ थ
	1 st of the class	च ट त व् क प य्
	Sibilants	श ष स र् ह ल्

In the table, इत् [it] letters are circled. इत् letters in माहेश्वरसूत्राणि [māheśvarasūtrāṇi] are indicative for making प्रत्याहारः [pratyāhāraḥ], abbreviations which are to be discussed next.

Assignment II:

- Try to memorize माहेश्वरसूत्राणि [māheśvarasūtrāṇi] while being aware of the points of articulation (स्थानानि [sthānāni]) of each sound.
- Help others to memorize माहेश्वरसूत्राणि [māheśvarasūtrāṇi].

2. How to understand Table 5

In Table 5, the 14 माहेश्वरसूत्रs are separated into rows in the original order. Each row contains either 4 or 5 letters (excluding इत् [it] letters.)

- Vowels appear in the first two rows.
 - Simple vowels are in the first row.
 - Diphthongs are in the second row.
- Consonants
 - Semivowels are in the third row.
 - 5 x 5 consonants are listed from 5th of the classes in descending order.
 - Sibilants are in the last row.
 - ह् appears twice.

3. Pratyāhārah (प्रत्याहारः)

The माहेश्वरसूत्राणि [māheśvarasūtrāṇi] are arranged in such a way that प्रत्याहारs [pratyāhārā]s, abbreviations for specific groups of letters, can be made from them.

Each प्रत्याहारः [pratyāhārah] consists of two letters;

- The first indicates the beginning letter of the group denoted by the प्रत्याहार
- The second is an इत् [it] letter, purely for indicating the end of the denoted group of letters

In this manner, each प्रत्याहार denotes the group of letters starting from the first letter of the प्रत्याहार, and ending with but not including the final इत् letter.

For example, अक् is a प्रत्याहार for all the letters starting from अ and ending with, but not including, the इत् letter क् (i.e. अ, इ, उ, ऋ, लृ.)

How the arrangement of माहेश्वरसूत्रs in Table 5 allows the contents of a प्रत्याहार to be found quickly:

For example, in a प्रत्याहार झय् :

- The first letter is झ, the 4th of the class.
- The इत् letter is य्, at the end of 1st of the classes.

Topic II – Māheśvarasūtrāṇi (माहेश्वरसूत्राणि)

By this, the group of letters abbreviated as झय् is understood as all the letters from 4th of the classes down to 1st of the classes.

= Exercise =

1. List the प्रत्याहार for the following:

All vowels = _____	All consonants = _____
All simple vowels = _____	All soft consonants = _____
All diphthongs = _____	All hard consonants = _____
All letters = _____	All sibilants = _____

2. List the number of letters, types of letters, and letters of the following प्रत्याहारः:

अक्	5	All the simple vowels	अ, इ, उ, ऋ, ए
अच्	_____	_____	_____
अण् * 1	_____	_____	_____
अण् * 2	_____	_____	_____
अट्	_____	_____	_____
इक्	_____	_____	_____
इच्	_____	_____	_____
इण् * 3	_____	_____	_____
एङ्	_____	_____	_____
एच्	_____	_____	_____
ऐच्	_____	_____	_____
खर्	_____	_____	_____
चर्	_____	_____	_____
जश्	_____	_____	_____
झल्	_____	_____	_____

Topic II – Māheśvarasūtrāṇi (माहेश्वरसूत्राणि)

झश्	_____	_____	_____
यण्	_____	_____	_____
हश्	_____	_____	_____
हल्	_____	_____	_____
अल्	_____	_____	_____

* 1 अण् is usually formed with the first ण्.

* 2 There is only one Pāṇini-sūtra in which अण् is formed with the second ण्.

* 3 इण् is always formed with the second ण्.

Special notes:

अण् (with the second ण्) in माहेश्वरसूत्रs represents all of the सवर्णs. Thus, अ in माहेश्वरसूत्र represents all the 18 सवर्णs of अ. Similarly, य in माहेश्वरसूत्र represents both nasal and non-nasal य. Refer back to Table 3: *List of similar sounds* for details.

There are certain ways to present vowels to convey restriction in length of the sound. For example:

- To convey only the 6 varieties of short (ह्रस्व [hrasva]) अ, the words “अत्” or “अकारः” are used.
- To convey only the 6 varieties of long (दीर्घ [dirgha]) आ, the words “आत्” or “आकारः” are used.
- To convey all 18 varieties of अ, the words “अ” or “अवर्णः” are used.

Topic III

Basics of Sandhi (सन्धिः)

Phonetic change when two sounds meet

The Basic Concepts of सन्धि (sandhi)

The word सन्धि [sandhi] literally means “connection” of two things.

As a grammatical term, सन्धि is a phonetic change which takes place when two sounds come in contact.

सन्धि is purely phonetic. Even when words are phonetically joined by sandhi, and written without a space between them, the meaning of each word is not affected. They do not become one word.

सन्धि is different from समास [samāsa]. समास is a compound, where meaningfully connected words join to become one compound word. सन्धि can take place between any words which come into contact, not just words within a समास.

Three types of सन्धि (sandhi)

सन्धि is classified into three categories, based on the type of sound that is replaced.

They are:

1. **Visarga sandhi** (विसर्ग-सन्धिः [visarga-sandhiḥ])
 - Regulations of phonetic change where visarga is replaced.
2. **Vowel sandhi** (अच्-सन्धिः [ac-sandhiḥ])
 - Regulations of phonetic change where vowel (अच्) is replaced.
3. **Consonant sandhi** (हल्-सन्धिः [hal-sandhiḥ])
 - Regulations of phonetic change where consonant (हल्) is replaced.

Where to apply सन्धि (sandhi)

सन्धि is to be applied to either a letter which is not at the end of a word (अपदान्त [apadānta]) or a letter which is at the end of a word (पदान्त [padānta]).

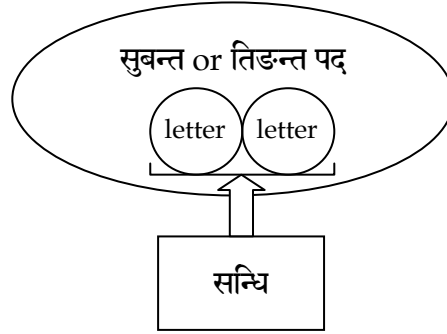
The following explanation will be useful to understand where to apply सन्धि.

As for the terminology used here, such as पद, सुबन्त-पद, तिङन्त-पद, उपसर्ग, धातु, समास, and वाक्य, their concepts are explained in detail in Volume 1.

1) सन्धि within a word (पद)

Here, पद means either सुप्-ending (सुबन्त) or तिङ्-ending (तिङन्त) word. If there are letters which are subject to सन्धि (phonetic change) within a पद, that सन्धि is compulsory.

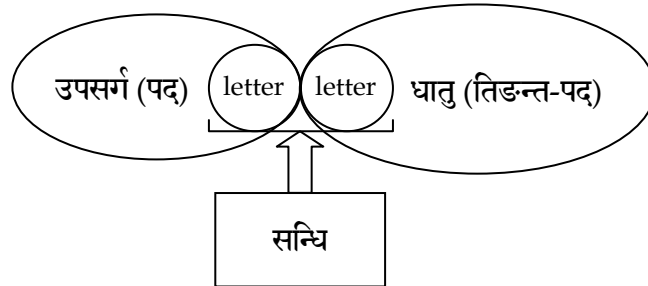
Note that the first letter of the two is called अपदान्त (not at the end of पद).



2) सन्धि between उपसर्ग and धातु

उपसर्ग is a particle meaningfully connected to a धातु and is placed before the धातु. उपसर्ग is considered to be a पद by itself. धातु here is suffixed by तिङ्, hence becoming a तिङन्त-पद.

When a सन्धि is applicable between the last letter of an उपसर्ग and the first letter of a धातु, that सन्धि is compulsory.



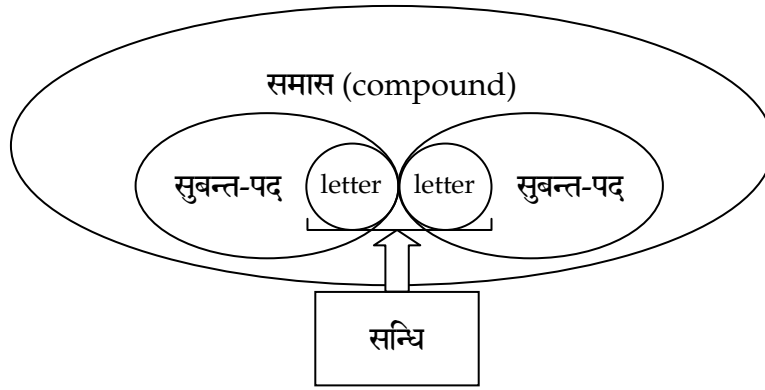
Topic III – Basics of Sandhi (सन्धिः) - Phonetic change when two sounds meet

3) सन्धि in a compound (समास)

Two or more सुबन्त-पदs can be compounded into one प्रातिपदिक. Such प्रातिपदिक is called समास.

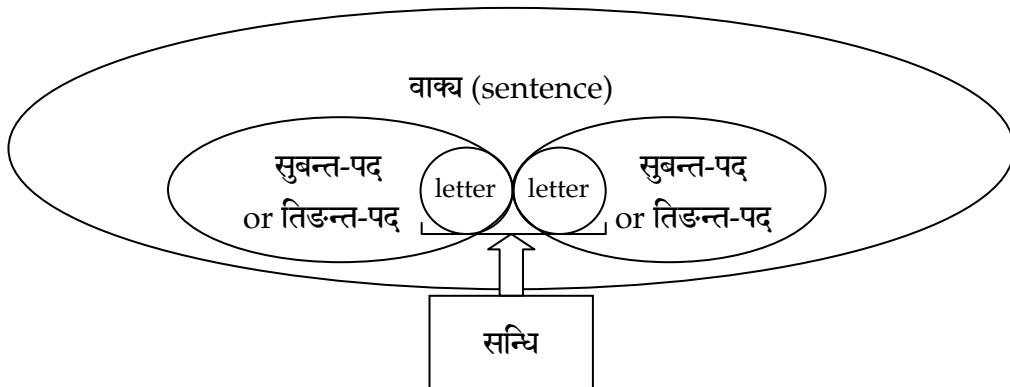
When a सन्धि is applicable between the last letter of a सुबन्त-पद and the first letter of the following सुबन्त-पद within a समास, that सन्धि is compulsory.

Note that even in a compound, the last letter of each सुबन्त-पद is called पदान्त (at the end of पद).



4) सन्धि between words (पदs) in a sentence

When a सन्धि is applicable between the last letter of a सुबन्त-पद and the first letter of the following सुबन्त-पद within a sentence, that सन्धि is compulsory. However, if the speaker gives a pause at the end of a given word, which results in breaking the flow, the सन्धि is not applied.



Topic IV

Visarga Sandhi

(विसर्गसन्धिः)

विसर्ग [visarga] is the aspirated guttural sound which is represented by “:” or “h”. When immediately followed by a sound, the विसर्ग may change into another sound. This change is called विसर्ग-सन्धि [visarga-sandhi].

This change of the विसर्ग is determined by the sound which precedes the विसर्ग and the sound which follows the विसर्ग. Since विसर्ग comes only after vowels, the sound which precedes (पूर्व [pūrva]) will be one of the nine vowels. The sound which follows (पर [para]) the विसर्ग can be any letter.

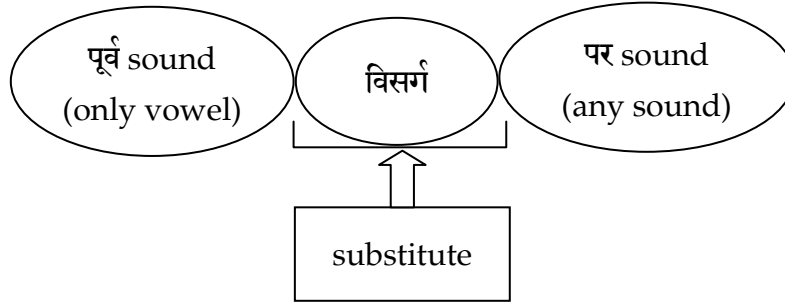


Table 6: *Overview of Visarga Sandhi* shows every possible combination of पूर्व and पर sounds for विसर्ग. The corresponding change to the विसर्ग is shown on the table at the intersections of the पूर्व and पर sounds. These changes are grouped into six areas. These areas are numbered #1, #2, etc. and are given nicknames based on their typical examples. Each area is explained with examples in the following section.

विसर्ग is also called विसर्जनीय [visarjanīya].

Table 6: Overview of Visarga Sandhi

परः पूर्वः	अ	आ / इच् (vowels other than अ)	हश् (soft consonants)		खर् (hard consonants)				
				र्	क्/ख् (guttural)	च्/छ्/श् (palatal)	ट्/ठ्/ष् (cerebral)	त/थ/स् (dental)	प/फ् (labial)
अ	#1 ओऽ - शिवोऽहम्। [śivo'ham]	#2 अ (visarga drops) - अर्जुन उवाच। [arjuna uvāca]	#3 ओ - नमो नमः। [namo namaḥ]	र् not born of रँ लोपः & दीर्घः on पूर्व अण् - पुना रमते। - मनोरथः।	#5 जिह्वामूलीयः or विसर्जनीयः - दुःखम्। [duḥkham]	#6 श् - रामश्च। [rāmaśca]	#6 ष् - रामष्ठीकते। - नमस्ते। [namaste]	#6 सु - नमस्ते। [namaste]	#5 उपध्मानीयः or विसर्जनीयः - पुनः पुनः। [puna=punah]
आ	#2 आ (visarga drops) - जना आगच्छन्ति। गुणा गुणेषु। [guṇā guṇeṣu]								
इच्	#4 र् - गुरुरादिः। [gururādih]	- गुरुरेव।	- गुरुर्ब्रह्म। [gururbrahmā]	लोपः & दीर्घः on पूर्व अण् - दाशरथी रामः।					
(exception) सः/एषः	ओऽ - सोऽहम्। [so'ham]	अ - स एव। - स पुरुषः। - एष पुरुषः।							

Optional विसर्जनीयः when शर् follows

- शान्तिः शान्तिः शान्तिः।
- मनःषष्ठानि।
- यः स महेश्वरः।

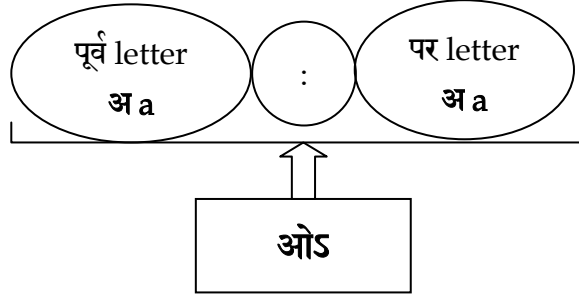
If खर् is followed by शर्, only विसर्जनीयः - समदुःखसुखः क्षमी।

1. अः + अ (शिवोऽहं सन्धिः [śivo'ham sandhih])

#1 in the table

अः + अ [aḥ + a]

= ओऽ [o']



- When a विसर्ग is preceded by short अ, and followed by short अ, all together they become "ओऽ".

e.g. 1) शिवः अहम् ।

= शिवोऽहम् ।

śivaḥ aham ।
= śivo'ham ।

e.g. 2) नमः अस्तु ।

= नमोऽस्तु ।

namaḥ astu ।
= namo'stu ।

= Exercise =

1) Resolve the विसर्ग sandhi.

1. प्रथमोऽध्यायः = _____ + _____

1. prathamo'dhyāyaḥ = _____ + _____

3. अजोऽपि = _____ + _____

3. ajo'pi = _____ + _____

5. शाश्वतोऽयम् = _____ + _____

5. śāśvato'yam = _____ + _____

7. तृप्तोऽहम् = _____ + _____

7. tṛpto'ham = _____ + _____

9. एकोऽस्ति = _____ + _____

9. eko'sti = _____ + _____

2. लोकोऽयम् = _____ + _____

2. loko'yam = _____ + _____

4. देहिनोऽस्मिन् = _____ + _____

4. dehino'smin = _____ + _____

6. नमोऽस्तु = _____ + _____

6. namo'stu = _____ + _____

8. प्रणतोऽस्मि = _____ + _____

8. prañato'smi = _____ + _____

10. रसोऽपि = _____ + _____

10. raso'pi = _____ + _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

11. कूटस्थोऽक्षरः = _____ + _____

11. kūṭastho'kṣaraḥ = _____ + _____

12. अतोऽस्मि = _____ + _____

12. ato'smi = _____ + _____

2) Apply the विसर्ग sandhi rule.

1. क्रोधः अभिजायते = _____

1. krodhaḥ abhijāyate = _____

2. पञ्चदशः अध्यायः = _____

2. pañcadaśaḥ adhyāyaḥ = _____

3. पुरुषः अश्नुते = _____

3. puruṣaḥ aśnute = _____

4. कर्मणः अन्यत्र = _____

4. karmaṇaḥ anyatra = _____

5. पूर्णः अहम् = _____

5. pūrṇaḥ aham = _____

6. भक्तः असि = _____

6. bhaktaḥ asi = _____

7. कुतः अयम् = _____

7. kutaḥ ayam = _____

8. समिद्धः अग्निः = _____

8. samiddhaḥ agniḥ = _____

9. नमः अस्तु = _____

9. namaḥ astu = _____

10. स्थितः अस्मि = _____

10. sthitaḥ asmi = _____

11. यः अवतिष्ठति = _____

11. yaḥ avatiṣṭhati = _____

12. प्रियः असि = _____

12. priyaḥ asi = _____

13. कः अन्यः अस्ति = _____

13. kaḥ anyaḥ asti = _____

14. तुमुलः अभवत् = _____

14. tumulaḥ abhavat = _____

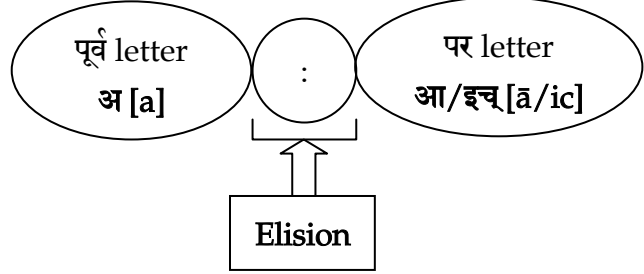
2. अः + आ/इच् (अर्जुन उवाच सन्धिः [arjuna uvāca sandhih])

and आ + अश् (गुणा गुणेषु सन्धिः [gunā guṇeṣu sandhih])

#2 (Elision of Visarga)

अः + आ/इच् [aḥ + ā/ic]

= अ + आ/इच् [a + ā/ic]



- When a विसर्ग is preceded by short अ, and followed by आ/इच् (any vowel other than short अ), the विसर्ग is elided.

e.g. 1) अर्जुनः आगच्छति ।

= अर्जुन आगच्छति ।

arjunaḥ āgacchati ।

= arjuna āgacchati ।

e.g. 2) अर्जुनः इच्छति ।

= अर्जुन इच्छति ।

arjunaḥ icchati ।

= arjuna icchati ।

e.g. 3) अर्जुनः ईक्षते ।

= अर्जुन ईक्षते ।

arjunaḥ īkṣate ।

= arjuna īkṣate ।

e.g. 4) अर्जुनः उवाच ।

= अर्जुन उवाच ।

arjunaḥ uvāca ।

= arjuna uvāca ।

e.g. 5) अर्जुनः ऋच्छति ।

= अर्जुन ऋच्छति ।

arjunaḥ ṛcchati ।

= arjuna ṛcchati ।

e.g. 6) अर्जुनः एव ।

= अर्जुन एव ।

arjunaḥ eva ।

= arjuna eva ।

e.g. 7) अर्जुनः ऐक्षत ।

= अर्जुन ऐक्षत ।

arjunaḥ aikṣata ।

= arjuna aikṣata ।

e.g. 8) अर्जुनः औषधिः ।

= अर्जुन औषधिः ।

arjunaḥ auṣadhiḥ ।

= arjuna auṣadhiḥ ।

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

= Exercise =

1) Apply विसर्ग sandhi rule.

