

The Mind of The Steward: Inquiry-Based Philosophy For The 21st. Century by Eric Sommer

Dedication: I dedicate this work to my great mentor, Dr. Stuart Paddock, the only full-blown universal genius, and also the kindest person, I have ever known. The core of this work, and at least 80% of the categories and concepts, spring from Stuarts work. I have wedded this core to concepts of inquiry and creativity which derive largely from the works of John Dewey and also from contemporary works on practical methods to enhance our intelligence and creativity and innovation powers, some of which I have listed in an appendix.. Last but not least, I should mention the works of Dr. Karl Marx, whose writings are always an inspiration to me.

Introduction

This 125 page work, seven years in preparation, sets-out a highly coherent new philosophical worldview The work begins from the premise that our universe is, in the most general terms, a network or society of interacting beings.

The general character of this network of beings is described in the form of a scheme of general inter-related categories. These categories are of 'metaphysical scope'. They are, that is, intended to apply to all aspects of this or any other reality. Taken together, these categories provide a 'generalist' or comprehensive model of the universe or network of beings in which we live.

In this work you will find six sections:

- 1) Section one provides a set of basic or metaphysical philosophical categories. These describe the basic character of the universe, and will help you to achieve integration of both intellectual information and experiences of everyday life;
- 2) Section two uses the categories established in section one to develop a revolutionary theory of epistemology or knowledge. This theory will help you to keep an open - yet critical - awareness in relation to all ideas; and to use appropriate means to test the truth-value of your beliefs and those of others.
- 3) Section three provides a discussion of ethics or the law of being, or 'Arta'. This discussion will help to open your eyes to the pervasive nature of moral and ethical concerns, and the revolutionary use of inquiry - rather than dogma - to address them.
- 4) Section four sets out a new theory of human nature called the 'Body-Mind-I' model. Modeling human nature with the concepts in this section provides a

uniquely powerful vantage point for developing an integrated understanding of the relationship between individuals and their world, as well as greatly enhanced ability to effectively inquire into the nature of the ordinary, as well as the spiritual and paranormal, phenomena which effect human beings.

5) Section five introduces the more `advanced' topics of synergy, organization, and structure. This section uses the preceding development of the categories of being, experience, interaction, knowledge, ethics, and human nature to elaborate approaches of special interest to people concerned with modeling complex interaction systems.

6) Section six provides a basic discussion of Inquiry. The approach here is consistent with scientific method but provides an enlarged conception of inquiry - a conception which allows us to go far beyond the traditional domain in which the method of inquiry has been applied. This new approach enables us to use inquiry as a tool in daily life to discover - and enact - optimal patterns of interaction in our relationships with one another and with our world; this new approach also enables us to use inquiry as a means of resolving problems and exploring positive potentialities as an integral part of the process of `becoming increasingly able to work together to promote one another's being together with that of the world'.

How to Read This Work For Maximum Benefit

It should be noted that this work contains specialized philosophical terminology and concepts, and that it assigns extended or deepened meanings to some everyday words.

All technical terms and special word uses are systematically and carefully explained when they are introduced. So the work is relatively easy to understand when the chapters are read in sequence.

Each section of this work can be read independently of the others. But the full meaning of these sections - including the expanded meanings they assign to everyday words - can only be grasped by carefully reading the sections of the work in sequence.

It should also be noted that for certain readers some of the chapters in the first section may seem, at first, to concentrate excessive attention on common sense features of everyday life and experience. But this careful examination of the obvious lays the foundations for the great advances in the theories of knowledge, ethics, and inquiry which appear in subsequent sections

Part One: Basic Categories

Chapter 2: Experience, Beings, and Phenomenal Worlds

Our universe is a network or society of interacting beings. I want to begin my discussion of the categories of the universal network with the concept that our universe is made up of 'individual beings'. By an 'individual being' is meant any entity, living or non-living, which may be found in our universe. I am a being. You are a being. And the bugs, stars, light bulbs, people, fish, dogs, trees, atoms, and automobiles of the universe may also all be thought of as beings.

These beings which make up our universe can be categorized, with a certain degree of simplification, as either 'human', 'natural', or 'divine'. I will not attempt to define 'human', 'natural', or 'divine' here. But I will provide a few examples.

You and I are presumably 'human beings'.
Trees, bugs, stars, and atoms are 'natural beings'.
And God or the sacred dimension is a 'divine being'.

In addition to the categories 'human', 'natural', and 'divine', beings may be categorized as to whether they are 'simple' or 'compound'. A 'simple being' is one which cannot be further subdivided; it is therefore immortal and indestructible. Such immortal and indestructible simple beings are also called 'monads'. As for 'compound beings', they are made up of simple beings or monads; they are therefore not immortal or indestructible since they can be further subdivided into the simple beings which make them up.

The Nature of Experience

Now I want to introduce a feature shared by all beings whether human, natural, or divine. This shared feature is that each being exists in its own 'world of experience'. By 'experience', I mean everything undergone or encountered by a being. My experience is my direct encounter with the world as 'seen' from my side of the encounter. My experience includes all the sense data -all of the sights, sounds, tastes, touches, and smells - I encounter. But it includes far more than that. It includes all of the thoughts, feelings, emotions, body sensations, energies, and any other phenomena whatsoever which I directly encounter. Everything which I am directly aware of or which I encounter, whether it is 'internal' or 'external' to my being, is part of my experience.

It should be emphasized that experience, as the concept is used here, is not synonymous with consciousness. For a human being, such as myself, a great deal of experience is 'conscious experience'. But by defining experience as "everything undergone or encountered by a being", we are positing experience as a feature shared by all beings, whether conscious or non-conscious, whether living or non-living, whether human, natural, or divine. A rock too has its experiences, if only in terms of 'undergoing or encountering' the knocks of other rocks

Phenomenal Worlds

One way of labeling or discussing our experiences is with the term phenomenon and its grammatical variants. A 'phenomenon' is a single experience. 'Phenomena' refers to two or more discreet experiences. And 'phenomenal', which is an adjective, indicates that the term or expression to which it is applied refers to an entity which is in our experience.

These terms allow me to introduce the concept of a 'phenomenal world' or 'world of experience'. By a 'phenomenal world', I mean the collection of all the phenomena or experiences encountered by a being.

Each individual being whether human, natural, or divine exists in its own phenomenal world. I exist in my phenomenal world. A raccoon exists in its phenomenal world. And god, if God exists, exists in his/her phenomenal world.

At this moment my phenomenal world includes my computer screen; thinking about the text that I am writing; noticing my chest rise and fall as I breath; and feeling sore from sitting in the same place for too long. The sum total of all my 'internal' and 'external' experiences make up my phenomenal world.

The Individuality of Experience

One point I want to make about phenomenal worlds is that they do not overlap. Beings do not directly share any of their experiences. Their experiences may be similar. But they are not the same experience. You and I may both be looking at the 'same' tree. But my experience of the tree is my experience appearing in my phenomenal world. Your experience of the tree is your experience appearing in your phenomenal world.

This separation of phenomenal worlds is highlighted by the case of colour blindness. A tree whose leaves are turning in the fall may appear multi- coloured and multi-hued to someone with colour vision. But it will not so appear to someone who is colour-blind. What I most want to emphasize, however, is this: whether our experiences are markedly different or relatively similar, they are our

own experiences.

This separation of phenomenal worlds might be called the 'individuality of experience'. Its significance, and the reasons for assuming that is in fact the case, will appear as we proceed.

There is one other point I want to make before I move on. It is that the 'individuality of experience' does not necessarily prevent us from knowing what other beings are experiencing. I cannot directly experience your experiences. But your communications regarding your experiences, and your behavior in relationship to your experiences, can enter my phenomenal world.

Suppose I want to know if you are experiencing a tree. I can scan your statements for indications, or outright reports, that you are experiencing the tree. I can also watch your behavior to see whether you direct your eyes towards the tree, stand in front of the tree, appear to touch the tree, and so on. Your reports about the tree, and your behavior towards it, are as much a part of my phenomenal world as the image of the tree itself when I am looking at it.

While not a foolproof method, attending to the reports and 'orienting behaviors' of other beings can generally tell us a good deal about their experiences.

Beings Have The Power To Effect One Another

Now I come to another important concept. This is the concept that beings have the ability to enter into, and produce effects in, one another's phenomenal worlds. When Jackie and Jennifer come to visit me, they enter into and produce effects in my world of experience. If Jackie sings a song she just learned, her performance appears in my phenomenal world. If I pour tea and hand it to Jackie, the tea appears in her phenomenal world. Jackie and Jennifer do not, as pointed out earlier, directly share any of my experiences. Nor do I share any of theirs. But we most certainly enter into and effect one another's experiences during our interactions.

In addition, Jackie and Jennifer appear when they visit me to pay attention to one another. They not only look at me; they look at each other. They not only talk to me; they talk to each other. It therefore appears to me very much as if Jackie and Jennifer are appearing in one another's worlds as well as my own.

Human beings, natural beings, and divine beings all have this power to enter into and produce effects in the phenomenal worlds or experience of other beings.

I have the ability to produce effects in the phenomenal worlds of other beings.

A raccoon has the ability to produce effects in the phenomenal worlds of other

beings.

And god if god exists has the ability to produce effects in the phenomenal worlds of other beings.

One definition of a being is that of 'a power with the ability to enter into and effect the phenomenal world or experience of at least one other being'.

The Reality of The World

Now I want to discuss, necessarily at some length, some of the evidence for this concept of 'other beings'. You may, at this point, be wondering why I bother to provide such evidence. The notion that there are beings other than oneself is, after all, a self-evident proposition for most people. I have, however, two reasons for providing evidence for this notion.

My first reason is that there is a viewpoint known as solipsism which contends that each of us alone is the author of all of our own experiences.

My second reason is that my evidence for the existence of other beings will also serve me in essential ways in the development of other concepts later on.

How, then, do I know that there are in fact any beings other than myself? Since by definition I can never get outside my phenomenal world, how do I know that there is anything outside it? How do I know that I am not creating all my own experiences, and that the other beings I encounter are not simply my own projections?

My evidence comes from an examination of the character of experience itself. In examining my experiences I notice that some of them appear to be amenable to my will and some do not.

I am able, for example, to call up and dismiss certain experiences at will. Some, although not all, of the thoughts which appear in my mind are of this character. I may summon up or dismiss the idea or image of Jackie and Jennifer visiting me simply by willing it. I will to think of my last visit with them and I find myself thinking of it. I will to stop thinking of my last visit with them and I find myself not thinking of it. There is, in cases such as this, a direct correlation between my willing and my experiences. When such correlation's exist, they seem to point to 'I', or my will, as a power or cause behind the phenomena which I am experiencing.

The case is quite different, however, with the majority of my experiences. The range of phenomena or experiences which are completely amenable to my will is

in fact quite limited.

Other people, other living beings in general, inanimate objects around me, and particular aspects of my own mind and body frequently don't do as I like.

They may resist what I want, or even do the opposite of what I want. They may also do things that I haven't willed or even thought of at all.

Such phenomena appear to have their own `character', a character independent of my willing, and of my likes and dislikes.

A piece of wood is characterized by its own particular grain. This grain conditions the ways in which I can work with the wood quite apart from the qualities `I' might prefer to find in the wood. My body continues to get tired when I don't sleep even though `I' would rather remain in a state of alert wakefulness. Jackie and Jennifer may decide not to visit me today even though I wanted them to come. Such phenomena, which appear to operate independently of my will, suggest to me that `I' am not the power or cause behind them. They lead me to posit the existence of `other beings'. I posit these `other beings' in order to explain those experiences in my phenomenal world which do not seem to be due to `I' or my will.

This impression that there are beings other than myself is reinforced by the existence of surprises. I go outside expecting a sunny day and it's raining. I run out of money and an old friend unexpectedly turns-up and gives me some. I think I see a silver shell on the beach but on closer examination it turns out to be a shiny piece of wood. Jackie and Jennifer say they aren't coming today and then they turn up. Such surprises again suggest the existence of beings or powers other than `I' or my will. These beings or powers are, I hypothesize, responsible for at least some of the experiences I encounter in my phenomenal world.

Conclusion

I began this discussion of `the evidence for other beings' by citing the `solipsist position'. This position, as you may recall, is that we each create our own experience. I think you can see now that the solipsist belief that `each of us is sole creator of our own experience' collapses in the face of the lessons of experience itself. For experience teaches that our world includes elements which resist our will, which don't do what we want them to do, and which offer us surprises. These elements of resistance and surprise in our experience point to the existence of other beings, beings with their own characters and wills who exist quite apart from us and our wills. It is our interaction or encounter with these other beings - and not ourselves alone - which produces our experiences. I can't think of a better way to pull all this together than to end this chapter with the definition of experience I introduced earlier: "My experience is my encounter with my world - and with the

beings of my world - as seen from my side of the interaction."

CHAPTER 3. NOUMENA - THE POWERS BEHIND EXPERIENCE

I have now placed before you a case for the existence of other beings. These other beings are, as it were, powers 'behind the scenes' of my experience. They, along with the power behind the scenes which I call 'I', are responsible for my experiences.

I call these powers behind the scenes noumena. By 'noumena', I mean any human, natural, or divine being currently outside my direct experience but possessing the power to enter into and effect my experience. When Jackie and Jenifer are not visiting me, they are from my perspective noumena. They are beings outside my phenomenal world but possessing the power to enter into and effect it, as is proven when they periodically arrive for visits.

Noumena may be contrasted with phenomena. Noumena are human, natural, or divine beings outside my experience. Phenomena are human, natural, or divine beings inside my experience. In addition, noumena may be regarded as the source of phenomena. As powers behind the scenes, noumena have the ability to enter into and effect my experience. Phenomena, entities inside my experience, may be thought of as the manifestation or actualization of the noumenal powers behind the scenes of my experience.

Let's look at an example. When my friends Jackie and Jenifer are not visiting me, they are, as we saw, noumena. They are powers or potentialities which are completely outside my phenomenal world.

But suppose they call me on the phone. As I hear their voices their power to enter my experience and effect it is actualized. They cease to be purely noumenal and become to an extent phenomenal. At the same time a large part of them remains noumenal. I only hear their voices. The rest of them - their bodies, minds, inner selves - is outside my experience.

But this noumenal portion of Jackie and Jenifer, though it is outside my experience, is not irrelevant to my experience. It is Jackie and Jenifer as noumena, as powers behind the scenes of my experience, who are in fact responsible for the voices on the phone.

Now let's consider a noumenal cold virus. Such a cold virus is outside our experience. It represents, however, a series of potentialities including the potentiality for illness. The actual experience of a cold - a runny nose, weakness, perhaps a mild fever - represents the conversion of this noumenal potentiality into phenomena. The cold has ceased to be purely noumenal and become to an

extent phenomenal. It has, in other words, entered my experience. At the same time a large part of the cold remains noumenal or outside my experience. I don't, for example, ordinarily see the cold virus. It may also be that the cold virus is not the only cause for the cold. Perhaps my body has gotten into a weakened condition and therefore become unusually susceptible to colds. And perhaps I have abused or weakened my body in this way by the way I have treated it. In that case there would be at least three noumena, or powers, behind the cold. These would be the 'I' which mistreated the body, the condition of the body itself, and the cold virus. In addition, a cold virus has the power to enter my experience in ways other than the production of illness. With the aid of a microscope, for example, a cold virus can manifest its shape and movements in my visual field.

This process of converting potentialities into actualities underlies all experience. As I open a can of diet Pepsi and drink it, my experience consists of converting noumenal Pepsi, Pepsi as a potentiality or power to slack my thirst, into phenomenal Pepsi, Pepsi going down my throat and in fact slacking my thirst.

Experience is the process of actualizing potentialities, of transforming noumena into phenomena.

CHAPTER 4. NOUMENA AND PHENOMENA AS POTENTIALITIES AND ACTUALITIES

In this chapter I want to introduce an important pair of concepts. These are 'potentiality' and 'actuality'. These concepts parallel those of noumena and phenomena introduced in the last chapter.

Noumena, as I explained in the last chapter, are 'powers behind the sciences'. Noumena may be human beings, natural beings, or divine beings. But they are in any event beings outside my direct experience but possessing the power to enter into and effect my experience.

Noumena may also be thought of as 'potentialities' or 'potentialities for experience'. By a 'potentiality for experience', I mean any being or any portion of any being, which is currently outside my phenomenal world but is able to enter into and effect it. Such potentialities may be human, natural, or divine. A part of my city I have not yet visited, a cold virus I have not yet caught, or a part of god I am not currently encountering would all be potentialities for my experience.

Contrasting with 'potentialities for experience.' is the concept of 'actualities' or 'actualities within experience'. By an 'actuality within experience', I mean a potentiality for experience which has been actualized as an experience within one or more phenomenal worlds.

Suppose I visit a part of my city I have not previously visited. In bringing it into my phenomenal world I convert it from a potentiality for my experience into an actual experience. Or suppose I catch a cold virus which was previously present in the environment. In appearing in my phenomenal world, the cold's symptoms are converted from a potentiality for my experience into an actual experience.

Or suppose I encounter an aspect of god, assuming god exists, which I have not previously encountered. In appearing in my phenomenal world that aspect of god is converted from a potentiality for my experience into an actual experience.

I want to emphasize that all `potentialities' are `potentialities for experience'. To be a potentiality is to have the power to appear as an experience within the phenomenal world of some being. I want also to emphasize that all `actualities' are `actualities within experience'. To be an actuality is to appear or be actualized within the phenomenal world of some being.

Finally, I want to emphasize that the character of most everyday objects is such that each of them carries a great many potentialities for human experience.

Suppose an ordinary glass is in front of me on the kitchen table. I can look at the glass and elicit its potentiality to present a shiny semi-transparent appearance to my eye. I can pour water into the glass and elicit its potentiality to contain liquids. I can bring the glass to my lips and elicit its potentiality for me to conveniently drink liquid out of it. I can tap the glass with a spoon and elicit its potentiality to make a musical kind of sound. I can turn the glass upside down and use it to support another object. I can melt the glass down in a furnace and reshape it. And so forth.

A glass, like most everyday objects, is brimming over with potentialities which can be actualized within the phenomenal worlds of human beings.

CHAPTER 5. CHARACTER

In the last two chapters we saw that noumena or potentialities are `powers behind the scenes'. They are beings, or portions of beings, outside my phenomenal world but able to enter into and effect it. Jackie and Jennifer, for example, when they are not visiting me, and are not in my direct experience, are noumena or potentialities for experience.

In this chapter I want to examine the concept that every noumena whether human, natural, or divine has its own particular `character'. By `character', I mean the specific characteristics or potentialities for experience carried by each being. I have a character. You have a character. A raccoon has a character. The large

rock in my garden has a character. The tree outside my window has a character. The former Soviet Union and the United States, have character. And God if God exists has a character.

It is the character or potentialities carried by these beings which makes each of them just what it is - and not something else.

You can, for example, climb twenty feet off the ground by climbing up the tree in my back yard. You can do so because the character of the tree includes the potentialities to bear the weight of a 200 pound human being and to be climbed twenty feet into the air. You cannot, however, climb twenty feet into the air by climbing up my back. The character of my body does not include the potentiality to support a 200 pound human being, nor does it include the potentiality to be climbed twenty feet into the air.

