

Macalester Journal of Philosophy

Volume 16, Issue 1

2007

Article 4

SPRING 2007

The Nyaya Dualist Tradition: A Comparative Analysis

Anirudh Seth*

*Macalester College

Copyright ©2007 by the authors. *Macalester Journal of Philosophy* is produced by The Berkeley Electronic Press (bepress). <http://digitalcommons.macalester.edu/philo>

The Nyaya Dualist Tradition: A Comparative Analysis

Anirudh Seth

Abstract

In this paper, I hope to i. briefly explain Nyaya dualist ontology and identify the implications involved in accepting this view, ii. provide a comparison of Nyaya dualism to Cartesian dualism, and iii. provide an analysis of Nyaya dualism vis-à-vis some contemporary non-dualist theories of mind, in an attempt to gauge the viability of Nyaya Dualism as a theory of mind. I will briefly identify the context and history of this school in Indian Philosophy and will attempt to describe how this paper approaches and interprets Nyaya thinking.

KEYWORDS: Nyaya, Indian philosophy, dualism, Chakrabarti

The Nyaya Dualist Tradition: A Comparative Analysis

Anirudh Seth

A. Introduction:

Indian philosophy is a rich, vast, though relatively neglected area of inquiry for the great majority of contemporary philosophers of mind. In particular, most of the contemporary work done in the philosophy of mind focuses primarily on the Western philosophical tradition, and more specifically, the focus tends to be on problems in the philosophy of mind that have arisen since the time of Descartes. Given this discrepancy, this paper will attempt to provide an expository analysis of ancient Indian thought, in the context of contemporary problems of mind. More specifically, this paper will focus on one specific school in Indian philosophy of mind, namely *Nyaya* dualism. In this paper, I hope to i. briefly explain *Nyaya* dualist ontology and identify the implications involved in accepting this view, ii. provide a comparison of *Nyaya* dualism to Cartesian dualism, and iii. provide an analysis of *Nyaya* dualism vis-à-vis some contemporary non-dualist theories of mind, in an attempt to gauge the viability of *Nyaya* Dualism as a theory of mind.

B. Understanding *Nyaya* Dualism:

Before I begin explaining the fundamentals of *Nyaya* dualism, I will briefly identify the context and history of this school in Indian Philosophy and will attempt to describe how this paper approaches and interprets *Nyaya* thinking. The *Nyaya* school is one of seven major schools¹ in the Indian philosophical tradition, and is perhaps the one of the oldest². The first philosophers in this school date back to the sixth century BC, starting with thinkers like Gotama and Vatsyayana³.

This paper will deal with *Nyaya* dualism as interpreted by Kisor Chakrabarti, Jean B. Williams Professor at Ferrum College. Chakrabarti has written a number of succinct and readily accessible accounts of *Nyaya* thought, and his account of *Nyaya* dualism is particularly interesting. It is important to note at the outset that Chakrabarti calls his interpretation of *Nyaya* dualism, *Nyaya-Vaisesika* dualism, to acknowledge that parts of his version and interpretation draw on thinking from another school in Indian thought, namely the *Vaisesika* school. In addition, the Routledge Encyclopedia of Philosophy will be used as a cross-reference to clarify certain aspects of Chakrabarti's interpretation.

¹ Chakrabarti cites seven schools, namely, *Nyaya*, *Vaisesika*, the *Syncretic school*, *Bauddha*, *Smakhya*, *Carvaka*, and *Advaita*.

² Chakrabarti, Kisor. *Classical Indian Philosophy of Mind*. Pp. 17

³ Chakrabarti, Kisor. *Classical Indian Philosophy of Mind*. Pp. 17

Further, it is important to note that translating Nyaya from Sanskrit to English can be problematic in the sense that much of the translated English terminology does not necessarily correspond directly to the intended meaning in Sanskrit. For example, the term *guna* or ‘qualities’ (as translated) has a very specific and distinct interpretation in Nyaya thought relative to what we would conventionally call qualities (i.e. simply properties of objects such as colors, sounds, feels etc). Having established these basic facts, we can now proceed to our analysis of Nyaya dualism.