1. रामः + आप्नोति = _____

1. rāmaḥ + āpnoti = _____

3. रामः + ईदृ = _____

3. rāmaḥ + īḍe = _____

5. रामः + ऊर्णोति = _____

5. rāmaḥ + ūrṇoti = _____

7. रामः + एधते = _____

7. rāmaḥ + edhate = _____

9. पक्वः + ओदनः = _____

9. pakvaḥ + odanaḥ = _____

2. रामः + इच्छति = _____

2. rāmaḥ + icchati = _____

4. रामः + उन्नयति = _____

4. rāmaḥ + unnayati = _____

6. रामः + ऋच्छति = _____

6. rāmaḥ + ṛcchati = _____

8. कामः + ऐहिकः = _____

8. kāmaḥ + aihikaḥ = _____

10. प्रत्ययः + औत्सर्गिकः = _____

10. pratyayaḥ + autsargikaḥ = _____

2) Resolve the विसर्ग sandhi.

1. अन्तवन्त इमे = _____ + _____

1. antavanta ime = _____ + _____

3. योग उच्यते = _____ + _____

3. yoga ucyate = _____ + _____

2. अव्यय ईश्वरः = _____ + _____

2. avyaya īśvaraḥ = _____ + _____

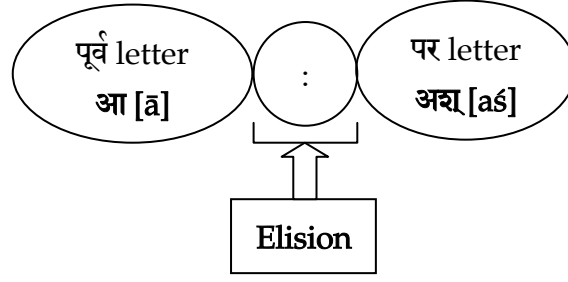
4. काम एषः = _____ + _____

4. kāma eṣaḥ = _____ + _____

#2 (Elision of Visarga)

आः + अश् [āḥ + ā/ic]

= आ + अश् [ā + ā/ic]



- When a विसर्ग is preceded by आ, and followed by अश् (all the vowels and soft consonants), the विसर्ग is elided.

e.g. 1) देवाः अस्यन्ति ।

= देवा अस्यन्ति ।

devāḥ asyanti ।

= devā asyanti ।

e.g. 2) देवाः आगच्छन्ति ।

= देवा आगच्छन्ति ।

devāḥ āgacchanti ।

= devā āgacchanti ।

e.g. 3) देवाः इच्छन्ति ।

= देवा इच्छन्ति ।

devāḥ icchanti ।

= devā icchanti ।

e.g. 4) देवाः उच्यन्ते ।

= देवा उच्यन्ते ।

devāḥ ucyante ।

= devā ucyante ।

e.g. 5) देवाः ऋच्छन्ति ।

= देवा ऋच्छन्ति ।

devāḥ ṛcchanti ।

= devā ṛcchanti ।

e.g. 6) देवाः एव ।

= देवा एव ।

devāḥ eva ।

= devā eva ।

e.g. 7) देवाः ऐक्षन्त ।

= देवा ऐक्षन्त ।

devāḥ aikṣanta ।

= devā aikṣanta ।

e.g. 8) देवाः औषधिः ।

= देवा औषधिः ।

devāḥ auṣadhiḥ ।

= devā auṣadhiḥ ।

e.g. 9) देवाः वदन्ति ।

= देवा वदन्ति ।

devāḥ vadanti ।

= devā vadanti ।

e.g. 10) देवाः गच्छन्ति ।

= देवा गच्छन्ति ।

devāḥ gacchanti ।

= devā gacchanti ।

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

= Exercise =

1) Resolve the विसर्ग sandhi.

1. देवा अपि = _____ + _____

1. devā api = _____ + _____

3. मणिगणा इव = _____ + _____

3. maṇigaṇā iva = _____ + _____

5. नित्ययुक्ता उपासते= _____ + _____

5. nityayuktā upāsate= _____ + _____

7. गुणा गुणेषु = _____ + _____

7. guṇā guṇeṣu = _____ + _____

9. भोगा दुःखयोनयः = _____ + _____

9. bhogā duḥkhayonayaḥ = _____ + _____

11. जना बहवः = _____ + _____

11. janā bahavaḥ = _____ + _____

13. बुद्धियुक्ता हि = _____ + _____

13. buddhiyuktā hi = _____ + _____

15. आदित्या वसवः = _____ + _____

15. ādityā vasavaḥ = _____ + _____

2. सुरा आगच्छन्ति = _____ + _____

2. surā āgacchanti = _____ + _____

4. देवा ईक्षन्ते = _____ + _____

4. devā īkṣante = _____ + _____

6. जना एव = _____ + _____

6. janā eva = _____ + _____

8. जना घटन्ते = _____ + _____

8. janā ghaṭante = _____ + _____

10. पुरुषा धर्मस्य = _____ + _____

10. puruṣā dharmasya = _____ + _____

12. देवता भक्ताः = _____ + _____

12. devatā bhaktāḥ = _____ + _____

14. पापा ये = _____ + _____

14. pāpā ye = _____ + _____

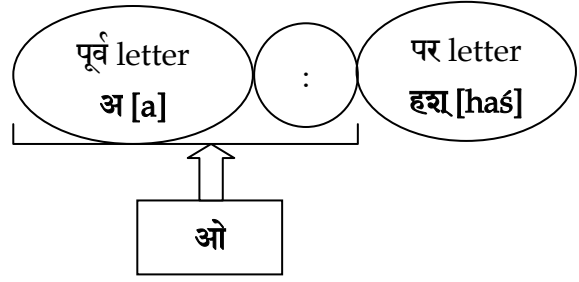
16. आहारा राजसाः = _____ + _____

16. āhārā rājasāḥ = _____ + _____

3. अः + हश् (नमो नमः सन्धिः [namo namaḥ sandhiḥ])

#3 (Change into ओ)

अः + हश् [aḥ + haś]
= ओ + हश् [o + haś]



- When a विसर्ग is preceded by short अ, and followed by हश् (soft consonants), the combination of अ and the विसर्ग becomes "ओ".

e.g. 1) कृष्णः हसति ।
= कृष्णो हसति ।
kṛṣṇaḥ hasati ।
= kṛṣṇo hasati ।

e.g. 2) कृष्णः यतते ।
= कृष्णो यतते ।
kṛṣṇaḥ yatate ।
= kṛṣṇo yatate ।

e.g. 3) कृष्णः वदति ।
= कृष्णो वदति ।
kṛṣṇaḥ vadati ।
= kṛṣṇo vadati ।

e.g. 4) कृष्णः रमते ।
= कृष्णो रमते ।
kṛṣṇaḥ ramate ।
= kṛṣṇo ramate ।

e.g. 5) कृष्णः लभते ।
= कृष्णो लभते ।
kṛṣṇaḥ labhate ।
= kṛṣṇo labhate ।

e.g. 6) कृष्णः गच्छति ।
= कृष्णो गच्छति ।
kṛṣṇaḥ gacchati ।
= kṛṣṇo gacchati ।

e.g. 7) कृष्णः जयति ।
= कृष्णो जयति ।
kṛṣṇaḥ jayati ।
= kṛṣṇo jayati ।

e.g. 8) कृष्णः ध्यायति ।
= कृष्णो ध्यायति ।
kṛṣṇaḥ dhyāyati ।
= kṛṣṇo dhyāyati ।

e.g. 9) कृष्णः भवति ।
= कृष्णो भवति ।
kṛṣṇaḥ bhavati ।
= kṛṣṇo bhavati ।

e.g. 10) कृष्णः नम्यते ।
= कृष्णो नम्यते ।
kṛṣṇaḥ namyate ।
= kṛṣṇo namyate ।

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

= Exercise =

1) Resolve the विसर्ग sandhi.

1. योगेश्वरो हरिः = _____ + _____

1. yogeśvaro hariḥ = _____ + _____

3. ततो युद्धाय = _____ + _____

3. tato yuddhāya = _____ + _____

5. नो राज्यम् = _____ + _____

5. no rājyam = _____ + _____

7. अधो गच्छन्ति = _____ + _____

7. adho gacchanti = _____ + _____

9. तेजो जायते = _____ + _____

9. tejo jāyate = _____ + _____

11. यो देवः = _____ + _____

11. yo devaḥ = _____ + _____

13. मोहो नष्टः = _____ + _____

13. moho naṣṭaḥ = _____ + _____

15. मनो बुद्धिः = _____ + _____

15. mano buddhiḥ = _____ + _____

17. श्रेयो भोक्तुम् = _____ + _____

17. śreyo bhoktum = _____ + _____

2. मनो हृदि = _____ + _____

2. mano hṛdi = _____ + _____

4. यो वेत्ति = _____ + _____

4. yo veti = _____ + _____

6. यशो लभस्व = _____ + _____

6. yaśo labhasva = _____ + _____

8. नष्टो घटः = _____ + _____

8. naṣṭo ghaṭaḥ = _____ + _____

10. काको डीयते = _____ + _____

10. kāko ḍiyate = _____ + _____

12. पार्थो धनुर्धरः = _____ + _____

12. pārtho dhanurdharaḥ = _____ + _____

14. अजो नित्यः = _____ + _____

14. ajo nityaḥ = _____ + _____

16. समो भूत्वा = _____ + _____

16. samo bhūtvā = _____ + _____

18. अतो म्रियते = _____ + _____

18. ato mriyate = _____ + _____

2) Apply विसर्ग sandhi.

1. उक्तः हृषीकेशः = _____

1. uktaḥ hṛṣīkeśaḥ = _____

3. ततः याति = _____

3. tataḥ yāti = _____

5. कः रमेत = _____

5. kaḥ rameta = _____

2. अतः हि = _____

2. ataḥ hi = _____

4. ध्यायतः विषयान् = _____

4. dhyāyataḥ viṣayān = _____

6. यः लोकत्रयम् = _____

6. yaḥ lokatrayam = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

7. नः गरीयः = _____

7. naḥ garīyaḥ = _____

9. अतः जायते = _____

9. ataḥ jāyate = _____

11. मनः दुर्निग्रहम् = _____

11. manaḥ durnigrahaṁ = _____

13. तेजः धृतिः = _____

13. tejaḥ dhṛtiḥ = _____

15. प्रत्यवायः न विद्यते = _____

15. pratyavāyaḥ na vidyate = _____

17. महतः भयात् = _____

17. mahataḥ bhayāt = _____

8. ततः घटः = _____

8. tataḥ ghaṭaḥ = _____

10. ततः डीयते = _____

10. tataḥ dīyate = _____

12. तपः दानम् = _____

12. tapaḥ dānaṁ = _____

14. निर्ममः निरहङ्कारः = _____

14. nirmamaḥ nirahaṅkāraḥ = _____

16. आत्मनः बन्धुः = _____

16. ātmanaḥ bandhuḥ = _____

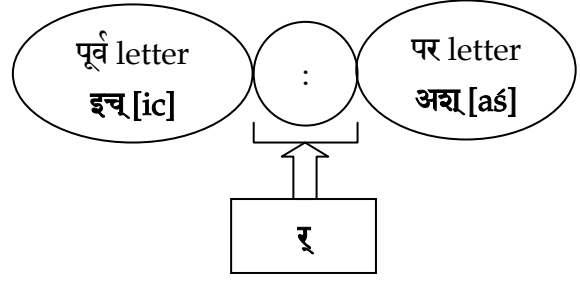
18. योगः भवति = _____

18. yogaḥ bhavati = _____

4. इच् + विसर्गः + अश् (गुरुर्ब्रह्मा सन्धिः [gururbrahmā sandhih])

#4 (Change into र्)

इच् + विसर्गः + अश् [ic + ḥ + aś]
= इच् + र् + अश् [ic + r + aś]



- When a विसर्ग is preceded by इच् (any vowel other than अवर्ण, and followed by अश् (all the vowels and soft consonants), the विसर्ग becomes "र्".

e.g. 1) ऋषिः अस्ति ।
= ऋषिर् अस्ति ।
ṛṣiḥ asti ।
= ṛṣir asti ।

e.g. 2) ऋषिः भवति ।
= ऋषिर् भवति ।
ṛṣiḥ bhavati ।
= ṛṣir bhavati ।

e.g. 3) श्रीः अस्ति ।
= श्रीर् अस्ति ।
śrīḥ asti ।
= śrīr asti ।

e.g. 4) श्रीः भवति ।
= श्रीर् भवति ।
śrīḥ bhavati ।
= śrīr bhavati ।

e.g. 5) गुरुः अस्ति ।
= गुरुर् अस्ति ।
guruḥ asti ।
= gurur asti ।

e.g. 6) गुरुः भवति ।
= गुरुर् भवति ।
guruḥ bhavati ।
= gurur bhavati ।

e.g. 7) हरेः अस्ति ।
= हरेर् अस्ति ।
hareḥ asti ।
= harer asti ।

e.g. 8) हरेः भवति ।
= हरेर् भवति ।
hareḥ bhavati ।
= harer bhavati ।

e.g. 9) गुरोः अस्ति ।
= गुरोर् अस्ति ।
guroḥ asti ।
= guror asti ।

e.g. 10) गुरोः भवति ।
= गुरोर् भवति ।
guroḥ bhavati ।
= guror bhavati ।

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

Note: When followed by ऋ/ॠ, the र् is often written as “ऋ/ॠ”. E.g., मुनिः ऋच्छति = मुनिर्ऋच्छति ।;
गुरुः ऋच्छति = गुरुर्ऋच्छति ।; महर्द्धिः ऋद्धः = महर्द्धिर्ऋद्धः ।

= Exercise =

1) Apply विसर्ग sandhi rule.

1. निराशीः + अपरिग्रहः = _____

1. nirāśīḥ + aparigrahaḥ = _____

3. शुद्धिः + इति = _____

3. śuddhiḥ + iti = _____

5. मुनिः + उच्यते = _____

5. muniḥ + ucyate = _____

7. जिज्ञासुः + अपि = _____

7. jijñāsuh + api = _____

9. उत्सीदेयुः + इमे = _____

9. utsīdeyuh + ime = _____

11. धनुः + उद्यम्य = _____

11. dhanuh + udyamyā = _____

13. हरेः + अयम् = _____

13. hareḥ + ayam = _____

15. हरेः + इयम् = _____

15. hareḥ + iyam = _____

17. उभयोः + अपि = _____

17. ubhayoh + api = _____

19. वायोः + इव = _____

19. vāyoh + iva = _____

21. एतयोः + एकम् = _____

21. etayoh + ekam = _____

2. क्षान्तिः + आर्जवम् = _____

2. kṣāntiḥ + ārjavam = _____

4. हरिः + ईडितः = _____

4. hariḥ + īḍitaḥ = _____

6. बुद्धिः + एका = _____

6. buddhiḥ + ekā = _____

8. बन्धुः + आत्मा = _____

8. bandhuh + ātmā = _____

10. गुरुः + ईडितः = _____

10. guruḥ + īḍitaḥ = _____

12. गुरुः + एव = _____

12. guruḥ + eva = _____

14. हरेः + आगमनम् = _____

14. hareḥ + āgamanam = _____

16. हरेः + उदयः = _____

16. hareḥ + udayaḥ = _____

18. गुरोः + आगमनम् = _____

18. guroh + āgamanam = _____

20. सेनयोः + उभयोः = _____

20. senayoh + ubhayoh = _____

22. गुरोः + ऐश्वर्यम् = _____

22. guroh + aiśvaryam = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

23. शुचिः + दक्षः = _____

23. śuciḥ + dakṣaḥ = _____

25. गुरुः + गरीयान् = _____

25. guruḥ + garīyān = _____

27. प्राहुः + योगम् = _____

27. prāhuḥ + yogam = _____

29. क्षेत्रक्षेत्रज्ञयोः + ज्ञानम् = _____

29. kṣetrakṣetrañāyoh + jñānam = _____

24. ग्लानिः + भवति = _____

24. glāniḥ + bhavati = _____

26. मृत्युः + धावति = _____

26. mṛtyuḥ + dhāvati = _____

28. प्रकृतेः + गुणसंमूढाः = _____

28. prakṛteḥ + guṇasammūḍhāḥ = _____

30. भ्रुवोः + मध्ये = _____

30. bhruvoḥ + madhye = _____

2) Resolve the विसर्ग sandhi.

1. अग्निरहम् = _____ + _____

1. agniraham = _____ + _____

3. भृगुरहम् = _____ + _____

3. bhrguraham = _____ + _____

5. गुरुब्रह्मा = _____ + _____

5. gururbrahmā = _____ + _____

7. प्रकृतेर्वशात् = _____ + _____

7. prakṛtervaśāt = _____ + _____

9. तयोर्न = _____ + _____

9. tayorna = _____ + _____

11. योगैरपि = _____ + _____

11. yogairapi = _____ + _____

13. द्वन्द्वैर्विमुक्ताः = _____ + _____

13. dvandvairvimuktāḥ = _____ + _____

15. सेनयोरुभयोर्मध्ये = _____ + _____ + _____

15. senayorubhayormadhye = _____ + _____ + _____

16. केवलैरिन्द्रियैरपि = _____ + _____ + _____

16. kevalairindriyairapi = _____ + _____ + _____

2. ऋषिर्भवति = _____ + _____

2. ṛṣirbhavati = _____ + _____

4. यजुरेव = _____ + _____

4. yajureva = _____ + _____

6. गुरुर्विष्णुः = _____ + _____

6. gururviṣṇuḥ = _____ + _____

8. विभूतेर्विस्तरः = _____ + _____

8. vibhūtervistaraḥ = _____ + _____

10. एतयोरेकम् = _____ + _____

10. etayorekam = _____ + _____

12. पूर्वैरपि = _____ + _____

12. pūrvairapi = _____ + _____

14. सर्वैरहम् = _____ + _____

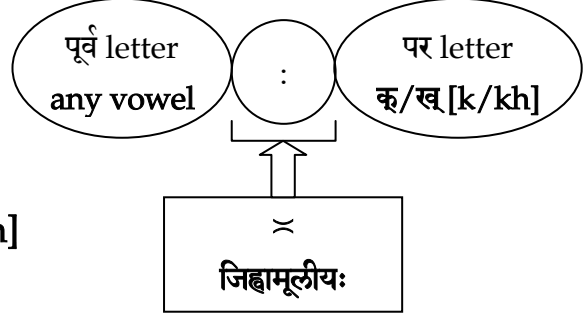
14. sarvairaham = _____ + _____

5. अच् + विसर्गः + क्/ख् (दुःखं सन्धिः [duḥkhaṃ sandhiḥ])

अच् + विसर्गः + प्/फ् (पुनः पुनः सन्धिः सन्धिः [punaḥ punaḥ sandhiḥ])

#5 (Change into जिह्वामूलीयः)

विसर्गः + क्/ख् [ḥ + k/kh]
= जिह्वामूलीयः + क्/ख् [ḥ (≈) + k/kh]



- When विसर्ग is followed by क् or ख्, the विसर्ग becomes जिह्वामूलीयः [jihvāmūliyaḥ] optionally.
- जिह्वामूलीय [jihvāmūliyaḥ] is a sound to pronounce the विसर्ग before क् or ख्. The sound is produced by the vibration of the root of the tongue. It can be written as ≈.

e.g. 1) रामः कथयति ।
= राम ≈ कथयति ।

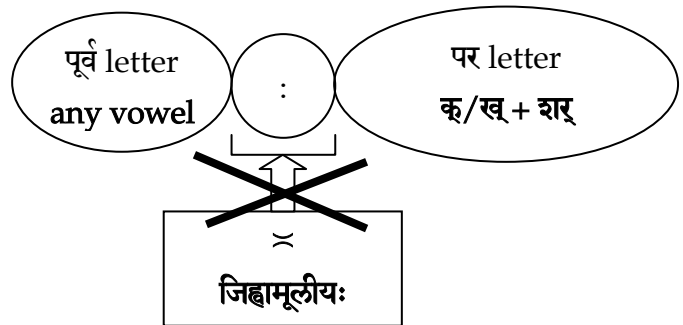
rāmaḥ kathayati ।
= rāma ≈ kathayati ।

e.g. 2) रामः खादति ।
= राम ≈ खादति ।

rāmaḥ khādati ।
= rāma ≈ khādati ।

- There is an exception. When विसर्ग is followed by क्/ख्, which is followed by श्, the विसर्ग does not become जिह्वामूलीयः.

e.g. 3) रामः क्षाम्यते ।
rāmaḥ kṣāmyate ।



Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

= Exercise =

1) Apply विसर्ग sandhi.

