The Concept of Anumāna in Navya-nyāya

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Abstract:
According to the Navya Naiyāyikas, inference is the knowledge, which is produced out of consideration. But what is to be understood by the term 'consideration' or '*parāmarśa*'? According to them, *parāmarśa* or consideration is the factor through the operation of which the inferential conclusion can be attained. *Parāmarśa* has been defined as the knowledge of the existence of the *hetu* or reason in the *pakṣa* or subject, which reason is characterized by its being concomitant with the *sādhya*, the knowledge in the form of *parāmarśa* is actually caused by the knowledge of invariable concomitance of probans (*hetu*) with the probandum (*sādhya*) and the knowledge of the existence of the hetu in the subject (*pakṣa*). It has been said by Viśvanātha that the cognition of the existence of probans or *hetu* in the subject of inference along with the cognition of the prabans or *hetu* as pervaded by *sādhya* is called *parāmarśa* (*pakṣasya vyāpyavṛttitvadhīḥ parāmarśa ucyate*). The invariable co-existence in the form 'where there is smoke, there is fire' is known as *vyāpti* or invariable concomitance. Here the invariable co-existence (*avyabhicārī sāhacarya*) between the probans and probandum (i.e., smoke and fire) is the definition of *vyāpti*. The term 'co-existence' means remaining in the same locus of the probans with the probandum, which is not the counter positive of the absolute negation existing in the locus of the *hetu*. To Gangeśa, the knowledge of the co-existence of the probans and probandum along with the absence of the knowledge of deviation of the probans is the cause of ascertaining *vyāpti*. Repeated observations, of course, sometimes act as a promoter (*prayojaka*) in ascertaining *vyāpti* by removing the doubt of deviation. The doubt of deviation can be removed sometimes by *Tarka* or sometimes by the absence of the collocation of causes of doubt, which is called *svataḥsiddhaḥ*. Gangeśa admits *sāmānyalakṣaṇā* as a *pratyāsatti* in ascertaining *vyāpti* between smoke-in-general and fire-in-general. To him, the super-normal connection through universal (*sāmānyalakṣaṇā pratyāsatti*) has got a prominent role in ascertaining *vyāpti*. If somebody challenges about the validity of the syllogistic argument in the form "The mountain is fiery as it possesses smoke" (*parvato vahnimān dhūmāt*), the philosophers of Nyāya and Navya-nyāya persuasion will justify the same with the help of five constituents (*avayava*-s). The process is called *parāthānumāna* (syllogistic argument for making others understand). The constituents of a syllogism are proposition

(*pratijñā*), reason (*hetu*), example (*udāharaṇa*), application (*upanaya*), and conclusion (*nigamana*).

Keywords: *anumāna*, *parāmarśa*, *vyāpti*, *vyāpāra*, *sāmānyalakṣaṇa*, *avayava*.