I. **The fundamental principles of Nyaya Dualist Ontology:**

Nyaya dualists believe that a living body is a necessary condition for the origin of conscious states⁴. According to the conventional view, Nyaya dualists hold that there are seven essential ‘reals’ in the world; i. substance (*dravya*), ii. qualities (*guna*), iii. action (*karma*), iv. universal (*samanya*), v. ultimate individuator (*visesa*), vi. inherence (*samavaya*), and vii. negative entities (*abhava*).⁵

1. Substances:

A substance is the substratum of qualities and actions in the sense that it is something in which there cannot be any absolute absence of the latter. Thus, no substance can exist *in absentia* of any qualities or actions. Further, a substance is “...a continuant and different from its qualities and action: it may remain the same, even when its qualities or actions change” (Chakrabarti 17). A mango, for example, may remain the same even when its color changes, or when it falls off a tree (a kind of action). Further, all substances exist in space (space will be discussed further in this section). Substances in Nyaya have a separate and distinct existence in a way that their inherent properties do not. Properties merely inhere in a substance, and do not have an existence independent of the substances in which they inhere.

In Nyaya dualism, qualities and actions are usually perceptible, as is the substance which underlies them. However, it may be the case that the qualities and actions are perceptible, but the underlying substance imperceptible (for example, the self may be an imperceptible substance, though it possesses perceptible qualities like cognition or desire.)⁶ Thus, a substance can be both perceptible and imperceptible in Nyaya thought, though the qualities and actions emerging from that substance are always perceptible.

2. Perception:

Perception in Nyaya thought is divided into two types. The first is external perception and perceptibility (i.e. the ability of others to perceive certain things in the real world). The other is internal perception, or the ability of the self to perceive the qualities, actions, etc that characterize it.

External perception is sub-divided into two categories in Nyaya thought: *savikalpa* (constructed) and *nirviklpa pratyaksa* (non-constructed) perceptions. For

⁴ Ibid, 2-3.

⁵ Franco, E. and Karin, P. (1998). Nyāya-Vaiśeṣika. In E. Craig (Ed.), *Routledge Encyclopedia of Philosophy Online*. **N.B.:** Chakrabarti translates *guna* as qualia rather than as qualities, though given the history of the term in the philosophy of mind, I used the definition provided by Prof. Laine and the *Routledge Encyclopedia of Philosophy*

⁶ Ibid, 2

example, simply seeing a cow will be a non-constructed perception, but perceiving a cow as being a cow is constructed.

3. Physical/spiritual Substances, the Self and the inner sense:

“The Nyaya admits five kinds of physical substances, namely earth, water, fire and air, and *akasa* (the substratum of sound)” (Chakrabarti 17). Most physical substances (though not all) have externally perceivable qualities and actions, according to Nyaya thought. This feature of the physical is more of an empirical observation than an *a priori* truth in Nyaya (thus, we tend to observe regularly that physical substances possess some kind of qualities and/or action). Nyaya thought leaves open the possibility of physical substances without externally perceivable qualities or actions. Matter (i.e. physical substances) in the Nyaya view, is simply that without the support of which externally perceptible qualities and actions could not exist. Matter is therefore the causal substratum of externally perceptible qualities.

The self is a kind of spiritual substance, radically different from any of the other substances. The self is considered the substratum of consciousness. Further, “...the self is considered to be both beginningless and endless...”¹ in the Nyaya view. The self, however, does not have externally perceptible qualities or actions. As a substance, the self must have some qualities or actions, though these are only internally perceivable.

Nyaya thinkers also hold that there are three additional substances aside from the self, and the five physical substances mentioned above. The first two of these are space (*dik*) and time, both of which are infinite and continuous. The third is the inner sense (*manas*). “The inner sense is imperceptible but is inferred to account for the direct awareness of internal states like pleasure. It is also inferred to account for the fact that there are occasions when although two or more perceptions could arise at the same time, only one does” (Chakrabarti 17). Thus, the inner sense is a regulator (like the eye) ensuring that perceptions (or light waves), come to us in an organized manner. Space, time and the inner sense are neither physical substances (since they lack externally perceptible qualities) nor are they spiritual substances (like the self), since they lack consciousness.