1. कैवर्तकः + केशवः = _____

1. kaivartakaḥ + keśavaḥ = _____

3. योगस्थः + कुरु = _____

3. yogasthaḥ + kuru = _____

5. यज्ञः + कर्मसमुद्भवः = _____

5. yajñāḥ + karmasamudbhavaḥ = _____

7. योगिनः + कर्म कुर्वन्ति = _____

7. yoginaḥ + karma kurvanti = _____

9. यः + खनति = _____

9. yaḥ + khanati = _____

11. स्थितधीः + किम् = _____

11. sthitadhīḥ + kim = _____

13. विदुः + कृत्स्नम् = _____

13. viduḥ + kṛtsnam = _____

15. प्रकृतेः + क्रियमाणानि = _____

15. prakṛteḥ + kriyamāṇāni = _____

17. कर्मेन्द्रियैः + कर्मयोगम् = _____

17. karmendriyaiḥ + karmayogam = _____

19. सुखिनः + क्षत्रियाः = _____

19. sukхинаḥ + kṣatriyāḥ = _____

21. धृतिः + क्षमा = _____

21. dhṛtiḥ + kṣamā = _____

2. योगः + कर्मसु = _____

2. yogaḥ + karmasu = _____

4. विद्मः + कतरत् = _____

4. vidmaḥ + katarat = _____

6. निग्रहः + किम् = _____

6. nigrahaḥ + kim = _____

8. प्रसक्ताः + कामभोगेषु = _____

8. prasaktāḥ + kāmabhogeṣu = _____

10. जनाः + खिद्यन्ते = _____

10. janāḥ + khidyante = _____

12. हेतोः + किम् = _____

12. hetoḥ + kim = _____

14. वायुः + खम् = _____

14. vāyuḥ + kham = _____

16. योगैः + कर्माणि = _____

16. yogaiḥ + karmāṇi = _____

18. एतैः + कुलग्नानाम् = _____

18. etaiḥ + kulaghnanām = _____

20. सुखः + क्षमी = _____

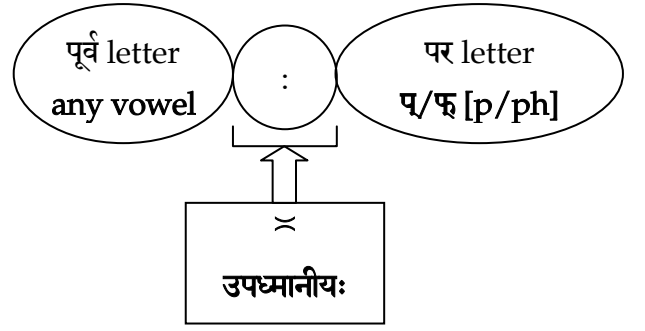
20. sukhaḥ + kṣamī = _____

22. तेजः + क्षमा = _____

22. tejaḥ + kṣamā = _____

#5 (Change into उपध्मानीयः)

विसर्गः + प/फ़ [ḥ + p/ph]
= उपध्मानीयः + प/फ़ [ḥ (ꣳ) + p/ph]



- When विसर्ग is followed by प or फ़ the विसर्ग becomes उपध्मानीयः [upadhmanīyaḥ] optionally.
- उपध्मानीय is a sound to pronounce the विसर्ग before प or फ़. The sound is made by blowing through rounded lips. It can be written as ꣳ.

e.g. 1) रामः पश्यति ।

= राम पश्यति ।

rāmaḥ paśyati ।

= rāma ꣳ paśyati ।

e.g. 2) रामः फलितः ।

= राम फलितः ।

rāmaḥ phalitaḥ ।

= rāma ꣳ phalitaḥ ।

= Exercise =

1) Apply विसर्ग sandhi.

1. यः + पश्यति = _____

1. yaḥ + paśyati = _____

3. पुरुषः + पुरुषः = _____

3. puruṣaḥ + puruṣaḥ = _____

5. कर्मणः + फलम् = _____

5. karmaṇaḥ + phalam = _____

7. इषुभिः + प्रतियोत्स्यामि = _____

7. iṣubhiḥ + pratiyotsyāmi = _____

9. हेतुः + प्रकृतिः = _____

9. hetuḥ + prakṛtiḥ = _____

11. केशवार्जुनयोः + पुण्यम् = _____

11. keśavārjunayoḥ + puṇyam = _____

13. साङ्ख्यैः + प्राप्यते = _____

13. sāṅkhyaiḥ + prāpyate = _____

2. पुनः + पुनः = _____

2. punaḥ + punaḥ = _____

4. मामकाः + पाण्डवाः = _____

4. māmakāḥ + pāṇḍavāḥ = _____

6. कृपणाः + फलहेतवः = _____

6. kṛpaṇāḥ + phalahetavaḥ = _____

8. तमाहुः + पण्डितम् = _____

8. tamāhuḥ + paṇḍitam = _____

10. बुद्धेः + परम् = _____

10. buddheḥ + param = _____

12. पूर्वैः + पूर्वतरम् = _____

12. pūrvaiḥ + pūrvataram = _____

14. सर्वपापैः + प्रमुच्यते = _____

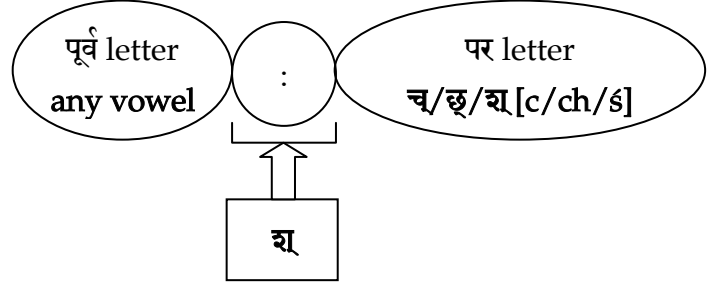
14. sarvapāpaiḥ + pramucyate = _____

6. अच् + विसर्गः + other hard consonants

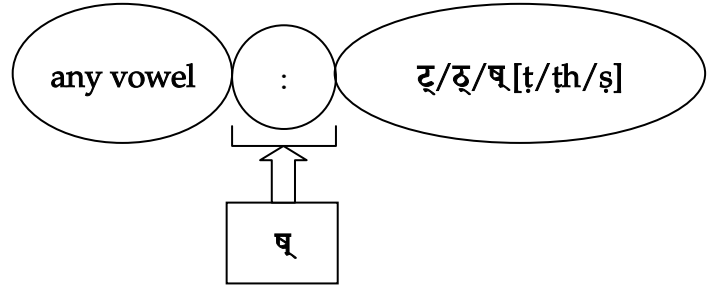
(रामश्च सन्धिः [rāmaśca sandhiḥ]), नमस्ते सन्धिः [namaste sandhiḥ])

#6 (change into श, ष, स)

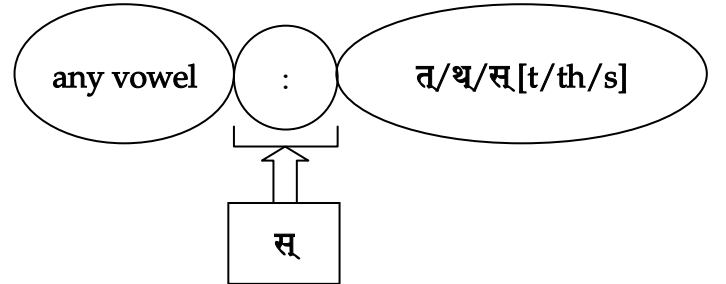
विसर्गः + च/छ/श् [ḥ + c/ch/ś]
 = श + च/छ/श् [ś + c/ch/ś]
 (palatal)



विसर्गः + ट्/ठ्/ष् [ḥ + t/th/ṣ]
 = ष + ट्/ठ्/ष् [ṣ + t/th/ṣ]
 (cerebral)



विसर्गः + त्/थ्/स् [ḥ + t/th/s]
 = स् + त्/थ्/स् [s + t/th/s]
 (dental)



- When विसर्ग is followed by hard palatal, cerebral, and dental consonants, the substitutions are श, ष, and स् respectively, the sibilants belonging to the same स्थान.
- When विसर्ग is followed by श, ष, स्, the substitution is optional.

e.g. 1) रामः चरति ।

= रामश् चरति ।
 rāmaḥ carati ।
 = rāmaś carati ।

e.g. 2) रामः छोटयति ।

= रामश् छोटयति ।
 rāmaḥ choṭayati ।
 = rāmaś choṭayati ।

e.g. 3) शान्तिः शान्तिः ।

= शान्तिश् शान्तिः । (optional)
 śāntiḥ śāntiḥ ।
 = śāntiś śāntiḥ ।

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

e.g. 4) रामः टीकते ।

= रामष् टीकते ।

rāmaḥ ṭīkate ।

= rāmaṣ ṭīkate ।

e.g. 5) रामः ठक्कुरः ।

= रामष् ठक्कुरः ।

rāmaḥ ṭhakkuraḥ ।

= rāmaṣ ṭhakkuraḥ ।

e.g. 6) मनः षष्ठानि ।

= मनष् षष्ठानि । (optional)

manaḥ ṣaṣṭhāni ।

= manaṣ ṣaṣṭhāni ।

e.g. 7) रामः तरति ।

= रामस् तरति ।

rāmaḥ tarati ।

= rāmas tarati ।

e.g. 8) रामः थुडति ।

= रामस् थुडति ।

rāmaḥ thuḍati ।

= rāmas thuḍati ।

e.g. 9) रामः सरति ।

= रामस् सरति (optional)

rāmaḥ sarati ।

= rāmas sarati

= Exercise =

1) Remove the विसर्ग sandhi.

1. मनश्च = _____

1. manaśca = _____

3. पाण्डवाश्च = _____

3. pāṇḍavāśca = _____

5. आदिश्च = _____

5. ādiśca = _____

7. हरेश्चरणम् = _____

7. hareścaraṇam = _____

9. वेदैश्च = _____

9. vedaiśca = _____

11. रामष्ठीकते = _____

11. rāmaṣṭhīkate = _____

13. यस्तु = _____

13. yastu = _____

15. बुद्धिस्तदा = _____

15. buddhistadā = _____

17. बुद्धेस्तदा = _____

2. मनश्चित्तम् = _____

2. manaścittam = _____

4. अनन्याश्चिन्तयन्तः = _____

4. ananyāścintayantaḥ = _____

6. वेपथुश्च = _____

6. vepathuśca = _____

8. गुरोश्चरणम् = _____

8. guroścaraṇam = _____

10. गौश्च = _____

10. gauśca = _____

14. मात्रास्पर्शास्तु = _____

14. mātrāsparśāstu = _____

16. प्राहुस्तान् = _____

16. prāhustān = _____

18. अनयोस्तत्त्वदर्शिभिः = _____

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17. buddhestadā = _____

18. anayostattvadarśibhiḥ = _____

19. विमुक्तैस्तु = _____

20. गौस्तरति = _____

19. vimuktaistu = _____

20. gaustarati = _____

2) Apply विसर्ग sandhi.

1. रामः + च = _____

2. रामः + चिनोति = _____

1. rāmaḥ + ca = _____

2. rāmaḥ + cinoti = _____

3. हरिः + चरति = _____

4. गुरुः + चरति = _____

3. hariḥ + carati = _____

4. guruḥ + carati = _____

5. कवेः + चित्तम् = _____

6. मुमुक्षोः + चित्तम् = _____

5. kaveḥ + cittam = _____

6. mumukṣoḥ + cittam = _____

7. इन्द्रियैः + चरन् = _____

8. गौः + चरति = _____

7. indriyaiḥ + caran = _____

8. gauḥ + carati = _____

9. रामः + टीकाम् = _____

10. एषाः + टीकाः = _____

9. rāmaḥ + ṭīkāṃ = _____

10. eṣāḥ + ṭīkāḥ = _____

11. रामः + तरति = _____

12. पुत्राः + तथा = _____

11. rāmaḥ + tarati = _____

12. putrāḥ + tathā = _____

13. हरिः + तरति = _____

14. गुरुः + तथा = _____

13. hariḥ + tarati = _____

14. guruḥ + tathā = _____

15. हरेः + तथा = _____

16. एतयोः + तथा = _____

15. hareḥ + tathā = _____

16. etayoḥ + tathā = _____

17. एतैः + तरति = _____

18. गौः + तथा = _____

17. etaiḥ + tarati = _____

18. gauḥ + tathā = _____

7. Practice of all visarga sandhi

1) अः + all possible combinations

- | | |
|---------------------------|----------------------------|
| 1. रामः + अस्ति = _____ | 21. रामः + डयते = _____ |
| 2. रामः + आगच्छति = _____ | 22. रामः + ढौकते = _____ |
| 3. रामः + इति = _____ | 23. रामः + तरति = _____ |
| 4. रामः + ईक्षते = _____ | 24. रामः + थुर्वति = _____ |
| 5. रामः + उपवसति = _____ | 25. रामः + ददाति = _____ |
| 6. रामः + ऊहः = _____ | 26. रामः + धारयते = _____ |
| 7. रामः + ऋच्छति = _____ | 27. रामः + नमति = _____ |
| 8. रामः + एधते = _____ | 28. रामः + पश्यति = _____ |
| 9. रामः + ओदनम् = _____ | 29. रामः + फलति = _____ |
| 10. रामः + ऐक्षत = _____ | 30. रामः + बाधते = _____ |
| 11. रामः + औषधिः = _____ | 31. रामः + भवति = _____ |
| 12. रामः + कथयति = _____ | 32. रामः + मीयते = _____ |
| 13. रामः + खादति = _____ | 33. रामः + यतते = _____ |
| 14. रामः + गच्छति = _____ | 34. रामः + रमते = _____ |
| 15. रामः + घटते = _____ | 35. रामः + लील्यते = _____ |
| 16. रामः + चलति = _____ | 36. रामः + वदति = _____ |
| 17. रामः + छाया = _____ | 37. रामः + शङ्कते = _____ |
| 18. रामः + जानाति = _____ | 38. रामः + षष्ठः = _____ |
| 19. रामः + झटिति = _____ | 39. रामः + सरति = _____ |
| 20. रामः + टीकते = _____ | 40. रामः + हसति = _____ |

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

2) आः + all possible combinations

1. रामाः + अटन्ति = _____
2. रामाः + आगच्छन्ति = _____
3. रामाः + इति = _____
4. रामाः + ईक्षन्ते = _____
5. रामाः + उपवसन्ति = _____
6. रामाः + ऊहाः = _____
7. रामाः + ऋच्छन्ति = _____
8. रामाः + एधन्ते = _____
9. रामाः + ओदनम् = _____
10. रामाः + ऐक्षन्त = _____
11. रामाः + औषधिः = _____
12. रामाः + कथयन्ति = _____
13. रामाः + खादन्ति = _____
14. रामाः + गच्छन्ति = _____
15. रामाः + घटन्ते = _____
16. रामाः + चलन्ति = _____
17. रामाः + छाया = _____
18. रामाः + जानन्ति = _____
19. रामाः + झटिति = _____
20. रामाः + टीकन्ते = _____

21. रामाः + डयन्ते = _____
22. रामाः + दौकन्ते = _____
23. रामाः + तरन्ति = _____
24. रामाः + थुर्वन्ति = _____
25. रामाः + ददति = _____
26. रामाः + धारयन्ते = _____
27. रामाः + नमन्ति = _____
28. रामाः + पश्यन्ति = _____
29. रामाः + फलन्ति = _____
30. रामाः + बाधन्ते = _____
31. रामाः + भवन्ति = _____
32. रामाः + मीयन्ते = _____
33. रामाः + यतन्ते = _____
34. रामाः + रमन्ते = _____
35. रामाः + लीलयन्ते = _____
36. रामाः + वदन्ति = _____
37. रामाः + शङ्कन्ते = _____
38. रामाः + षष्ठाः = _____
39. रामाः + सरन्ति = _____
40. रामाः + हसन्ति = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