Or consider my character and that of my friend Jennifer. If you query me about a particular point related to computer technology or religion, I may be able to answer you, as my manifest character includes a relative degree of familiarity with computer technology and religion. My friend Jennifer, on the other hand, can tell you far more about mathematics than I can but knows relatively little about computer technology or religion.

Every Being Has Its' Own Character

The point I have been making is that all of the beings we encounter have their own particular characters. These characters, together with our own, determine the kinds of experiences we can have with those beings.

I want to emphasize that the characters of other human, natural, or divine beings exist independently of our own. Their characters are what they are regardless of what we might like them to be.

I might wish that my friend Jennifer knew more computer technology or religion, or that the cherry tree in my backyard were really an apple tree. But my wish has no effect on the fact that at this time Jennifer does not know much about computer technology or religion or that the cherry tree is not an apple tree.

It is, then, not my will alone but the character or potentialities of other human, natural, or divine beings which determine the kinds of experiences I can have with them. As I put it in a previous chapter: "A piece of wood is characterized by its own particular grain. This grain conditions the ways in which I can work with the wood quite apart from the qualities 'I' might prefer to find in the wood." In short, every being has a character which determines the kinds of experiences which are possible when it encounters another being.

CHAPTER 6. MANIFEST AND LATENT CHARACTER

In this chapter I want to briefly discuss two important aspects of character. These

two aspects are 'manifest character' and 'latent character'. By the 'manifest character' of a being, I mean its overt character or potentialities. The manifest character of a being is, as it were, 'on the surface'. It consists of those potentialities which have been developed such that little more than change of spatial relationships is necessary to bring them into actual experience.

Suppose a dinner is already laid out on the table. Little more than a change of spatial relationships - i.e., walking into the dining area - is necessary to bring such a dinner into my phenomenal world. Such a dinner is part of the 'manifest character' of my world.

Or suppose a building is already built. Little more than a change of spatial relationship is necessary for me to encounter the building. Such a building is part of the manifest character of my world.

Or suppose I have developed a skill such as bicycle riding or the ability to engage in compassionate dialogue. Little more than getting on a bicycle or encountering someone I can engage in compassionate dialogue with is necessary to actualize these skills. Such potentialities are part of my manifest character.

LATENT CHARACTER

But now suppose that the potentiality to experience a building consists of materials on a construction site which have not yet been assembled; or that the potentiality to eat my dinner consists of raw foods, kitchenware, and a stove; or that the potentiality to engage in compassionate dialogue or ride a bicycle consists of basic cognitive or motor abilities which have not as yet been developed into these particular skills.

In such cases the noumena or potentialities are part of the 'latent characters' of the beings involved. Like the manifest character of a being, its latent character consists of potentialities for experience.

But unlike its manifest character, the potentialities in its latent character require modifications well beyond a simple change of physical location to be accessed. This distinction between a being's manifest character and its latent character may also be thought of as a distinction between its 'manifest being' and its 'latent being'.

Finally, I want to sum up these two chapters on character.

The first message of these chapters is that every being whether human, natural, or divine has its own character. This character consists of the potentialities for experience which the being carries.

The second message of these two chapters is that the characters or potentialities of beings exist independently of our beliefs or desires about them. My character, a raccoon's character, and god's character if god exists are just what they are regardless of what we might believe or want them to be.

The third message of these chapters is that it is fundamentally the character or potentialities of beings, and not our beliefs or desires, which determine the kinds of experiences we can have with them. And the fourth message of these chapters is that beings have a 'manifest character' consisting of potentialities for experience which are readily available and a 'latent character' consisting of potentialities for experience which are not readily available.

CHAPTER 7. EXPERIENCE AS INTERACTION

In this chapter I want to introduce you to a crucial principle. It is the principle that all experience is generated by the interactions between beings. Suppose I encounter you on the street. If you wave a friendly greeting as we approach one another, my experience of that wave will be an interaction between the motion of your hand on the one side, and the ability of my eyes and mind to see and interpret such a greeting on the other.

Or suppose I am holding a glass of water and experiencing its cool, round shape. This experience will be an interaction. It will be an interaction between the character of the glass on the one side, and the character or abilities of my human hand and mind on the other. Since it is an interaction, my experience of feeling the cool, round shape of the glass will last as long as I continue to hold the glass. But, since it is an interaction, my experience of feeling the cool, round shape of the glass will also cease the moment I end the interaction by putting the glass back down on the table.

Now I want to expand on the principle that all experience is generated by the interactions between beings.

Each being, as we saw in the previous two chapters, has its own particular character. This character consists of the noumena or potentialities for experience or being which the being carries. These potentialities which make up the character of a being cannot, however, be actualized except through its interactions with other beings. When a being interacts with other beings, its potentialities rub, as it were, up against their characters or potentialities. In so 'rubbing', some of the potentialities carried by the beings are elicited or activated; they are converted into actual experiences within the respective phenomenal worlds of the interacting beings.

This process of converting potentialities for experience into actual experiences through interaction can, I think, be best understood by contemplating a range of examples.

Suppose that Jackie, Jennifer, and I carry potentialities to experience stimulating conversations with one another. Those potentialities can be converted into experience only by the interaction of an actual conversation.

Or consider my body's potentiality to be squashed flat by a truck. That potentiality, one I would like to avoid actualizing, will be manifested only if I interact in a 'flattening way' with a truck.

Or suppose I am allergic to bean sprouts. My potentiality to experience an allergic reaction will only be actualized if I actually eat bean sprouts.

Or consider my mind's potentiality to remember what I had at lunch. This potentiality will be actualized only if I interact with my mind in a way which elicits that memory.

Or consider my potentialities to enjoy and appreciate classical, rock, and jazz music. Those potentialities can be actualized only by actually hearing or interacting with these three kinds of music.

Or consider the potentiality for a seed to grow into a tree. That potentiality will be actualized only if the seed interacts with appropriate soil conditions, sunlight, and a generally appropriate echo-niche including the other flora and fauna in the area.

Or consider my potentiality to experience God or the sacred if it exists. That potentiality will be actualized as experience only if I interact through prayer, meditation, or another appropriate means with God or the sacred.

All experience, then, is produced by interaction.

My experience of a human being is generated by the interactions between that human being's character and my own. My experience of a natural being is generated by the interactions between that natural being's character and my own. And my experience of a divine or sacred being is generated by the interactions between that divine or sacred being's character and my own.

The Formula For Generating Specific Experiences

This dependence of experience on interaction - and on the characters of interacting beings - has an important consequence. This consequence is that to elicit a particular experience not just any interaction will do. It takes particular kinds of interactions between particular kinds of beings to elicit a particular kind of experience. Put differently, beings with the appropriate characters must come together in an appropriate way.

If I want to experience a baseball game with Jennifer, for example, I must meet her at the baseball court. It won't do if I go to the movies with her or if I meet Jackie when it's Jennifer I want to play with. These considerations lead us to what I call 'the three-fold formula for eliciting a particular experience'.

Let's take a look at this formula.

The first condition set by the formula is that the being seeking an experience must carry the potentiality to have that kind of experience. Consider that I am human being with normal hearing. As such, I have the potentiality to experience the sound of a spoon tapping a glass. I cannot, however, hear the high pitched sounds audible to dogs and certain other animals. I do not carry the potentiality to do so.

The second condition for eliciting a particular experience is that the being seeking the experience must have access to, and actually interact with, the other beings or entities necessary to generate the experience. If I want to hear a spoon tapping a glass, it will not do if I interact with a trumpet and piano, a bat and ball, or a sock and a shoe.

The third condition for eliciting a particular experience is that the being seeking the experience, and the other beings or entities involved, must engage in the particular interactions which will generate the experience. It will not do if I stir liquid in the glass with the spoon, or stick the spoon in my mouth while turning the glass upside down. To elicit the 'spoon-tapping-glass' sound, I must tap the glass with the spoon.

The 'three-fold formula' states, then, that to elicit a particular experience I must: 1. Carry the potentiality for that experience. 2. Interact with the particular other beings or entities who can elicit that experience. 3. Interact with those other beings or entities in the particular way that will elicit that experience.

CHAPTER 8. EXPERIENCE AS ENCOUNTER WITH THE WORLD

In this chapter I want to emphasize that experience is my encounter or interaction with the world. Experience is not a 'subjective' realm. It does not exist cut off from the 'actual' or 'objective' world. It is true that a being exists in its own phenomenal world and does not directly share its experiences with other beings. But the experience of a being is not separate from other beings in the sense that it might have nothing to do with those other beings.

On the contrary, a being's experience is its direct interaction with the other beings of its world as seen from its side of the interaction. In its experience a being knows the beings of its world in the most direct way possible - through direct encounter. I never know a glass more than when I directly encounter or hold it. I never know you more than when I directly encounter or interact with you. And I never know the tree in my backyard more than when I directly see it, touch it, or climb it.

My experience, then, is my encounter with the world as seen from my side of the encounter. This means that experience always involves at least two beings. There

must, that is, be a being which has the experience and at least one other being which is experienced. Nothing in the human, natural, or divine worlds can be experienced unless there is a being there to receive the experience and another being there to be received. "It takes," as they say, "two to tango."

But what about my experiences of my own mental or physical states? Does the 'two-sided' character of experience apply to these 'inner experiences' as well? The answer is 'yes'. My inner experiences involve encounters between my self, on the one hand, and my mind and body on the other. Thoughts and feelings arise in my experience as a result of my encounters or interactions with my body and mind. These inner experiences, and the interactions responsible for them, will be discussed in the section on the human 'Body-Mind-I' system.

Finally, experience or interaction is a revelation of being. Through my interactions with the other human, natural, and divine beings of my world those beings successively reveal their beings or potentialities to me. As I get to know my friend Jennifer, for example, I may successively see her play the oboe for the first time, comment on a film we have seen, or choose what to order in a restaurant. Each of these interactions or experiences with Jennifer tells me something more about her character or potentialities. It is through their interactions, and the experiences generated by those interactions, that beings successively reveal themselves and their potentialities to one another.

CHAPTER 9. THE UBIQUITY OF INTERACTION

My essential thrust in the previous two chapters was that all experience, and all manifestations of being, are generated by interaction. My thrust in this chapter is simply to stress the pervasiveness of interaction itself. Consider such categories as development and diminution, evolution and devolution, creation and destruction, and growth and decay. All of these categories refer to particular forms or aspects of interaction. So too do the four forces identified by contemporary science as the primary factors in the physical universe: gravity, electromagnetism, and the weak and strong forces in the atomic or subatomic realm.

In addition, the communities of organisms that make up the various bio-regions of our planet also exist as individual and collective interaction systems. Forests, oceans, and desert areas alike are collections of interacting beings.

Finally, the building blocks of the human cultural realm also consist of interactions and interaction patterns. Human labour, human artistic endeavor, human nurturing and caring, human kinship and social systems, human war and human peace, human religion, and all other human cultural activities constitute particular forms of interaction.

Whether we look at the physical universe, the bio-spheric world of life, or the human cultural realm, our world is a world of interaction.

CHAPTER 10: THE `INDIVIDUAL' AND THE `SOCIAL' ASPECTS OF REALITY.

In this chapter I want to clarify an important relationship. It is the relationship between the `individual' and the `interactive' or `social' aspects of reality. This world view attempts to give due weight to both of these aspects. It emphasizes on the one hand that the universe is made up of individual beings, each with its own particular character or potentialities. It emphasizes on the other hand the pervasiveness, and the fundamental status, of interactions or `social relationships' between beings.

Consider a human beings such as my friend Jennifer, a natural being such as a skunk, and a divine being such as god. Each is an individual being, dwelling in its own world of experience, possessing its own character, carrying its own potentialities.

Thinking in this way helps us to see the particularity, and the irreducible reality and importance, of individual human beings, such as my friend Jennifer; of individual natural beings, such as skunks; and of individual divine beings, such as god. But, as pointed out earlier, the particularities or potentialities of individual beings can only be actualized through the interactions between them. In this respect the world view also emphasizes the interconnected or `social' character of beings.

A human being, for example, may have the potentiality to enjoy the shade of a tree. But he or she cannot experience that shade except by interacting with a tree.

A skunk may have the potentiality to walk on a blade of grass. But the skunk cannot experience walking on the grass, nor can the grass experience the skunk's tread, except through the interactions between them.

Or consider that God, if God exists, may have the potentiality to experience the clouds which encircle the earth. This experience cannot be actualized, however, unless God interacts in some way or another with those clouds.

These two aspects - the `individual' and the `interactive' or `social' - are mutually dependent on one another. Reality as we know it requires them both.

On the one hand, there can be no interactions, and therefore no actualization of experience or being, except through the existence of individual beings. Without particular beings bringing their particular characters or potentialities to their interactions, there would be nothing to interact and therefore no interactions and no experiences.

On the other hand, without interaction individual beings would remain mere bundles of potentialities; they would be unable to manifest their being or realize

their potentialities for experience.

This interdependence of the `individual' and the `social' aspects of reality has been captured by my friend Stuart Piddocke in an aphorism: "Being is being in relationship, but there is no relationship between non-entities."

CHAPTER 11. INTERACTION AS COGNITION AND CONATION

In this chapter I want to deepen my exploration of interaction. Before going further, however, I want to provide you with a formal definition. By `interaction', I mean any interplay or encounter between two or more beings. Now in any such interplay or encounter there are three primary aspects. These three aspects are `cognition', `conation, and `processing'. By `cognition', I mean the act of going out to the world to learn about or receive it.

Suppose you make a statement and I `take it in'. I am cognizing - i.e., allowing myself to receive or be reshaped by - that statement. Or suppose the branch of a tree is bent or broken by the weight of a bear. The branch is cognizing - i.e., receiving or being reshaped by - the bear's weight.

Or suppose a worker hammers a piece of metal into a round shape. The metal is cognizing - i.e., receiving or being reshaped by - the worker's hammer strokes.

In cognition, then, we receive the `impress' of the world - and of its forms and shapes - into our own being. Cognition may be thought of as `receiving the world', `feeling the world', or `learning of the world'.

But whether we speak of `receiving', `feeling', or `learning', all of these words point to the same thing: they point to the fact that in cognition we are not effecting other beings but are rather receiving their effects into ourselves.

Suppose I hear a door slam. My cognition of this sound is an act of `learning', of `feeling', of `receiving'. It is an act of receiving into my own being the `impress' of a loud grating `sound-form'. This door-slammng cognition may be contrasted with happier ones such as receiving into my being the joyous `sound-form' of a mozart symphony.

Cognition is complemented by `conation.

In `conation we are not being shaped or influenced by the world but are shaping or influencing it. By `conation, I mean the act of going out to the world to shape or influence it. In conation we modify the world to conform to our own desires or character.

Consider a human being who turns on a computer, kneads dough to form a loaf of

bread, or makes a request of another person. These acts are all examples of conation. In all of them the individual is going out to the world to modify or shape it.

Or consider what happens when I enter a room and you look up and see me. My body is, in effect, conation or going out to modify or shape your perception.

Or think of a bird building a nest, beating its wings against the air to fly, singing a song, or standing on a tree. In all these cases the bird is engaged in conation, in going out to the world to modify or shape it according to its character or desires.

Conation, then, is the act of shaping or influencing the world. Together, conation and cognition form two sides of every interaction.

When I reshape or conate the world, there is necessarily something else which receives or cognizes my action. When I receive or cognize the world, there is necessarily something else which is conating or reshaping me.

Suppose I use my hands to form raw dough into the shape of a dough of bread. I am performing an executive action or conation. I am going out to the world to shape it. The molecules of the bread, in receiving my conation, in taking on the shape I convey, are performing an act of cognition. They are receiving the world.

Or suppose a rock falls into a pool of water. The rock's impact on the water is a conation effecting or reshaping the water. The ripples of the water resulting from the rocks impact are the cognition's of the rock by the water.

Or suppose my friend Jackie says, "could you hand me the glass?" in making that request she is performing an executive action or conation. She is going out to the world to shape it. In taking in her request I am performing an act of cognition. I am going out to the world to learn about or receive it.

Every interaction, then, involves these two sides. One side is a being going out to shape the world or conation. The other side is a being going out to receive the world or cognition.

In the next chapter, we'll look at the role of processing in interaction.

CHAPTER 12. PROCESSING IN INTERACTION

In the previous chapter we saw that interaction involves two key aspects, conation and cognition. In conation I go out to effect the world, as when I stick my fork into a piece of carrot. In cognition I go out to receive the world, as when I chew-up the piece of carrot and swallow it. In this chapter I want to introduce you to a third important aspect of all interaction. This aspect is 'processing'.

By 'processing', I mean the action of beings in modifying the cognition's they receive to fit their own characters. In receiving cognition's beings necessarily modify them, in one way or another, in keeping with their own characters.

Suppose I touch a friend's arm, or a rock, or a tree. In each of these cases the beings in question will receive or 'process' my touch in different ways in keeping with their own characters.

Or suppose some grass is eaten by an insect, a cow, or a human. In each of these cases the beings in question will receive or 'process' the grass in different ways in keeping with their own characters.

Or suppose I rattle off a set of numbers to a friend, or record them on a sheet of paper, or input them to a 'spread-sheet' program designed to manipulate them on my computer. In each of these cases the beings in question will receive or 'process' my figures in different ways in keeping with their own characters.

Finally, I want to connect my discussion of processing with the language of 'input and output'.

Strictly speaking, processing is part of input or cognition. Processing means that in receiving something a being necessarily changes that something in keeping with its own character.

However, we can distinguish for analytical purposes between the bare fact that a being receives or cognizes something and the further modifications which it makes in that something.

This distinction allows us to treat the action of mediators as a three-stage sequence. This sequence is that of 1) input or cognition, 2) processing or modification, and 3) output or conation. This may more simply be written as cognition-processing- conation.

From this perspective, a being acting as a mediator cognizes the world, processes what it has cognized, and outputs the result back to the world.

CHAPTER 13. INTRODUCTION TO FORM

In the previous two chapters we saw that interaction involves cognition, conation, and processing. Now I want to examine these three aspects of interaction as involving the transmission of 'form'.

In laying the groundwork for this discussion my first order of business is to define 'form' and discuss its general character. The word 'form' comes from the Latin 'forma' which probably was derived from 'ferire' meaning 'to strike' or 'to hew' and thereby to make a recognizable thing. By 'form', then, I mean any distinct or

recognizable element or set of elements in experience.

Geometric Forms

The most commonly cited forms are the geometric ones which appear in our visual fields.

These geometric forms are, to begin with, the various kinds of lines which I see when I look out on my visual world. These lines are wavy, straight, jagged or crooked as the case may be.

Joined together, these visual lines make up such forms as rectangles, triangles, polygons, circles, ellipses, and the many other 'irregular' shapes of my visual world.

If I look at a chair, for example, I see various straight and curved lines, and these connect together to make the shapes of the back, the seat, and the legs of the chair.

Colour And Other Sense Forms

In addition to geometric forms, my visual field includes the forms, or forms of experience, called 'colours'.

There is, for example, the 'form of redness'. This is the element of experience which recurs whenever I see the colour red in my visual field. If I look at a red chair I see, in addition to its geometric forms, this form of redness. All distinguishable colours and shades are forms of my visual experience.

Geometric forms and colour forms are only the beginning of the forms encountered by a human being.