The characteristic features of an object are revealed through cognition just as the nature of an object is revealed through the light of a lamp. This cognition is of two kinds: recollection (*smṛti*) and presentative knowledge (*anubhava*) [1]. Recollection or *smṛti* is a kind of knowledge which is produced by the trace (*saṁskāra*) alone [1]. All cognitions other than memory is called the presentative knowledge or *anubhava* which is, again, divided into two categories: valid (*yathārtha*) and invalid (*anyathārtha*) [1, p. xix]. A valid cognition always represents the real character of the object and an invalid cognition does not represent the real character of the object [1, p. xix]. A valid presentative cognition which is technically known as *pramā* is of four kinds: perception (*pratyakṣa*), inference (*anumiti*) comparison (*upamiti*) and verbal testimony (*śābda*). Its special cause or instrument (*karana*) is also of four kinds which are known as perception (*pratyakṣa*), inference (*anumāna*), comparison (*upamāna*) and verbal testimony (*śabda*) [1, p. xx]. The cognition which is produced from the contact of the sense organ with an object and which is not caused due to words *(avyapadeśya)*, which is, again, invariably related to the object (*avyabhicāri*) and certain (*vyavasāyātmaka*) is called perception. Perception is the immediate knowledge of present object through a sense organ [5, 1.1.4]. We can attain the perceptual knowledge of an object directly without taking help of previous knowledge of an object, e.g., when we perceive a jar, we can know it without taking any help of inferential or any other sources of valid knowledge. In other words, Gaṅgeśa is of the opinion that perception is a cognition, the instrumentality of which is not another cognition (*jñānākaraṇakaṁ jñānaṁ pratykṣam*) [3], [5, 1.1.5]. So, perception does not depend on other cognitions. Without perception no other instrument of valid cognition is possible. Perception is different from inference, comparison and testimony, which are not produced by the sense-object-contact. Though perception is the fundamental basis of all kinds of knowledge yet other sources of valid cognitions like inference etc. play an important role in our everyday life. We can know only the present object through perception. But in order to know the past, future and remote objects as well as present and near object we have to depend on inference. Gaṅgeśa has given the definition of inference after perception an account of the fact that inference is dependent on perception – ("*Pratykṣopajīvakatvāt pratykṣānantaraṁ vahuvādisammatatvādupamānāt prāganumānaṁ nirūpyate*") [3, (inference-part), 1].

Inference is the knowledge in which perception must be present as an antecedent. So, inference is mediate knowledge of an object. Inference can reveal those objects that are not within the reach of our sense organs. With the help of inference, we can know definitely the existence and the nature of an object, which is doubtful [7, p. 263].

According to old logicians, inference is followed by 'something' which is expressed by the term 'Tat' [5, 1.1.5] Here the term 'tat' refers to perception without which inference is not possible at all. In the case of inference, the perception of the probans and the invariable co-existence between the probans and the probandum are highly essential, [5, commentary on 1.1.5] e.g., the syllogistic argument in the form: 'The mountain is fiery as it has got smoke.' The real ground of this inference is not the perception of smoke alone, but the knowledge of the invariable co-existence between smoke and fire is also ground.

According to the latter logicians, inference is the knowledge, which is produced out of consideration ("*Tacca vyāpti-viśiṣṭa-pakṣadharmatā-jñāna-janyaṁ jñānamanumitistatkaraṇaman-umānam*" [3, p. xxv], [3, p. 2]. But what is to be understood by the term 'consideration' or '*parāmarśa*'? According to them, *parāmarśa* or consideration is the factor through the operation of which the inferential conclusion can be attained [2, pp. 99-100]. *Parāmarśa* has been defined as the knowledge of the existence of the *hetu* or reason in the *pakṣa* or subject, which reason is characterized by its being concomitant with the *sādhya*. In a valid syllogistic argument in the form "The Mountain is fiery as it has got smoke," the cognition in the form "The Mountain has got

smoke which is pervaded by fire" is consideration [3, p. xxv] (*parāmarśa*) which is the intermediate cause *(vyāpāra)* [2, p. 99] in attaining inferential knowledge of fire.

But what is to be understood by the term intermediate cause or *vyāpāra*? It has been defined in the following manner.

That which, being produced by a particular object, becomes the producer of some entity produced by the same (i.e. first) particular object, is called *vyāpāra* or intermediate cause (*tajjanyatva sati tajjanyajanako vyāpāraḥ*) [1, p. xxviii]. As consideration (*parāmarśa*), being produced by knowledge of *vyāpti,* becomes the producer of inference which is again produced by knowledge of *vyāpti*, it is considered as an intermediate cause (*vyāpāra*) of inference [6, p. 47]. The knowledge of *vyāpti* is taken as the special cause of inference [2, p. 99]. But what is to be known by the term "special cause or *karaṇa*"?

The uncommon cause associated with the intermediary is called special cause or *karaṇa* (*vyāpāravadasādhāraṇaṁ karaṇam*) [1, p. xx]. Here knowledge of *vyāpti* which is associated with the knowledge in the form of consideration (*parāmarśa*) is the special cause of inference or instrument to inference.