3) इः + all possible combinations

1. हरिः + अस्ति = _____

2. हरिः + आगच्छति = _____

3. हरिः + इति = _____

4. हरिः + ईक्षते = _____

5. हरिः + उपवसति = _____

6. हरिः + ऊहः = _____

7. हरिः + ऋच्छति = _____

8. हरिः + एधते = _____

9. हरिः + ओदनम् = _____

10. हरिः + ऐक्षत = _____

11. हरिः + औषधिः = _____

12. हरिः + कथयति = _____

13. हरिः + खादति = _____

14. हरिः + गच्छति = _____

15. हरिः + घटते = _____

16. हरिः + चलति = _____

17. हरिः + छाया = _____

18. हरिः + जानाति = _____

19. हरिः + झटिति = _____

20. हरिः + टीकते = _____

21. हरिः + ड्यते = _____

22. हरिः + ढौकते = _____

23. हरिः + तरति = _____

24. हरिः + थुर्वति = _____

25. हरिः + ददाति = _____

26. हरिः + धारयते = _____

27. हरिः + नमति = _____

28. हरिः + पश्यति = _____

29. हरिः + फलति = _____

30. हरिः + बाधते = _____

31. हरिः + भवति = _____

32. हरिः + मीयते = _____

33. हरिः + यतते = _____

34. हरिः + रमते = _____

35. हरिः + लीलयते = _____

36. हरिः + वदति = _____

37. हरिः + शङ्कते = _____

38. हरिः + षष्ठः = _____

39. हरिः + सरति = _____

40. हरिः + हसति = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

4) उः + all possible combinations

1. गुरुः + अस्ति = _____

2. गुरुः + आगच्छति = _____

3. गुरुः + इति = _____

4. गुरुः + ईक्षते = _____

5. गुरुः + उपवसति = _____

6. गुरुः + ऊहः = _____

7. गुरुः + ऋच्छति = _____

8. गुरुः + एधते = _____

9. गुरुः + ओदनम् = _____

10. गुरुः + ऐक्षत = _____

11. गुरुः + औषधिः = _____

12. गुरुः + कथयति = _____

13. गुरुः + खादति = _____

14. गुरुः + गच्छति = _____

15. गुरुः + घटते = _____

16. गुरुः + चलति = _____

17. गुरुः + छाया = _____

18. गुरुः + जानाति = _____

19. गुरुः + झटिति = _____

20. गुरुः + टीकते = _____

21. गुरुः + डयते = _____

22. गुरुः + दौकते = _____

23. गुरुः + तरति = _____

24. गुरुः + थुर्वति = _____

25. गुरुः + ददाति = _____

26. गुरुः + धारयते = _____

27. गुरुः + नमति = _____

28. गुरुः + पश्यति = _____

29. गुरुः + फलति = _____

30. गुरुः + बाधते = _____

31. गुरुः + भवति = _____

32. गुरुः + मीयते = _____

33. गुरुः + यतते = _____

34. गुरुः + रमते = _____

35. गुरुः + लीलयते = _____

36. गुरुः + वदति = _____

37. गुरुः + शङ्कते = _____

38. गुरुः + षष्ठः = _____

39. गुरुः + सरति = _____

40. गुरुः + हसति = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

5) सः + all possible combinations

1. सः + अस्ति = _____

2. सः + आगच्छति = _____

3. सः + इति = _____

4. सः + ईक्षते = _____

5. सः + उपवसति = _____

6. सः + ऊहः = _____

7. सः + ऋच्छति = _____

8. सः + एधते = _____

9. सः + ओदनम् = _____

10. सः + ऐक्षत = _____

11. सः + औषधिः = _____

12. सः + कथयति = _____

13. सः + खादति = _____

14. सः + गच्छति = _____

15. सः + घटते = _____

16. सः + चलति = _____

17. सः + छाया = _____

18. सः + जानाति = _____

19. सः + झटिति = _____

20. सः + टीकते = _____

21. सः + डयते = _____

22. सः + ढौकते = _____

23. सः + तरति = _____

24. सः + थुर्वति = _____

25. सः + ददाति = _____

26. सः + धारयते = _____

27. सः + नमति = _____

28. सः + पश्यति = _____

29. सः + फलति = _____

30. सः + बाधते = _____

31. सः + भवति = _____

32. सः + मीयते = _____

33. सः + यतते = _____

34. सः + रमते = _____

35. सः + लील्यते = _____

36. सः + वदति = _____

37. सः + शङ्कते = _____

38. सः + षष्ठः = _____

39. सः + सरति = _____

40. सः + हसति = _____

Topic IV - Visarga Sandhi (विसर्ग-सन्धिः)

6) एषः + all possible combinations

1. एषः + अस्ति = _____

2. एषः + आगच्छति = _____

3. एषः + इति = _____

4. एषः + ईक्षते = _____

5. एषः + उपवसति = _____

6. एषः + ऊहः = _____

7. एषः + ऋच्छति = _____

8. एषः + एधते = _____

9. एषः + ओदनम् = _____

10. एषः + ऐक्षत = _____

11. एषः + औषधिः = _____

12. एषः + कथयति = _____

13. एषः + खादति = _____

14. एषः + गच्छति = _____

15. एषः + घटते = _____

16. एषः + चलति = _____

17. एषः + छाया = _____

18. एषः + जानाति = _____

19. एषः + झटिति = _____

20. एषः + टीकते = _____

21. एषः + डयते = _____

22. एषः + ढौकते = _____

23. एषः + तरति = _____

24. एषः + थुर्वति = _____

25. एषः + ददाति = _____

26. एषः + धारयते = _____

27. एषः + नमति = _____

28. एषः + पश्यति = _____

29. एषः + फलति = _____

30. एषः + बाधते = _____

31. एषः + भवति = _____

32. एषः + मीयते = _____

33. एषः + यतते = _____

34. एषः + रमते = _____

35. एषः + लीलयते = _____

36. एषः + वदति = _____

37. एषः + शङ्कते = _____

38. एषः + षष्ठः = _____

39. एषः + सरति = _____

40. एषः + हसति = _____

Topic V

Vowel sandhi

अच्-सन्धि: [ac-sandhiḥ]

अच् [ac] is the प्रत्याहारः [pratyāhārah], abbreviation, for all vowels. Thus अच्-सन्धि [ac-sandhiḥ] means vowel sandhi. अच्-सन्धि is a phonetic change when a vowel is followed by another vowel.

The sound which comes first is called पूर्व [pūrva], and the sound which comes later is called पर [para]. Since there are nine vowels according to माहेश्वरसूत्राणि [māheśvarasūtrāṇi], Table 7: *Overview of Vowel Sandhi* is a 9 x 9 chart which covers every possible combination of the vowels. (Remember that all the varieties of vowel, short and long, are represented by the nine vowels told in माहेश्वरसूत्रs.) In the intersection of the पूर्व and पर sounds, the corresponding change is shown.

The changes are grouped into five areas. These areas are named by the type of the sounds of the change. 1. दीर्घः [dīrghaḥ] (long vowels: आ, ई, ऊ, ऋ), 2. गुणः [guṇaḥ] (अ, ए, ओ), 3. वृद्धिः [vṛddhiḥ] (आ, ऐ, औ), 4. यण् (प्रत्याहारः for य, व, र, ल्), 5. अयवायावः (अय, अव, आय, आव)

After studying अच्-सन्धि rules, observe the following points:

- दीर्घः, गुणः, and वृद्धिः are the substitutes in the place of both पूर्व and पर.
- यण् and अयवायावः are the substitutes in the place of पूर्व only.
- Notice that गुणः and वृद्धिः are the substitutes only when पूर्व is अवर्ण (all 18 types of अ).
- If पूर्व is इक् (the remainder of the simple vowels), the substitute is यण्, except when the substitute is दीर्घः.
- And if पूर्व is एच् (diphthongs), the substitute is अयवायावः, with some exceptions.

Table 7: Overview of Vowel Sandhi

पूर्व and पर sounds are grouped by प्रत्याहारs, with the इत् sounds in the pentagons.

		इक्					एच्			
		क्					च्			
पर \ पूर्व	अ/आ	इ/ई	उ/ऊ	ऋ/ॠ	ऌ	ए	ओ	ऐ	औ	
अ/आ	दीर्घः आ	गुणः ए	ओ	अ + र्	अ + ल्	वृद्धिः ऐ	औ	ऐ	औ	
इ/ई	यण् य्	दीर्घः ई	यण् य्							
उ/ऊ	व्	दीर्घः ऊ		व्						
ऋ/ॠ	र्	दीर्घः ॠ			र्					
ए	एऽ *1	अयवायावः अय् *2								
ओ	ओऽ	अव्								
ऐ		आय्								
औ		आव्								

*1 When ए/ओ at the end of a पद is followed by short अ, only ए/औ remains. (पूर्वरूपम्)

* 2 य्/व् at the end of a पद optionally drops. (लोपः शाकल्यस्य।)

The basics of understanding Pāṇini-sūtras on sandhi

Sandhi rules are described in the form of sūtra given by Pāṇini. Sūtras are minimized and precise sentences. (We will study the definitions of sūtra in a later volume.)

In his metalanguage system of using words in sūtras, Pāṇini assigned extra meanings to 5th, 6th, and 7th case nominal suffixes. These artificial विभक्त्यर्थs are used only in his sūtras, and only when the meanings of the विभक्ति found in the natural language do not convey the intended meaning.

In a Pāṇinisūtra, a noun in the:

- 1st case is the substitute. (आदेशः)

“ ... is the substitute ”

- 6th case is the occupant of the place of substitution. (स्थानी)

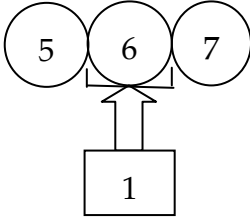
“In the place of ... ”

- 7th case follows the place of substitution. (परनिमित्तम्)

“When ... follows.”

- 5th case precedes the place of substitution. (पूर्वनिमित्तम्)

“When ... precedes.”



In this book, study of the Pāṇini-sūtras can initially be skipped by beginners. Rules and exercises can be studied first, and sūtras can be studied later as revision.

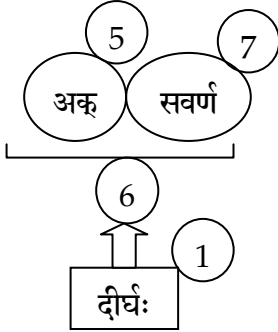
1. सवर्ण-दीर्घ-सन्धि: [savarna-dīrgha-sandhiḥ]

When a simple vowel is immediately followed by a similar simple vowel, they together become one long vowel.

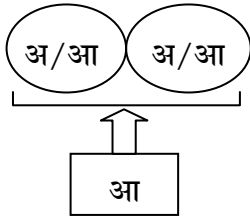
- अ/आ + अ/आ = आ
- इ/ई + इ/ई = ई
- उ/ऊ + उ/ऊ = ऊ
- ऋ/ॠ/ऌ + ऋ/ॠ/ऌ = ॠ

6.1.101 अकः^{5/1} सवर्ण^{7/1} दीर्घः^{1/1} । ~ पूर्वपरयोः^{6/2} एकः^{1/1} अचि^{7/1} संहितायाम्^{7/1}

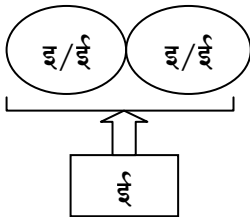
- When अकः is immediately followed by a similar sound (सवर्ण, refer back to Topic I), the long vowel is the substitution in the place of the two.



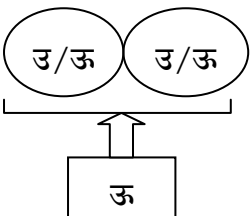
○ अक = _____



e.g. 1) वेद + अर्थः = वेदार्थः

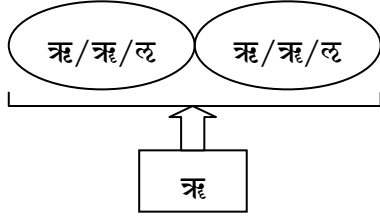


e.g. 2) अस्ति + इति = अस्तीति



e.g. 3) सु + उक्तम् = सूक्तम्

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])



e.g. 4) पितृ + ऋणम् = पितृणम्

= Exercise =

1) Apply the दीर्घ sandhi rule between the two words.

- | | |
|---------------------------|-----------------------------|
| 1. इह + अमुत्र = _____ | 2. ब्रह्म + अण्डम् = _____ |
| 3. परम + आत्मा = _____ | 4. तथा + अस्तु = _____ |
| 5. धर्म + अधर्म = _____ | 6. विद्या + अविद्या = _____ |
| 7. नित्य + अनित्य = _____ | 8. राजस + अंशः = _____ |
| 9. इति + इदम् = _____ | 10. अपि + इह = _____ |
| 11. अस्ति + इति = _____ | 12. गच्छति + इति = _____ |
| 13. श्री + ईशः = _____ | 14. मुनि + ईश्वरः = _____ |
| 15. साधु + उक्तम् = _____ | 16. वधू + उत्सवः = _____ |

2) Resolve the दीर्घ sandhi.

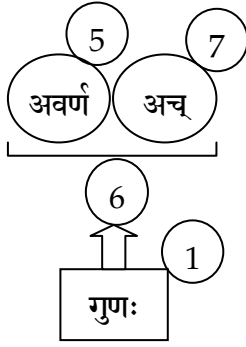
- | | |
|------------------------------------|-----------------------------------|
| 1. नास्ति = _____ + _____ | 2. इहापि = _____ + _____ |
| 3. शमादि = _____ + _____ | 4. सत्त्वांश = _____ + _____ |
| 5. ब्रह्मात्मा = _____ + _____ | 6. कर्ताहम् = _____ + _____ |
| 7. तथापि = _____ + _____ | 8. अत्रायम् = _____ + _____ |
| 9. आत्मानात्मा = _____ + _____ | 10. जीवात्मा = _____ + _____ |
| 11. अस्तीति = _____ + _____ | 12. अपीह = _____ + _____ |
| 13. श्रीशः = _____ + _____ | 14. पाणीन्द्रियम् = _____ + _____ |
| 15. मुनीन्द्रः = _____ + _____ | 16. ध्यायतीव = _____ + _____ |
| 17. वस्तूपदेशः = _____ + _____ | 18. रघूत्तमः = _____ + _____ |
| 19. गीतासूपनिषत्सु = _____ + _____ | 20. गुरूपसदनम् = _____ + _____ |

2. गुण-सन्धि: [guṇa-sandhiḥ]

When अ/आ is immediately followed by इक्, गुण [guṇa] is the one substitute in the place of the two sounds.

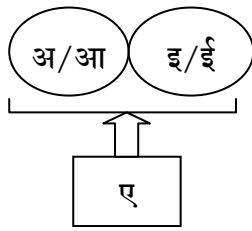
6.1.87 आत्^{5/1} गुणः^{1/1} । ~ अचि^{7/1} पूर्वपरयोः^{6/2} एकः^{1/1} संहितायाम्^{7/1}

- When अवर्ण (any type of अ) is immediately followed by अच्, a गुण is the substitute in the place of the two.



- अच् = _____
- गुणः = _____

- गुणः (guṇaḥ) is a name for these 3 letters: अ, ए, ओ.
- अ is guttural. ए is guttural-palatal. ओ is guttural-labial.
- Which one of the गुण letters becomes the substitute is decided according to the स्थान of the original letters.



- अ/आ is guttural
- इ/ई is palatal
- The गुण letter ए is guttural-palatal

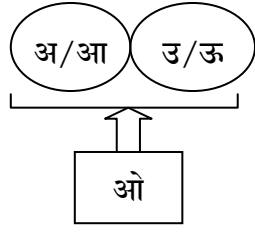
e.g. 1) च + इति = चेति

e.g. 2) राम + ईश्वरः = रामेश्वरः

e.g. 3) गङ्गा + इति = गङ्गेति

e.g. 4) गङ्गा + ईश्वरः = गङ्गेश्वरः

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])



- अ/आ is guttural
- उ/ऊ is labial
- The गुण letter ओ is guttural-labial

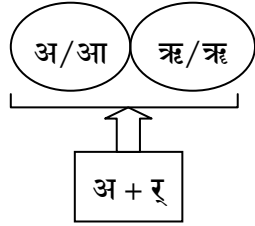
e.g. 1) च + उक्तः = चोक्तः

e.g. 2) च + ऊर्ध्वम् = चोर्ध्वम्

e.g. 3) यथा + उक्तः = यथोक्तः

e.g. 4) यथा + ऊर्ध्वम् = यथोर्ध्वम्

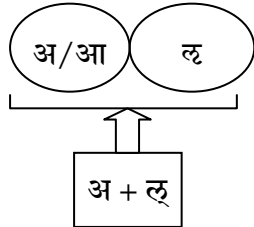
- There is an additional rule. When ऋ/ॠ or ॡ is substituted by अण, the substitute should be followed by र् or ॡ, respectively.



- अ/आ is guttural.
- ऋ/ॠ is cerebral.
- The गुण letter अ is guttural.
- र् follows the अ.

e.g. 1) कृष्ण + ऋद्धिः = कृष्णर्द्धिः

e.g. 2) गङ्गा + ऋद्धिः = गङ्गर्द्धिः



- अ/आ is guttural.
- ॡ is dental.
- The गुण letter अ is guttural.
- ॡ follows the अ.

e.g. 1) तव + ॡकारः = तवॡकारः

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])

= Exercise =

1) Apply the गुण sandhi between the two words.

- | | |
|----------------------------|---------------------------|
| 1. च + इति = _____ | 2. कर्ता + इति = _____ |
| 3. न + इति = _____ | 4. प्र + ईक्षणम् = _____ |
| 5. योग + ईश्वरः = _____ | 6. सुर + ईश्वरः = _____ |
| 7. गण + ईशः = _____ | 8. उमा + ईशः = _____ |
| 9. गज + इन्द्रः = _____ | 10. देव + इन्द्रः = _____ |
| 11. गङ्गा + उदकम् = _____ | 12. यथा + उक्तम् = _____ |
| 13. सर्व + उपनिषद् = _____ | 14. शीत + उष्ण = _____ |
| 15. माया + उपाधिः = _____ | 16. पर + उपकारी = _____ |
| 17. देव + ऋषिः = _____ | 18. पाप + ऋद्धिः = _____ |
| 19. ब्रह्मा + ऋषिः = _____ | 20. परम + ऋषिः = _____ |

2) Resolve the गुण sandhi between the two words.

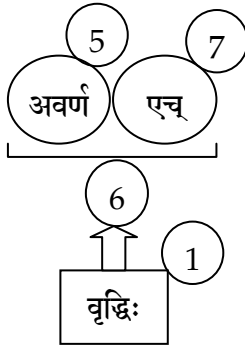
- | | |
|-------------------------------------|------------------------------------|
| 1. तथेति = _____ + _____ | 2. यथेच्छा = _____ + _____ |
| 3. ज्ञानेन्द्रियाणि = _____ + _____ | 4. कर्मेन्द्रियाणि = _____ + _____ |
| 5. सुरेशः = _____ + _____ | 6. गङ्गेशः = _____ + _____ |
| 7. नेति = _____ + _____ | 8. तथेह = _____ + _____ |
| 9. यथोक्तम् = _____ + _____ | 10. पूर्वोक्तम् = _____ + _____ |
| 11. सूर्योदयम् = _____ + _____ | 12. नो = _____ + _____ |
| 13. गुणोपेतः = _____ + _____ | 14. हितोपदेशः = _____ + _____ |
| 15. कठोपनिषत् = _____ + _____ | 16. केनोपनिषत् = _____ + _____ |
| 17. महर्षिः = _____ + _____ | 18. ग्रीष्मर्तुः = _____ + _____ |
| 19. एषर्क् = _____ + _____ | 20. नर्ते = _____ + _____ |

3. वृद्धि-सन्धि: [vr̥ddhi-sandhiḥ]

When अ/आ is immediately followed by एच्, वृद्धि [vr̥ddhi] is the one substitute in the place of the two sounds.

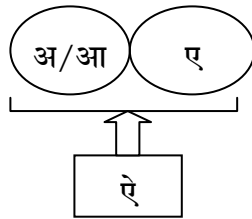
6.1.88 वृद्धिः^{1/1} एचि^{7/1} । ~ आत्^{5/1} पूर्वपरयोः^{6/2} एक्^{1/1} संहितायाम्^{7/1}

- When अवर्ण (any type of अ) is immediately followed by एच्, a वृद्धि is the substitute in the place of the two.



- एच् = _____
- वृद्धिः = _____

- वृद्धि (vr̥ddhi) is a name for these 3 letters: आ, ऐ, औ
- आ is guttural. ऐ is guttural-palatal. औ is guttural-labial.
- Which one of the वृद्धि letters becomes the substitute is decided according to the स्थान of the original letters.