4. Qualities and Actions:

Qualities are features of a substance that do not generate motion and are particular to the substances to which they belong (e.g. color, smell, etc.) Qualities in the Nyaya view are thought to be exclusively tied to the substances that they characterize. Thus, “...the particular red color of a particular mango is causally dependant on and inheres in that mango and cannot belong to anything else” (Chakrabarti 17). However, qualities do instantiate universals. “For example, the particular red color of a particular mango is an instance of the universal redness that is the common property of all particular red colors.” (Chakrabarti 17). The universal redness is ontologically distinct from the particular red colors, which are distinct from the substances. Thus, qualities are quality particulars and not quality universals.

Actions are features of a substance that primarily generate motion (resulting in conjunction with or disjunction from other substances). They too, as qualities, are

¹ Ibid, 2

particular to the substance for the same reason (i.e. actions are causally dependant on and inhere in the substance.)²

5. Universals vs. Particulars:

As mentioned earlier, particulars in Nyaya thought are specific to each and every incidence of that particular. All substances, actions, and qualities are considered to be particulars. However, they all possess recurrent properties that are common to other substances, qualities and actions. For example, the color green: both the leaf of an oak tree and the wild grass of the African savannah are green. Nyaya thought grants that the green of the oak leaf is particular to that specific leaf, as is the green of the grass to the savannah. However, each and every oak leaf and each and every strand of grass in the savannah possess the property of greenness. The recurrent property of greenness is the universal (i.e. the fact that we acknowledge that all these plants are green is the universal greenness.) Universals are not merely categories or names. “They are objective, independent of the particulars that share them and are, in fact, changeless and eternal” (Chakrabarti 17). Universals are perceptible in particulars (for example, cowness is perceptible in all individual cows).

6. Ultimate Individuators:

There are certain occasions when two or more particulars “...cannot be found to be different in any recognizable way although they are distinct on substantial grounds. For example, envisage two atoms that are indiscernible in every way, though are know to be different by virtue of the fact that they are two distinct objects in the real world.³ In such cases, Nyaya thought invokes the concept of ultimate individuators, which are considered a last remaining feature to distinguish two particulars. This is to ensure that the identity of indiscernibles does not accidentally group two particulars together as one in Nyaya thought (e.g. if all the properties/particulars that characterize atom A are the same as those that categorize atom B, the identity of indiscernibles would conclude that A and B are the same atom; however, the fact that these two atoms are distinct can be inferred if they really are observably distinct.) Thus, the fact that I have observed two atoms (even though I cannot distinguish any distinct property of A that B lacks, or vice-versa) is the ultimate individuator that allows me to conclude that there are indeed two distinct atoms.

7. Inherence:

Recall the aforementioned discussion of universals and particulars. In Nyaya thought, the universal and the particular are causally inter-dependant. For example, “...an individual cow cannot but be a cow a long as it exists and, in the Nyaya jargon, cowness is present in it from the moment of its birth till the moment of its death” (Chakrabarti 18). This interdependency is called *samavaya*, or inherence. Inherence is also the relation between qualities/action and substances (i.e. the qualities and action characterizing a substance cannot exist without the substance and vice-versa.) Thus, inherence is the natural, “...intimate relation between two relata [where] at least one of which cannot exist without the other” (Chakrabarti 18).

² Ibid, 4

³ Ibid, 4

8. Negative Entities:

True negative judgments are not affirmations in Nyaya thought, but rather have “objective counterparts” (Chakrabarti 19) called negative entities. For example, the statement “there is no book on the table”, implies the absence of a book on a table. Negative entities always have a locus (the table, in the example above) and a negatum (a book).