In the syllogistic argument, "The Mountain is fiery as it has got smoke on it," there are five mental or psychic processes. At first, we have to gather the knowledge in the form: "where there is smoke there is fire" in various places like kitchen etc., this invariable relation between smoke and fire is called *vyāpti.* After sometimes it has been found that the smoke is arising from the mountain having an uninterrupted connection with the surface of the mountain (*avichhinnamūla dhūmarekhā*). This is the second step in attaining inferential knowledge. Then recollection of the knowledge in the form "where there is smoke there is fire," i.e., *vyāpti* (*karaṇa*) is necessary and after that we attain the knowledge in the form: "The mountain has got smoke which is invariably connected with fire." This knowledge is known as consideration (*parāmarśa*) after which the conclusion in the form "The mountain is fiery" can be drawn [2], [8 (commentary on the verse 66), p. 99].

In the above process of inference, the knowledge in the form of *parāmarśa* is actually caused by the knowledge of invariable concomitance of probans (*hetu*) with the probandum (*sādhya*) and the knowledge of the existence of the *hetu* in the subject *(pakṣa)*. It has been said by Viśvanātha that the cognition of the existence of probans or *hetu* in the subject of inference along with the cognition of the prabans or *hetu* as pervaded by *sādhya* is called *parāmarśa* (*pakṣasya vyāpyavṛttitvadhīḥ parāmarśa ucyate*) [2, p. 99]. It may also be explained in the following way. The cognition of the existence of a *hetu*, which is characterized by *vyāpti,* is called *parāmarśa* (*vyāpti-viśiṣṭa-pakṣadharmatā-jñānam parāmarśaḥ*). It is called an intermediate condition of inferential cognition (*vyāpāra*). Because such cognition being produced through the earlier cause, i.e., *vyāpti* becomes the producer of inference. To Viśvanātha this is an invariable step for the attainment of inferential cognition.

The Mīmāṁsakas do not think that such a step is at all essential for attaining inferential cognition as it has got no new information other than the conjunction of the two, i.e., the cognition of the existence of *hetu* in the *pakṣa* (*pakṣadharmatājñāna*) and the cognition of the *hetu* as pervaded by *vyāpti (vyāptiviśiṣṭa)*. The conditions of *vyāptijñāna* (the knowledge of invariable concomitance) and *pakṣa-dharmatā-jñānam* (i.e., the cognition of the existence of the probans in the subject) are accepted as essential isolately, but so far as *parāmarśa* is concerned, it is, according to them, quite uncalled for. In the syllogistic argument in the form: 'The mountain is fiery as it has got smoke (*parvato vahnimān dhūmāt*) and "wherever there is smoke, there is fire" (*yatra yara dhūmastatra tatra vahniḥ*). In this case, the inferential cognition follows from the knowledge of the invariable concomitance and the knowledge of the existence of *hetu* in a *pakṣa* (*vyāptijñāna and pakṣadharmatājñāna*). An individual who does not have these two conditions cannot attain the inferential cognition that the mountain has got smoke. Hence these two cognitions have to be admitted as the necessary conditions for having inferential cognition. They are not merely necessary, but sufficient also, according to the Mīmāṁsā-thinkers, to produce the inferential state. It being so, the postulation of an additional condition called *parāmarśa* or the cognition in the form-

"The Mountain has got smoke pervaded by fire" seems to be unnecessary. The Mīmāṁsakas do not say indeed that such an additional cognition is never found as instrumental to the emergence of the inferential state. But they emphasize that, since it is not a uniform antecedent, it cannot be regarded as one of the necessary conditions for *anumiti* [2], [7, p. 99]. The Naiyāyikas claim that even there such cognition has to be admitted for the sake of logical economy (*lāghava*). They explain that there is such a thing as *parāmarśa* leading to an inferential state and that if *parāmarśa* has to be admitted even for once as a condition for some inferential cognition, then for the sake of a unified causal theory it should be admitted as a uniform condition for all inferential cognitions (*nanu vyāpyatāvacchedaka-prakāreṇa vyāptismaraṇaṁ pakṣadharmatājñānaṁ tathā lāghavāt parāmarśa-hetutvenāvaśyakatvācca evañca dhūmo vahnivyāpyo dhūmavānścāyamitijñāna-dvayādevānumi-tirastu*) [5, p. 442].