There are, in addition, all the forms which come to us through the other sense channels. Each of the sounds I hear, for example, has a distinct form. There is the loud, grating form of a slamming door; the kindly, happy form of a friend talking to a friend; and the joyful, upbeat form of a mozart symphony.

Or consider the sense of touch. The touch of sandpaper communicates one kind of form to me; shaking hands with someone communicates another kind of form to me; and stroking a dog conveys still another kind of form to me.

The senses of smell and taste serve as additional channels through which many other distinct forms of experience are received by human beings.

Mental Forms

In addition to forms received through the sense channels, there are also the 'forms of mental life'. These 'mental forms' include all of the thoughts, feelings, subtle energies, and so forth which we encounter in the mental realm.

Among our emotions, for example, are anger, fear, sadness, love, and joy, each of which has its own distinct forms. Manfred Clynes has made a start in charting these distinct emotional forms in his book 'Sentic Forms'. In addition to emotional forms, human mental life also includes various kinds of 'thought-forms'.

I cannot even begin to categorize these thought-forms here. I will instead simply point out that the thought-forms we 'see' in our minds may be visual, auditory, kinesthetic, or olfactory in nature. There also seems to be a category of thoughts composed of pure concept-forms not draped in sensory clothing.

I have, I trust, given you at least a general sense of form. To be an experience is to be a 'something' which I encounter. To be a 'something' is to have a distinguishable form. All experiences have such forms and may be said to consist of forms.

CHAPTER 14. INTERACTION AS TRANSMISSION OF FORM

In the previous chapter I proposed that all experience is made up of specific forms. I also defined these forms as "any distinct or recognizable element or set of elements in experience". In this chapter I want to explore the transmission of these forms by means of interaction.

In their interactions with one another beings transmit forms - or forms of experience - to one another.

In conating its world a being sends out its forms to other beings.

In cognizing its world a being receives forms from other beings.

In processing its world a being fits the forms it has received from other beings to its own character.

Suppose my friend Jackie and I interact by shaking hands. This interaction will consist of both sending forms to one another and receiving forms from one another. In my phenomenal world I will receive or encounter Jackie shaking my hand as a set of pressure-forms or pressure-feelings appearing in my hand as she grasps it; as a set of hand shapes appearing in my visual field; and as a set of warm, friendly feeling forms which appear in my mental sphere. In Jackie's phenomenal world she will receive or encounter me as another set of geometric forms, colour-forms, sound-forms, touch-forms, emotional-forms, and so forth.

All Interaction Involves The Transmission of Form

All interaction, then, involves this process of beings transmitting forms to one another.

Prior to this transmission these forms reside as potentialities for form in the characters of the beings involved.

A chair, for example, carries in its character a set of potentialities to produce particular kinds of forms in my phenomenal world. These potentialities for form manifest themselves as a set of geometric and colour forms when I look at the chair; as a set of kinetic and touch forms when I touch the chair; and as a set of pressure and feeling forms when I sit on the chair.

All beings, as we saw in a previous chapter, have individual characters. These characters consist of the particular potentialities for experience carried by the beings.

I can now add that these potentialities for experience carried by beings are their potentialities to produce forms in one another's phenomenal worlds through their interactions with one another. The character of a chair, for example, includes the potentiality to produce a 'chair-form' in my visual field when I look at it. All beings contain potentialities for form in their characters and manifest those potentialities through their interactions with other beings.

Now a word to prevent misunderstanding.

In claiming that all beings carry particular potentialities for form I risk trespassing on a time-honored doctrine. This is the prohibition found in Judaism, Christianity, Islam, and the other western monotheistic faiths against making or worshipping forms or graven images of God.

In prohibiting the 'making' of forms or images of God, however, I do not think that the western monotheistic faiths are ruling out the possibility that God has forms.

On the contrary, it is by virtue of God's forms, if God in fact exists, that he or she would be able to enter into and effect the phenomenal worlds of other beings. If God truly had no forms, he or she would not exist and could not appear to other beings or influence other beings in any way whatsoever.

All interactions between beings involve, then, the transmission or generation of forms. The nature of these forms is determined by the potentialities for form carried by the beings involved, and by the particular ways in which these potentialities come together in the interactions between the beings.

Consider a lump of potter's clay. Its character includes the potentiality to take on the form of a tea cup. If I simply mash it beneath my foot, however, the clay will not produce anything useful. If, on the other hand, I interact in an appropriate way with the clay, it will receive from my hands the form of a tea cup. But no matter how I interact with it, a lump of potter's clay will not receive from my mind or speech a complex mental form such as a request to "please form yourself into a tea cup". The clay simply does not have the character to receive this kind of mental form.

Beings `Stamp' Their Forms Upon One Another

As beings interact, they progressively shape and reshape, form and reform, one another's characters. They `stamp', as it were, their forms upon one another. They do not, however, shape one another's characters just as they please. They rather shape them in ways determined by their potentialities to shape and to be shaped, and by the particular ways in which these potentialities to shape and to be shaped come together in their interactions.

CHAPTER 15. INTERACTION AS MEDIATION

Until now I have discussed interaction only as taking place directly between beings. So long as only two beings are interacting, all of their interactions will in fact be direct. But as soon as three beings are involved, `mediated interaction' or `indirect interaction' becomes possible. By `mediated interaction' or `indirect interaction', I mean any process in which an interaction between beings is communicated through one or more other beings.

? Suppose I am talking on the phone to my friends Jackie and Jennifer. The phone system serves as a `mediator' through which our conversational interaction is transmitted.

Or suppose I am trying to send a message to Jackie and Jennifer through a friend who keeps misconstruing my message. My friend is a `mediator' of a different kind.

Or suppose I am working in the garden with a shovel. The shovel serves as still another kind of `mediator' through which my interaction with the ground is transmitted.

Most Interactions Use Mediators

Most interactions, then, involve mediators of one sort or another. These mediators are `instruments', `media', or `means of interaction' when they promote or

facilitate the interaction, and `barriers' or `obstructions' or `noise' when they interfere with or hinder the interaction.

But regardless of whether they assist or obstruct the interaction, the mediating beings have their own characters which determine the contributions they make to the interaction. These characters fit these mediating beings to serve as particular kinds of instruments or obstructions, and makes the interaction possible.

Put differently, interactions which pass through mediators are processed through the characters of those particular mediators.

Suppose I am working in the garden with a shovel. My digging motions will be quite different when they reach the ground than when I first make them. They will be different because they are processed through the shovel's character with its long handle and sharp-edged scoop before they reach the ground.

Or suppose Jackie tells Jennifer a story and Jennifer tells the story to me. This story will be at least slightly different when I hear it than when Jackie first told it. It will be different because it has been `processed' through Jennifer's character before being passed along to me.

Or finally, suppose a tree receives sunlight and binds it with carbon dioxide, nutrients and water to make an apple. If I eat the apple I am receiving the sunlight received by the tree. But I am receiving it in a different form than when it was first received by the tree. It will be different because it has been processed through the tree's character with its leaves, roots, and general ability to engage in photosynthesis.

Means of Cognition and Means of Conation

Broadly speaking, the means or mediators of interaction can be divided into two kinds. These two kinds parallel the two aspects of every interaction - cognition and conation - which we encountered earlier.

First, then, there are the `means of cognition'. These are means by which we receive the world and learn about it. An eye, a mind, a library, a telephone, a microscope, a telescope, and a computer are, generally speaking, examples of means of cognition.

Secondly, there are the means of conation. These are means by which we go out to shape or influence the world. An animal paw or a human hand, a hand tool, a machine, or a house are, generally speaking, means of conation.

Now I would like to explore the concept of mediation in more depth. In providing examples of means of cognition and means of conation I have

spoken as if an entity can serve exclusively as one or the other. An eye or microscope, for example, was said to be a means of cognition. A hand or a machine was said to be a means of conation.

All Mediators Engage in both Cognition and conation

Strictly speaking, however, any entity serving as a mediator is involved to some extent in both cognition and conation.

In `transmitting' an interaction from one being to another a mediator must in the first place receive an `impress' or `input'. This impress or input comes from the source of the interaction. The act of receiving or taking in this impress or input on the part of the mediator is cognition.

But this is only half the story.

In order to complete its `transmission', the mediator must then shape or influence the `recipient' of the transmission. It must, as it were, stamp an impress or convey an input to the `recipient' of the transmission. This is conation.

Both cognition and conation are, then, involved in every act of mediation.

In receiving light a lens engages in cognition. In conveying or impressing this light upon my eye the lens is engaged in conation.

In receiving the movements or forces from my hands and arms a shovel is engaged in cognition. In conveying or impressing those movements or forces to the ground, the shovel is engaged in conation

In receiving information from Jackie, Jennifer engages in cognition. In conveying or impressing this information to me, Jennifer engages in conation.

The Ubiquity of Mediators

Mediators, or means of interaction, are a pervasive feature of our world. Their ubiquity is reflected in the wide range of terms which refer to them.

We speak of `media' - as in `communications media' or `chemical media'.

We speak of `tools' or `instruments' as in `manual tools' or `musical instruments'.

We speak of `vehicles' - as in `transportation vehicles' or, as we will see in a

subsequent chapter, 'the body and mind as vehicles of the 'I' or self'.

All of these terms - media, tool, instrument, and vehicle - refer to beings serving as mediators or facilitators of interactions between other beings.

Taken together, the means of cognition and means of conation make up the linkages - the means of interaction - through which beings relate when they are not in direct one-to-one communication.

These linkages may also be thought of as extending the 'power' of beings. By 'power', I mean the ability to interact with the world and generate experiences or states of being which one desires. By extending the 'outreach' of a being, its means of cognition and means of conation extend also its ability to receive the world and to shape the world in ways which it desires.

CHAPTER 16. MEDIATED COGNITION AND MEDIATED conation

In this chapter I want to briefly clarify the meaning of 'mediated cognition' and 'mediated conation'. By 'mediated cognition', I mean receiving an impress or effect which is not communicated directly but rather through a mediator.

Suppose I tell Harry a story and Harry repeats, as best he can, the story to you. In listening to Harry's account of my story you are cognizing or being effected by me. But your cognition of me is a mediated one. It is based not on direct interaction between us but on Harry's role as an intermediary.

Or suppose I hit the 'q-ball' in a game of billiards and it in turn hits a second ball. This second ball has received an impress or effect from my action. But its cognition or receipt of my action is a mediated one. It is based not on direct interaction with me but on the role of the 'q-ball' as an intermediary.

Finally, suppose you go out to buy a liter of milk at your local supermarket. The milk is, as it were, mediated to you by the supermarket. The source of the milk, however, is not the supermarket but a series of other beings including cows, dairy farmers, and milk truck drivers. In purchasing the milk you are receiving not only the supermarket's effects but the mediated effects of the other beings which provided the milk to the supermarket.

Mediated conation

The complement of mediated cognition is 'mediated conation'. By 'mediated conation', I mean shaping or effecting a being by interacting with a mediator which 'passes the effect along' to it.

Suppose I speak to you in a way which enlivens or brings a degree of joy into your

life. Your positive mood may then result in your speaking in a somewhat kinder or happier way to a third person. My treatment of you has then effected that third person. But my conation is a mediated one, it is `passed along' to that third person through you.

Or suppose I am a dairy farmer selling my milk to a supermarket which in turn sells it to the public. Through my milk sales I conate or effect the public. But the conation is a mediated one, it is `passed along' to the public by the supermarket.

CHAPTER 17.THE THREE BASIC POWERS

You have now been exposed to the three basic aspects of every interaction. These aspects are cognition, conation, and processing or memory. These three aspects of all interaction are also present as `three basic powers' in all beings. To exist and manifest itself at all, a being whether human, natural, or divine must have:

1. The power to conate or effect at lease some other beings;
2. The power to cognize or be effected by at least some other beings;
3. The power to process what it receives from other beings through its own particular character.

These `three basic powers' are the minimum necessary ones for a being to exist and manifest itself.

Dust particles, giraffes, shovels, and people all exist inasmuch as they possess the three basic powers. Each of them possess the ability to transmit effects to at least some other beings; to receive effects from at least some other beings; and to process the effects which they receive from at least some other beings.

All beings whether human, natural, or divine must have the three basic powers in order to exist.

The Three Basic Powers And Character

Now I want to connect the three basic powers with the concept of character.

The character of a being, as we saw in a previous chapter, is made up of its potentialities for experience. These potentialities for experience are also its powers to cognize, conate, and process its world in particular ways.

My character, for example, includes the power to receive or hear sounds, the power to effect other people by talking to them, and the power to process the food I eat by digesting it. Taken together, the sum total of my powers of cognition, conation, and processing make up my character. Similarly, the three basic powers possessed by other beings - whether dust particles or giraffes - make up their particular characters.

How Beings Differ

Now I want to briefly discuss the differences we encounter in the characters of beings.

These differences are differences in their powers of cognition, conation, and processing. Human beings, squirrels, and stones, for example, differ in their abilities to cognize or receive other beings.

Eyesight, to cite only one example, differs greatly as between humans, squirrels, and stones. In addition to their cognitive differences, human beings, squirrels, and stones differ in their conative abilities.

Squirrels are much more adept at running up and down trees than are humans, while humans are much more adept than squirrels at shaping the environment with their hands. As for stones their conative powers are of a more rudimentary kind such as their stony ability to impact or resist other beings.

Finally, human beings, squirrels, and stones differ in their processing powers. Human stomachs, for example, are adapted to processing human foods, while squirrels thrive on the consumption of acorns, and stones eat very little

Human beings, squirrels, and stones are very different species of beings. Their powers of cognition, conation, and processing are correspondingly quite different.

Even within the same species, however, the characters or powers of beings can vary significantly.

Human cognitive abilities, for example, typically include the five senses, perhaps some potentiality to use 'subtle senses', to eat and digest different foods, to understand different ideas, to listen to other people, and so forth. There are broad similarities in these areas for most humans. But the five senses, the 'subtle senses', as well as the ability to eat different foods, to understand different ideas, to listen to other people, and so forth will also vary from one human being to the next.

CHAPTER 18: TO BE A BEING IS TO BE A POWER

Before leaving this discussion of beings and their interactions, I want to briefly discuss the relationship between being and power.

To be a being is to be a power.

Beings - whether human, natural, or divine - are powers able to effect and be effected by at least some other beings.

When two people meet, it is a meeting of two powers, each with its own particular character, and each able to effect and be effected by the other.

When the natural beings in an echo-niche interact it is a meeting of many powers, each with its own particular character and each able to effect and be effected the others.

And when the beings of the planetary interaction system as a whole interact it is a meeting of a tremendous number of powers, each with its own particular character and each able to effect and be effected by the others.

The ability to enter into, and to effect, the experiences of other beings is an important part of what makes us beings!

CHAPTER 19. THE FOUR KINDS OF ENTITIES (Part one)

The content of this chapter is absolutely essential to understanding the revolutionary theory of knowledge which is presented in part two. It concerns a fundamental distinction which runs through this entire world view. This is the distinction between entities outside your experience and entities inside your experience.

All the beings in the universe can, from the perspective of a given being, be divided into those which are currently inside its experience and those which are currently outside its experience.

I have until now explored this outside experience/inside experience distinction with the help of the concepts noumena and phenomena. Noumena are powers outside my experience but able to enter into and effect my experience.

Phenomena are the manifestation of those noumenal powers within my experience.

In this chapter I introduce a series of concepts which parallel the noumena/phenomena distinction. Like noumena and phenomena, this series of

concepts is built on the 'inside experience/outside experience' distinction.

But these additional concepts draw out different and exceedingly important aspects of the 'inside experience/outside experience' relationship. They thereby add to our understanding of noumena and phenomena, and of experience in general.

Theoretical Entities and Phenomenal Entities

Now I come to my first additional pair of concepts. These are 'theoretical entities' and 'phenomenal entities'. By a 'phenomenal entity', I mean an entity or being which is currently present in my experience. By a 'theoretical entity', I mean an entity or being of whose existence I am aware but which is not currently present in my experience.

At the moment, for example, I am sitting in a restaurant. A man working as a waiter is serving me and is directly present in my experience. He is therefore from my perspective a phenomenal entity or being.

I cannot, however, see the outside facade of the restaurant. I saw it on the way in, but I cannot see it or otherwise experience it from where I am now sitting.

For all I know labourers could have arrived, and removed part of the facade while I have been sitting here.

The outside facade is therefore from my current perspective a theoretical entity or being. That is to say, I hold a theory that the facade is there, although I cannot see it.

In distinguishing phenomenal from theoretical entities the crucial issue is whether they are currently in our experience.

A moment ago, for example, I saw the pen on the restaurant table in front of me. At that point it was a phenomenal entity inside my experience. But I have now looked away from the pen and am no longer directly encountering it. It is therefore now outside my experience and has become a theoretical entity.

Phenomenal entities, then, are entities which are present in my experience now. Theoretical entities are entities of whose existence I am aware but which are not present in my experience now.

The 'Relativity' of Phenomenal And Theoretical Status

There is a related key point which you may already have noticed. It is the 'relativity' of phenomenal and theoretical statuses. These statuses are not permanent but change according to our relationship to an entity.

While I sit in a restaurant, for example, the waiter serving me is phenomenal - and the outside facade of the restaurant is theoretical. As I leave the restaurant, however, the waiter becomes for me a theoretical entity as he passes out of my experience. The outside facade of the restaurant becomes at the same time phenomenal and remains so for the period of time that it remains in my direct experience.

To further refine your understanding of the phenomenal/theoretical distinction, consider also the wide range of objects which have at least two sides.

When I look at the front of a chair, its back side is out of sight and theoretical. If I walk around to its rear, however, the back of the chair becomes phenomenal and the front becomes theoretical.

We see, then, that an entity's phenomenal or theoretical status may change according to our physical position in relationship to it. An entity's status may, however, also be changed by its position in time.

A few seconds ago, for example, I glanced into my refrigerator. On the top shelf I saw a coke bottle. That bottle was directly present in my experience and was therefore phenomenal. Now, however, a few seconds have passed. I have closed the refrigerator and the coke bottle is out of my sight. The coke bottle is no longer present in my phenomenal world, my experience of it is in the past, and it is therefore now a theoretical entity for me.

A present event may be phenomenal or theoretical - it depends on whether it is directly present in my experience. But all past events, which are by definition outside my direct experience, are necessarily theoretical.

Finally, another significant consequence flows from the `relativity' of phenomenal and theoretical statuses. It is that an entity may be phenomenal in relationship to one being and theoretical in relationship to another.

Consider the status of thoughts. Suppose you have a thought currently present in your mind. That thought is, from your perspective, a phenomenal entity: it is directly present in your experience.

But for me, no matter how much you tell me about the thought, it remains a theoretical entity which I do not directly encounter.

Or suppose that Jackie and Jennifer pay me a visit. They are from my perspective phenomenal because they are directly present in my experience. But if you are not along for the visit, they are not in your phenomenal world and are therefore for you theoretical. This set of relationships can, of course, be reversed. If Jackie and Jennifer visit you, and I am not along for the trip, they will be phenomenal entities

or beings for you and theoretical ones for me.

Now I want to tie this discussion of theoretical and phenomenal entities back to my previous discussion of noumena and phenomena. The key point to grasp here is that 'theoretical entities' are also 'noumena', and 'phenomenal entities' are also 'phenomena'.

Both pairs of concepts - noumena/phenomena and theoretical entity/phenomenal entity - point to the same 'outside experience/inside experience' relationship.