9. More on Space (Extension), time and the ‘physical’:

In the Nyaya view, the concept of the physical is not as cut and dry as it is in the conventional view. Physical objects are in the realm of space and time (most physical objects occupy a certain space and time). However, all physical objects do not occupy space and time in the same way. For example, bricks, stones, cats, dogs, etc all occupy a certain space at any given time. The presence of a brick in a particular space at a particular time precludes the possibility of any other physical object being in the same space at the same time. However, in Nyaya thought, there are physical substances that can be in space, but not prevent other substances from being in the same space. For example, *akasa*, the substratum of sound, is physical and in space, though it does not occupy any limited region of space. This is because it is extended⁴, though not limited to any one locus in space.

Therefore, Nyaya draws a distinction between two different senses of being in space. The first is that of occupying a particular region in space, and preventing other measurable physical substances from being in that space (the brick, for example.) The second is that of being extended and being in contact with a substance. “Something in contact with a measurable (or immeasurable) substance need not prevent other measurable (or immeasurable) substances from being in contact with that same thing” (Chakrabarti 20). Nyaya thought thus implies that all physical substances are in space, in either the first or second sense.

All extended substances are not, however, physical in Nyaya thought. Thus, being physical necessarily implies being extended, though not the other way around. “Being extended in the sense of being in contact with another substance is true of all substances, physical or non-physical, including the self.” (Chakrabarti 21) So the self turns out to be an extended, spiritual substance in the Nyaya view.

10. Internal States

Internal states in Nyaya thought are the internally perceptible qualities and actions of the self (the only spiritual substance in Nyaya thought). These include pleasure, pain, cognition etc. “Internal states arise within the limits of the body, but they do not belong to the body. They belong only to the self” (Chakrabarti 21). In many ways, internal states are like the mental states of Cartesian dualism, with the notable difference being that Nyaya thought establishes that internal states must be in space (i.e. extended). In addition, it is important to note that Nyaya is a theistic school, treating God as a distinctive spiritual substance.

The above sections are designed to be an introductory guide to Nyaya ontology, since a more detailed discussion of this ontology is not within the scope of this paper.

⁴ N.B. Extension is the property of ‘being in space’ in Nyaya terminology.

However, it is important to keep in mind the following few implications drawn from the description above. The self is a kind of substance different from internal states such as cognition, desire, pleasure or pain (all of which are qualities that belong to the self, though not to any physical substances.) Thus, Nyaya is committed to both a substance dualism (since the self is a substance distinct from other substances) and a qualities dualism (there are qualities of the self that are not reducible to qualities of any other substance).

Having established a basic framework of Nyaya ontology, we can proceed to our comparative analysis of Nyaya to Cartesian dualism.

C. Nyaya dualism vs. Cartesian Dualism: Overcoming the problem of explaining mental to physical interaction

The key feature differentiating Nyaya dualism from the Cartesian view is that the self is a spiritual (i.e. non-physical) substance **in space**, a contradiction in the Cartesian view. Recall that Cartesian dualism holds that there are two substances: mind and matter. Mind is non-physical and not in space (i.e. unextended) and matter is physical and extended. However, Nyaya holds that ‘the self’ (synonymous with the mind in Cartesian thought) is extended, but not physical. A simple matrix illustrating this key difference is shown below:

The Cartesian View:

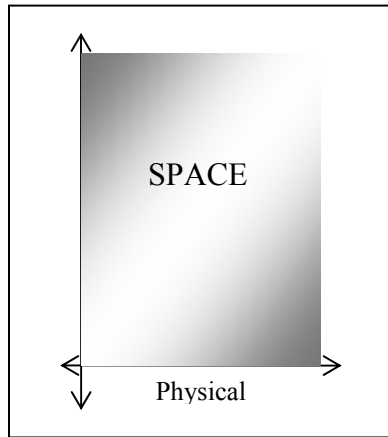
| | Extended (in space) | Unextended (not in space) |
|--------------|-----------------------------|---------------------------|
| Physical | Matter(physical substances) | X |
| Non-physical | X | Mind (the self) |