According to the Nyāya, cognition like *parāmarśa* has to be admitted as a necessary condition for all inferential cognitions. In the case of a person inferring the existence of fire in a hill on the strength of the smoke coming out of the mountain and remembering that, wherever there is smoke, there is fire, the ensuing *parāmarśa* is of the nature of an immediate cognition. But an individual may infer the presence of fire on the mountain on hearing from others that the hill in question has smoke, which is invariably associated with fire. In this case the inference undoubtedly caused by his verbal knowledge mentioned earlier, which is again of the nature of *parāmarśa*. If *parāmarśa* is admitted as a necessary condition for a particular inference, why is not accepted in all cases? Hence the Naiyāyikas have accepted a uniform condition called *parāmarśa* for inferential cognition for the sake of logical economy (*lāghava*). Moreover, there would arise a possibility of inferential cognition from the statement "The Mountain is smoky" (*parvato dhūmavān*), because the cognition of the existence of a *hetu* i.e., smoke (in *pakṣa*) characterized by 'smokeness' which has become the limiter of the pervadedness (*vyāpyatāvacchedakībhūtaprakāraka*) is very much present here. It cannot be said that the cognition of the existence of the *hetu* (in *pakṣa*), which is characterized by the limiter of the pervadedness, which is known, becomes the cause of inferential cognition. For, if the above criterion is accepted, there would arise the possibility of attaining inferential cognition from the knowledge of *vyāpti* attained by an individual called Caitra and from the cognition of the existence of *hetu* in *pakṣa* attained by another individual called Maitra [5, p. 442].

If it is said again that the cognition of the *hetu* characterized by the limitor of the pervadedness attained by an individual and the cognition of the existence of *hetu* in *pakṣa* attained by the same individual become the causes of the inferential cognition by the same individual, there would have to be accepted innumerable forms of causal relations, because different or individual form of causal relation has to be accepted for the inferential cognition drawn by each individual. In order to avoid such complication a solution is suggested by Viśvanātha. The cognition of *hetu* (in a *pakṣa*), which is characterized by *vyāpti* attained through the relation of inherence, can produce an inferential cognition through the relation of inherence. Hence there does not arise the question of innumerable causal relations [5, p. 442].

If it is said that the cognition of the existence of innumerable causal relations, and the cognition of *hetu* characterized by *vyāpti* (*vyāptiprakārakaṁ jñānam*) are taken as an independent cause of inferential cognition, then two forms of causal theory would have to be accepted. If it is taken for granted, there would arise inferential cognition from two independent cognitions in the forms: "The smoke is pervaded by fire" (*vahnivyāpyo dhūmaḥ*) and "the mountain is possessing light (*ālokavān parvataḥ*), as there are two cognitions mentioned above. The latter cognition is described as *pakṣadharmatājñāna* (the knowledge that probans exists in the *pakṣa)* because 'light' (*āloka*) which is like smoke is pervaded by fire" [5, p. 483].

In order to avoid this problem, the Naiyāyikas prefer to admit a qualified cognition which is a unitary whole in the form '*vyāptiviśiṣṭa-pakṣadharmatā-jñānam*,' i.e., the cognition of the existence of *hetu* (in *pakṣa*), which is characterized by *vyāpti*. If there is at all any defect of *gourava*, it is of virtuous type (*phalamukha gaurava*), as it does not become an impediment to the

attainment of inferential cognition ("*Kāraṇatāgraha-daśāyāṁ phalamukhagauravasya siddhyasiddhi-bhyāmadoṣatvāt*") [5, pp. 503-504].