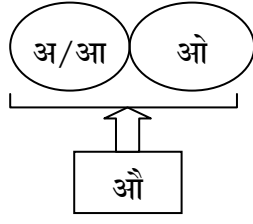


- अ/आ is guttural
- ए is guttural-palatal
- The वृद्धि letter ऐ is guttural-palatal

e.g. 1) च + एव = चैव

e.g. 2) तथा + एव = तथैव

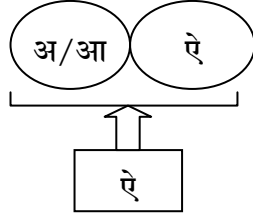
Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])



- अ/आ is guttural
- ओ is guttural-labial
- The वृद्धि letter औ is guttural- labial

e.g. 1) जल + ओघः = जलौघः

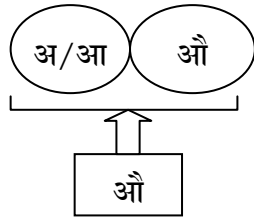
e.g. 2) गङ्गा + ओघः = गङ्गौघः



- अ/आ is guttural
- ऐ is guttural-palatal
- The वृद्धि letter ऐ is guttural-palatal

e.g. 1) देव + ऐश्वर्यम् = देवैश्वर्यम्

e.g. 2) महा + ऐश्वर्यम् = महैश्वर्यम्



- अ/आ is guttural
- औ is guttural-labial
- The वृद्धि letter औ is guttural- labial

e.g. 1) देव + औषधम् = देवौषधम्

e.g. 2) महा + औषधम् = महौषधम्

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])

= Exercise =

1) Apply the वृद्धि sandhi between the two words.

1. इह + एव = _____

2. तत्र + एव = _____

3. विदित्वा + एनम् = _____

4. कृत्वा + एतत् = _____

5. गङ्गा + ओघः = _____

6. कृष्ण + औत्कण्ठ्यम् = _____

2) Resolve the वृद्धि sandhi between the two words.

1. ब्रह्मैव = _____ + _____

2. तथैव = _____ + _____

3. एकैकम् = _____ + _____

4. यथैवम् = _____ + _____

5. सैषा = _____ + _____

6. मैवम् = _____ + _____

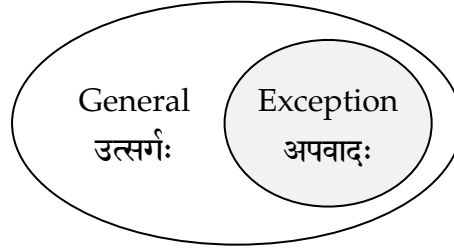
7. विम्बौष्ठी = _____ + _____

8. महौष्ण्यम् = _____ + _____

General rule (उत्सर्ग [utsarga]) and Exception (अपवाद [apavāda])

The concept of उत्सर्ग [utsarga] and अपवाद [apavāda] is used throughout Pāṇini sūtras to present rules which cover the same scope of operation.

उत्सर्ग and अपवाद are relative terms. उत्सर्ग is a general rule, while अपवाद is a special rule whose scope is totally within the scope of उत्सर्ग. When such a relationship is observed between two rules, अपवाद takes effect by negating उत्सर्ग.



अपवाद does not have its own scope outside that of उत्सर्ग. Thus, if अपवाद never took effect, it would become useless, which is not acceptable.

Among दीर्घसन्धि, गुणसन्धि, and वृद्धिसन्धि, there are relationships called उत्सर्ग and अपवाद.

- When अवर्ण as पूर्व is followed by अच् (any vowel) as पर, the substitute is गुणः. This is the general rule (उत्सर्गः). (Refer 6.1.87 आत्^{5/1} गुणः^{1/1} । ~ अचि^{7/1} पूर्वपरयोः^{6/2} एकः^{1/1} संहितायाम्^{7/1})
- When अवर्ण is पर, the substitute is दीर्घः. This is an exception (अपवादः) to गुण.
- When एच् is पर, the substitute is वृद्धिः. This is another exception (अपवादः) to गुण.

In this case गुण rule is called “उत्सर्ग” (by-default general rule), and दीर्घ rule and वृद्धि rule are called “अपवाद” (exceptions).

पर	अ/आ	इ/ई	उ/ऊ	ऋ/ॠ	ऌ	ए	ओ	ऐ	औ
	अच्								
पूर्व	सवर्णः	इक्				एच्			
अ/आ	दीर्घः	गुणः				वृद्धिः			

4. यण्-सन्धि: [yaṅ-sandhih]

When इक् is immediately followed by अच्, यण् (य, व, र, ल) is the substitute for the इक्.

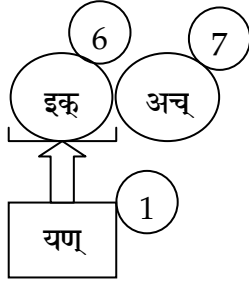
6.1.77 इक्: ^{6/1} यण् ^{1/1} अच् ^{7/1} । ~ संहितायाम् ^{7/1}

□ When इक् is immediately followed by अच् there is a यण् substitute in the place of इक्.

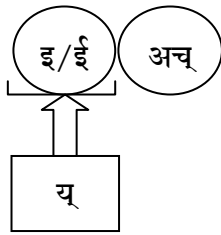
* दीर्घसन्धि is an अपवाद of यण्-सन्धि.

□ The substitution is decided by the स्थान of the sounds.

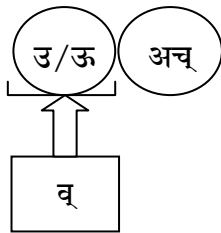
- इ/ई (palatal) => य (palatal)
- उ/ऊ (labial) => व (dental-labial)
- ऋ/ॠ (cerebral) => र (cerebral)
- ल (dental) => ल (dental)



- इक् = _____
- यण् = _____
- अच् = _____

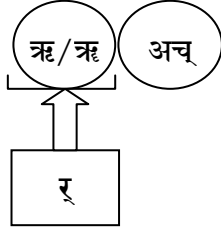


- e.g. 1) इति + अत्र = इत्यत्र
 e.g. 2) नदी + अत्र = नद्यत्र
 e.g. 3) इति + उच्यते = इत्युच्यते
 e.g. 4) नदी + उच्यते = नद्युच्यते



- e.g. 1) तु + अत्र = त्वत्र
 e.g. 2) तु + इति = त्विति
 e.g. 3) तु + एवम् = त्वेवम्

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])



e.g. 1) कर्तृ + आ = कर्त्रा

e.g. 2) कर्तृ + ए = कर्त्रे

e.g. 3) कर्तृ + ओः = कर्त्रोः

= Exercise =

1) Apply the यण् sandhi between the two words.

- | | |
|--------------------------|--------------------------|
| 1. इति + अतः = _____ | 2. इति + आह = _____ |
| 3. यदि + अपि = _____ | 4. नदी + अस्ति = _____ |
| 5. इति + उक्त्वा = _____ | 6. इति + उच्यते = _____ |
| 7. इति + एवम् = _____ | 8. नदी + एवम् = _____ |
| 9. वस्तु + अस्ति = _____ | 10. गुरु + आदेशः = _____ |
| 11. अस्तु + इति = _____ | 12. वस्तु + इदम् = _____ |
| 13. अस्तु + एवम् = _____ | 14. अस्तु + ओम् = _____ |
| 15. धातृ + अंश = _____ | 16. पितृ + उक्त = _____ |

2) Resolve the यण् sandhi between the two words.

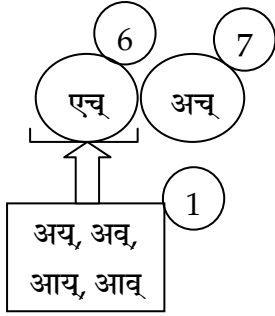
- | | |
|-------------------------------|--------------------------------|
| 1. इत्यर्थः = _____ + _____ | 2. इत्यभिधीयते = _____ + _____ |
| 3. इत्युक्तम् = _____ + _____ | 4. इत्यादि = _____ + _____ |
| 5. ह्ययम् = _____ + _____ | 6. इत्यत्र = _____ + _____ |
| 7. पश्चादि = _____ + _____ | 8. धात्वर्थ = _____ + _____ |
| 9. इत्येषः = _____ + _____ | 10. अप्येतत् = _____ + _____ |
| 11. खल्विदम् = _____ + _____ | 12. साध्विति = _____ + _____ |
| 13. कर्त्रादि = _____ + _____ | 14. शत्रादेशः = _____ + _____ |

5. अयवायाव-सन्धि: [ayavāyāva-sandhiḥ]

6.1.78 एच्: ^{6/1} अय्-अव्-आय्-आवः ^{1/3} । ~ अच् ^{7/1} संहितायाम् ^{7/1}

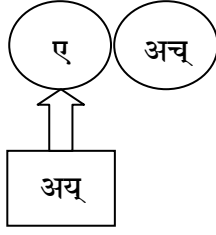
- When एच् is immediately followed by अच्, एच् (ए, ओ, ऐ, औ) is substituted by अय्, अव्, आय्, आव् respectively.
- The substitution is decided by the order of appearance in the sūtra.

- 1) ए => अय्
- 2) ओ => अव्
- 3) ऐ => आय्
- 4) औ => आव्



- एच् = _____
- अच् = _____

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])



e.g. 1) हरे + अः^{1/3}

हर् अय् + अः

= हरयः

e.g. 2) हरे + ए

हर् अय् + ए

= हरये

e.g. 3) ने + अति

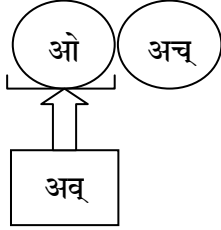
न् अय् + अति

= नयति

e.g. 4) गमे + अति

गम् अय् + अति

= गमयति



e.g. 1) गुरो + अः

गूर् अव् + अः

= गुरवः

e.g. 2) गुरो + ए

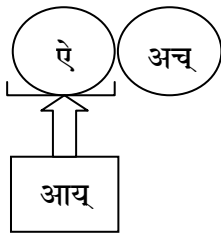
गूर् अव् + ए

= गुरवे

e.g. 3) भो + अति

भ् अव् + अति

= भवति



e.g. 1) नै + अकः

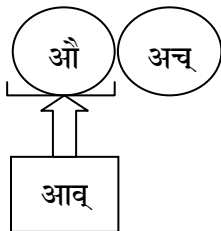
न् आय् + अकः

= नायकः

e.g. 2) गौ + अति

ग् आय् + अति

= गायति



e.g. 1) पौ + अकः

प् आव् + अकः

= पावकः

e.g. 2) असौ + इति

अस् आव् + इति

= असाविति

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])

= Exercise =

1) Apply the अयवायाव sandhi.

1. जे + अति = _____

2. श्रे + अति = _____

3. क्षे + अति = _____

4. कारे + अति = _____

5. द्रो + अति = _____

6. स्रो + अति = _____

7. ध्यै + अति = _____

8. गै + अति = _____

9. त्रै + अते = _____

10. रै + औ = _____

11. पौ + अक = _____

12. लौ + अक = _____

13. असौ + आत्मा = _____

14. उभौ + अपि = _____

15. पूजाहौ + अरिसूदन = _____

16. बालौ + इह = _____

2) Resolve the अयवायाव sandhi.

1. शयन = _____ + _____

2. क्षय = _____ + _____

3. जय = _____ + _____

4. श्रय = _____ + _____

5. भवन = _____ + _____

6. लवन = _____ + _____

7. नायक = _____ + _____

8. ग्लायति = _____ + _____

9. पावक = _____ + _____

10. वागर्थाविव = _____ + _____

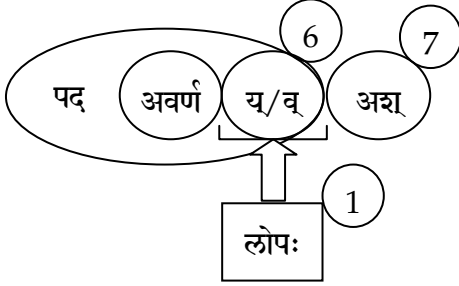
11. द्वाविमौ = _____ + _____

12. पुरुषावुभौ = _____ + _____

6. लोपः शाकल्यस्य [lopaḥ śākalyasya]

8.3.19 लोपः^{1/1} शाकल्यस्य^{6/1} । ~ अपूर्वयोः^{6/2} व्योः^{6/2} पदस्य^{6/1} अशि^{7/1}

- An elision of a letter is called लोप [lopa] in grammatical terms.
- पद [pada] is a grammatical term referring to a word which is either noun or verb.
Technically speaking, पद is that which ends with सुप्-प्रत्यय or तिङ्-प्रत्यय. (Ref. Volume 1 Topic II – Structure of the Sanskrit Language.)
- When य/व् is at the end of a पद, and is preceded by अवर्ण (any kind of अ), and is immediately followed by अश्, there is an optional elision of that य/व्.



○ अश् = _____

e.g. 1) हरे + इह

हरय् + इह (6.1.78 एचोऽयवायावः।)

= हर इह / हरयिह (2 forms)

e.g. 2) विष्णो + इह

विष्णाव् + इह (6.1.78 एचोऽयवायावः।)

= विष्ण इह / विष्णविह (2 forms)

- After applying this rule, further sandhi rules, such as गुणसन्धि (guṇasandhi) or दीर्घसन्धि (dīrghasandhi), cannot be applied.

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])

= Exercise =

1) Apply the लोपः शाकल्यस्य sandhi between the two words.

- | | |
|---------------------------|-----------------------|
| 1. देशे + इह = _____ | 2. काले + इति = _____ |
| 3. वर्तन्ते + इति = _____ | 4. एधते + इति = _____ |
| 5. तस्मै + अहम् = _____ | 6. तस्यै + इह = _____ |

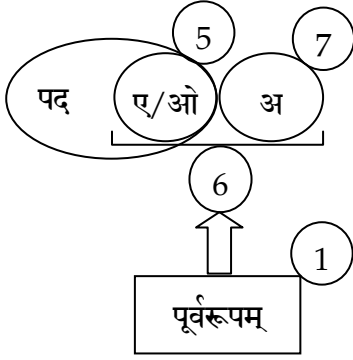
2) Resolve the लोपः शाकल्यस्य sandhi between the two words.

- | | |
|-----------------------------|---------------------------------|
| 1. त आहुः = _____ + _____ | 2. उच्यत इति = _____ + _____ |
| 3. एत इह = _____ + _____ | 4. त आहुः = _____ + _____ |
| 5. तस्मा इह = _____ + _____ | 6. तस्या उक्तम् = _____ + _____ |
| 7. वा अरे = _____ + _____ | 8. वा इह = _____ + _____ |

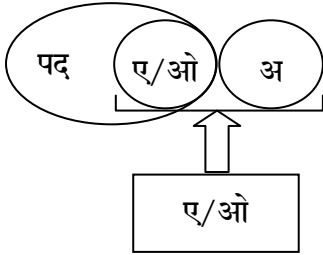
7. पूर्वरूप-सन्धि: [pūrvarūpa-sandhiḥ]

6.1.109 एङः^{5/1} पदान्तात्^{5/1} अति^{7/1} । ~ पूर्वरूपम्^{1/1} पूर्वपरयोः^{6/2} एकः^{1/1} संहितायाम्^{7/1}

- When two sounds of the पूर्व (that which precedes) and पर (that which follows) become one sound of the पूर्व, it is called पूर्व-रूप (the sound of the preceding).
- When एङ् (ए/ओ) at the end of a पद is immediately followed by a short अ, the पूर्वरूप is the substitute in the place of the two.



○ पूर्वरूपम् = ए/ओ



e.g. 1) काले + अपि
= कालेऽपि

e.g. 2) सो + अहम्
= सोऽहम्

* The अकार which follows may be, or may not be written as “ऽ”, which is called अवग्रह [avagraha].

Topic V - Vowel sandhi (अच्-सन्धि: [ac-sandhi])

= Exercise =

1) Apply the पूर्वरूप sandhi rule.

1. लोके + अस्मिन् = _____

2. ते + अद्य = _____

3. आरभते + अर्जुन = _____

4. एते + अत्र = _____

5. काले + अपि = _____

6. ते + अहम् = _____

7. मोक्ष्यसे + अशुभात् = _____

8. निरीक्षे + अहम् = _____

9. लोको अस्ति = _____

10. सो + अपि = _____

11. सर्वतो + अस्ति = _____

12. तृप्तो + अस्मि = _____

2) Remove the पूर्वरूप sandhi rule.

1. सर्वेऽपि = _____ + _____

2. कुरुतेऽर्जुन = _____ + _____

3. एतेऽत्र = _____ + _____

4. शरीरेऽस्मिन् = _____ + _____

5. अन्येऽपि = _____ + _____

6. मेऽमृतम् = _____ + _____

7. इमेऽवस्थिताः = _____ + _____

8. अपरिहार्येऽर्थे = _____ + _____

9. मेऽच्युत = _____ + _____

10. नमस्तेऽस्तु = _____ + _____

11. भासयतेऽखिलम् = _____ + _____

12. नरकेऽशुचौ = _____ + _____

13. सोऽपि = _____ + _____

14. लोकोऽयम् = _____ + _____

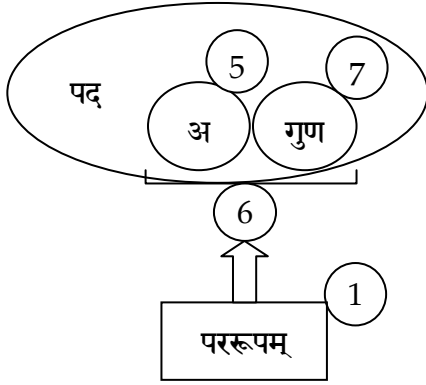
15. शाश्वतोऽयम् = _____ + _____

16. सोऽर्जुन = _____ + _____

8. पररूप-सन्धि: [pararūpa-sandhi]

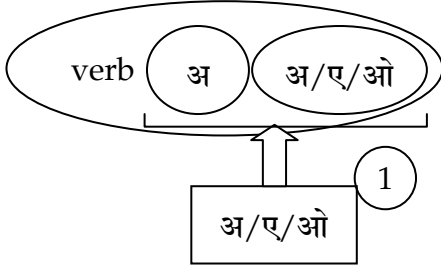
6.1.97 अतः^{5/1} गुणे^{7/1} । ~ अपदान्तात्^{5/1} पूर्वपरयोः^{6/2} एकः^{1/1} संहितायाम्^{7/1}

- When two sounds of the पूर्व (that which precedes) and पर (that which follows) become one sound of the पर, it is called पर-रूप (the sound of the following).
- When a short अ is immediately followed by a गुण letter within a पद, the पररूप is the substitute in the place of the two.



○ गुणः = अ, ए, ओ

○ पररूपम् = गुण



e.g. 1) भव + अन्ति
= भवन्ति

e.g. 2) लभ + ए
= लभे

= Exercise =

1) Apply the पररूप sandhi rule.

1. गच्छ + अन्ति = _____

2. लभ + अन्ते = _____

3. मन्य + ए = _____

4. दृश्य + अन्ते = _____

2) Remove the पूर्वरूप sandhi rule.

1. नमन्ति = _____ + _____

2. विद्यन्ते = _____ + _____

3. सृज्ये = _____ + _____

4. योत्स्ये = _____ + _____

Topic VI

Consonant Sandhi

हल्-सन्धि: [hal-sandhiḥ]

Overview of हल्-सन्धि:

Before the study of this section, the concept of **सवर्ण** under Topic I, and the concept of **पद**, **पदान्त**, and **अपदान्त** explained in “Where to apply सन्धि” under Topic III should be revised.