The Nyaya View:

| | Extended (in space) | Unextended (not in space) |
|--------------|-------------------------------------|---------------------------|
| Physical | Matter | X |
| Non-physical | Mind (the self) and the Inner sense | X |

Thus, the Nyaya can escape the Cartesian problem of having to establish a causal relation between the mind and matter, since they are both part of a causal substratum (namely, space). Essentially, the distinction rests in the fact that Cartesian dualists believe that the non-physical is also non-spatial, a category mistake according to Nyaya thought. This result is particularly revealing of an underlying problem with not only Cartesian

dualists, but several western theories of mind, namely, the assumption that being in space necessitates physicality. Thus, either something is physical and in space, or non-physical



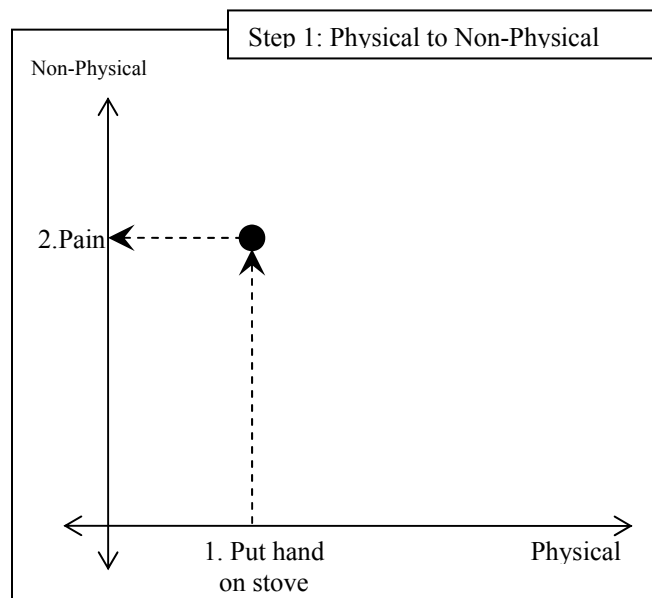
and not in space. The Nyaya view space more like a dimension in which everything is dispersed, rather than limiting space to that of the externally observable material universe (as Cartesians, and indeed many western theories of mind do.) Thus, space is considered to be like a plane in which everything operates, containing both physical and non-physical things (see the diagram below). That which is not in space, is not in existence. However, being material (i.e. physical) is not a prerequisite for existence in space.

Nyaya dualists see space as a two dimensional plane, consisting of the physical and the non-physical (ironic, since we can use a Cartesian plane to illustrate their view of space).

A related problem plaguing Cartesian dualism is averted with the Nyaya view, namely, that the Cartesian problem of the spaceless mental states. Mental states in the Cartesian view have temporal, but not special features. Therefore, my thoughts, ideas, feelings, consciousness, etc (i.e. all mental states, or the products of my mind) are considered to exist for a certain period of time, but still lack spatial characteristics. Thus, my mental state of pain lacks any spatial characteristics (my pain lasts for some period of time, but is not in space).

The Nyaya view of mental states is that they are internally perceptible qualities of the self, all of which are non-physical, but in space. The causal interaction between the mental (internal) states and the physical world is through the medium of space (where the mental and physical overlap). It is just that these states occur within the confines of my body (a necessary container for the self.) However, the fact that they occur, the fact that I can perceive them and the fact that they have causal powers over the material world can all be explained by the fact that they are indeed in space (a same space shared by the physical), and not in some other mental dimension (as the Cartesians argue). The causal relationship between the two would be like a mathematical equation relating x and y. Further, this view allows the causal relation to work in multiple ways: thus, mental events can cause physical events and vice-versa. Additionally, single/multiple physical events can lead to multiple/single mental events.

For example, imagine that I put my hand on a hot stove



(admittedly a bad idea). In the Nyaya view, this physical event would lead to the non-physical event of pain (an internal state of the self). The causal relationship would be explained through a relationship in space (see Step 1 below).

The causal points on the graph are what explain the intricate relationship between the mental (non-physical) and physical.