Hence the knowledge of *vyāpti* is considered as highly essential in order to attain inferential knowledge. And that is why, the question about the nature of *vyāpti,* the special cause of inference, has been raised by Gaṅgeśa Upādhyāya in the beginning of his famous book *Vyāptipañcakam* [3, p. 29].

The invariable co-existence in the form – "where there is smoke, there is fire" is known as *vyāpti* or invariable concomitance [3, p. xxv]. Here the invariable co-existence (*avyabhicārī sāhacarya*) between the probans and probandum (i.e., smoke and fire) is the definition of *vyāpti.* The term 'co-existence' means remaining in the same locus of the probans with the probandum, which is not the counter positive of the absolute negation existing in the locus of the *hetu* [1, p. xxvi]. As for example, "The mountain is fiery, as there is smoke" (*parvato vahnimān dhūmāt*). In this particular syllogistic argument, smoke has been taken as probans, the locus of which is mountain in which there is the absolute negation of a jar. The counter positive or absentee (*pratiyogī*) of this absence is the jar itself, and the non-counter-positive of it is fire. The co-existence of smoke with such type of fire is called *vypāti* [3, p. 100], [8, p. 258].

In an invalid syllogistic argument having the form "The mountain is smoky as there is fire on it" (*parvato dhūmavān vahneḥ*). 'Fire' has been taken as probans. One of the loci of the probans is 'the red hot iron ball' in which there is the absolute negation of smoke. The counter-positive of it (but not the non-counter positive) is the smoke, which is the probandum. So, the definition of *vyāpti* cannot be applied in this invalid inference [8, p. 258]. Though there is diversity of opinion among the philosophers of the different schools in respect of the definition, function and nature of *vyāpti* or invariable concomitance, all of them are of the view of that inference is not possible without proper knowledge of *vyāpti* or invariable concomitance which has been considered as a special cause (*karana*) of inference by the logicians. To Gaṅgeśa, the knowledge of the co-existence of the probans and probandum along with the absence of the knowledge of deviation of the probans is the cause of ascertaining *vyāpti* (*vyabhicāravirahasahakṛtaṁ sahacāradarśanaṁ vyāptigrāhakam*) [3, p. 210]. As the knowledge of deviation counters the knowledge of *vyāpti,* the absence of it should be considered as the cause of ascertaining *vyāpti* (*vyabhicāragrahasya vyāptigrahe pratibandha-katvābhāvaḥ kāraṇam*) [8 on verse 137].

The repeated observations of the co-existence between *hetu* and *sādhya* cannot be regarded as the cause of *vyāpti*. For, *vyāpti* may sometimes be ascertained by a single observation of the co-existence of a *hetu* and a *sādhya* in a particular locus if the knowledge of deviation does not arise (*bhūyodarśanaṁ tu kāraṇaṁ vyabhicārāsphurtau sakṛddarśane'pi kvacidvyāptigrahāt*) [8, p. 532] as we find in the case "It has this-colour, as it has this-taste" (*etadrūpavān etadrasāt*). In this case the knowledge of *vyāpti* is in the form "This-taste is pervaded by this-colour" (*etadrasaḥ etadrūpavyāpyaḥ*) of which 'this-taste' is a qualificand and 'the pervasion determined by this-colour' is a qualifier. From the single observation of the coexistence of the two in the above-mentioned inference the knowledge of *vyāpti* is ascertained. As it is ascertained from the single observation of the existence of the two when there is the absence of the knowledge of deviation (*vyabhicāra*), the repeated observation cannot be the violation of the rule – "the method of agreement in absence" (*vyatirekavybhicāra*).