There is, however, an important distinction in how the two sets of concepts construe this 'outside experience/inside experience' relationship.

Noumena/phenomena construes it primarily as one between powers or potentialities standing outside experience and the actualization of those powers or potentialities within experience.

Theoretical/phenomenal, on the other hand, construes it primarily in terms of our knowledge. Being outside our direct experience, a noumena or theoretical entity is known to us indirectly by means of a theory. It may have been within our experience a moment ago. But at the moment it is not within our phenomenal world and our idea of it is therefore, from our standpoint, a theory.

A phenomena or phenomenal entity, on the other hand, stands directly before us. It is currently within our direct experience and is known to us directly. This distinction between entities known directly and entities known indirectly to us will turn out to be crucial when we come, later on, to the nature of knowledge.

'Technical' Theoretical Entities and 'Absolute' Theoretical Entities

Now I want to introduce you to an important sub-distinction. This is the distinction between 'technical theoretical entities' and 'absolute theoretical entities'. By a 'technical theoretical entity', I mean an entity which I am not currently encountering in my phenomenal world but which could enter into my experience. By an 'absolute theoretical entity', I mean an entity which is not currently in my phenomenal world and which cannot even in principle enter into my phenomenal world.

Lets clarify the distinction between 'technical' and 'absolute' theoretical entities with some examples.

Jackie and Jennifer are frequently outside my direct experience. At such times they are, from my perspective, theoretical entities. Their theoretical status at such times is, however, technical rather than absolute. It is technical because the barriers to encountering or experiencing them are 'technical' rather than absolute. Given appropriate circumstances, such as a visit from them, they are able to enter

or re-enter my direct experience.

Now consider the example of bacteria and other microscopic life forms. These are ordinarily outside our direct experience. They are at such times theoretical entities. By using a microscope, however, we can convert them, or at least aspects of them, into phenomenal entities present in our experience. Microbes outside our phenomenal world are therefore like Jackie and Jennifer when they are outside it. Since the possibility of directly encountering them exists, they are technical rather than absolute theoretical entities.

Now let's look at some examples of absolute theoretical entities. Any entity too small to ever be directly encountered or experienced, such as certain sub-atomic particles, is an absolute theoretical entity. So too is any entity too far away, such as perhaps certain distant objects in space. The motives, egos, thoughts, feelings, wills. And minds of beings other than ourselves cannot ordinarily be directly encountered or experienced. They are therefore, from our perspective, also absolute theoretical entities.

The Importance Of Theoretical Entities

"What," you may be wondering, "is the point of thinking about absolute theoretical entities? If they can never enter my experience, what connection do I have with them? And, if I can never directly encounter them, how can I even know if they exist?"

The full answer to this query will not emerge until I come to my discussion of knowledge. But I can make a provisional response at this point: The significance of absolute theoretical entities, and the means of verifying their existence, is in their consequences.

It is true that absolute theoretical entities never directly enter our experience. But their consequences do. The motives, egos, or wills of other beings can have definite consequences in our experience. So too can sub-atomic particles when they leave tracks in a cloud chamber in a scientific lab, or produce an atomic explosion.

It is by such consequences that we also can test the existence of absolute theoretical entities. If we are able to encounter in our phenomenal worlds the consequences which should follow if an absolute theoretical entity exists, then we can tentatively assume that it does in fact exist.

If we do not encounter these consequences, then we have grounds for supposing that it might not exist.

CHAPTER 20. THE FOUR KINDS OF ENTITIES (Part two)

Now I want to introduce two more concepts. These concepts refine the distinction between phenomenal and theoretical which we have already examined.

These two new concepts are those of 'mixed entities' and 'unknown entities'. By a 'mixed entity', I mean an entity which is partly directly present in my experience and partly outside it. In other words, a mixed entity is partly phenomenal and partly theoretical. Most of the entities we encounter in everyday life are of the mixed type.

A Cat is A Mixed Entity

Suppose I see a cat. The cat shape - the shape of head, legs, and trunk - directly enters into my phenomenal world. The cat's colour is likewise directly present in my experience. But the vast majority of the cat remains theoretical. The colored material covering the cat appears to me to be fur. But unless I touch it, the furry quality remains for me a theoretical entity. I believe the cat has insides. But unless the cat is cut open those insides remain for me theoretical.

In addition, my concept of the cat includes the idea of its ability to run, to meow, to claw, to curl up, to eat fish, and so forth. But as I observe the cat, most of these 'cat qualities' are at any given particular time outside my experience and hence theoretical. Cat's, like most of the beings or entities we encounter in everyday life, are thoroughly mixed entities.

The Role of Sense Channels

Before passing on from mixed entities to unknown entities, I want to briefly touch on the concept of 'sense channels'. By 'sense channels', I mean sight, hearing, touching, tasting, and smelling. There may be other 'subtle' or less frequently used sense channels. But the standard common ones will suffice for my brief discussion here. Now the significance of sense channels for our knowledge of phenomenal, theoretical, or mixed entities is simply this: An entity may be present in one sense channel (and to that extent phenomenal) but not present in another (and to that extent theoretical).

Let's consider the cat again. When I look at the cat, it is present - and to that extent phenomenal - in my visual channel. But unless I am touching it, it is purely theoretical in terms of my kinesthetic or touch channel. The presentation of a cat shape in my phenomenal world could, for all I know, result from a three-dimensional holographic projection of a cat. In that case, my hand would simply swish through empty air if I moved to pet the cat.

Or consider the 'soft-looking' cat fur. That fur might, for all I know, contain briars. My expectation of its softness remains a theory until I touch it.

Or consider a visit with my friends Jackie and Jennifer. When I hear their voices outside my door, they are present in only one sense channel. Their visual appearances and other sense qualities are theoretical. Those voices in the corridor might, for all I know, belong to two other people who sound like them. As they enter my room, however, I not only hear them but see them. Their entry into my visual channel, in addition to the auditory channel, increases their phenomenal presence and my certainty that they are in fact Jackie and Jennifer.

Unknown Entities

Now I come to unknown entities. By an 'unknown entity', I mean an entity which exists but is unknown to us. The universe is, from the perspective of any given being, literally teeming with unknown entities. Any existing entity not currently present in my phenomenal world, and of which I have no theoretical conception, is for me an unknown entity.

Like phenomenal, theoretical, and mixed entities, unknown entities are relative to the phenomenal worlds of observers. An entity can, that is, be known to you but unknown to me.

Consider any thought, piece of knowledge, animal, person, or place which you encounter - or have encountered in the past - in your phenomenal world. All of these are known to you. But if I have not encountered them, and if no one tells me about them, they are for me unknown entities.

The Importance of Unknown Entities

Now there isn't a great deal more to be said about unknown entities. All that we know about them is, after all, that they are unknown. Except, and it is an important 'except', that the concept of 'unknown entities' can serve to remind us that the universe, with all its beings and potentialities, is greater than our knowledge of it. The notion of unknown entities can help to keep us open to new possibilities; it can prompt us to explore beyond the entities, resources, or explanations we are familiar with; and it can remind us that in the words of Shakespeare "there are more things in heaven and earth than are dreamt of in your philosophy, Hereto." I have now examined four types of entities. Each of these types derives its status, as we have seen, from its relationship to beings and their phenomenal worlds.

There are phenomenal entities (entities which are currently present within the phenomenal world of a being).

There are theoretical entities (entities which are known to a given being but currently outside its phenomenal world). There are mixed entities (entities which are partly currently present in the phenomenal world of a being and partly outside it). And there are unknown entities (entities which exist but which are unknown to a given being).

Part Two: Knowledge

CHAPTER 21: THE ROLE OF KNOWLEDGE IN HUMAN LIFE.

In the previous chapter we explored the four types of entities. We saw that all the beings in the universe can, from the perspective of a given being, be divided into phenomenal, theoretical, mixed, and unknown entities. Now I want to explore the nature of our knowledge of these entities. In this and the next few chapters I want to explore:

- The role of knowledge in human life.
- The nature of knowledge.
- How the truth of our knowledge is tested.
- The nature of information;
- The nature of perception,
- How knowledge is built in our minds.

In this chapter I want to tackle point 1 - the role of knowledge in human life - by indicating just why knowledge is so important to us.

The importance of knowledge stems fundamentally from the position which each of us occupies as an observer/actor in a world greater than our knowledge of it. There is around each of us a vast sea of beings, and of potentialities, both positive and negative, most of them outside our phenomenal world and unfamiliar or only partially familiar to us.

Instrumental and Contemplative Functions of Knowledge

In this vast world of potentialities, which each of us must navigate, knowledge has two functions. These are the 'instrumental function' of knowledge and the 'contemplative function' of knowledge. By its 'instrumental function', I mean that knowledge is an instrument for anticipating, and therefore controlling, experience.

Suppose I know that Jackie and Jennifer are coming over to see me at six p.m. This knowledge increases my power to see Jackie and Jennifer by allowing me to be there to meet them.

Or suppose I know that large trucks moving at high speeds have a character which can decimate a human body. This knowledge increases my power to maintain my body in one piece.

Or suppose I have knowledge that there is a tree outside my window in the backyard. This knowledge increases my power to see the tree or to go out in the backyard to interact with the tree and experience it in various ways.

Or suppose I know that a job I want is available. This knowledge increases my power to secure the kind of employment I am seeking. Or suppose I know that an ecologically sensitive area has been targeted for industrial development. This knowledge increases my power to take measures to protect that area.

Or suppose I know that meditating in a certain way will increase my physical energy and promote spiritual well being.

In each of these instances my knowledge is an instrument for anticipating and therefore controlling experience.

By now I imagine you can see what a powerful instrument knowledge is: it is a primary means for moving the world in directions we desire, and for eliciting experiences we wish to elicit and avoiding experiences we wish to avoid.

The Contemplative Function of knowledge

Now I want to discuss the non-instrumental or 'contemplative function' of knowledge. The instrumental function of knowledge is to increase my power to change the world or to choose my experiences in the world. The 'contemplative function' of knowledge, on the other hand, is to help me to appreciate or contemplate the world just as it is. Knowledge is of contemplative value when it helps me to expand my being through savoring or enjoying my world in all its multi-dimensionality.

Suppose, for example, I am listening to a song not to rewrite it but to contemplate or appreciate it as it is.

Or suppose I am watching the daily news not to influence events but to identify with a wider sphere than my own daily life.

Or suppose I am learning about astronomy not to fly in space but out of curiosity.

Or suppose I am learning about the habits of beetles not out of a desire to either hunt or help them but because I enjoy knowing about beetles.

In all such cases my knowledge is of contemplative value. It is knowledge which is serving me by helping me to contemplate, and in some cases identify with, a larger portion of my world.

I have, I hope, given you a sense of the importance of knowledge. It is both the means by which we contemplate or appreciate our world, and a crucial instrument for moving the world in directions which we desire and for securing the experiences for ourselves and other beings which we wish to secure. In the next chapter I will define knowledge and discuss its character.

CHAPTER 22: THE NATURE OF KNOWLEDGE (Part One)

In a number of previous chapters I have explored a fundamental distinction. This is the distinction between entities currently inside and entities currently outside our experience. Now, however, I want to introduce a second fundamental distinction. This is the distinction between our ideas about these entities and the entities themselves. The essential thrust of this distinction is that our ideas about these entities are not the entities and can therefore be incomplete, one-sided, or wrong.

The Map Is Not The Territory

This distinction between our ideas and our world is like the distinction between a map and its territory.

A map, for example, is smaller than the territory it describes. It must therefore omit certain features of that territory. A hill which exists in the territory may not be represented at all on the map. In addition, a map may be one-sided. A specialized whether map may show whether patterns in detail while providing relatively little information about population distribution.

Finally, a map may contain outright inaccuracies. A community depicted on the map may never have existed, or may have ceased to exist since the map was made.

Our Knowledge May Be Incomplete, One-Sided, Or Wrong

Our knowledge is like a map in that it too may be 1) incomplete, 2) one-sided, or 3) wrong.

Take my knowledge of Jackie and Jennifer. Like a map, this knowledge is distinct from Jackie and Jennifer themselves. It therefore may omit many of Jackie and Jennifer's characteristics and activities, and may thereby be incomplete.

In addition, my knowledge of Jackie and Jennifer may be specialized or One-Sided; it may concentrate on what I am interested in and omit areas of Jackie and Jennifer's lives which do not interest me.

Finally, my knowledge of Jackie and Jennifer in all probability includes mistaken assumptions about them or their lives; being distinct from Jackie and Jennifer themselves, my knowledge of them is likely to contain at least some errors.

These similarities between maps and knowledge - that both tend to be incomplete, one-side, and prone to error - is captured in the aphorism put forward by Count Alfred Korziczka in his great work 'Science and Sanity': "The map is not the territory."

What is Knowledge?

I have been hammering away at the importance of distinguishing between our knowledge and the world. But what, then, is 'knowledge'? If we can provide an adequate answer to this question, we will have a key which will open many doors. By 'knowledge', I mean a disposition to believe that if I interact with a particular part of the world in a particular way I will generate a particular kind of experience.

Suppose I have knowledge that there is a tree outside my window in the backyard. This knowledge is a disposition to believe that if I look outside my window I will see the tree and that if I go out in the backyard I will be able to interact with the tree and experience it in various ways.

Or suppose I have knowledge that my friends Jackie and Jennifer live at 123 maple street. This knowledge is a disposition to believe that if I were to go to the street labeled maple, and go up to the house with '123' on it, and knock on the door, I would encounter or experience Jackie and Jennifer. My knowledge, whether of the tree in my backyard or of Jackie and Jennifer's address, is "a disposition to believe that interacting with a particular part of the world in a particular way will generate a particular kind of experience".

Knowledge Is A Prediction About The Future

This way of viewing knowledge makes knowledge tentative, hypothetical, and predictive about the future. It eliminates the idea that knowledge means absolute certainty. Some knowledge is of course more reliable or certain than other knowledge. But the predictive, future-leaning character of knowledge means that none of our knowledge can be absolutely certain. It cannot be certain because it refers to events, or experiences, which have not yet happened.

My knowledge that Jackie and Jennifer live at 123 maple is, for example, a 'prediction' that if I go there I will find them. Though I think it unlikely, I may discover when I go there that they have moved out. Or I may discover that my memory has played tricks with the address. Or I may discover that for some reason they have deceived me about their address and have never lived there at

all. Knowledge as predictive of future possible experience means that it is always at least somewhat tentative and is, or at least should be, open to correction by future experience.

But what about our knowledge of events, or experiences, which took place in the past? Consider the example of World War II. My knowledge of this war is a disposition to believe that between 1939 and 1945 a war of global scope, involving the world's most powerful nations, as well as many others, took place.

The only way I can know if these notions about World War II are true is to interact with particular parts of the world in particular ways. I can look at 'secondary sources' such as books or articles on the war, I can look at old newspaper clippings from the war period, I can talk to old war veterans, view documentary films of the war, and so forth.

If the experiences these interactions produce are consistent with my view of the war, then I have to that extent confirmed my knowledge. If these experiences are not consistent - for example if no one remembers such a war and there are no records - then my knowledge needs to be seriously re-examined.

So my knowledge of events in the past, such as world war II - though referring to past events - also includes assumptions about future experience (if I look up records or talk to war veterans, they will confirm that the war took place).

Knowledge, even knowledge of the past, may therefore be thought of as a set of hypotheses or predictions regarding potentialities for future experience.

The Scientific Attitude In everyday Life

If pondered, this predictive, 'future-leaning' view of knowledge can work a positive change in the way we engage with the world.

It can, for example, inculcate a greater degree of healthy skepticism, and a greater humility, about the certainty of our own or other peoples thinking and knowledge; it can at the same time inculcate a greater respect for, and a greater desire for, substantiating evidence, argumentation, or experience to back up assertions by ourselves or others of alleged fact.

It can, finally, lead us to 'qualify' our knowledge - to point out to ourselves or others when the evidence for a particular assertion we are making is less than solid. This change of attitude may be thought of as bringing the scientific attitude into everyday life.

Recognizing Our Own Ignorance

"The scientist," says Nobel-prize-winning physicist Richard Feynman, "has a lot of

experience with ignorance and doubt and uncertainty. And this experience is of very great importance, I think. When a scientist doesn't know the answer to a problem, (s)he is ignorant. When (s)he has a hunch as to what the result is, (s)he is uncertain. And when (s)he is pretty darn sure about what the result is going to be, (s)he is still in some doubt. We have found it of paramount importance that in order to progress we must recognize our own ignorance and leave room for doubt. Scientific knowledge is a body of statements of varying degrees of certainty - some most unsure, some nearly sure, but none absolutely sure."

I think that this quote puts the matter almost perfectly.

All that remains is to add is that Feynman's statements apply not just to physical scientific knowledge but to all knowledge. My knowledge as a whole is "a body of statements of varying degrees of certainty - some most unsure, some nearly sure, but none absolutely sure."

My beliefs may concern sub-atomic particles, the delivery time for today's paper, or the direction that relations between the world's superpower nations are heading in. Whatever the subject of my knowledge, it remains a prediction about future experience, and therefore remains to some degree uncertain.

Knowledge Is A Prediction About Future Experience

Now I want to emphasize that knowledge is concerned with the world's potentialities for experience. These potentialities for experience are the various aspects of all those other human, natural, or divine beings which are currently outside my phenomenal world.

My knowledge is a set of dispositions to believe that interacting with the world in particular ways will convert the various aspects of these other beings into particular kinds of experiences in my phenomenal world or in the phenomenal worlds of other beings.

Finally, I want to mention several synonyms or partial synonyms for 'knowledge' or 'belief'. Each of these synonyms emphasizes a different aspect or quality of knowledge. These synonyms or partial synonyms for knowledge are 'assumption', 'expectation', and 'hypothesis'.

Saying that I 'assume' something about the world emphasizes that my knowledge is a construct in my mind which may or may not be true of the world.

Saying that I have an 'expectation' about the world emphasizes that my knowledge points to future potentialities for experiences which I expect to appear when I interact with the world in particular ways.

Saying that I have a `hypothesis' about the world emphasizes that my knowledge is a set of tentative, `future-leaning' statements which are confirmed or falsified by future experience.

I may now expand my original definition of `knowledge' to read as follows: "By knowledge, I mean a disposition to believe, assume, expect, or hypothesize that if I interact with a particular part of the world in a particular way, I will generate a particular kind of experience."

CHAPTER 23. THE NATURE OF KNOWLEDGE (Part Two)

In the previous chapter I discussed the `future-predictive' character of our knowledge. Knowledge, I said, "is a disposition to believe that if I interact with a particular part of the world in a particular way I will generate a particular kind of experience". This `future- predictive' character of knowledge makes all knowledge hypothetical or tentative and rules out absolute certainty. But the `future-predictive' character of knowledge does not mean that we have to go about continually uncertain or skeptical about everything.

Inquiry And Skepticism

In exploring why we need not indulge in ultimate skepticism I want to begin with an image. It is an image of my knowledge as a vast network of assumptions or beliefs about the world.

The majority of assumptions in this belief-network can at any given time be used for contemplative or practical purposes without further consideration. I can generally assume without further consideration, for example, that the restaurant around the corner is still in business; that the earth still goes around the sun; and that the United States is still a super-power. However, the hypothetical character of knowledge means that any such particular assumption in my belief network could conceivably be inadequate, One-Sided, or wrong.