My pain, since it is an internally perceivable quaila of the self, could only be felt by me (i.e. my self). Further still, my pain may cause other physical events to occur, such as me screaming out, and removing my hand (Step 2 above).

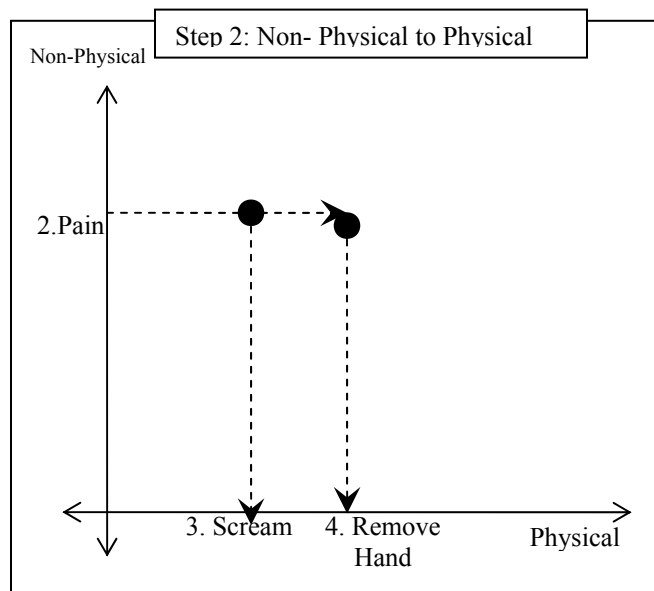
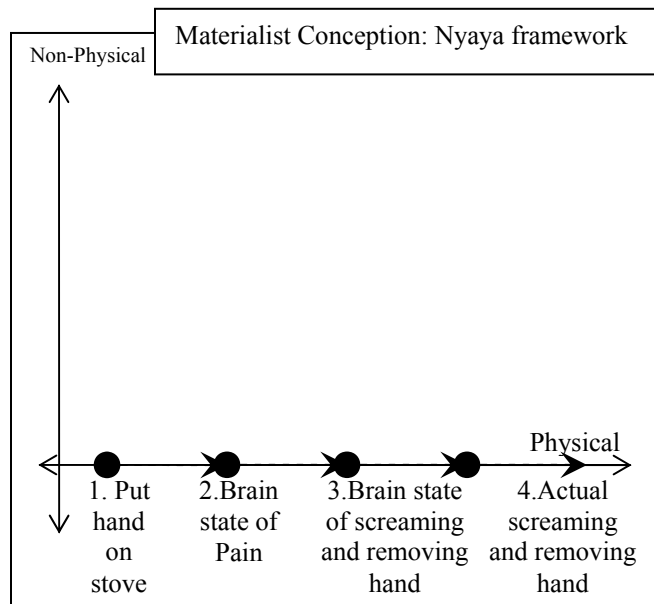
Having explained the key differences in Nyaya thought relative to Cartesian dualism, let us now proceed to examine how Nyaya compares with some other theories of mind.

D. Nyaya Dualism vs. Other Theories of Mind:

1. Nyaya vs. Materialism:

The Materialist would have a number of objections to Nyaya thought. First, the materialist would argue that the Nyaya conception of space as constituent not only of physical but non-physical events is flawed. Materialists reject the entire notion of there being a non-physical self (i.e. a mind outside the realm of the physical), and so the entire non-physical dimension Nyaya dualism establishes would be rejected.