What is to be understood by the absence of the knowledge of deviation (*vyabhicārajñānaviraha*)? It is an absence whose counter-positiveness is limited by the property of being knowledge existing either in the definite knowledge of deviation or in the cognition of deviation in the form of doubt. The knowledge of deviation may be attained sometimes definitely but sometimes not. If in a case of inferential procedure *vyāpti* or invariable relation, not being known definitely, gives rise to the slightest doubt about it, it should be described as the knowledge of deviation. Hence "the cognition of the absence of deviation" (*vyabhicārajñānaviraha*) requires certain knowledge of *vyāpti*, which is free from doubt. The cognition in which the probans is known as qualificand (*viśeṣya*) and the co-existence of the probans with the probandum in the same substratum as qualifier (*prakāra*) is to be known by the term '*sahacāragraha*' (the knowledge of

coexistence) (*sahacāragrahaśca hetuviśeṣyaka-sāmānadhikaraṇya-prakārakaṁ jñānam*). It can be explained with the help of the following instance. In the cognition – "Smoke is coexistent with fire in the same locus" (*dhūmah vahnisamāṇādhikaraṇah*) the 'smoke' (*dhūmah*) is the qualificand (*viśeṣya*) and "the coexistence of the smoke with the fire in the same substratum" (*vahnisamānādhikaraṇa*) is the qualifier (*prakāra*). By the term '*sahacāragraha*' such an apprehension should be taken into account. Both the knowledge of existence of the probans and the probandum in a particular locus and the absence of the knowledge of deviation are the causes of ascertaining *vyāpti* (*tadubhayamapi vyāptiniścaye kāraṇam*). Repeated observations, of course, sometimes act as a promoter (*prayojaka*) in ascertaining *vyāpti* by removing the doubt of deviation (*vyabhicāraśamkāvidhūnanadvārā bhūyodarśanamupayujyate*) [8, p. 532].

There are two kinds of knowledge – the definite knowledge and the knowledge in the form of doubt. The doubt of deviation may arise in some cases from the doubt of extraneous adjunct and sometimes from the knowledge of some common attributes like co-existence etc. along with the absence of the knowledge of the specific characteristic features of them. The doubt of deviation can be removed sometimes by *Tarka* or sometimes by the absence of the collocation of causes of doubt, which is called *svataḥsiddhaḥ*.

> *jñānam niścayaḥ śamkā ca. Sa kvacidupādhisandehāt, kvacid viśeṣādarśanasahitasādhāraṇadharmadarśanāt, Tadvirahaśca kvacid vipakṣabādhakatarkāt, kvacit svatahsiddhaḥ eva* [8, p. 532], [3, pp. 210-211]. "*Svataḥsiddhaḥ iti tarkam vinā anyena prayuktaḥ*" [4, p. 217].

If doubt is not dispelled through repeated observation of the co-existence between *hetu* and *sādhya*, the method of *tarka* is to be resorted to (*yatra tu bhūyodarśanādapi śamkā nāpaiti tatra vipakṣa-bādhakatarko'pekṣitah*). *Tarka* is the end of doubt (*tarkaḥ śamkāvadhiḥ*), as it is dispelled through the application of this method [3, pp. 219-224]. *Tarka* is a kind of hypothetical reasoning (*āropa*). It is an imposition of the pervader through the imposition of the pervaded (*vyāpyāropeṇa vyāpakāropah*). It is of two types-determining the definite nature of an object *(viṣayapariśodhaka)* and removing the doubt of deviation (*vyabhicāraśamkānivartaka*). The former is in the form: "If it does not possess fire, it would not possess smoke" (*yadyaṁ vahnimān na syāt tadā dhūmavān na syāt*). It determines the certainty of the existence of fire in a particular locus. In this context through the absence of the *āpādya* or the consequence (i.e., by the absence of the negation of smoke) the certainty of the existence of the absence of the *āpādaka* (the absence of the negation of fire) is ascertained. Through the knowledge of the existence of smoke the existence of fire is ascertained. In this way the doubt as to the existence of fire on the mountain in this context may be removed by applying this type of *tarka*. The observation of the co-existence is to be taken as the cause of ascertaining causal relation (*kāryakāraṇabhāva*) between smoke and fire (*yadyam vahnimān na syāt tadā dhūmavān na syāt, kāraṇaṁ vinā kāryānutpādāt*) [8, (on verse 137), p. 225]. The latter type of *tarka* is in the following form: "If smoke be deviated from fire, it will not be caused by fire" (*dhūmo yadi vahnivyabhicārī syāttarhi vahnijanyo na syāt*). If the first part is true, the second part would also be true. But it is experienced that the second part is not true in so far as we do not get any smoke, which is not caused by fire. From the falsity of the second half the falsity of the first half is determined. *Tarka*, being a mental construction, is useful for removing doubt and hence it is otherwise called *āpatti* i.e., imposition of the undesired through which a desired standpoint is established. It is a kind of indirect method through which the truth is ascertained. If the negation of p is proved as absurd, it would automatically follow that p is true. *Tarka* cannot be applied to all cases where doubt stands on the way of our knowledge. If there does not arise any doubt due to some contradiction (*vyāghāta*), inference can be drawn without the application of *tarka*.