It may be that the restaurant around the corner is not still in business, that the earth does not go around the sun, or that the United States is slipping as a super-power.

Any assumption in my belief-network can therefore be singled out for inquiry through re-evaluation, correction, or expansion.

Such inquiry into a belief may take place because new information or new experience has appeared. Or it may take place simply because I have decided to inquire into a particular matter. But even when I select-out a particular belief for skeptical examination or inquiry the rest of my belief network remains intact.

This belief network serves me as the stable framework within which I may re-examine or inquire regarding the belief I have singled-out for consideration. If, for example, I am considering that the restaurant around the corner may have closed, I will probably not simultaneously consider that my life on Earth may be a dream, or that the Bill of fare in the restaurant may have changed, or that I may be mistaken regarding the woman I think of as the owner of the restaurant.

Even when inquiring into a primary element in my world view, my skepticism will not extend to all of my beliefs. Those beliefs not the subject of my current inquiry serve me as the means I use to examine the belief or beliefs I am inquiring into.

Practical Certitude

The stability of most of my beliefs at any particular time leads to me to the idea of 'practical certitude'.

Suppose I get up in the morning and decide to have breakfast at the same restaurant I patronized yesterday morning. If asked I will cheerfully admit that for all I know the restaurant could have changed its hours, gone into bankruptcy, or burned down over night. I will also acknowledge that just conceivably my memory may be playing tricks on me and the restaurant may not be there at all.

Nevertheless, my degree of certainty that none of these is the case is sufficient to warrant my 'practical certitude' that I need not inquire further before going to the restaurant to have breakfast.

By 'practical certitude', I mean this sense that something is in all probability the case and therefore does not require further inquiry at this time. Practical certitude that something is true and does not require further inquiry is, however, quite compatible with the hypothetical character of knowledge and with the belief that any idea may conceivably be inadequate, One-Sided, or wrong and therefore may need to be corrected or improved through inquiry in the future.

Degrees of Certainty and Knowledge Warrants

Finally, I want to discuss the degrees of certainty we can have regarding our knowledge.

What determines the position of a knowledge statement on the range from most unsure to nearly sure? The position of a statement on this range depends, or I think ought to depend, on the 'knowledge warrant' we have for that statement. By a 'knowledge warrant', I mean the warrant or grounds for believing that a particular knowledge concept is true.

The 'warrant', or grounds for accepting, a belief may include past or present

experiences, as well as theories which I have attached to those experiences. It may also include reports from others regarding their experiences or theories.

CHAPTER 24. HOW KNOWLEDGE IS TESTED

In the last few chapters I have explored the nature of knowledge. I defined knowledge as "the disposition to believe that interacting with a particular part of the world in a particular way will generate a particular kind of experience".

In this chapter I want to examine the four kinds of knowledge concepts used by human beings and the ways in which the truth of these knowledge concepts can be tested.

First, however, I want to introduce you to the notions of 'concept' and 'knowledge concept'. By a 'concept', I mean any idea or image in my mind. My idea that Jennifer lives at 123 maple street, my image of the cartoon character daffy duck, and my notion that it is now three o'clock are all concepts.

All of my concepts are not, however, 'knowledge concepts'. To be a 'knowledge concept', a concept must refer to an entity which I believe to exist.

I have, for example, a distinct concept, a distinct image or idea, of Santa Claus. I do not, however, believe that a jolly red-suited man, who operates a gigantic toy factory at the North Pole, and who delivers the toys every Christmas to all the world's children by a reindeer pulled sky sleigh actually exists. My concept of Santa Claus is therefore not a knowledge concept.

I also have a distinct concept of my friend Jennifer. I believe that my friend Jennifer, unlike Santa Claus, actually does exist - and so my concept of her is a knowledge concept. By a 'knowledge concept', then, I mean any concept which refers to an entity which I believe to exist.

My knowledge concepts can refer to 'material' things, other ideas, feeling states, spiritual entities, or any other entity or potentiality for experience whatsoever which I believe to exist.

Before introducing the four kinds of knowledge concepts, I want to emphasize an essential message of this chapter. It is simply that the mere possession of a knowledge concept, of an idea or image of an entity, does not in any way prove the existence of that entity.

To put it colloquially: "Just because I believe it, doesn't make it so!"

This is a restatement of the principle that our knowledge is distinct from the world, and can therefore be incomplete, One-Sided, or wrong. To put it still differently,

the concept of a thing is not the thing itself.

Suppose, for example, I look at a bag of peanuts in my kitchen. If I then turn away from the bag of peanuts and return to the other room, I can still recall the concept of the bag of peanuts to mind. But what is within my awareness or experience now is not the peanuts but only the concept of the peanuts. For all I know someone could have come along and eaten the peanuts while I was working at my desk.

This is a crucial point. I want to emphasize it because in talking with people I have discovered that it is a frequent point of confusion.

Let me therefore repeat: It is crucial to be able to distinguish between having an entity in your awareness or experience and having the concept of an entity in your awareness or experience.

The concept or awareness of the supposed existence of an entity is not the same thing as having that entity in your awareness.

What makes this such a critical point is that if we miss it we will be less inclined to doubt our knowledge and more likely to believe that our knowledge concepts, our ideas or images of the supposed state of the world, are identical with the world and therefore necessarily true.

Testing The Truth Of Our Knowledge Concepts

Now I want to introduce the four kinds of knowledge concepts and the ways in which these concepts can be tested. These four kinds of knowledge concepts correspond to 'the four kinds of entities' examined in a previous chapter.

The first of these concepts is the 'phenomenal concept'. By a 'phenomenal concept' I mean an idea or conception of a phenomenal entity. A phenomenal entity, as we saw earlier, is one which is currently present in experience and no part of which is outside experience. Colors, shapes, behaviors, sense-data, and our own ideas while they are in experience are examples of phenomenal entities.

Since phenomenal entities are directly present in experience, it is relatively easy to tell whether concepts or statements referring to them are true or false. We can match the concepts against the entities presented in experience, and observe the degree of fit between the entity and our idea or concept of the entity.

If I believe Jennifer has red hair and she is standing before me, I can compare my concept to her actual hair color and decide whether I am wrong or right.

Testing Theoretical Concepts

The second kind of concept is the 'technical theoretical concept'.

A technical theoretical entity is an entity not currently present in my experience but which can be brought into my experience. A 'technical theoretical concept' is the idea or concept of such an entity. Examples of technical theoretical concepts include:

- * My concept of Jackie and Jennifer when I am not interacting with them.
- * My concept of a cold virus when I'm not viewing it through a microscope and it is having no other perceptible effect on me.
- * My concept of my ability to swim when I am not swimming.

The Two Methods For Testing Truth

There are two ways of testing the truth of a theoretical concept. The first way is the 'method of direct encounter'. This method involves the attempt to bring the entity to which a concept refers directly within my direct experience. To do that, I must apply the 'formula for generating experience': I must interact in a particular way with the particular part of the world where the entity resides if it exists.

To determine whether Jackie and Jennifer are as I remember them, I can phone Jackie and Jennifer and arrange to see them.

To determine whether a cold virus matches my expectations, I can view the cold virus through a microscope to see if it's really there and what it is like

To determine whether I can swim, I can go to the swimming pool and see if I really know how to swim.

If such interactions produce the experiences which correspond to the concepts I am investigating, I have proven the truth of those concepts. If such interactions fail to produce the experiences which correspond to the concept I am investigating, then I am entitled to doubt the truth of that concept.

Difficulties In Disproving Concepts

It is easier to prove than to disprove the truth of a technical theoretical concept. Absolute disproof requires that I experience the entire portion of the world where a technical theoretical entity resides if it exists.

Imagine that I cannot locate my friends Jackie and Jennifer. I get a 'disconnect' message when I phone their house. I check with the telephone operator for a new phone number for them. I travel about the city checking at various addresses where they might be staying. I go to various restaurants and other public spots where I think they might be found. But all of this is to no avail. I cannot locate them.

But have I disproved their existence? Hardly. There are still a myriad of locations where they might be found. This necessity to explore the entire portion

of the world where an entity resides if it exists makes, as I said before, the task of disproving a technical theoretical concept a daunting task at times.

The Method of Indicators

I said before that there are two ways to determine whether a technical theoretical concept is true. The first way, which I have just discussed, is 'the method of direct encounter'. It is the method of attempting to bring the entity to which the concept refers directly within my experience.

The second method for test the truth of a concept is 'the method of indicators'. This method involves the attempt to bring another entity within my experience which I can treat as an 'indicator'. By an 'indicator', I mean an entity or experience other than the one I am testing for which I can treat as pointing to or suggesting the existence of the entity in question.

Instead of attempting to see Jackie and Jennifer in person, I can look in the phone book and treat their listing or non-listing there as an indicator pointing to their residence or non-residence in the city.

Instead of viewing the cold virus through a microscope, I can expose susceptible people to the dish in which I believe the virus to reside to see if they catch cold. I can then treat the appearance or non-appearance of their cold symptoms as an indicator of the presence or non-presence of the cold virus in the dish.

Instead of going to the swimming pool to see if I know how to swim, I can elicit memories in my mind of my experiences in the water. If I remember myself swimming, I can treat those memories as an indicator that I can swim; if I remember myself unable to swim, then I can treat those memories as an indicator that I cannot swim.

In testing for the existence of technical theoretical entities, this method of using 'indicators' is a common one. It is frequently used in both scientific and everyday life. It is frequently an irreplaceable method because of its economy and convenience. It is well to bear in mind, however, that the 'indicator method' is less reliable than attempting to bring an entity directly within your experience. Moreover, indicators must be carefully chosen if they are not to mislead us into thinking that we have established that something does or does not exist when in fact we have done nothing of the kind.

Before passing on, I want to focus briefly on testing the truth value of absolute theoretical entities.

An 'absolute theoretical entity' is, as we saw earlier, an entity which cannot be directly experienced and whose existence must be inferred from the existence of

phenomenal entities thought to depend on it. An 'absolute theoretical concept' is the idea or concept of such an entity. Here there is no question of bringing the entity we are testing for directly within our experience. By definition, an absolute theoretical entity is beyond the reach of my experience. Testing for such entities therefore relies wholly on the use of indicators.

Suppose I want to determine whether you are feeling happy. Your feeling states are from my perspective absolute theoretical entities unavailable to my direct scrutiny. I can, however, look at your face to see whether you are smiling. I can check your eyes to see whether they are bright or dull. I can listen to your voice to see whether it sounds happy or sad. And I can ask you outright whether you are feeling happy or not. All these methods involve bringing not your feeling state, which is beyond my reach, but indicators of your feeling state, within my experience.

Or consider the use of cloud chambers by scientists. The appearance of lines or trails in such cloud chambers is treated as an indicator pointing to the existence and path of sub-atomic particles too small to be seen.

Testing Mixed Concepts

The third kind of concept is the 'mixed concept'. A 'mixed entity', as we saw earlier, is an entity which is currently partially within, but also partially outside, my direct experience or phenomenal world. A 'mixed concept' is my concept of such an entity.

My concept of a peanut sitting on the table before me is a simple example of a mixed concept. Part of the peanut, the appearance of the shell, is in my phenomenal world by way of the 'visual channel'. But most of the peanut, its touch and taste, the appearance of the nut inside the shell, and so forth, is outside my immediate experience. If I view what is before me not simply as a 'brown shape' but rather as a 'peanut', I hold a mixed concept which is open to testing. The phenomenal part of the concept is the easiest to test - I can see the brown shape directly in front of me. To test the theoretical part of the peanut concept, however, is a bit more work. To see whether there really is a peanut in the shell for example, I must bring the inside of the shell directly within my experience by cracking the shell.

The pattern of the peanut holds for all mixed concepts. The phenomenal part of such concepts, the part that corresponds to an area of the world directly within my experience, is easy to test. The theoretical part of the mixed concept, the part of the concept which corresponds to parts of the world outside my experience, can be tested with either 'the method of direct encounter' or 'the method of indicators' exactly like any other theoretical concept.

Testing for Unknown Entities

The fourth kind of concept is the 'concept of unknown entities'. An unknown entity, as we saw previously, is an entity of which we have no knowledge. The 'concept of unknown entities' is simply the concept that such entities exist, that we live in a world greater than our knowledge of it, and that there are things of which we are not aware. The test for the truth of this concept is the surprises that periodically appear in our phenomenal worlds, the ability to go out and make new discoveries, and the reports from other regarding such surprises and new discoveries.

CHAPTER 25. CENTRAL LESSONS OF KNOWLEDGE TESTING

Before leaving the subject of knowledge testing, I want to put its three underlying points in different, and more succinct, terms.

1. The first point is that our knowledge concepts are not the things they refer to, and that our knowledge concepts can therefore be wrong and may require testing.

2. The second point is that there are two general methods which we may use to test the truth of our knowledge concepts. One of these methods is to attempt to bring the entity to which a knowledge concept refers directly within our phenomenal world. As a Shorthand, I have referred to this method as 'the method of direct encounter'.

The other method for testing the truth of a knowledge concept is 'the method of indicators'. This is the method of attempting to bring an entity which we regard as an 'indicator' of the existence of the entity to which a knowledge concept refers directly within our phenomenal world.

Taken together, these two methods may be called 'the two methods for testing truth'.

3. The third point is that it is the separate existence of other entities or beings, quite apart from our interpretations or concepts about them, which enables us to bring them or their consequences directly within our experience so that we can observe their behavior in ways which may confirm or falsify our beliefs about them.

Checking Out The Band

Now I would like to round out my discussion of knowledge testing with a little vignette to illustrate these three lessons. I call this vignette 'Checking Out The Band'.

Suppose that I want to test my concept that a particular band is playing at a club.

One means of testing my idea is to elicit indicators. I may talk to friends to see what they know about the matter. I may look in the paper to see if there is a listing for the performance. I may phone the club to see if the management says the band is performing.

By such efforts I may garner evidence pointing to the possibility that the band is, or is not, playing at the club.

But since these phenomena do not represent direct contact on my part with the band at the club, they may in fact mislead me.

Suppose that a friend tells me that he read in the paper that the band's performance was canceled.

His statement about what he read may be correct. However, the paper may have made a mistake.

Or my friend may have misread or misinterpreted the article. Or I may have misunderstood my friend. Due to their indirect nature, indicators can give us relative but not absolute certainty.

In addition to indicators, then, I may therefore attempt to elicit a direct encounter to determine whether the band is playing at the club. I may, for example, go to the club and stand outside to see if I can hear the band's music.

If while standing outside I hear the sound of the band, this is evidence that the band may in fact be there. But this evidence is not conclusive. My concept of the band at this point is a mixed concept. It refers to a band which is partly inside my phenomenal world, by virtue of being in my auditory channel, and partly outside my phenomenal world, by virtue of the fact that I am not seeing, touching, or otherwise encountering the band.

From another standpoint, the sound of the band's music is an indicator which I take as pointing to the presence of the band inside the club. But none of this is conclusive. For all I know the music coming from the club could be produced by a record player.

So I may choose to obtain visual input by walking up to the club and peering in the window. If I see the band on stage, I have direct phenomenal confirmation of the band's presence in two sense channels. In other words, I can now both hear and see the band.

At this point I will probably become relatively certain that my knowledge that the band is playing at the club is correct. But there is still room for uncertainty, though to explicate the nature of this uncertainty I must anticipate my analysis of causality

in a later chapter. What I am referring to is that the causal link between the band's movements with their instrument on stage and the music I hear is still theoretical.

Am I being overly technical? Isn't it a forgone conclusion at this point that the band is in fact making the music? Not at all. A common practice in some clubs is for a band to lip-synch to pre-recorded material which they or perhaps others have previously produced!

CHAPTER 26: INDICATORS AS PHENOMENAL CONSEQUENCES.

In the preceding chapter I stressed two methods for testing our knowledge concepts. These are the methods of 'direct encounter' and of 'indicators'. The method of 'indicators', as you may recall, is that of attempting to bring another entity within my experience which I can treat as pointing to or suggesting the existence of the entity in question.

Such indicators may also frequently be thought of as 'phenomenal consequences' of the entities to which they point. By 'phenomenal consequences', I mean that these indicators may be thought of as results appearing within my phenomenal world of entities which themselves remain outside my phenomenal world.

The microscopic cold virus may remain outside my phenomenal world if I lack a microscope. But my sneezing is a phenomenal consequence, appearing within my phenomenal world, which can be taken as indicating that the cold virus may in fact be present.

Jackie and Jennifer may be standing outside my door invisible to me. But the sound of a knock is a phenomenal consequence in my phenomenal world which can be taken as indicating that they may have arrived. I may not want to visit Jackie and Jennifer's house in order to see for myself their exact address. But by looking in the phone book I can elicit a listing which I can take as a phenomenal consequence of their location.

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CHAPTER 27: INFORMATION.

In this chapter I want to introduce a concept which overlaps, but is also distinct from, that of knowledge. This concept is that of 'information'. I indirectly introduced this subject in the previous chapter when I discussed indicators. The concept of information presented here is in fact an 'indicator theory of information'.

By 'information', I mean any presentation in my phenomenal world which I treat as indicating or pointing beyond itself to another entity or potentiality currently lying outside my phenomenal world.

Suppose I hear the phone ringing. If I take the ringing sound merely as a sound, I am treating it simply as a presentation in my phenomenal world. I am not treating it as indicating or pointing beyond itself to other potentialities for experience. It is therefore not information.

But suppose I treat the ringing sound as suggesting that there is someone calling on the phone. I am at that point treating the ringing sound as an indicator; I am treating it as pointing beyond itself to a potentiality for experience currently outside my phenomenal world. At this point the ringing sound becomes information.

Or suppose I see a tree. If I take the image of the tree merely as an image, I am treating it simply as a presentation in my phenomenal world. I am not treating it as indicating or pointing beyond itself to other potentialities for experience. It is therefore not information.

But suppose I treat the visual image of the tree as suggesting other possibilities for experience such as the possibility to climb the tree or to touch it. I am at that point treating the visual image of the tree as an indicator; I am treating it as pointing beyond itself to potentialities for experience currently outside my

phenomenal world. At this point the image of the tree becomes information.

Or, finally, suppose I look at a cookbook. If I relate to the words in the cookbook simply as black patterns against white paper, I am treating them simply as a presentation in my phenomenal world. I am at that point not treating them as indicating or pointing beyond themselves to other potentialities for experience. They are therefore not information.

But if I treat the words in the cook book as, say, telling me how to make a carrot cake, then I am treating them as indicators, as pointing to possibilities currently outside my phenomenal world. At that point the cookbook is information for me. There are, then, two fundamental ways in which a being may relate to an experience. It may treat the experience simply as an immediate presentation without further significance. Or it may treat it as 'information'. as an indicator pointing beyond itself to some other possibility for experience.

All Experience Contains Potential Information

I want to emphasize that we are constantly bombarded with potential information in the form of our experiences. All experience contains potential information. But this potential information is not realized as actual information until the observer or experience interprets the experience as an indicator or symptom pointing to potentialities in the world. It is at the point that the experience is treated as an indicator or pointer to other potentialities for experience that the potential information becomes actual information. Another way to put this is that no phenomenon is by itself information. A phenomenon only becomes information when some being treats it as such.