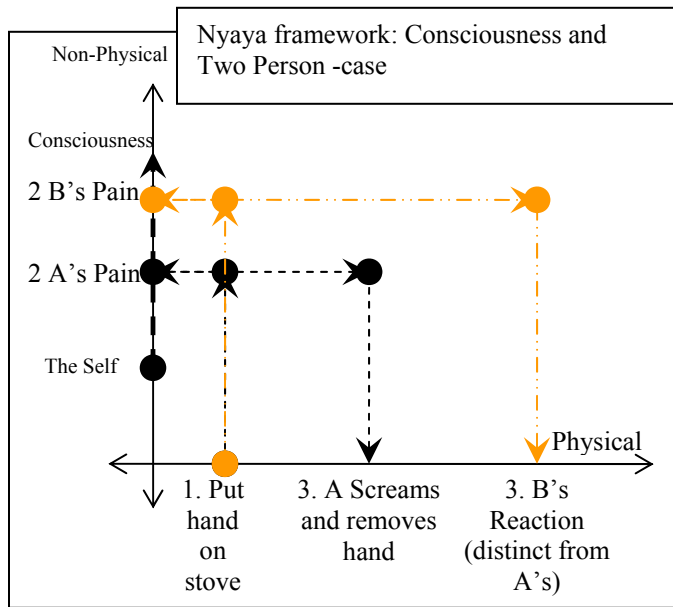
Thus, the materialist would argue that Nyaya dualists have overcomplicated and confused a rather simple, purely physical phenomenon (namely that the Nyaya non-physical states and events are simply a series of neural firings in the brain). Thus, even if the materialist accepts the framework from which Nyaya thinkers establish a relation between non-physical and physical (namely the plane of space), materialists would view



the aforementioned scenario as follows. My hand on the stove causes neural firings in my brain, which is the brain state of pain. This brain state then causes another set of associated neural firings (the brain state of me screaming and removing my hand from the stove.)

To this, Nyaya thinkers would simply respond by saying that materialists cannot explain how non-physical events, such as pain, come about and differ amongst different people (i.e. my pain, and my reaction to pain may be, and most likely is, different to the pain someone

else would feel from putting their hand on the stove.) The Nyaya framework helps explain why humans feel and perceive things differently (i.e. different selves, e.g. person A and person B, have a different set of causal points relating their specific physical event to their specific mental state.) Additionally, Nyaya dualists may argue that materialists cannot explain how brain states come about without being invoked by some event in the real world, and therefore, the materialists have ignored the true nature of the mind by including non-physical phenomenon in the physical realm. Further, materialists have trouble explaining phenomenon such as consciousness, which are internally perceptible qualities of the self according to Nyaya.



2. Nyaya vs. Searle:

Searle proposes a theory of biological naturalism to explain the mind. Thus, the mind must be understood in the context of the circumstances that surround it, and so the mental-physical divide most theories of mind try to make is not a valid one. Additionally, Searle rejects several problems of the philosophy of mind (since he argues that they arise as a result of flawed assumptions and category mistakes made by mind theorists since Descartes.) Therefore, Searle would argue that the Nyaya view (like Cartesian dualism) also faces the problem of categorizing events as 'mental' and 'physical', even though the causal relationship between the two does not suffer from the problems associated with Cartesian dualism. I do not think that Searle would reject Nyaya merely on the basis of this fact, but rather note that the Nyaya theory of mind is not any better at addressing the problems of the philosophy of mind than any other cognitive theory presented thus far.

Nyaya dualists would respond by arguing that Searle's conception of mind is not complete enough to explain the intricate nature of the relationship between the mind and the material world. In other words, Nyaya dualists, as many contemporary theories of mind, would claim that Searle's biological naturalism contains an explanatory gap, and does not capture the fullness of the self. It is not that they would reject Searle as incapable of acknowledging consciousness, beliefs, etc (since he is a mental realist), but

rather than biological naturalism fails to acknowledge the true nature of self, and the other non-physical substances.

In my view, although Nyaya dualists make a distinction that Searle would probably disagree with, the view of biological naturalism and Nyaya's causal plane of space are very similar, in that both take into account the complexity of the context surrounding the mind. In biological naturalism, we are asked to look at the spectrum of circumstances that form the context of the mind in order to understand it. In the Nyaya framework, the spectrum of different possible causal interactions is presented in the plane of space, some of which are chosen at one time, and some at another. The underlying idea in both is that there are a variety of different and complex situations that affect our understanding of mind.