हल्-सन्धिस in this section should be studied along with the Declension of Consonant-ending Nominal bases in Volume 1. Later, as revision, हल्-सन्धिस can be studied independently in the order of sūtra number from the beginning.

For those who are interested in Pāṇini-sūtras:

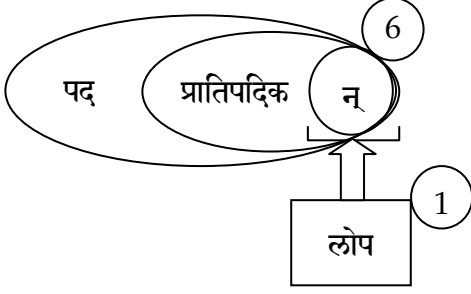
All the हल्-सन्धि rules of हल्-सन्धि in this book are found in the last 3 quarters of Chapter 8 of the book of Pāṇini-sūtras. The section consisting of those 3 quarters is called **त्रिपादी**. Once a sūtra in the **त्रिपादी** is applied, only the sutras which numerically follow it will be applicable. This is told in the sutra 8.2.1 **पूर्वत्रासिद्धम् ।**, which governs all the sūtras in the last 3 quarters. Because of this, हल्-सन्धि rules in this book are listed in the order of sūtra number.

Another sūtra to be noted is 8.2.108. This sūtra contains the word **संहितायाम्**, which governs all sandhi rules from 8.2.108 until the end. The meaning of the word **संहितायाम्** is: “in the topic of sandhi, where two sounds meet and have to be pronounced together without a gap”. This has to be taken into consideration in the sutras after 8.2.108.

1. नलोपः [na-lopah]

8.2.7 न^{6/1} लोपः^{1/1} प्रातिपदिक^{6/1} अन्तस्य^{6/1} । ~ पदस्य^{6/1}

- When न् is at the end of a प्रातिपदिक and पद, it is elided.



- This सन्धि is often seen in the declension of न्-ending masculine and neuter प्रातिपदिक in 1/1 and पद section (3/2, etc.) of सुप्-प्रत्ययसः. (Refer to Volume 1.)

E.g. 1) न्-ending masculine प्रातिपदिक in 1/1

योगिन् + स्^{1/1} स् is the 1/1 of the सुप्-प्रत्ययसः. Ending with सुप्-प्रत्यय, योगिन् + स् gains पद status.

योगिन् + स् of 1/1 is to be elided after consonant.

Even after the elision of स्, it leaves पद status to what remains.

योगीन् Being इन्-ending प्रातिपदिक, in 1/1 the penultimate इ is elongated.

The end of this पद is न्, which is also the end of प्रातिपदिक. Thus this न् is to be elided.

योगी At the end of पद, the last न् of प्रातिपदिक is elided. (नलोप by 8.2.7)

e.g. 2) न्-ending प्रातिपदिक in 3/2

आत्मन् + भ्याम्^{3/2} भ्याम्, the 3/2 of the सुप्-प्रत्ययसः is suffixed.

The अङ्ग which is followed by भ्याम् gains the status of पद. Thus आत्मन् here is पद.

The end of this पद is न्, which is also the end of प्रातिपदिक. Thus this न् is to be elided.

आत्मभ्याम् At the end of पद, the last न् of प्रातिपदिक is elided. (नलोप by 8.2.7)

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

= Exercise =

1) Apply the नलोप. (Refer to Volume 1)

1. योगिन् (masculine) + 1/1 = _____

2. ज्ञानिन् (masculine) + 1/1 = _____

3. योगिन् (masculine) + 3/2 = _____

4. ज्ञानिन् (masculine) + 3/2 = _____

5. योगिन् (masculine) + 7/3 = _____

6. ज्ञानिन् (masculine) + 7/3 = _____

7. ब्रह्मन् (masculine) + 1/1 = _____

8. आत्मन् (masculine) + 1/1 = _____

9. ब्रह्मन् (masculine) + 3/2 = _____

10. आत्मन् (masculine) + 3/2 = _____

11. ब्रह्मन् (masculine) + 7/3 = _____

12. आत्मन् (masculine) + 7/3 = _____

13. ब्रह्मन् (neuter) + 3/2 = _____

14. नामन् (neuter) + 3/2 = _____

15. ब्रह्मन् (neuter) + 1/1 = _____

16. नामन् (neuter) + 1/1 = _____

17. ब्रह्मन् (neuter) + 3/2 = _____

18. नामन् (neuter) + 3/2 = _____

19. ब्रह्मन् (neuter) + 7/3 = _____

20. नामन् (neuter) + 7/3 = _____

2) Find न्-ending प्रातिपदिक which has undergone नलोप.

1. ब्रह्मचारी = _____

2. ब्रह्मविद्या = _____

3. आत्मतत्त्वम् = _____

4. सामवेदः = _____

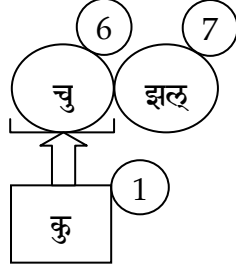
5. अधिकारित्वम् = _____

6. भूमविद्या = _____

2. कुत्वम् [ku-tvam]

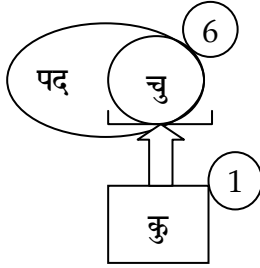
8.2.30 चोः ^{6/1} कुः ^{1/1} । ~ झलि ^{7/1} पदस्य ^{6/1} अन्ते ^{7/1} च ⁰

- There is कुत्व (changing into क् ख् ग् घ् ङ्) in the place of चु (च् छ् ज् झ् ञ्), respectively, when चु is followed by झल् or at the end of a पद.
- Which letter of चु (च-वर्ग) is to be replaced by which letter of कु (क-वर्ग) is decided by the order of appearance. च, the first letter of च-वर्ग, is replaced by क्, the first letter of क-वर्ग, and छ्, the second letter of च-वर्ग, is replaced by ख्, the second letter of क-वर्ग, and so on.



- चु (च-वर्ग) = _____
- कु (क-वर्ग) = _____
- झल् = _____

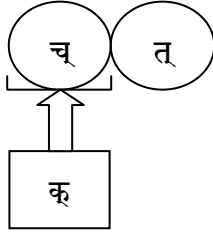
or



- This सन्धि is often seen in the declension of च/ज्-ending प्रातिपदिक in 1/1 and पद section. (Refer to Volume 1)
- This सन्धि is also seen in the process of making प्रातिपदिक from च/ज्-ending धातु by adding झल्-beginning suffix, such as ति and त. (These suffixes are called कृत-प्रत्यय, which are studied in Volume 3.)

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

Examples of कुत्व when झल् follows:



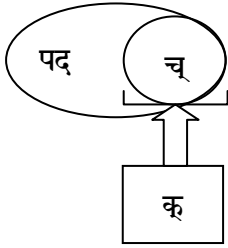
e.g. 1) मुच् + त
= मुक् + त

e.g. 2) भज् + ति
= भग् + ति 8.2.30 चोः कुः ।
= भक् + ति 8.4.55 खरि च ।
(Refer to चर्त्व)

In these examples, च् of मुच् and ज् of भज् are चु, followed by त्, which is झल्. Thus च् and ज् are changed into क् and ग्, corresponding कवर्ग letters.

प्रातिपदिकs मुक्त and भक्ति are derived from मुच्-धातु and भज्-धातु by suffixing derivative suffixes त and ति respectively.

Examples of कुत्व at the end of पदः



e.g. 1) वाच् + स्^{1/1}
= वाच् +
= वाक् 8.2.30 चोः कुः ।

e.g. 2) ऋत्विज् + भ्याम्^{3/2}
= ऋत्विग् + भ्याम् 8.2.30 चोः कुः ।

e.g. 1) च्-ending प्रातिपदिक in 1/1

वाच् + स्^{1/1} स् is the 1/1 of the सुप्-प्रत्ययs. Ending with सुप्-प्रत्यय, वाच् + स् gains पद status.

वाच् + स् of 1/1 is to be elided after consonant.

Even after the elision of स्, it leaves पद status to what remains.

वाक् At the end of पद, the च् is replaced by क्. (कुत्व by 8.2.30)

e.g. 2) ज्-ending प्रातिपदिक in 3/2

ऋत्विज् + भ्याम्^{3/2} भ्याम्, the 3/2 of the सुप्-प्रत्ययs is suffixed.

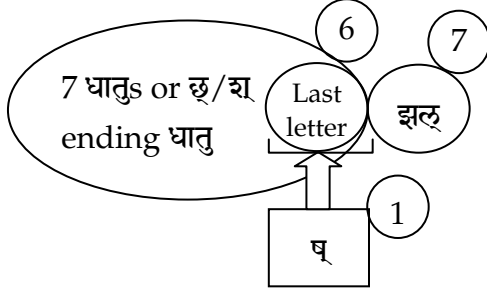
The अङ्ग which is followed by भ्याम् gains the status of पद. Thus ऋत्विज् here is पद.

ऋत्विग् + भ्याम् At the end of पद, the ज् is replaced by ग्. (कुत्व by 8.2.30)

3. षत्वम् [ṣa-tvam]

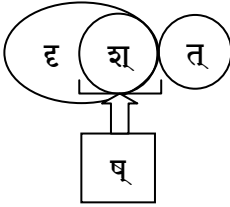
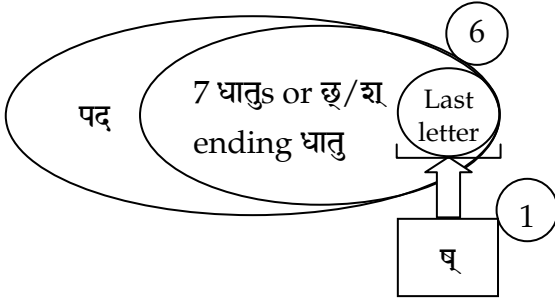
8.2.36 व्रश्च-भ्रस्ज-सृज-मृज-यज-राज-भ्राज-च्छ-शां^{6/3} षः^{1/1} । ~ झलि^{7/1} पदस्य^{6/1} अन्ते^{7/1} च⁰

- The last letter of these seven धातुs listed in the sūtra or a धातु ending with छ् or श् is replaced by ष् when followed by झल् or when the धातु comes at the end of a पद.



○ झल् = _____

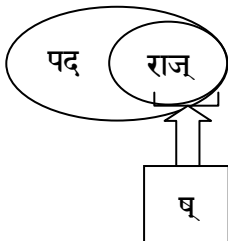
or



e.g. 1) दृश् + त्वा
 = दृष् + त्वा 8.2.36 व्रश्च-भ्रस्ज ◦ ।
 = दृष् + ट्वा 8.4.41 ष्टना ष्टुः ।
 = दृष्ट्वा

श् at the end of दृश्-धातु is followed by त्, which is of झल्. Thus the last letter of the धातु is replaced by ष्, त्वा is a suffix discussed in the section of “अव्ययस derived from धातु” in Volume 1.

The next example is for when राज्-धातु, which is one of the seven धातुs listed in the sūtra, comes at the end of पद.

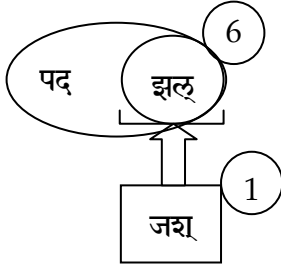


e.g. 2) विराज् + स्^{1/1}
 = विराज्
 = विराष् 8.2.36 व्रश्च-भ्रस्ज ◦ ।
 = विराड् 8.2.39 झलां जशोऽन्ते ।
 = विराट् 8.4.56 वाऽवसाने ।

4. जश्-त्वम् [jaś-tvam]

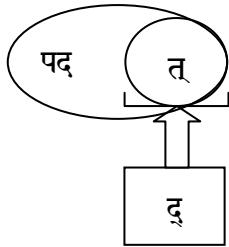
8.2.39 झलाम्^{6/3} जश्: ^{1/3} अन्ते ^{7/1} । ~ पदस्य ^{6/1}

- At the end of a पद, झल् is replaced by जश्.
- In other words, झल् at the end of पद is to be softened.
- Out of five letters in जश्, the closest to स्थानिन् is chosen as the substitute.



- झल् = _____
- जश् = _____

- This सन्धि is often seen in the declension of consonant-ending प्रातिपदिक in 1/1 and पद section. (Refer to Volume 1)



e.g. 1) मरुत् + स्^{1/1}

= मरुत्

= मरुद् 8.2.39 झलां ० ।

= मरुत् 8.4.56 वावसाने ।

e.g. 2) मरुत् + भ्याम्^{3/2}

= मरुद् + भ्याम् 8.2.39 झलां ० ।

त्, which is of झल्, is at the end of पद. Thus it is replaced by the closest letter among जश्, which is the dental द्.

- This सन्धि is also seen in sentences and समास.

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

= Exercise =

1) Apply the पदान्त जश्-त्व sandhi in declension. (Refer to Volume 1)

- | | |
|------------------------------------|--------------------------------------|
| 1. मरुत् (masculine) + 1/1 = _____ | 2. विद्युत् (feminine) + 1/1 = _____ |
| 3. मरुत् (masculine) + 3/3 = _____ | 4. विद्युत् (feminine) + 3/3 = _____ |
| 5. समिध् (feminine) + 1/1 = _____ | 6. वाक् (feminine) + 1/1 = _____ |
| 7. समिध् (feminine) + 3/3 = _____ | 8. वाक् (feminine) + 3/3 = _____ |
| 9. अच् (masculine) + 1/1 = _____ | 10. अच् (masculine) + 3/3 = _____ |

* चवर्ग-ending प्रातिपदिकs first undergo कुत्व at the end of पद by 8.2.30 चोः कुः। However, by convention, the प्रत्याहार अच् does not undergo कुत्व because it would become another प्रत्याहार, अक्.

2) Apply the पदान्त जश्-त्व sandhi in sentences.

- | | |
|---------------------------|------------------------------|
| 1. वाक् + इति = _____ | 2. मरुत् + अस्ति = _____ |
| 3. वाक् + गच्छति = _____ | 4. मरुत् + गच्छति = _____ |
| 5. तस्मात् + इति = _____ | 6. सत् + इति = _____ |
| 7. तस्मात् + भवति = _____ | 8. ग्रामात् + गच्छति = _____ |

3) Apply the पदान्त जश्-त्व sandhi in compounds.

- | | |
|-----------------------------------|-----------------------------|
| 1. वाक् + ईशः = _____ | 2. अच् + आदिः = _____ |
| 3. जगत् + ईशः = _____ | 4. अत् + अन्तः = _____ |
| 5. सुप् + अन्तः = _____ | 6. सुप् + उत्पत्तिः = _____ |
| 7. श्रीमत् + भगवत् + गीता = _____ | |

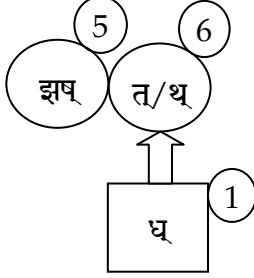
2) Resolve the पदान्त जश्-त्व sandhi.

- | | |
|----------------------------------------|------------------------------|
| 1. मरुद्भ्याम् = _____ + _____ | 2. चिदात्मा = _____ + _____ |
| 3. सदेव = _____ + _____ | 4. जगदीश्वरः = _____ + _____ |
| 5. अजन्तः = _____ + _____ | 6. अदन्तः = _____ + _____ |
| 7. सदसद्भ्याम् = _____ + _____ + _____ | |

5. धत्वम् [dha-tvam]

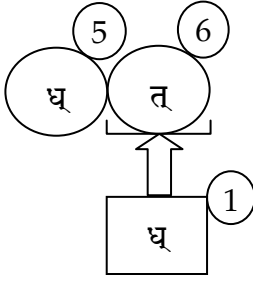
8.2.40 झषः ^{5/1} तथोः ^{6/2} धः ^{1/1} अधः ^{6/1} ।

- There is धत्व in the place of त् or थ् when the त् or थ् is preceded by झष्.



○ झष = _____

- This सन्धि is often seen in the process of making प्रातिपदिक from झष-ending धातु by adding त्/थ्-beginning suffix, such as ति and त्.



e.g. 1) बुध् + ति

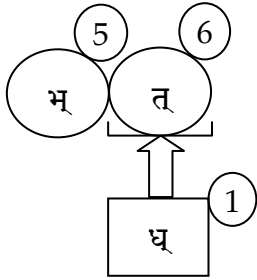
= बुध् + धि

8.2.40 झषस्तथोर्धोऽधः ।

= बुद् + धि

8.4.53 झलां जश् झशि ।

= बुद्धि



e.g. 2) लभ् + त्

= लभ् + ध

8.2.40 झषस्तथोर्धोऽधः ।

= लब् + ध

8.4.53 झलां जश् झशि ।

= लब्ध

= Exercise =

1) Apply the पदान्त जश्-त्व sandhi.

1. शुध् + ति = _____

2. शुध् + त् = _____

3. लभ् + ति = _____

4. सिध् + त् = _____

2) Resolve the पदान्त जश्-त्व sandhi.

1. सिद्धि = _____ + _____

2. बद्ध = _____ + _____

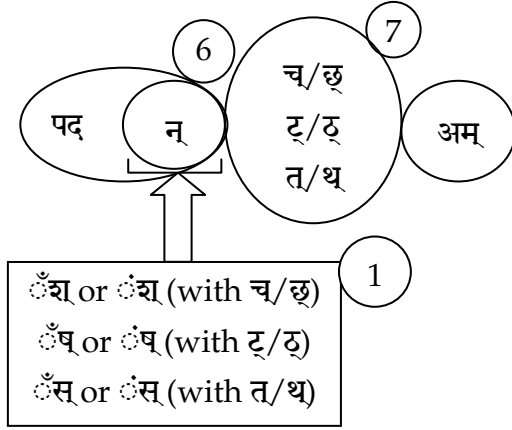
3. आरब्ध = _____ + _____

4. उपलब्धि = _____ + _____

6. 2nd रुत्वम् [ru-tvam]

8.3.7 नः^{6/1} छवि^{7/1} अप्रशान्^{6/1} । ~ पदस्य^{6/1} अम्परे^{7/1} रुः^{1/1}

- न् at the end of a पद, when followed by छव् which is followed by अम्, changes into sibilant (श्, ष, स) of the following letters, and the vowel preceding the न् becomes nasalized (ँ) or अनुस्वार (ं) is attached.



- छव् = _____
○ अम् = _____

e.g. 1) पुमान् + चरति
= पुमाँश्चरति / पुमांश्चरति

e.g. 2) पुमान् + टीकते
= पुमाँष्टीकते / पुमांष्टीकते

e.g. 3) पुमान् + तरति
= पुमाँस्तरति / पुमांस्तरति

= Exercise =

1) Apply the sandhi rule.

1. सन् + च = _____

2. योगिन् + च = _____

3. रामान् + च = _____

4. हरीन् + च = _____

5. गुरून् + च = _____

6. धातृन् + च = _____

7. रामान् + टीकते = _____

8. हरीन् + टीकते = _____

9. रामान् + तथा = _____

10. हरीन् + तथा = _____

11. गुरून् + तथा = _____

12. धातृन् + तथा = _____

2) Resolve the sandhi.