The doubt of deviation (*vyabhicāraśamkā*) does not arise in the *vyāpti* existing inside *tarka*, because it would lead to the involvement of contradiction in respect of one's own activity (*svakriyāvyāghāta*) and hence there does not arise any necessity of another *tarka*. It is a fact that an individual is allowed to doubt as long as there does not arise any contradiction in respect of one's

own practical activity. He is not allowed to entertain doubt about *vyāpti*-relation existing between smoke and fire, because he seeks fire to get smoke without any hesitation in the empirical level. Had he possessed a slightest doubt as to it, he would not have sought fire for smoking. The existence of doubt in this context will contradict one's own activity. Thus, habitually a man takes food to satisfy his hunger and takes the help of language to make others understand his desire etc. (*yadi hi kāraṇaṁ vinā kāryaṁ syāt tadā dhūmārthaṁ vanhestṛptyarthaṁ bhojanasya va niyamata upādānaṁ tavaiva na syāditi*) [8, p. 225], [3, pp. 219-224]. If there is a case where an effect is produced without any cause, the effect would be doubted as having any cause or uncaused (*ahetuka*). If this doubt persists, it would surely lead to contradiction in respect of one's own action (*svakriyāvyāghāta*). In fact, such doubt, if nourished, surely leads to contradiction, which is undesirable. Hence it is better not to entertain doubt (*yadi hi kvacit kāraṇaṁ vinā kāryaṁ bhaviṣyati tadāhetuka eva bhaviṣyatīti tatrāpyaśaṁkā bhavet tadā sa svakriyāvyāghātādapasaraṇīyā*) [8, p. 225]. One's own activities indicate the absence of doubt in them. For, the activities are regarded as impediment to a doubt. In spite of this if someone goes on doubting without caring to the fact of self-contradiction, it would be taken as a pathological one. Hence the phenomenon of doubting would be taken as an object of doubt.

Gangeśa admits *sāmānyalakṣaṇā* as a *pratyāsatti* in ascertaining *vyāpti* between smoke-in-general and fire-in-general. To him the super-normal connection through universal (*sāmānyalakāaṇā pratyāsatti*) has got a prominent role in ascertaining *vyāpti*. When it is asserted that all men are mortal, it means that the character of being mortal is true not of this or that man only but all men existing in past, present and future. Such cognition of morality is not possible by ordinary contact of sense organ with the object on account of the fact that all men are cannot be physically present before my sense organ. Hence, a super-normal connection with the aid of universal has been admitted by the Naiyāyikas. When a human being is perceived as such, the universal 'humanity' in him is also perceived simultaneously. The normal perception of humanity is the medium through which all human beings or the class of human beings is perceived.