Anything Can Become Information

I want to stress that any experience or phenomenon whatsoever may become information. My feelings, thoughts, beliefs, intuitions, reports that I receive from others, insights gained through religious or spiritual experiences, and the models of the world I develop through the free use of my human imagination may all serve me as valuable sources of information.

To convert these or other experiences into information I need only treat them as indicators pointing to other possibilities for experience.

No Information Is Absolutely Reliable

It should be emphasized that neither these nor any other sources of information are absolutely reliable. Neither my feelings, nor my thoughts, nor my beliefs, nor my intuitions, nor reports that I receive from others, nor insights gained through

religious or spiritual experiences, nor the models of the world I develop through my imagination are absolutely reliable guides to the character of my world. It is only by comparing these different sources of information, and by seeking out additional experiences to test this information, as previously discussed in the chapter on knowledge testing, that I can verify or falsify my knowledge in relatively effective ways.

Now I want to deepen my exploration of the concept of information. As a first step, I want to introduce you to a coined word which will simplify my discussion.

This coined word is 'informativ'. By 'informativ', I mean the act of treating a current experience as information. To 'informativ' an experience is to treat it as an indicator pointing to other potentialities for experience.

We may speak of 'informatized experience' and 'uninformatized experience'. 'Informatized experience' is experience to which meaning is attached; it is experience treated as information pointing to potentialities beyond itself. 'Uninformatized experience' is experience treated simply as an immediate presentation; it is experience not treated as pointing to anything beyond itself.

Suppose I look at a door and simply treat it as a door-shape. At that point my experience is not 'informatized'. I have not treated the door-shape as information. But suppose I think of the door-shape as indicating the route out of the room. At that point I have treated the door shape as an indicator or as information. I have 'informatized' my experience.

In addition to 'informatize' and its grammatical variants, I also want to introduce the concept of 'the informatizing power'. This power is akin to the power of reason which will be discussed in a later chapter. By 'the informatizing power', I mean the power of a being to treat its current experiences as indicators pointing to other potentialities for experience.

I use my 'informatizing power' when I interpret a door-shape not simply as a shape but as a way out of the room.

I also use it when I interpret the words in a book as signifying something beyond squiggles in front of me. And I use it as well when I treat my thoughts as indicators pointing beyond themselves to other potentialities for experience in the world.

I began this discussion by defining information as "any presentation ...which I treat as indicating or pointing beyond itself to another entity or potentiality currently lying outside my phenomenal world".

A ringing phone, for example, only becomes information when I treat it as pointing beyond itself to the possibility that someone is calling on the phone. This power to 'informatize' experience may also be thought of as 'the power to

anticipate'. By 'the power to anticipate', I mean the ability to use experiences to anticipate other possible experiences.

Suppose I'm crossing the road when I see a bus. I could treat this event as a presentation in my phenomenal world without further significance. But I do not. Instead I informatize the experience; I treat it as an indicator allowing me to anticipate the potentiality to be run down by the bus (an experience I would like to avoid) and as pointing to the possibility of being taken by the bus to my destination (an experience I would like to elicit).

Or consider the experience of a one-celled creature. In its phenomenal world presentations appear which it treats as information indicating 'dinner' or 'not-dinner'. Those presentations it construes as dinner it treats in one way and those it construes as not-dinner it treats in another. If the one-celled creature could not anticipate its possible experiences in this way, it would quickly starve or attempt to consume entities which were toxic for it.

The informatizing power, and the power to anticipate, are simply two ways to look at a single ability. In treating my experience of the bus as information, I am at the same time anticipating the effects which the bus might have on me. In informatizing my experience of words in a cookbook, I am at the same time anticipating the potentialities I might elicit if I were to mix dough and other ingredients to make a carrot cake.

Now I want to connect the concept of information with the concept of choice.

The informatizing power, the power to treat experiences as information, is the foundation for all choice. The very possibility of choosing to elicit some experiences and to avoid others depends on the informatizing power. I cannot choose to avoid being run over by a bus or to use it to reach my destination unless I can treat my initial glimpse of it as information. Only by informatizing my initial sighting of the bus can I choose between its potentialities to run me down or to take me where I want to go.

Without the power to treat experiences as information, we would be reduced to blindly, and choicelessly, encountering one experience after another. All choice requires the informatizing power.

CHAPTER 28: PERCEPTION.

In this chapter I introduce the important concept of perception. By 'perception', I mean the impressions of my world which I generate as I interact with it.

The Datum And Judgment

Perceptions are made up of two kinds of components. One of these is the 'datum' and the other is the 'judgment'. The 'datum' in a perception may consist of sense data such as sights, sounds, tastes, touches, or smell. But the datum may also be a thought, feeling, emotion, body sensation, energy, or any other phenomena whatsoever which I directly encounter in either my inner or outer worlds. By a 'datum', then, I mean any direct experience or immediate presentation in my phenomenal world.

As for the 'judgment' in a perception, it consists of any interpretation which I bring to the datum. The datum is simply there in my experience; it is what the world has presented to me. But the judgment goes beyond this direct experience by construing it as an indicator pointing to other possibilities for experience.

Suppose I perceive a bus in the distance on the road at night. The datum in this perception, the direct experience in it, may be two bright areas of light. The judgment in this perception, the interpretation I bring to the datum, may be construing these two bright areas of light as indicating a bus in the distance.

The datum or direct experience, in this case the two bright lights, cannot be falsified. If I am directly encountering or experiencing two bright lights, then I am directly encountering or experiencing two bright lights.

But the judgment in my perception - that these two bright lights indicate a bus - can be falsified. The two bright lights which I take to represent a bus may turn out when they approach me to belong not to a bus but to a truck.

Or take the example of a friend whom I perceive to be angry at me because he has snarled at me. The datum in this perception, the direct experience in it, is my experience of my friend snarling. The judgment, the interpretation I bring to the datum, is construing this snarling as indicating that my friend is angry at me. The datum or experience, in this case the snarling, cannot be falsified. Snarling sounds are snarling sounds.

But the judgment in my perception - that the snarling sounds mean my friend is angry at me - can be falsified. Questioning my friend may, for example, reveal that he is snarling not because he is angry at me but because his tooth is hurting.

Perceptual Hypotheses

Every perception which includes a judgment, then, is in effect a hypothesis about the character of the world. The accuracy of such 'perceptual hypotheses' can be tested.

The first step in testing the accuracy of a perception is to distinguish its

phenomenal component or datum from its theoretical component or judgment. In the case of a snarling friend, for example, I must first distinguish between the phenomena of his snarling and my interpretation of his snarling as indicating that he is angry at me.

In the case of my perception of a bus at night I must first distinguish between the phenomena of two lights in the distance and my interpretation of these two lights as indicating that there is a bus.

Once I have distinguished datum from judgment, I can apply the 'two methods for testing truth'. These two methods were set out in the chapter on testing the truth of our knowledge concepts. The methods are, as you may recall, 'the method of indicators' and the 'method of direct encounter'.

In 'the method of indicators' I attempt to bring an entity which I regard as an 'indicator' of the existence of another entity directly within my phenomenal world. In the case of a snarling friend, for example, I can test my perception that he is upset with me by asking him if he is. Or I might ask someone else if they know whether he is upset with me. Or I might watch his behavior for further clues as to whether he is upset with me.

In the case of my perception of a bus in the distance at night, I might apply 'the method of indicators' in a number of ways. I might ask someone else at the bus stop if they know whether the bus is due or I might consult a timetable to see if the lights I see are likely to be those of the bus.

By asking my friend if he is upset with me, or by checking the timetable to see if the bus is due, I am bringing into my phenomenal world indicators of the truth or falsity of my perceptions.

The second method for testing truth is 'the method of direct encounter'. This method involves the attempt to bring the entity to which a knowledge concept refers directly within our phenomenal world.

In the case of my snarling friend, I cannot apply 'the method of direct encounter'. The method does not apply to human dispositions such as anger since we cannot ordinarily have direct access to someone else's inner states.

In a case such as my perception of a bus in the distance, however, I can apply the 'method of direct encounter'. I can walk towards the area where I believe the bus to be in order to bring the entity more fully into my phenomenal world. Or I can wait until the entity generating the lights moves closer to me and more fully enters my phenomenal world.

Finally, I want to connect this discussion of perception with that of information in the previous chapter. The categories of 'information' and 'perception' are in fact

two ways of looking at the same thing. Information, as I said in the previous chapter, is any experience in my phenomenal world which I treat as an indicator pointing to other entities or potentialities for experience which are not currently in my phenomenal world. In this conception of information, the direct experience in my phenomenal world is also the 'datum' in perception, and the treatment of that experience as an indicator is also the 'judgment in perception.

**Chapters 29-31 are not yet written. So the chapter below is numbered 32.
CHAPTER 32. CAUSAL EXPLANATION AND CO-VARIATION.**

Now I want to look at some examples of cause and effect. In doing so I want to emphasize the idea of causes as powers or beings 'behind' the experiences or effects appearing our phenomenal world which we use to explain those experiences.

Behind the voices which I hear in this room, for example, are Jackie and Jennifer talking in the next room.

Behind the voice of a friend speaking sharply to me is his unhappiness or displeasure with me.

Behind the altered pointer readings which a scientist observes in a chemical experiment are changes in the chemicals used in the experiment. Now I want to delve a little deeper into the nature of 'causes'. The causes or beings behind our experiences need not be, and frequently are not, directly experiencable. Causes can be 'absolute theoretical entities'. They can, that is, be outside our experience and capable of entering our experience only via effects mediated through other beings.

Moreover, in explaining our experiences in terms of the beings behind them, we need not restrict ourselves a-priori to any one kind of being such as 'material beings'. Causal powers need not be of any particular character. They may be material, energetic, spiritual, physical, mental, emotional, or otherwise. To be a causal power is simply to have - and exercise - the power to enter into and produce an effect in the phenomenal world of some other being. Jackie and Jennifer, for example, are able to produce effects in my phenomenal world.

Sunlight is able to produce effects in my phenomenal world.

And it may be that God or spiritual beings are able to produce effects in at least the mental portion of my phenomenal world.

The particular beings or causes behind our experiences should not be decided

upon a-priori, but rather by open-minded inquiry and experimentation.

We may choose to attribute an experience to a causal power which is material, energetic, spiritual, or of some other kind. But regardless of the being to which we attribute an experience, the criteria of falsifiability and the methods for testing the truth of our ideas need to be borne in mind.

Co-variation and Causality

Before I continue I want to emphasize an essential claim of this model of cause and effect. This is the claim that all causes or powers are outside our direct experience.

It may seem that this claim is too sweeping. What if I see someone accidentally tip over a glass with his or her hand? Haven't I seen both the effect (the tipped-over glass) and the cause (the hand tipping it over)? The answer to this is 'no'.

What I have directly experienced is a 'co-variation' in my phenomenal world of two presentations. I have seen a glass tipping over (one presentation) and I have seen a hand near or overlapping the glass (the other presentation)).

Because these two presentations 'co-vary' or come together, and because I impute to hands a 'tipping-over' power as a result of previous experiences with them, I assume that it was the power of the hand that tipped over the glass.

This 'tipping-over' power of the hand, like all powers or causes, is behind the scenes. I assume that the 'tipping-over' power is in the hand but I do not see it. By contrast, if a small leaf blew in the window, touched the glass, and the glass suddenly tipped-over, I would be amazed. I would not automatically assume that the leaf had tipped-over the glass but would look for other explanations. I would seek these other explanations because I do not ordinarily impute the power to tip-over glasses to leaves.

I have, I hope, succeeded in giving you at least a basic understanding of what I mean by 'cause and effect', and by co- variation.

Causal Explanation

Now I want to turn to 'causal explanation'. By 'causal explanation,' I mean explanation concerned with identifying the noumena or powers behind our experiences. When we engage in causal explanation, we attempt to account for our experiences or those of others in terms of causes and effects. We attempt, that is, to explain our experiences or those of others as effects resulting from causes or powers 'behind the scenes' which are responsible for those

experiences. But since the causes or noumena behind our experiences are outside our experiences, we must depend on our powers of creative imagination to model the beings or causes which lie behind - and produce - our experiences.

Suppose I hear Jackie and Jennifer's voices coming from the next room. I can use my creative imagination, working as reason, to formulate a number of hypotheses as to the beings or entities behind these sounds.

One hypothesis is that Jackie and Jennifer talking in the next room are the causes or powers behind the sounds of the voices.

Another hypothesis is that other people who sound like Jackie and Jennifer are the causes or powers behind the sounds of the voices.

Still another hypothesis is that Jackie and Jennifer have turned on a tape-recording of their voices.

Now suppose I have what I take to be an encounter or experience of God or the sacred dimension. Here too I can formulate a number of explanatory hypotheses.

One hypothesis is that God or the sacred is the cause or power behind the experience.

Another is that the cause or power behind the experience is some portion of my own mind which I do not ordinarily encounter.

And still another hypotheses is that it is neither my own mind nor God or the sacred but some other entity which is the power or cause behind the experience.

It should also be pointed out that a noumena or cause may or may not be capable of extension into a particular phenomenal world. So that God, if God exists, may only appear in the phenomenal worlds or mental spaces of those with appropriate capacities of perception, just as colour can only appear in the perceptions of those with colour vision.

Testing Causal Explanations.

Now I want to discuss the issue of testing causal explanations.

One important method of testing causal explanations is what scientists call the hypothetico-deductive method. This method involves deducing and checking for other phenomenal consequences of the inferred causal noumena in one or more phenomenal worlds. (This paragraph to be continued.)

There can be varying degrees of certainty in causal explanations. These can range from great uncertainty up to practical certitude. But we cannot ever have absolute certainty in identifying the causes behind experience. This is because causal explanations point to powers or causes which are in fact outside our experience.

The power behind what I take to be Jackie and Jennifer talking in the next room may not be Jackie and Jennifer but other people with similar voices, or even a tape recorder which Jackie and Jennifer have put on as a joke.

Changes in my pointer readings during a chemistry experiment may be caused not by chemical changes but by malfunctions in the equipment or other factors.

A friend may speak sharply to me not, as I think, because he is displeased with me but because he just thought of a painful incident in his past which has nothing to do with me.

The character of our direct experience is generally easier to determine than the character of the causes behind that experience. I can be relatively certain that I hear voices from the next room, or that the pointer reading changes during a chemical experiment, or that my friend spoke sharply to me. But the causes or powers behind these or other experiences, while we can gain a measure of practical certitude about them, necessarily remain less certain.

CHAPTER 33: FALSIFIABLE AND NON-FALSIFIABLE CLAIMS.

This chapter is not complete.

In this chapter I want to introduce a concept which a friend of mine once termed "one of the most enlightening ideas that the human mind can ever receive." This is the concept of 'falsifiability'.

The concept of falsifiability was introduced into philosophy of science by Karl Popper earlier in this century. It states that to qualify as valid a knowledge concept or piece of information must be 'falsifiable'. By 'falsifiable', I mean that a knowledge concept must directly or indirectly tell us what evidence or experience would be necessary to demonstrate that it is false.

Suppose I tell you that the sun is shining outside. This is a falsifiable knowledge concept. It is falsifiable in that it tells you, in effect, what evidence would be necessary to demonstrate that it is false. It tells you that you can go outside to see whether there is in fact a bright disk shining in the sky.

Or consider a conversation I once had with an anti-Semite who said that Jews control the banking system of the United States. I asked him how he knew this.

"Look," he said, "at the Rockefeller family. They're Jews and they control many banks and oil companies."

"Wait," I replied, "the Rockefeller s are not Jews but Protestants. "

At first he refused to believe me. But when I cited various facts he retracted his original statement and said: "It doesn't matter whether the Rockefeller s are Jews or not - because their advisers must be Jews."

I assume that if I had somehow convinced him that the advisers weren't Jews he would have clung to the view that nevertheless Jews are somehow behind the Rockefeller s and the U.S. Banking system.

This man's view of Jews was not falsifiable. It was not falsifiable because it was not controlled or correctable by evidence. On the contrary, evidence or experience was simply ignored or used to support the view where possible and was rationalized away and replaced with other assumptions where the evidence could not be ignored or rationalized away.

From the perspective of the criteria of falsifiability, any knowledge concept which cannot be falsified by evidence, either because of our bias or because it is so formulated that nothing would count as evidence against it, is not knowledge. (This chapter to be expanded.)

CHAPTER 34: HOW KNOWLEDGE IS BUILT (PART 1):

Introduction To Reason And The Creative Imagination.

Until now I have examined knowledge primarily in terms of its nature and of how its truth may be tested. But there is another important other side to knowledge. This is the side of how knowledge is produced in the first place. Before knowledge can be tested it must first exist. How, then, does knowledge come into existence?

In broad terms knowledge is built in our minds by the power of reason working on our experiences. This power of reason is in turn a particular application of a broader power which is the human imagination. In this sense reason might be described as "rational imagination". In this chapter I want to briefly define imagination and survey its various applications before explaining its use as reason in building our knowledge and models of the world.

The subject of human imagination is a vast and, I think, still relatively unexplored continent. I will here be able to touch on only a number of cardinal points. To begin with I want to define imagination. By 'imagination', I mean the mental power which we use to generate images or forms in our minds. Imagination is the 'image-generating power'. The experiences generated by this power consist, like all other experiences, of forms. The forms which appear in the 'imaginal world'

may be visual, auditory, kinesthetic, olfactory, or taste forms. They may also involve 'pure concept' forms, emotional forms, subtle energies of a spiritual or other nature, and so forth.

The Economic Advantages of Imagination

These forms or images generated by imagination in our minds have one great advantage over all others. They are far more amenable to our wills, and therefore far more economical to produce, than other kinds of experiences.

It is, for example, far easier to build a mental house than to build an actual house.

It is easier to dismiss the thought of Jackie and Jennifer being in my presence than to get the actual Jackie and Jennifer to leave my presence.

It is easier to imagine myself living on another planet than to actually go to another planet and live there.

There are exceptions such as painful emotional states or obsessive thoughts which may strongly resist my will. But generally my mental images or experiences display far greater plasticity and willingness to conform to my wishes than other experiences involving other kinds of entities.

The Uses of Imagination

Now I want to discuss the uses to which imagination can be put.

Imagination, and the mental images or forms it produces, may be used for many purposes. There is, to begin with, what might be termed 'imagination for its own sake'. This is the realm of experiences, stories, fantasies, and worlds existing, and thought and intended by the imager to exist, only in the imagination. The world of 'imagination for its own sake' is, to a considerable degree, a 'play world'. It is a world from which, properly used, both children and adults can derive tremendous pleasure and satisfaction.

Another important aspect of imagination is what the psychologists Roberto Assagioli and Karl Jung have referred to as the realm of 'sub-selves' or 'sub-personalities'. Such 'sub-selves' or 'sub-personalities' exist in most human beings as semi-autonomous systems within the personality and can under appropriate therapeutic or other conditions appear in the mind as imaginal entities or beings with their own distinct characters. These imaginal beings can be addressed by the experience within his or her mind and will respond from their own, albeit imaginal, character. In this way a relationship of dialogue, and of improved communication and gradual integration of sub-selves within the human personality can take place.