1. प्रज्ञावादांश्च = _____

2. अगतासूंश्च = _____

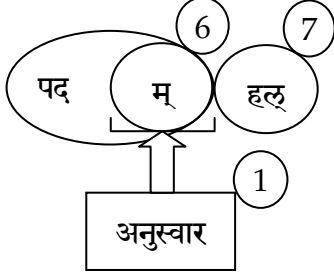
3. सर्खीस्तथा = _____

4. ऋषींश्च = _____

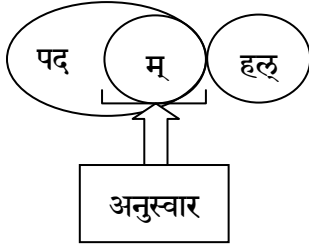
7. अनुस्वार: [anusvārah]

8.3.23 मः ^{6/1} अनुस्वारः ^{1/1} । ~ हलि ^{7/1} पदस्य ^{6/1}

- When followed by any consonant, म् at the end of a पद is replaced by अनुस्वार.



○ हल् = _____



e.g. 1) शशिवर्णम् + चतुर्भुजम्
= शशिवर्ण + चतुर्भुजम् 8.3.23 मोऽनुस्वारः ।

= Exercise =

1) Apply the पदान्त अनुस्वार rule.

1. पापम् + हरति = _____

2. किम् + शरीरम् = _____

3. देवम् + यजति = _____

4. तम् + रामम् + नमामि = _____

5. अयम् + आत्मा = _____

6. इदम् + सर्वम् + आसीत् = _____

7. प्रज्ञानम् + ब्रह्म = _____

8. अहम् + करोमि = _____

2) Resolve the पदान्त अनुस्वार sandhi.

1. किं करोति = _____ + _____

2. ओदनं खादामि = _____ + _____

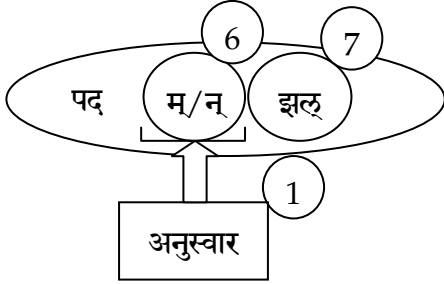
3. सुखं लभते = _____ + _____

4. इदं पठनं भवति = _____ + _____ + _____

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

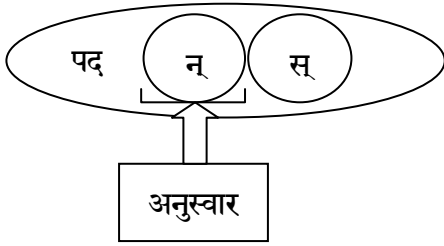
8.3.24 नः^{6/1} च⁰ अपदान्तस्य^{6/1} झलि^{7/1} । ~ मः^{6/1} अनुस्वारः^{1/1}

- When followed by झल्, म् and न्, not at the end of a पद is replaced by अनुस्वार.
- There are three points different from the previous sūtra: 1) न्, as well as म्, are subject to अनुस्वर change; 2) they are not at the end of पद; 3) when झल् follows.



○ झल् = _____

- Since this sandhi is within पद, this is observed in conjugation of verbs and declension of nouns, such as अस्-ending neuter in 1/3 (See Volume 1.)



e.g. 1) छन्दस् + इ^{1/3}

= छन्दान् स् + इ

= छन्दां स् + इ 8.3.24 नश्चापदान्तस्य झलि ।

= Exercise =

Apply the अपदान्त अनुस्वार sandhi in the process of declension or conjugation.

(अस्-ending neuter in 1/3)

1. तपान् स् + इ = _____ 2. तमान् स् + इ = _____

3. मनान् स् + इ = _____ 4. रजान् स् + इ = _____

5. वचान् स् + इ = _____ 6. वासान् स् + इ = _____

(अस्-ending masculine in 1/2 and 1/3)

7. विद्वान् स् + औ = _____ 8. विद्वान् स् + अः = _____

9. श्रेयान् स् + औ = _____ 10. श्रेयान् स् + अः = _____

11. पुमान् स् + औ = _____ 12. पुमान् स् + अः = _____

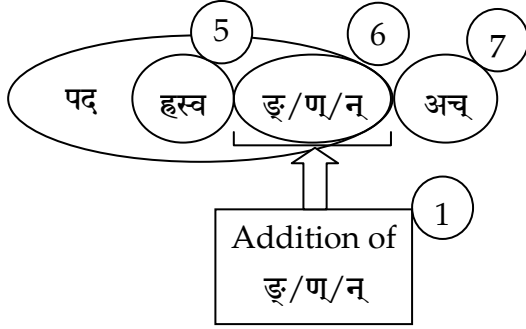
(Conjugations of verbs)

13. नम् + स्यति = _____ 14. हन् + सि = _____

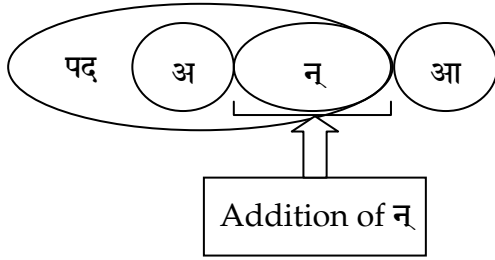
8. डमुट्-आगमः [namuṭ-āgamah]

8.3.32 डमः ^{6/1} ह्रस्वात् ^{5/1} अचि ^{7/1} डमुट् ^{1/1} नित्यम् ⁰ च ⁰ । ~ पदस्य ^{6/1}

- When ङ्/ण्/न् at the end of a पद is preceded by a short vowel (ह्रस्व), and followed by any vowel (अच्), ङ्/ण्/न् is added to that ङ्/ण्/न् (i.e., ङ्/ण्/न् is duplicated.)



○ अच् = _____



e.g. 1) पश्यन् + आत्मनि

= पश्यन् न् + आत्मनि

8.3.32 डमो ह्रस्वा०।

न् at the end of पद, which is preceded by a short vowel अ, and followed by a vowel आ, takes additional न्. Thus न् is duplicated.

1) Apply the डमुट् sandhi.

1. पश्यन् + अपि = _____

2. गायन् + आस्ते = _____

3. भगवन् + इति = _____

4. तिष्ठन् + ईक्षते = _____

5. पचन् + उपविशति = _____

6. वदन् + एतत् = _____

7. तस्मिन् + इति = _____

8. कस्मिन् + उ = _____

2) Remove the डमुट् sandhi.

1. कुर्वन्नपि = _____

2. कुर्वन्नाप्नोति = _____ / _____

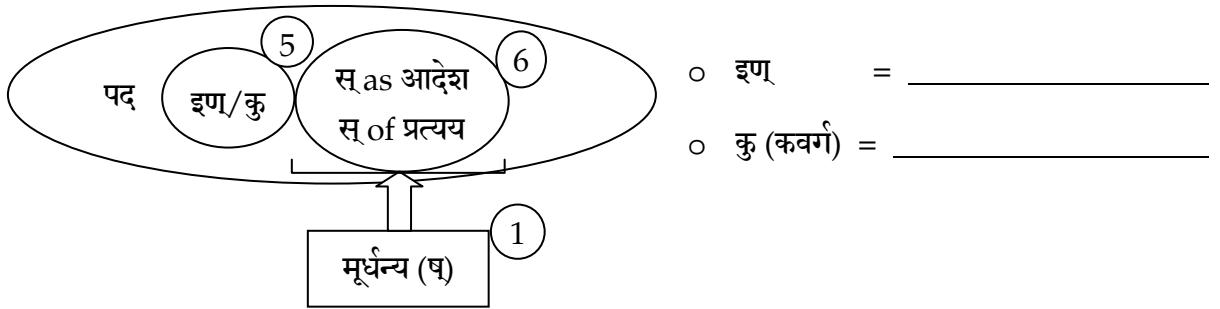
3. विषीदन्नदिदम् = _____

4. गृह्णन्मिषन् = _____

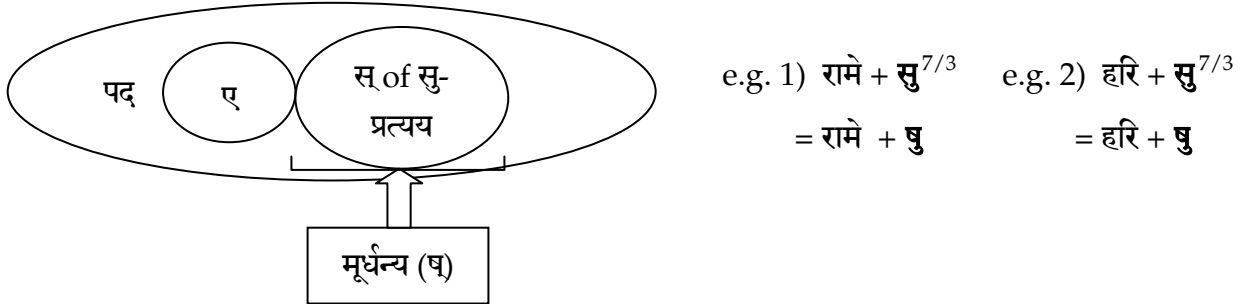
9. मूर्धन्यत्वम् [mūrdhanya-tvam]

8.3.59 आदेश-प्रत्यययोः ^{6/2} । ~ अपदान्तस्य ^{6/1} मूर्धन्यः ^{1/1} सः ^{6/1} इण्कोः ^{5/1}

- मूर्धन्य (ष) is the substitute in the place of स, when the following conditions are fulfilled;
1. The स as an आदेश (replacement) of previous modification, or a part of प्रत्यय
 2. When the स is preceded by इण् or क-वर्ग
 3. When the स is not at the end of पद



In the following examples, nominal suffixes are suffixed to nominal bases.



= Exercise =

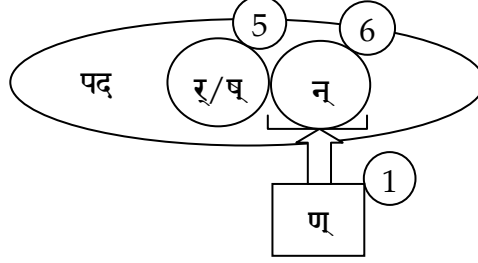
Apply the अपदान्त-मूर्धन्य-त्व sandhi rule in the process of declension or conjugation..

1. सर्वे + सु^{7/3} = _____
2. हरि + सु^{7/3} = _____
3. गुरु + सु^{7/3} = _____
4. कर्तृ + सु^{7/3} = _____
5. नदी + सु^{7/3} = _____
6. मति + सु^{7/3} = _____
7. ऋक् + सु^{7/3} = _____
8. वाक् + सु^{7/3} = _____
9. दिक् + सु^{7/3} = _____
10. योगि + सु^{7/3} = _____
11. चक्षुस् + इ^{7/1} = _____
12. करो + सि^{II/1} = _____

10. णत्वम् [na-tvam]

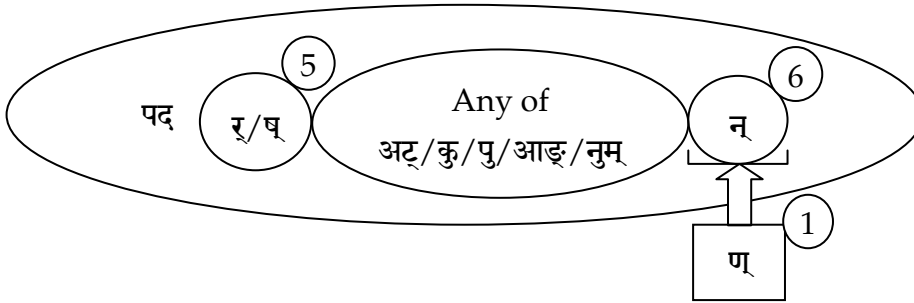
8.4.1 र-षाभ्याम्^{5/2} नः^{6/1} णः^{1/1} समानपदे^{7/1} ।

- ण् is the substitute for न् when the न् is immediately preceded by र् or ष् in the same word.



8.4.2 अट्-कु-पु-आङ्-नुम्-व्यवाये^{7/1} अपि⁰ ।

- The णत्व takes place even when र्/ष् and न् are intervened by one or more of the following letters in any order.



- अट् = _____
- कु (कवर्गः) = _____
- पु (पवर्गः) = _____
- आङ् = one of उपसर्गs
- नुम् = a type of augment

8.4.37 पदान्तस्य^{6/1} । ~ न⁰ नः^{6/1} णः^{1/1}

- This change of ण् should not happen at the end of पद.

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

= Exercise =

1) Examining whether णत्व is applicable, write the forms of the following masculine words in 3/1 and 6/3.

- | | | | |
|--------------------|-------|------------------|-------|
| 1. राम _____ | _____ | 2. पुरुष _____ | _____ |
| 3. विषय _____ | _____ | 4. तर्क _____ | _____ |
| 5. पुत्र _____ | _____ | 6. अर्जुन _____ | _____ |
| 7. लक्ष्मण _____ | _____ | 8. कृष्ण _____ | _____ |
| 9. आचार्य _____ | _____ | 10. शिष्य _____ | _____ |
| 11. हरि _____ | _____ | 12. ऋषि _____ | _____ |
| 13. गिरि _____ | _____ | 14. नृपति _____ | _____ |
| 15. गुरु _____ | _____ | 16. इषु _____ | _____ |
| 17. मुमुक्षु _____ | _____ | 18. विष्णु _____ | _____ |
| 19. पक्षिन् _____ | _____ | 20. वैरिन् _____ | _____ |

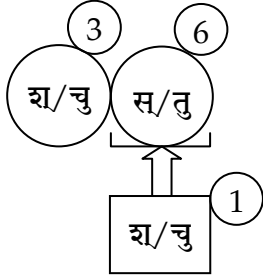
2) Write forms of the following neuter words in 1/3, 3/1 and 6/3.

- | | | | |
|-------------------|-------|-------|-------|
| 1. इन्द्रिय _____ | _____ | _____ | _____ |
| 2. पत्र _____ | _____ | _____ | _____ |
| 3. पर्ण _____ | _____ | _____ | _____ |
| 4. शास्त्र _____ | _____ | _____ | _____ |
| 5. करण _____ | _____ | _____ | _____ |
| 6. लक्षण _____ | _____ | _____ | _____ |
| 7. वारि _____ | _____ | _____ | _____ |
| 8. दारु _____ | _____ | _____ | _____ |
| 9. ब्रह्म _____ | _____ | _____ | _____ |
| 10. कर्म _____ | _____ | _____ | _____ |

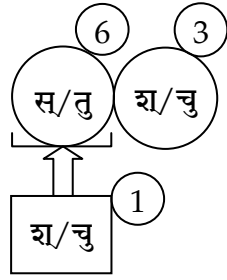
11. श्चुत्वम्/ष्टुत्वम् [ścu-tvam/ṣṭu-tvam]

8.4.40 स्तोः^{6/1} र्चुना^{3/1} र्चुः^{1/1} ।

- Dental स/तु (त थ द ध न) is changed to its corresponding palatal (तालव्य) sound, which is श/चु (च छ ज झ ञ) when the dental स/तु has contact with श/चु.



or



- चु (च-वर्ग) = _____
○ तु (त-वर्ग) = _____

The तालव्य sound which is the most similar to the original becomes the substitute.

- स → श (sibilant)
○ त → ___ (1st of the class)
○ थ → ___ (___ of the class)
○ द → ___ (___ of the class)
○ ध → ___ (___ of the class)
○ न → ___ (___ of the class)

= Exercise =

1) Apply the र्चुत्व sandhi.

- | | |
|--------------------------------|---------------------------|
| 1. राज् + नः = _____ | 2. राज् + नी = _____ |
| 3. रामस् + शेते = _____ | 4. रामस् + चिनोति = _____ |
| 5. मनस् + चलति = _____ | 6. रामस् + च = _____ |
| 7. तत् + शेते = _____ | 8. सत् + चित् = _____ |
| 9. ईश्वराद् + जायते = _____ | 10. तद् + ज्ञानम् = _____ |
| 11. तस्मात् + छात्रात् = _____ | 12. योगिन् + जय = _____ |

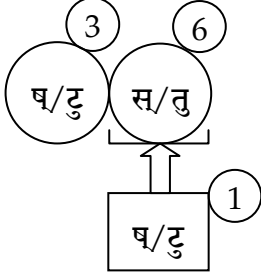
2) Resolve the र्चुत्व sandhi.

- | | |
|---------------------------------|----------------------------------|
| 1. सच्च = _____ + _____ | 2. उच्छेदः = _____ + _____ |
| 3. तस्माज्जायते = _____ + _____ | 4. आचार्याज्जातः = _____ + _____ |

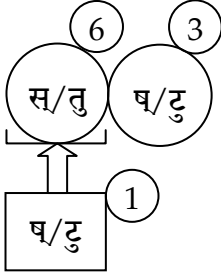
Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

8.4.41 ष्टुना^{3/1} ष्टुः^{1/1} । ~ स्तोः^{6/1}

- Dental स/तु (त थ द ध न) is changed to its corresponding cerebral (मूर्धन्य) sound, which is ष/टु (ट् ठ् ड् ढ् ण्) when that स/तु has contact with cerebral sound ष/टु.



or



○ टु (ट-वर्ग) = _____

○ तु (त-वर्ग) = _____

The मूर्धन्य sound which is the most similar to the original becomes the substitute.

- स → ष (sibilant)
- त → ___ (1st of the class)
- थ → ___ (___ of the class)
- द → ___ (___ of the class)
- ध → ___ (___ of the class)
- न → ___ (___ of the class)

= Exercise =

1) Apply the ष्टु-त्व sandhi rule.

1. तुष् + त = _____

2. पुष् + ति = _____

3. द्रष् + ता = _____

4. ईष्ट् + ते = _____

5. रामस् + षष्ठः = _____

6. रामस् + टीकते = _____

7. तत् + टीका = _____

8. चक्रिन् + ढौकसे = _____

2) Resolve the ष्टु-त्व sandhi rule.

1. तस्माटीकते = _____ + _____

2. दृष्टिः = _____ + _____

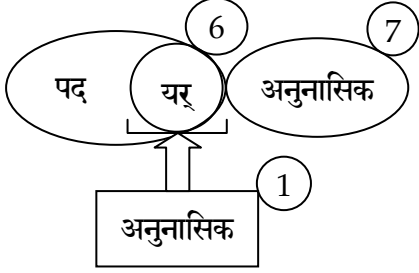
3. शिवष्पष्टः = _____ + _____

4. शिवष्टीकते = _____ + _____

12. अनुनासिकः [anunāsikah]

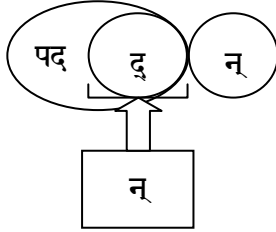
8.4.45 यर्: ^{6/1} अनुनासिके ^{7/1} अनुनासिकः ^{1/1} वा ^{0/1} ~ पदस्य ^{6/1}

- पदान्त यर्, when followed by अनुनासिक (nasal sound), is replaced by its अनुनासिक (nasal sound).