With the aid of such supernormal connection through universal the invariable relation (*vyāptisambandha*) can be established between two objects. Such relation existing between all cases of smoke and fire cannot be known through the normal way of seeing. The cognition of the coexistence between a particular smoke and a particular fire leads to the perception of their corresponding universals i.e., smokeness and fireness. With the help of these an invariable relation between smoke-in-general and fire-in-general existing in three times can be established. In this context the universal 'smokeness' serves as a *pratyāsatti* through which we get all the cases of smoke. Generally, doubt arises concerning all cases of smoke and fire existing in different place and time that are beyond the range of our sense organs. Any type of doubt presupposes the knowledge of its object. Hence an object must be known previously to justify doubt and the previous perceptual knowledge of all cases of smoke is highly essential. This is possible through universal (smokeness). This is another way of justifying *sāmānyalakṣaṇā*, which ultimately assists in ascertaining *vyāpti* in the way mentioned above. It runs as follows in the text: *Vyāptigrahaśca sāmānyalakṣaṇāpratyāsattyā sakaladhūmādiviṣayaka* [3, p. 253]. *Prasiddhadhūme vahnisambandhāvagamāt kālāntarīyadeśāntarīyadhūmasya mānābhāvenājňānāt. Sāmānyena tu sakaladhūmopasthitau dhūmāntare viśeṣādarśane saṁśayo yujyate* [3, p. 254].

In this case the term *lakṣaṇa* means *svarūpa* or nature. The connection in which universal becomes the nature is called *sāmānyalakṣaṇa* (*sāmānyam lakṣaṇaṁ yasya ityarthaḥ*). The definition, if taken into account, everybody would have acquired the knowledge of all cases of smoke through the connection of smokeness, which is eternal and remains in all smokes through the relation of inherence. But in actual life such cognition is not possible. Hence a different type of definition is proposed. By the term '*sāmānyalakṣaṇasannikarṣa*' we mean the universal, which has become a qualifier in the knowledge of which the object connected with sense organ is a qualificand (*indriyasambaddhaviṣayaka*). In the case of a particular manifestation of smoke the 'smoke' has become a qualificand connected with sense organ. In such 'smoke' the property or universal 'smokeness' inheres as a qualifier (*prakārībhūta*). All the cases of smoke existing in past, present

and future can be perceived through super normal connection through smokeness existing in a particular smoke (*tatra dhūmatvena sannikarṣena dhūmā ityevam rūpa-sakaladhūmaviṣayakam jñānam jāyate*) [8, (on verse 69), p. 111].

In the case of inferential cognition, the knowledge of all cases of smoke is essential. In the smoke, which is perceived, there is certainty about its relation with invariable concomitance with fire. Without the acceptance of such *sannikarṣa* the doubt regarding the invariable concomitance of smoke with fire, which is beyond the reach of the sense organ, cannot be explained. When a particular smoke, fire and their coexistence are known, the universals like smokeness and fireness are known simultaneously. Through these universals all individuals become objects of our knowledge. In such cases universal becomes a supernormal relation or *pratyāsatti*.

If somebody challenges about the validity of the syllogistic argument in the form "The mountain is fiery as it possesses smoke" (*parvato vahnimān dhūmāt*), the philosophers of both the old school of Nyāya and the new school of Nyāya or Navya Nyāya persuasion will justify the same with the help of five constituents (*avayava*-s). The process is called *parāthānumāna* (syllogistic argument for making others understand). The constituents of a syllogism are proposition (*pratijñā*), reason (*hetu*), example (*udāharaṇa*) application (*upanaya*) and conclusion (*nigamana*).

1. Proposition (*pratijñā*): The mountain is fiery (*parvato vahnimān*)
2. Reason (*hetu*): because it possesses smoke (*dhūmāt*)
3. Example (*udāharaṇa*): Whatever is smoky is fiery, as a kitchen (*yatra dhūmastatra vahniḥ yathā mahānasaḥ*)
4. Application (*upanaya*): So is the mountain (*tasmāttat tathā*)
5. Conclusion (*nigamana*): Therefore, the mountain is fiery (*parvato vahnimān*) [3, pp. 656-761].

In the above-mentioned case the proposition and the conclusion are the same apparently. But it should be borne in mind that proposition is mere an introduction of what is going to be proved while conclusion is the result of the whole inferential process.

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