Another use to which imagination, and the images it produces, may be put is what

might be called 'conscious imagination for personal or spiritual development'. Meditating on an image of Christ, contemplating the character of Buddha, or focusing on some other ideal for one's own being or development are all instances of 'conscious imagination for personal or spiritual development'. So too are the imaginal exercises intended to prepare people to perceive and influence the 'subtle', 'energetic', and 'spiritual' bodies said to exist in and around their physical bodies.

An additional use of conscious imagination for personal development is the conscious rehearsal and perfecting of various kinds of social or physical performances. This use of imagination is exemplified by the title of the well-known book 'The Inner Game of Tennis'.

Another, and exceedingly important, use of imagination is for the production of knowledge. This use of imagination is the one I will focus on here, as my primary concern with imagination in this book is with its use in the production of knowledge and information.

All knowledge and all information are in one sense products of the human imagination. The experiences or images generated by imagination serve as knowledge or information when we treat them as indicators pointing to other possibilities for experience in the wider world beyond the images.

This specialized use of imagination is the use of imagination as 'rational imagination', as a 'connecting power' for relating our experiences to one another. This use of imagination will be discussed in the next chapter.

CHAPTER 35: HOW KNOWLEDGE IS BUILT (Part2): -

The use of external media in simulation and mental modeling.
This chapter is not Complete.

In the preceding chapter I explored the idea of imagination or mental modeling, which might also be called 'simulation'. By 'simulation', I mean the use of mental models to simulate the properties or beings of the world and the experiences they can generate by interacting. Such mental simulation, as mentioned earlier, is often far more economical or efficient than producing the real conditions which are being explored. In this chapter I want to broaden the discussion of simulation to include external media" such as writing or drawing, the use of computers, and physical models such as model airplanes. Such external media extend the power of our minds to simulate the properties and beings of the world and their interactive potentials. (This chapter to be expanded..)

CHAPTER 36: WORLDVIEWS AND PERSPECTIVES:

Introduction

In this chapter I turn to the important idea that every being has an individual perspective and an individual world view of its own.

A 'perspective' is the world as 'seen' by a particular being, on the basis of its own particular character, and from its own particular position in the world. The perspective of a being is made up of three elements. These three elements are the current experiences, the current beliefs, and the current purposes held by the being.

The first element in my perspective, then, is my 'experience'. By my 'experience', as explained in previous chapters, I mean anything I am currently undergoing or directly encountering in my 'inner' or 'outer' world. My experiences also tell me what the world actually contains.

The second element in my perspective is my 'beliefs' or my 'knowledges'. By my 'beliefs' or 'knowledges', as explained in previous chapters, I mean my suppositions about the possibilities for experience to be found in my world. My beliefs are my assumptions that my inner or outer world holds particular potentialities for my experience or that of other beings.

The third element in my perspective is my 'purposes'. By my 'purposes', I mean my desires to elicit some of these potentialities for experience which I believe my inner or outer world holds, and to avoid others.

Experience, in other words, is 'what I bump into', belief is what I 'think is there to bump into', and purpose is 'what I want or don't want to bump into'. Now let's look at an example of a being's perspective as its experience, beliefs, and purposes.

Suppose I expect Jackie and Jennifer at six p.m. And exactly at six I hear the doorbell ring. My 'current experience' is the doorbell sound; my 'current belief' is that Jackie and Jennifer are the beings behind the sound and are ringing the bell; and my 'current purpose' is to answer the door and bring Jackie and Jennifer into my phenomenal world. Taken together, my experience, belief, and purpose constitute my perspective on the doorbell sound.

The concept of perspective emphasizes that a being's experiences, beliefs, and purposes arise from its particular position or place in the world. The total perspective of a being is the totality of its current individual orientation towards its world as a whole. Within this total perspective, there are particular perspectives which represent the particular orientations of the being towards particular parts of its world.

There is, for example, 'my perspective regarding Jackie and Jennifer', 'my perspective regarding what I'd like us to eat for dinner', 'my perspective on love', or 'my perspective on the world's super-powers'.

WORLDVIEWS

Now I want to relate perspectives to 'worldviews'. A being's perspective may be divided into two parts. On the one hand there are its current experiences. On the other hand there are the beliefs and purposes which the being holds in regard to these current experiences and in regard to the world's other potentialities for experience. Considered apart from its current experiences, a being's beliefs and purposes are its world view. By a 'world view', then, I mean all of a being's current beliefs and purposes in relation to its world.

Christianity, Marxism, and Buddhism are often said to be 'worldviews'. This is because each of them attempts to provide an integrated total view, an integrated set of beliefs and purposes, through which to orient towards the world. But regardless of whether we subscribe to such 'integral' world-view systems, each of us has a world view. Each of us, that is, has a set of beliefs and purposes related to the world we live in.

Every Being Has A World view And A Perspective

I want to emphasize that this notion of worldviews and perspectives is not limited to human beings. Every being, or at least every living being, carries some experiences, beliefs, and purposes in relation to its world. This is true whether we think of an amoeba, an elephant, a tree, or a human being. All of them have worldviews because all of them have beliefs and purposes, at some level, about their world.

I distinguished a moment ago between worldviews, which are made up of beliefs and purposes, and perspectives, which contain beliefs, purposes, and experiences. An important reason for this distinction is that it allows us to test and improve our worldviews, by comparing our ideas and purposes to our experiences, as will be discussed later in this chapter. But for now I want to deepen my exploration of the nature of perspectives.

Perspectives Differ

In the social order of the universe each human, natural, or divine being has at each moment its own particular perspective. This perspective arises from a being's particular position within the universal network of interaction, and from the particular character which the being brings to its interactions. Since no two beings have identical characters, and since no two beings interact in identical ways, no two beings have identical perspectives. There are as many perspective as there

are beings in the universe.

Transpecting

In addition to relating to the world through our own worldviews or perspectives, we may also engage in 'transpecting'. By 'transpecting', I mean the act of reconstructing within our own worldviews or perspectives the world view or perspectives of other human or non-human beings.

This ability to transpect is, to a greater or lesser extent, a standard part of our operating system as human beings. We use it every time we imagine what someone is feeling or guess what their next action will be. Our transpecting abilities are, however, quite fallible, in that we may neglect to use them or we may misconstrue the perspective of another being due to failures of imagination or information.

In 'transpecting', we are, as it were, traveling into or crossing into the perspective of another human, natural, or divine being. It should be noted, however, that we cannot literally enter into another being's world view or perspective. 'The individuality of experience', as discussed earlier, rules out direct entry into the phenomenal worlds or perspectives of other beings.

I want to emphasize that, as an individual being, my world view or perspectives do not directly overlap with those of any other being. Just as beings do not directly share any of their experiences, so they do not directly share their worldviews or perspectives.

What transpecting in fact involves is not entering another perspective but the attempt to reconstruct that other perspective as a model within our own perspective. Transpecting is in fact modeling, and not actual participation in another being's experience or perspective.

This 'modeling-aspect' of transpecting accounts for the frequent errors we make in understanding the experiences, beliefs, purposes, motives, meanings, or ideas of other human and non-human beings.

It also points to the importance of getting explicit symbolic feedback from others regarding the character of their experiences, beliefs, purposes, motives, meanings, or ideas wherever these may be in doubt and it is important to us to know what these are.

Testing Our World views and Perspectives

The fact that every human being has his or her own world view and perspective does not mean that worldviews and perspectives cannot be tested and improved.

On the contrary, the beliefs and purposes found in our world views may be tested and modified by comparing them to the experiences we encounter as we move through the world. This is the process of 'world view inventing and testing' which in the broadest sense of the term might also be called 'inquiry'.

An important part of 'world view inventing and testing' or 'inquiry' is the use of reason to compare my actual experiences with my beliefs and purposes. I want to emphasize that my experience as such cannot be tested. My experience is simply what I actually encounter in my phenomenal world.

But the truth of my beliefs, and the viability of my purposes, can be tested against my actual experiences to the extent of my intellectual capabilities and my willingness to do so.

The truth of a belief, as discussed in a previous chapter, is its conformity or lack of conformity to the actual potentialities for experience held by the world.

The 'viability' of a purpose is the ability or inability of the world to deliver the experience which that purpose seeks.

As I interact with the world and spontaneously or intentionally elicit particular experiences from it, I can therefore successively refine and improve both the beliefs and the purposes found in my world view.

CHAPTER 37: MORE ON WORLD VIEWS AND PERSPECTIVES

The Structure of World Views

Every world view connects experience, belief, and purpose in particular ways. But there is no single way in which the experiences, beliefs, and purposes found together in a world view must be connected.

Suppose I experience finding a sum of money on the sidewalk in front of my house. This experience may be linked with any number of beliefs. It may be linked with believing that the millionaire across the street dropped it, or that children playing dropped it, or that a secret admirer left it for me.

The experience of finding the money may also be linked with any number of purposes. My purpose may be to return the money to the millionaire if I believe that he dropped it there. Or my purpose may be to give it back to the children if I believe that they left it there. Or my purpose may be to keep my find secret so that no one asks me for the money.

We see, then, that while experience, belief, and purpose are linked together in

worldviews, there is no particular kind of relationship which necessarily exists between them.

The General Pattern of Perspectives

There is, however, a general pattern which can generally be found in the relationships between experiences, beliefs, and purposes in worldviews. This general pattern is that our purposes or desires for particular kinds of experiences are generally based on our beliefs about the possibilities for experience which the world holds. And our beliefs about the possibilities for experiences which the world holds are generally based on our experiences or information regarding the experiences of others.

Suppose, for example, that I form the purpose of taking a walk in the park. Such a purpose would ordinarily be based on a belief. This belief is that the park exists and that I will find it a pleasant place to walk. My beliefs about the park would in turn be based on my previous experience of the park or on information I had received about it.

There is, then, a general 'functional dependency' between the experiences, beliefs, and purposes found together in a world view. This 'functional dependency' produces a 'strain' towards consistency between the elements of a world view. It is of course true that worldviews can also contain great inconsistencies, as when we go on believing something despite glaring evidence or experience to the contrary.

The Mutability of World Views

By 'the mutability of worldviews and perspectives', I mean that the experiences, beliefs, and purposes which make up a world view or perspective can change. Moreover, a change in one of these elements can produce a change in the other two elements due to their general interdependence.

Suppose I experience a doorbell sound which I believe signifies the arrival of my friends Jackie and Jennifer and I form the purpose of letting them in. If I open the door and find a salesperson there offering a product I am not interested in, this experience may lead me to change my belief from 'Jackie and Jennifer are at the door' to 'a salesperson is at the door'.

This change in belief may then lead me to change my purpose from 'letting Jackie and Jennifer in' to 'asking the salesperson to leave'.

Or suppose that while I am still walking towards the door to let Jackie and Jennifer in you tell me that you're sure it's actually Fred, a person I dislike talking to. This

information may lead me to change my belief from 'Jackie and Jennifer are at the door' to 'Fred is at the door'. This change in belief may lead me to change my purpose from 'answering the door' to 'letting you and not me answer the door'.

Finally, suppose I believe that you are playing the stereo at three in the morning and I want you to turn it off so I can sleep. I can change either my belief (that you are playing the stereo) or my purpose (that you turn it off so I can sleep).

CHAPTER 38: STILL MORE ON WORLD VIEWS AND PERSPECTIVES

Similarities and Differences in Perspectives

Perspectives and worldviews are made-up of experiences, beliefs, and purposes. These differ as we move from the world view or perspectives of one being to the next. In comparing the experiences, beliefs, and purposes held by any two human beings, for example, we will find both similarities and differences.

Suppose you and I both look at a tree. Our experiences may be similar in that they may include the impression of the tree as brown with green leaves and sunlight filtering through the branches. But our experiences of the tree may also differ.

One of us may be standing where blue-sky shows through the tree's leaves, for example, while the other sees only clouds through the part of the tree which he or she is viewing.

Or one of us may be colour-blind while the other can see the colours of the tree. Or one of us may see subtle shades or subtle energies around the tree while the other does not. There may also be similarities as well as differences in the beliefs we hold about the tree.

Our beliefs may be similar in that both of us may believe it to be a tree. But I, knowing as I do relatively little about the different species of trees, may not be able to identify the species of the tree. You, if you know more than I do about tree species, may believe the tree to be a maple tree. Moreover, if you are an aboriginal person or another person whose world view includes belief in nature spirits, your beliefs about the tree may include the idea that it is inhabited by tree spirits. Finally, there may be similarities as well as differences in the purposes we hold in relation to the tree.

Our purposes may be similar if, for example, we both want to see the tree preserved. But you may want to preserve the tree unless it becomes a serious threat to the survival of other important beings while I may be willing to cut it down if there is its the only convenient way to get kindling wood. Our purposes may also differ if one of us has the purpose of simply contemplating and enjoying the appearance of the tree while the other one wants to climb the tree. There are, then, both similarities and differences to be found in different world view or

perspectives. Such similarities and differences can be found even in such a simple matter as looking at a tree.

Building Common World Views

Human beings cannot, as already pointed out, actually hold the same perspectives or worldviews. In this sense the terms 'common perspective' or 'common world view' are misleading. I, as an individual being, have my experiences, beliefs, and purposes. You, as an individual being, have your experiences, beliefs, and purposes. However great the differences or similarities may be, our experiences, beliefs, and purposes remain our own.

Our worldviews or perspectives are not directly shared. It is also true, however, that the form of two perspectives or worldviews may be isomorphic or 'similar in form'. Our experience, beliefs, or purposes may, that is, may have parallel or similar forms. Such isomorphism or similarity of form is what I mean by a 'common perspective' or a 'common world view'.

Such commonalities or similarities in perspectives or worldviews are built-up in two ways. First, such similarities may be built-up through communication or diffusion of beliefs and purposes from one person or group to another. Second, they may be built through similarities in experiences which influence different individuals or groups to independently develop similar world view or perspectives.

Suppose John is a verbal bully. If you and I both have encountered his attempts to verbally bully us, our experiences of John as well as our beliefs and purposes in regard to him may well be similar. We may then be said to have formed a similar or common perspective on John.

Or suppose you and I both experience growing up in religious Jewish families. Our experiences, beliefs, and purposes regarding Judaism may well be similar.

Or suppose you and I both experience watching the same TV. programs depicting the planetary ecological crisis. Our experiences, beliefs, and purposes regarding that crisis may as a result also be similar.

In all of these cases our similar experiences may lead us to similar beliefs and purposes and hence to similar or common perspectives.

Now let's look at some cases where communication leads to common or similar world views. By 'communication', I mean as explained in an earlier chapter 'the transmission of form by means of interaction'.

Suppose I see you drinking water out of a glass and I have never done so. Your action therefore communicates a new possibility to me. If I model on your behavior by also drinking water out of a glass, I may well have a similar experience to yours and form similar beliefs and purposes in regard to the use of glasses for drinking. My modeling on you will, then, have led us to similar or

common perspectives regarding glasses.

Or suppose Jackie and Jennifer see a cat outside my house and formulate the purpose to feed it if it's hungry. If they want me to share the belief that there's a cat outside and to share the purpose of feeding it if it's hungry, they can say to me: "We saw a cat outside and we'd like you to help us feed it if it's hungry." If I believe them, and if I decide I would like to help feed the cat, Jackie and Jennifer will have succeeded in getting me to build a perspective similar to their own.

More complex perspectives, such as the beliefs and purposes making up Darwinian evolutionary theory, feminism, or Roman Catholicism may be similarly communicated from one individual to another by symbolic means. In addition, external media such as books or video films may be used to transmit the beliefs and purposes of a perspective or world view to large numbers of people.

Finally, a combination of both similar experiences and communication regarding those experiences may lead to common perspectives or worldviews.

Suppose two groups of people working at different places are unhappy with their wages and working conditions. If one group forms a trade union and thereby improves its wages and working conditions, and if it persuades the other group to also form a trade union, then the similar experiences and related communication between the two groups will have led to similar or common perspectives. Similar experiences and communication about those experiences can also lead to common perspectives when people find themselves in the same situations or do things together. In this case similarities of experience, and communication regarding these experiences, may arise together.

We see, then, that common perspectives or common worldviews can arise in a number of ways:

- 1) Similar experiences may lead people to independently also arrive at similar beliefs and purposes and therefore at similar perspectives.
- 2) Communication through modeling may lead people to interact with the world in similar ways and therefore to arrive at similar experiences, beliefs, and purposes.
- 3) Communication through symbolic means such as language may lead people to similar experiences, beliefs, and purposes and therefore at similar perspectives.
- 4) A combination of similar experiences and related communication may lead people to adopt similar beliefs and purposes and thereby arrive at similar perspectives.

CHAPTER 39: BUILDING A WORLD VIEW THAT PROMOTE BEING.

Every human being has a worldview and a perspective. But not every perspective or world view is equally true.

World Views and perspectives may be tested by the methods of reason and experience and shown to be more or less likely to be true.

The methods for this testing were outlined in the previous chapters on testing our knowledge and on falsification.

Distinguishing Between Experiences, Beliefs, and Purposes

In considering the truth or falsehood of a world view or perspective, we must be careful to distinguish between the experiences, beliefs, and purposes contained in it. I cannot falsify your experience, though I may question the accuracy of your reports about it, because experience is simply whatever you directly encounter.

I cannot falsify your purposes, though I may question whether they are optimal for promoting being, because your purposes are what you want from the world and are not what you think it contains.

Beliefs Can And Should Be Open To Testing And Falsification

Only beliefs, which purport to tell us what potentialities for experience the world contains, can be tested or falsified.

Suppose I think I'm hearing thunder and decide to take my umbrella with me when I leave my house for a walk. My actual experience is not the sound of thunder but simply a loud 'thunder-like' sound; my belief is that this sound is produced by an immanent rain-storm; and my purpose is to take my umbrella with me to avoid getting wet.

My experience cannot be falsified because the sound I experience is simply a direct experience.

My purpose to take the umbrella with me cannot be falsified because taking the umbrella is something I want to do rather than something I believe.

But my belief that a rainstorm is causing the loud sound can be falsified, as when I look across the street and notice a building demolition in progress.

The Example of DDT

Or consider a perspective which was common among biological scientists in the post-World-War-II period. This was the perspective that using the insecticide DDT would contribute to the general good of our world.

This perspective rested on the phenomenal co-variation of DDT's use and the suppression of malaria-carrying misquotes and other pests.

This co variation of DDT use and the reduction of malaria-carrying misquotes could not be falsified because it was an experience. The scientist's desire to contribute to the general good could not be falsified because it was a purpose.

But the idea that DDT would in fact contribute to the general good could be falsified because it was a theoretical concept. As DDT interacted over time with our world, it moved through and was concentrated by the food-chain. The result was that DDT ended by poisoning large numbers of living beings, and effecting virtually every living being on the planet in potentially negative ways never intended by those who introduced it.

Moreover, the result of its wide-spread use to control malaria- carrying mosquitoes was the appearance of new DDT-resistant strains of mosquitoes. Due to its reference to future experience, the perspective that DDT would promote the general good could be and in fact was falsified.

Building A World View That Promotes Being

Finally, I want to emphasize that our perspectives - our experiences, beliefs, and purposes - can be modified so as to promote greater being for ourselves as well as for the beings with whom we interact.

This subject of modifying our perspectives, and our interactions, will be delved into more deeply when we come to the chapters on the law of being and inquiry.

For now I just want to emphasize that openness to new experience and new information, and willingness to positively modify our perspectives as new experience and new information arise, is a key to moral, spiritual, and social progress and to the practice of loving intelligence which is the subject of this work.