E. Conclusion:

Nyaya dualism is clearly a unique and comprehensive way of addressing the problems of the mind. However, though it may seem like the approach Nyaya dualists take in order to explain non-physical to physical interaction avoids many of the problems associated with traditional dualism, I find that it is still unable to adequately escape the mind-body problem, as well as other key objections.

The first such objection is the assumption that the non-physical realm exists (a typical attack against substance dualism). Although I may believe it to exist, there is no observable, objective evidence to establish its presence and the significance of the non-physical thus drops out of the picture (ironically, Nyaya dualists would argue that the very fact that we cannot objectively observe the non-physical is what makes the non-physical, non-physical.) Thus, our lack of being able to understand other 'selves' can only be explained by the non-physical nature of the self (for were it physical, everyone could clearly observe and understand its nature, and the entire purpose for any inquiry into the mind would be gone.) The reason we have these unresolved problems of mind (i.e. the reason we have so many pressing questions about the nature of mind) is because the mind is a non-physical entity.

Another potentially devastating objection to Nyaya dualism is that their framework suffers from a logical contradiction. The non-physical is considered to be that which is not physical (i.e. the negation of physical). However, by the laws of logic, a proposition and its negation are mutually exclusive (i.e. the causal plane of space where the physical and non-physical supposedly interact is logically empty). Thus, because of this logical contradiction, Nyaya dualism collapses. The Nyaya dualist would probably respond to this by stating that this interpretation misunderstands the complex nature of the causal substratum of space. It is not that space is some construct of the physical and the non-physical (i.e. space is not strictly defined to be the overlap between the physical and non-physical), but rather a common dimension in which they interact and exist. Thus, it is not contradictory to say that the physical and non-physical interact in the plane of space.

It is interesting to note that the problem of mental causation does not specifically arise as a problem within the Nyaya dualist tradition, as compared with the questions Descartes raised about the mind-body relationship in the Western philosophical tradition. This is particularly interesting, given that both traditions faced the same problem. Part of the reason for this discrepancy may lie in problems due to translation (since the terms

‘mind’ and *atman* or ‘the Self’ do not necessarily have the same connotation). However, another possible reason for this inconsistency may rest in the fact that personal identity was not in question for Nyaya thinkers (it is clear from the outset who I am: I am my *atman* or my Self. My body is just a shell for the self.) However, Descartes was ultimately trying to identify who he was (i.e. he was trying to establish whether his mind could exist independently of his body, and if so, what it is that makes his body and mind interact.) Thus, since personal identity was not in question for Nyaya thinkers, the problem of mental causation was not really a problem at all.

In this paper, I have attempted to explain Nyaya dualism in the context of some of the major contemporary theories of mind, with the hope of discussing an aspect of Indian philosophy of mind notably absent in most of the contemporary work done. Further, I have attempted to compare Nyaya dualism to other theories of mind, in order to gauge its viability as a theory of mind. Clearly there are several avenues of further inquiry, especially looking at other Indian theories of mind, and the objections they present to Nyaya dualism. In addition, one could further investigate and explain the nuances of the causal interactions between the non-physical and physical realms, since my analysis of Nyaya is rather brief. Nevertheless, I still find the similarities and differences between Nyaya and Cartesian dualism fascinating, and think that this analysis reveals several salient aspects of the developments in philosophy of mind across different traditions.

Bibliography

- Chakrabarti, Kisor Kumar. *Classical Indian philosophy of mind: the Nyāya dualist tradition*. New York: State University of New York Press, 1999.
- Hamilton, Sue. *Indian philosophy: a very short introduction*. Oxford: Oxford University Press, 2001.
- Sharma, Arvind. *Sleep as a state of consciousness in Advaita Vedānta*. New York: State University of New York Press, 2004.
- Deutsch, Eliot. *Advaita Vedānta : a philosophical reconstruction*. University Press of Hawaii, 1973.
- Gupta, Sanjukta. *Advaita Vedānta and Vaisnavism : the philosophy of Madhusūdana Sarasvatī*. Routledge, 2006. *Routledge Encyclopedia of Philosophy Online*.