- यर् = _____
- अनुनासिक = _____

- कवर्ग/चवर्ग/टवर्ग/तवर्ग/पवर्ग sounds become ङ्/ञ्/ण्/न्/म्, respectively.
- य, व, ल् become यँ, वँ, लँ respectively.
- र्, श्, ष्, स् remain as they are because of the absence of similar nasal sounds.



e.g. 1) तद् + न

= तन् + न 8.4.45 यरोऽनुनासिकेऽनुनासिको वा ।

= Exercise =

1) Apply the पदान्त-अनुनासिक sandhi rule.

- | | |
|-----------------------|----------------------------|
| 1. वाक् + मे = _____ | 2. डमुट् + नित्यम् = _____ |
| 3. तत् + नाशः = _____ | 4. एतत् + मन्यसे = _____ |

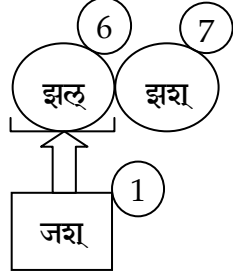
2) Resolve the पदान्त-अनुनासिक sandhi.

- | | |
|-----------------------------------|------------------------------------|
| 1. प्राङ्मोक्षात् = _____ + _____ | 2. इणित्यः = _____ + _____ |
| 3. तस्मान्न = _____ + _____ | 4. जगन्नाथः = _____ + _____ |
| 4. जगन्मिथ्या = _____ + _____ | 5. बन्धनान्मृत्योः = _____ + _____ |

13. जश्त्वम् [jaś-tvam]

8.4.53 झलाम्^{6/3} जश्^{1/1} झशि^{7/1} ।

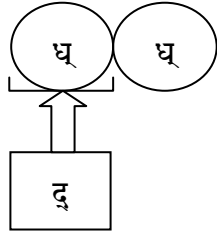
- जश् is the substitute for झल्, when the झल् is immediately followed by झश.



- झल् = _____
 ○ जश् = _____
 ○ झश = _____

- In other words, झल् followed by soft consonant becomes non-aspirated.

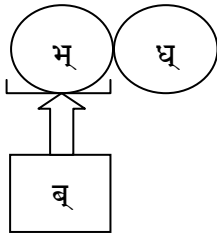
In the following examples, suffix त or ति is suffixed to a root in order to create a new nominal base.



- e.g. 1) बुध् + त
 = बुध् + ध 8.2.40 झषस्तथोर्धोऽधः ।
 = बुद् + ध 8.4.53 झलां जश् झशि ।

ध, which is of झल्, is followed by ध, that is of झश. Thus the first ध is replaced by the closest जश्, which is दृ, because they are both dental.

In the same manner, भ्, which is of झल्, followed by ध, is replaced by its non-aspirated, which is ब्.



- e.g. 2) लभ् + त
 = लभ् + ध 8.2.40 झषस्तथोर्धोऽधः ।
 = लब् + ध 8.4.53 झलां जश् झशि ।

= Exercise =

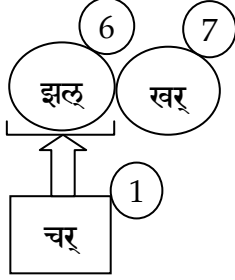
Apply the जश्त्व sandhi rule.

1. दघ् + ध = _____ 2. दुघ् + ध = _____
 3. शुघ् + ध = _____ 4. सिघ् + धि = _____
 5. लभ् + ध = _____ 6. आरभ् + धि = _____

14. चर्त्वम् [car-tvam]

8.4.55 खरि^{7/1} च⁰। ~ झलाम्^{6/3} चर्^{1/1}

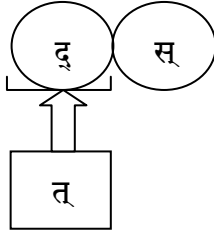
- चर् is the substitute for झल्, when the झल् is immediately followed by खर्.



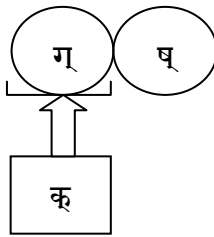
- झल् = _____
 ○ चर् = _____
 ○ खर् = _____

- In other words, झल् followed by hard consonant becomes non-aspirated.

In the following examples, nominal suffixes are suffixed to nominal bases. Refer to the topic of Declension of Consonant-ending Nominal Bases in Volume 1.



- e.g. 1) मरुत् + सु^{7/3}
 = मरुद् + सु 8.2.39 झलां जशोऽन्ते ।
 = मरुत् + सु 8.4.55 खरि च ।



- e.g. 2) ऋच् + सु
 = ऋक् + सु 8.2.30 चोः कुः ।
 = ऋग् + सु 8.2.39 झलां जशोऽन्ते ।
 = ऋग् + षु 8.3.59 आदेशप्रत्यययोः ।
 = ऋक् + षु 8.4.55 खरि च ।

= Exercise =

1) Apply the चर्त्वम् sandhi rule.

1. वाग् + च = _____

2. त्यग् + त = _____

3. तद् + कालः = _____

4. समिध् + सु = _____

5. तद् + ते = _____

6. तस्माद् + परः = _____

2) Resolve the चर्त्वम् sandhi.

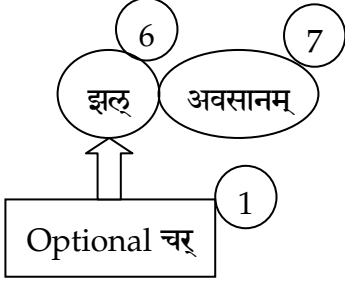
1. तत्किम् = _____ + _____

2. सर्ववित्सु = _____ + _____

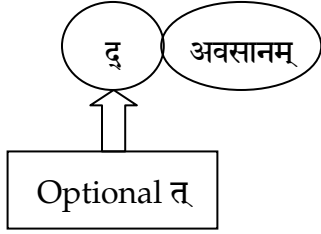
Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

8.4.56 वा⁰ अवसाने^{7/1} । ~ इलाम्^{6/3} चर्^{1/1}

- The substitution of चर् is optional, when the इल् is immediately followed by अवसान (absence of letter/full stop), which is observed at the end of a sentence.



- इल् = _____
- चर् = _____
- अवसानम् = Absence of letter



- e.g. 1) मरुत् + स्^{1/1}
 = मरुत् Elision of स्
 = मरुद् 8.2.39 इलां जशोऽन्ते ।
 = मरुत् / मरुद् 8.4.56 वाऽवसाने ।

= Exercise =

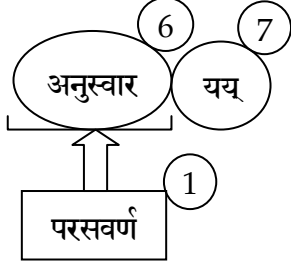
Apply the optional चर्त्वं sandhi rule before अवसान.

- | | |
|------------------------------|------------------------------|
| 1. रामाद् = _____ or _____ | 2. तस्माद् = _____ or _____ |
| 3. मरुद् = _____ or _____ | 4. विद्युद् = _____ or _____ |
| 5. सर्वविद् = _____ or _____ | 6. उपनिषद् = _____ or _____ |
| 7. ऋत्विग् = _____ or _____ | 8. वाग् = _____ or _____ |
| 9. सम्राड् = _____ or _____ | 10. विराड् = _____ or _____ |

15. परसवर्णः [parasavarṇah]

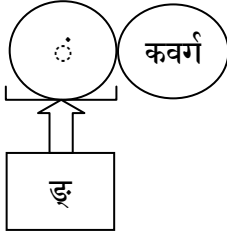
8.4.58 अनुस्वारस्य ^{6/1} ययि ^{7/1} परसवर्णः ^{1/1} ।

- परसवर्ण (similar sound to the following) is the substitute for अनुस्वार when the अनुस्वार is immediately followed by यय्.



○ यय् = _____

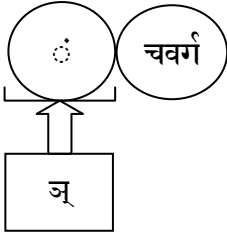
- In other words, अनुस्वार followed by यय् becomes the nasal of the following letter.



e.g. 1) शं + का

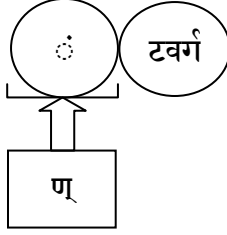
= शङ् + का 8.4.58 अनुस्वारस्य ययि परसवर्णः ।

= शङ्का



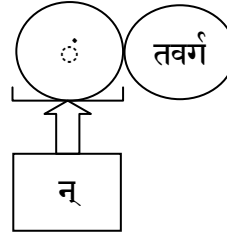
e.g. 2) पं + च

पञ्च



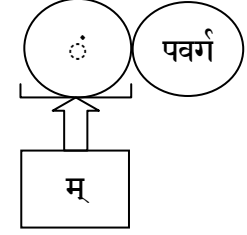
e.g. 3) दं + ड

दण्ड



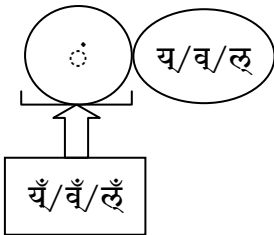
e.g. 4) गं + त्

गन्तु



e.g. 5) कं + प

कम्प



e.g. 6) सं + याति = सयँ याति/ संयाति

e.g. 7) सं + वादः = सवँवादः / संवादः

e.g. 8) सं + लक्षणम् = सलँलक्षणम् / संलक्षणम्

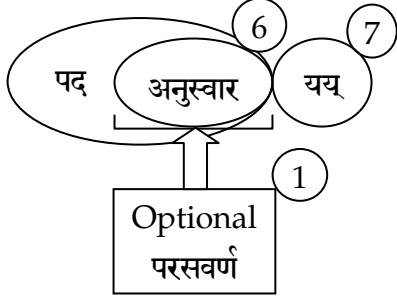
At पदान्त, this is optional by the next sūtra.

- When र्, as well as श/ष/स/ह् follow, अनुस्वार remains अनुस्वार, as in अंशः, कंसः, संहिता, etc.

Topic VI - Consonant Sandhi (हल्-सन्धि: [hal-sandhi])

8.4.59 वा⁰ पदान्तस्य^{6/1} ।

- This rule is optional at the end of a पद.



= Exercise =

1) Apply अनुस्वार sandhi (refer back to 8.3.24) and अनुस्वारस्य परसवर्ण sandhi rules within पदs listed below. Due to not being at the end of पद, the sandhi is compulsory.

- | | |
|-------------------------------|-------------------------------|
| 1. शन् + का = _____ -> _____ | 2. लन् + ख = _____ -> _____ |
| 3. गम् + गा = _____ -> _____ | 4. लन् + घन = _____ -> _____ |
| 5. पन् + चन् = _____ -> _____ | 6. अन् + जना = _____ -> _____ |
| 7. पन् + डित = _____ -> _____ | 8. ग्रन् + थ = _____ -> _____ |
| 9. नन् + दन = _____ -> _____ | 10. कन् + पन = _____ -> _____ |
| 11. गम् + तृ = _____ -> _____ | 12. हन् + तृ = _____ -> _____ |

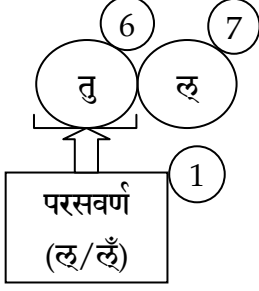
2) Apply अनुस्वार sandhi (refer back to 8.3.23) and अनुस्वारस्य परसवर्ण sandhi rules between two पदs listed below. Being at the end of पद, the sandhi is optional, thus there should be two forms. Note that उपसर्ग is grammatically considered to be an independent पद.

- | |
|------------------------------------------------|
| 1. कार्यम् + करोमि = _____ -> _____ / _____ |
| 2. क्षेत्रम् + चरन्ति = _____ -> _____ / _____ |
| 3. शोकम् + तरति = _____ -> _____ / _____ |
| 4. सम् + काशः = _____ -> _____ / _____ |
| 5. सम् + तापः = _____ -> _____ / _____ |

16. तोर्लि [torli]

8.4.60 तो: ^{6/1} लि ^{7/1} । ~ परसवर्ण: ^{1/1}

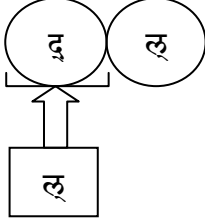
- When तवर्ग is followed by ल्, it becomes परसवर्ण (similar sound to the following), which is either ल् or लँ.



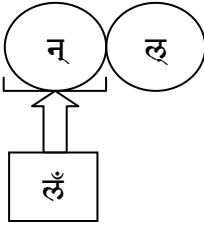
- तु (तवर्ग) = _____
 ○ सवर्ण of ल् (पर) = ल् and लँ _____

- Among the परसवर्णs, the most similar sound in terms of स्थान has to be the substitute. In this case, the substitute for त, थ, द, ध is ल् because they all have दन्ता: as their स्थान.

Whereas, the substitute for न् is लँ because they both have दन्ता: and नासिका as their स्थान.



- e.g. 1) तद् + लयः
 = तद् + लयः 8.2.39 झलां जशोऽन्ते।
 = तल् + लयः 8.4.60 तोर्लि।



- e.g. 2) श्रद्धावान् + लभते
 = श्रद्धावालँ + लभते 8.4.60 तोर्लि।

= Exercise =

1) Apply the sandhi.

1. जहत् + लक्षणा = _____

2. उद् + लेखः = _____

3. इमान् + लोकान् = _____

4. हनुमान् + लङ्गते = _____

2) Resolve the sandhi.

1. अजहल्लक्षणा = _____

2. उल्लङ्घयते = _____

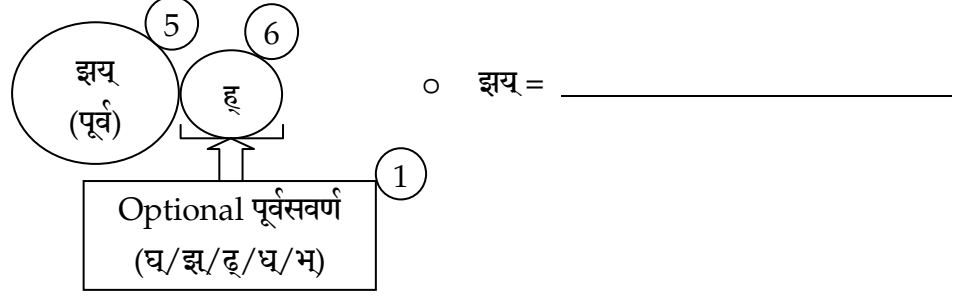
3. शुभाल्लोकान् = _____

4. पश्यल्लिखति = _____

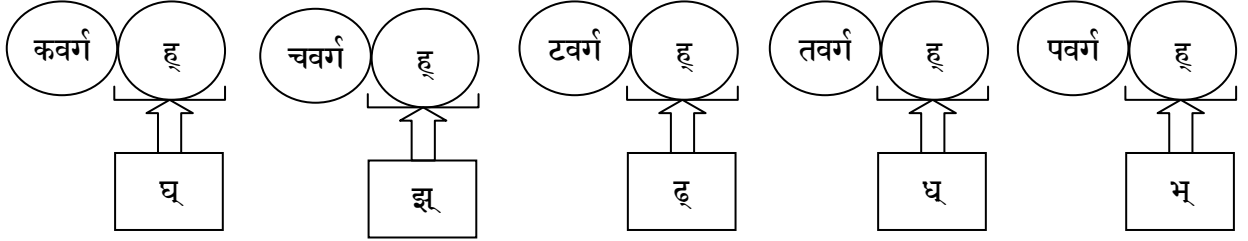
17. झयो होऽन्यतरस्याम् [jhayo ho'nyatarasyām]

8.4.62 झयः^{5/1} हः^{6/1} अन्यतरस्याम्⁰ । ~ पूर्वस्य^{6/1} सवर्णः^{1/1}

- When ह् is preceded by झय्, the ह् is replaced by the most similar letter among सवर्ण letters of the preceding letter (पूर्वसवर्णस)



- Among पूर्वसवर्ण, the most similar letter to ह् is determined by बाह्यप्रयत्न (hard or soft, and अल्पप्राण or महाप्राण), since it cannot be decided by the स्थान. As बाह्यप्रयत्न of ह् is soft and महाप्राण, the 4th letters of each class (घ, झ, ढ, ध, भ) are the most similar letters to ह्.



e.g. 1) दिग् + हरिः e.g. 2) अज् + हीनः e.g. 3) लिट् + हरति e.g. 4) दुराद् + हूते e.g. 5) अब् + हस्ती
दिग् + घरिः अज् + झीनः लिट् + ढरति दुराद् + धूते अब् + भस्ती

= Exercise =

1) Apply the sandhi.

- | | |
|-----------------------------|--------------------------|
| 1. वाग् + हृदये = _____ | 2. अज् + ह्रस्वः = _____ |
| 3. स्याद् + ह्रस्वः = _____ | 4. तद् + हीनः = _____ |
| 5. अब् + हस्ती = _____ | 6. समुद् + हर्ता = _____ |

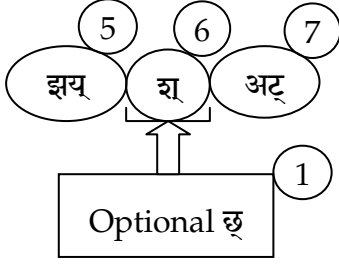
2) Resolve the sandhi.

- | | |
|---------------------------------|-------------------------------|
| 1. इग्घ्रस्वः = _____ + _____ | 2. अज्झ्रस्वः = _____ + _____ |
| 3. रत्नमुड्ढरति = _____ + _____ | 4. दूराद्धूते = _____ + _____ |
| 5. तद्धेतुः = _____ + _____ | 6. उद्धृतम् = _____ + _____ |

18. शश्छोऽटि [śaśco'ti]

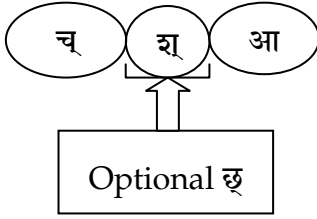
8.4.63 शः^{6/1} छः^{1/1} अटि^{7/1} । ~ झयः^{5/1} अन्यतरस्याम्⁰

- छ is optionally the substitute for श, when the श is preceded by झय, and followed by अट्.



○ झय = _____

○ अट् = _____



e.g. 1) तद् + शास्त्रम्

= तद् + शास्त्रम्

8.2.39 झलां जशोऽन्ते।

= तज् + शास्त्रम्

8.4.40 स्तोः श्रुना श्रुः।

= तज् + शास्त्रम्

8.4.53 झलां जश् झशि।

= तच् + शास्त्रम्

8.4.55 खरि च।

= तच् + छास्त्रम्

8.4.63 शश्छोऽटि।

= Exercise =

1) Apply the छत्व sandhi.

1. वाक् + शेते = _____

2. लिट् + शेते = _____

3. यद् + शोकम् = _____

4. उद् + शोषणम् = _____

5. श्रीमद् + शङ्करः = _____

6. तद् + श्रुत्वा = _____

2) Resolve the छत्व sandhi.

1. शश्वच्छान्तिम् = _____ + _____

2. सच्छब्दः = _____ + _____

3. युद्धाच्छ्रेयः = _____ + _____

4. उच्छ्रितम् = _____ + _____

5. तच्छीलम् = _____ + _____

6. तच्छृणु = _____ + _____

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