Part Three: The Law of Being

CHAPTER 40. INTRODUCTION TO ARTA

I have now arrived at the point for discussion of 'Arta' or the law of being. This law is rooted in the fundamental character of our universe as a network or society of interacting beings. This network or society contains two basic principles.

On the one hand, there is the 'principle of individuality'. This is the principle that

the universe or 'universal network' is made up of individual beings. Each of these individual beings possesses its own particular character made up of its own individual potentialities for experience or being. Each of these individual beings also dwells in its own individual phenomenal world or world of experience.

On the other hand, there is in addition to this 'principle of individuality' a 'principle of interaction'. This 'principle of interaction' states that the beings of the universe can actualize their individual potentialities for experience or being only through the interactions or social relations between them.

Taken together, the principle of individuality and the principle of interaction yield a picture of our universe. It is a picture of a network or society of individual beings actualizing, or failing to actualize, their potentialities through their interactions. It is also a picture of a universe in which beings 'choose' states of experience or being for themselves and for one another through their interactions.

Such 'choices' are made in every situation, and by every being and set of beings. For in every situation, and for every being and set of beings, there is a range of possible interaction patterns, and a consequent range of possible experiences or states of being.

This range of possibilities may in each case be arrayed hierarchically from the least to most desirable. The least desirable option for a set of beings is the pattern of interactions which will elicit potentialities which least optimally promote the being of the interacting beings. The most desirable option is the pattern of interactions which will elicit the potentialities which most optimally promote the being of the interacting beings.

In between the least and most desirable options is a set of intermediate options or interaction patterns which will elicit potentialities which promote the being of the interacting beings to an intermediate degree.

This entire range of options - from least to most desirable - forms a 'composite Arta'. By a 'composite Arta', I mean the entire sphere of interactive possibilities for a situation, being, or set of beings.

Composite Arta

All things have a composite Arta. There is a composite Arta, a range of higher and lower options for interaction, for every set of beings whether human, natural, or divine.

There is a composite Arta for each grasshopper relating to a clump of grass. There is a composite Arta, a range of higher and lower possibilities for interaction, for each human conversation, relationship, institution, or community.

And there is a composite Arta, a range of higher and lower possibilities for interaction, for the overall planetary interaction system within which all the human,

natural, and divine beings of our world relate to one another.

Finally, there is a grand composite Arta, a range of higher and lower possibilities for interaction, for all the beings of the universe as a whole.

Primary Arta And Secondary Arta

Now I want to introduce a crucial distinction. Every composite Arta may be divided into a 'primary Arta' and a 'secondary Arta'. By a 'primary Arta', I mean the particular pattern of interactions for a situation, being, or set of beings which will optimally expand the being of those beings.

This primary Arta is informally referred to simply as 'the Arta' or for a situation, being, or set of beings. There is a primary Arta or optimal Arta for all things. There is an optimal Arta - an optimal pattern of interactions - for every set of beings whether human, natural, or divine.

In the human world, for example, there is an Arta for each human conversation, relationship, institution, or community. If, for example, I say, "I want to find the Arta for this relationship" I mean that I want to find the optimal pattern of interactions which will best promote the being of all those effected by the relationship.

In addition to the primary Arta, however, there is the 'secondary Arta'. By a 'secondary Arta', I mean all of the 'sub-optimal' possibilities which will to a greater or lesser extent fall short of optimal actualization of being.

The Universality of Arta

I want to emphasize the universality of 'primary Arta' and 'secondary Arta'.

For every set of beings whether human, natural, or divine there is a primary Arta and a secondary Arta.

The primary Arta is the interaction pattern which will optimally promote positive being or experience for the interacting beings.

The secondary Arta is a set of secondary options for interaction which will in one way or another fall short of the primary Arta, and whose consequences will be sub-optimal states of experience or being for the beings involved in that situation.

There is, then, a primary Arta and a secondary Arta for all things.

The Wrath of Arta

Now I want to focus briefly on the character of secondary Arta. Secondary Aortas are possible interaction patterns which, if realized, will produce sub-optimal states

of being or experience. Such secondary Aortas evoke, to a greater or lesser extent, the `wrath of Arta'. By the `wrath of Arta', I mean the unnecessary suffering or diminished being which results when some or all of the beings in an interaction achieve less than the optimal pattern of interaction.

Consider the failure of the western European allies to form a united front with the soviet union against Nazi Germany in 1939; the wrath of Arta, the penalty for failing to achieve an optimum pattern, was the world war which began shortly afterwards.

Or consider a couple which does not want another child but engages in sex without contraception. In this case the wrath of Arta may take the form of an unwanted pregnancy and the necessity of choosing between an abortion and an unwanted child.

Or consider a conversation in which a misunderstanding arises and in which the participants fail to take measures which are within their power to dispel the problem. In this case the wrath of Arta may take the form of unnecessary hurt feelings, future distrust between the people involved, or a broken friendship.

We see, then, that primary and secondary Aortas exist for all interactions and that `the wrath of Arta' is to a greater or lesser extent elicited whenever a secondary Arta is chosen.

Arta Within Beings

Now I want to clarify an important point. The law of Arta applies not only to the interactions between all beings; it applies also to the interactions within all compound beings.

Consider the case of an individual human being. There are Aortas for the interactions which take place within and between his/her body, mind, and `I' or self.

Or consider the case of a tree. There are Aortas for the interactions which take place within and between its roots, its leaves, and its trunk.

Or consider the earth seen as `gaia' or one compound being. There are Aortas for all the interactions between the human, natural, and divine beings which make it up.

The Particularity of Arta

I have already emphasized the universality of `the law'. It consists in the fact that for every set of beings whether human, natural, or divine there is a primary and secondary Arta.

Now I want to emphasize the 'particularity of the law'. It consists in the fact that the Arta for every situation, being, or set of beings is unique to that situation, being, or set of beings. There will of course be similarities between one Arta and another. These similarities are related to the similarities and differences in the nature of the beings involved. However, no situation, no being, and no set of beings can be absolutely identical with any other. There is therefore something of each Arta which is unlike every other.

Why The Arta Principal is Unique

The 'universality of the law' and the 'particularity of the law' sets Arta apart from other approaches to moral conduct. Its all- pervading universality means that there is one moral law which we may seek to follow in all situations. This law is the search for primary Arta. The particularity of the law means that Arta exists not in a world of abstractions but in the particular character and particular conditions of particular beings involved in particular situations.

Male And Female Reasoning

The 'universality of the law' and the 'particularity of the law' also bring together two distinct styles of moral reasoning. These styles are ones which have been termed 'male' and 'female' by some thinkers. Here I want to cite a landmark study by Carol Gilligan of female and male modes of moral reasoning and development.

In studying university students in the U.S. Gilligan found a significant distinction in the ways in which women and men reason, and develop their powers of reasoning, in the moral area.

Men developed by learning to apply abstract principles across various situations, while women developed by learning to immerse themselves imaginatively in the particular points of view within a given situation. The male approach was more 'monological', based on a principle which the men brought to the situation. The female principle was more 'dialogic', based on consideration of the various perspectives in the situation.

The principle of Arta combines both of these 'male' and 'female' modes of moral reasoning.

On the one hand, the search for primary Arta - or optimum interaction patterns - is a universal abstract principle. Learning to seek such patterns in all situations typifies the abstract moral reasoning Gilligan points to as the male mode.

On the other hand, the primary Arta - or optimum interaction pattern -for a particular situation is always concrete. It is based on the different points of view and different characters of the beings effected by each particular situation. Learning to seek Arta as a concrete particular pattern based on the particular beings in each situation typifies Giligan's 'female mode' of moral reasoning.

The search for primary Arta thereby combines the `male' and `female' modes of moral reasoning. It combines, that is, the commitment to a universal principle of optimal interaction for all beings in all situations with commitment to paying full attention to the particular beings and the particular perspectives within each situation.

Finally, I want to emphasize what might be called the `objectivity of Arta'. By `the objectivity of Arta', I mean that Arta exists as a reality, or more properly a set of potential realities, quite apart from our own beliefs or purposes. Our own beliefs or purposes may be more or less aligned with Arta. But Arta is not determined by them. Arta exists as the possibilities for experience or being laid down in the characters of beings.

CHAPTER 41. PRESCRIPTIVE AND DESCRIPTIVE ARTA

I have now placed before you a sketch of Arta, the law of being. This law states that for every interaction or interaction pattern, whether small or great, whether within or between beings, there is a primary and secondary Arta.

All interactions represent primary or secondary Aortas with corresponding consequences in the actualization or non-actualization of being.

In this chapter I want to advance my discussion of Arta by adding a crucial distinction. This is the distinction between `descriptive Arta' and `prescriptive Arta'. By `descriptive' Arta, I mean the description of a situation in terms of its primary and secondary Aortas. In producing a `descriptive Arta' our purpose is to discover, and to rank, the possibilities which a situation holds.

When completed, this `descriptive Arta' provides us with a map of the options within a situation; it also provides us with an indication of which options will optimally promote being and which will not.

Descriptive Arta, then, tells us about the possibilities in a situation. It does not, however, tell us what to do about those possibilities. For that we must turn to `prescriptive Arta'. By `prescriptive Arta', I mean the decision to seek being by seeking to discover and enact optimal patterns of interaction - patterns which will optimally promote our own being as well as that of the other beings we interact with. In a word, prescriptive Arta means choosing primary Arta.

Prescriptive Arta is a principle of universal responsibility embracing all beings human, natural, and divine. It tells us that there not only are possibilities for greater or lesser expansion of being in our interactions with other beings; it tells us to seek to know those possibilities and to actualize those which will optimally

promote being. In a word, prescriptive Arta is the ethical side of the law of being.

Arta, Egotism, And Altruism

To understand prescriptive Arta it may be helpful to contrast it to two other ways of orienting to the world. These other ways are egotism and altruism.

The egotist believes that the universe exists solely for the purpose of serving him or her. In any given situation the egotist will seek to discover and act upon his or her own needs or concerns - regardless of the effect on the other beings involved.

The altruist, by contrast, believes that he or she exists solely for the purpose of serving the universe. In any given situation the altruist will seek to discover and act upon the needs or concerns of the other beings involved - regardless of the effect upon his or her own needs and concerns.

Prescriptive Arta rejects both the altruist and egotist positions. It advises us to put neither ourselves nor others first. It proposes instead that we put being or Arta first.

What this means is that in each situation I seek to discover and optimally act upon both my own possibilities, needs, and concerns and the possibilities, needs, and concerns of the other beings I am interacting with. I seek, in other words, to discover and enact in each situation those interaction patterns which will optimally promote my own being as well that of the other beings I am interacting with.

Suppose, to cite a very simple example, that we want to decide what to eat for dinner. If I am an egotist, I will concern myself solely with discovering what I want for dinner and arranging matters so that I get it. If I am an altruist, I will concern myself solely with determining what you want for dinner and arranging matters so that you get it. But if I follow prescriptive Arta, I will concern myself with determining both what I want and what you want for dinner and seeking to arrange matters so that both your desires and mine are taken into account.

Seeking Arta In All Areas

This approach of seeking to discover and enact optimum interaction patterns between beings may be applied in all areas. Our interactions may be with human beings, natural beings, or the divine. But in all cases we may seek to discover and enact patterns which optimally promote the being and experience of interacting beings.

There is, as stated earlier, an optimum interaction pattern to be discovered and enacted for each situation, for each being, for each set of beings, for the beings who make up the interaction system of our planet as a whole, and for all the beings who make up the cosmos or universe.

CHAPTER 42: ARTA AND `THE GREATEST SUM OF MUTUALLY RECONCILABLE ACTUALIZATIONS

In this chapter I want to add an important refinement to my discussion of Arta. This refinement is that prescriptive Arta does not mean the greatest actualization possible for each being. Nor does it mean the maintenance or expansion of all beings. It means `the greatest sum of mutually reconcilable actualization's for all the beings effected by an interaction'.

What does this mean?

It means that maintenance or expansion for some beings involved in an interaction may necessitate restriction or elimination for others. Eliminating Nazi Germany was, for example, an `Artagrade' act from the standpoint of the greater Arta of the planet. The elimination of Aids is an Artagrade act from the standpoint of the greater Arta which takes account not only of the good of bacteria but the good of human beings.

Now I want to elaborate on the principle of `the greatest sum of mutually reconcilable actualization's'.

In seeking prescriptive Arta it is necessary to be concerned with the possibilities, needs, and concerns of the beings effected by our interactions.

Such concern is indispensable if we are to find the maximum `mutually reconcilable actualization's' for the beings effected by an interaction. But concern for all beings means that at times the being or experience of some beings, and perhaps one's own being or experience, must be sacrificed to support the being or experience of others.

I might, for example, be happier continuing an unbroken sleep through the night. But if my child is crying in his or her room, I may choose to sacrifice my own being or experience to support theirs.

It also remains true that `so that some may eat and live, others must serve as food and die.' and it remains true that `so that some experiences or states of being may be enjoyed, others must be given up.' If I want to take a walk with you through the woods, I cannot be at home playing with my child at the same time.

The `art' of Arta is in finding interaction patterns which combine the least possible sacrifice of life or being with the greatest possible expansion of life or being.

Arta, Pacifism, And The Tender-Minded Approach

The principle of `maximum mutually reconcilable actualization's' sets prescriptive

Arta apart from principled pacifism. It also sets it apart from a consistently tender-minded stance to the world.

Prescriptive Arta, pacifism, and the tender-minded approach are all concerned with the protection and nurturing of beings. But pacifism and the tender-minded approach reject violence and harsh measures in principle.

Prescriptive Arta does not. It views violence and harsh measures as last resorts which may be legitimately employed for the defense of being in certain cases.

Suppose a friend of mine is victimized by a rape-attempt and adamantly refuses to report it to the police. This circumstance may call for the non-tender-minded statement that "if you don't report this rape-attempt, then I will report it whether you like it or not so that other women will not be victimized."

Or consider the issue of armed force. A pacifist army is by definition out of the question. But an army fighting in the defense of being, or of Arta, is not. The forces which fought and defeated fascism during the second world war fall into this category of an army fighting for being.

CHAPTER 43. ARTA AND ANARTA

My discussion in the previous chapter pointed out that Arta is not, and cannot be, a consistently tender-minded approach which conserves all beings and all positive possibilities. Arta is, rather, the greatest sum of mutually reconcilable actualization's of being. This means that in any moment some possibilities, and in some moments some beings, must be sacrificed for the greater good.

In this very short chapter I want to take this critique of the tender-minded approach a step forward by introducing the concept of `AnArta'. By `AnArta', I mean any pattern of interactions which serves as a barrier to Arta or optimum interactions between beings.

Sexism, racism, spec-ism, class ism, ageism, exploitation, neurosis, dogmatism, lack of compassion, ignorance of the nature of being, and ignorance of the means of upholding being, are all examples of `anArta'. They are barriers to beings interacting or working together to optimally promote one another's being.

Those who follow the way of being uphold and work for Arta and they oppose and work against AnArta.

CHAPTER 44. ARTA AND THE PRIMACY OF BEING

In this extremely short chapter I want to discuss a principle which is implicit in all I

have written about Arta. This is the principle of 'the primacy of being'. By 'the primacy of being', I mean the choice to put being first. Those who choose to apply prescriptive Arta are making this choice. This choice means evaluating other values, patterns, or possibilities - whether within us or without us - in terms of how well they serve being. Those who choose to make being primary are choosing to subordinate other purposes to being. They are choosing not to be guided only by existing personal or cultural patterns or traditions but to assess whether these patterns, or alternately some other arrangement, will more optimally serve being.

Now I invite you to try 'the worldview intramural'. This entrant is, I think, best said aloud somewhat slowly and thoughtfully, it should not be recited automatically or by rote. I would also suggest leaving a brief pause after each sentence to allow its full meaning to 'sink-in':

"I am not my worldview: I am not my experiences, beliefs, or purposes. My experiences, beliefs, and purposes are my instruments which I use to interact with other beings to promote their being as well as my own. I therefore make myself free to work to create, preserve, or eliminate experiences, beliefs, and purposes as these support or oppose being."

CHAPTER 45. THE BEING THEORY OF VALUE

In this chapter I want to introduce a corollary of 'the primacy of being' which might be called 'the being theory of value'. By 'the being theory of value', I mean the principle that the value of any experience, belief, purpose, or activity is the contribution it makes to being.

Knowledge of antibiotics, for example, is ordinarily considered to be more valuable than, say, knowledge of what the neighbors eat for dinner yesterday.

It is considered more valuable because an anti-biotic might contribute to saving the life of your child whereas knowledge of the neighbors culinary habits ordinarily would not.

Or suppose you have a choice to sit bored in your house or to go out to a park where you can enjoy yourself by rolling down a hill or swinging on the swings. Going out to the park might well be the more being-promoting choice. (This chapter to be continued.)

CHAPTER 46. ARTA AND ETHICS

In this chapter I want to apply the primacy of being, or prescriptive Arta, in the area of ethics. The law of Arta is, at least from my perspective, the real foundation for all valid ethical principles and behavior. I find that ethics is, or at least ought to

be, the search for interaction patterns which optimally promote the being or experience of interacting beings. All more particular ethical principles flow from this one. 'Thou shalt not steal', 'thou shalt not lie', 'thou shalt not murder', and 'thou shalt not undermine the ecological integrity of the planet' all derive their validity as moral principles from the fact that they generally uphold being.

Such behaviors as kindness, charity, and the extension of compassion and love to others whenever possible also derive their ethical validity from the fact that they too uphold being. What makes such principles and behaviors ethical in character is that they represent interaction patterns which tend to optimally promote the being or experience of interacting beings.

Arta Is The Measure of Ethics

Now I want to introduce the idea that the law of Arta is not only the foundation of other valid ethical principles; it is also the means of judging both their validity and applicability. Other more particular ethical principles may be thought of as useful 'rules-of-thumb' in the service of Arta or being. By a 'rule-of-thumb', I mean a rule which tells us that in a particular kind of situation it is generally best to act in a particular way.

If I am confronted with an opportunity to steal someone else property, for example, the-rule-of-thumb 'thou shalt not steal' tells me that it is generally best not to do it.

What makes an ethical principle valid as a rule-of-thumb is that following it usually leads to interactions which promote being more than not following it would. Unlike absolutes, however, rules-of-thumb are not universally valid. We use ethical rules of thumb because they usually provide correct guidance, and because it would be too difficult, too much work, and we would be too prone to error, if in each case we had to work out basic ground rules for ethical conduct.

Exceptions To Ethical 'Rules-of-Thumb'

There are, however, definite exceptions to our ethical-rules-of-thumb. 'Thou shalt not kill', for example, is without doubt an essential moral principle of human social life. But suppose you come upon a maniac and take his or her life to prevent the slaughter of a group of other human beings. Most people would say that if there is really no other way it is moral to take the disturbed person's life and immoral or questionable to allow the other people to die as a result of not taking the disturbed person's life. The ultimate basis for this judgment is that following the rule-of-thumb against killing would in this case not promote being but diminish it. Here prescriptive Arta, or the search for interaction patterns which optimally promote the being or experience of interacting beings, is used to over-turn the application of a rule of thumb which would in this case diminish being.

Or consider the ethical principle that 'thou shalt not steal' . This principle tells me

that it is usually better not to steal. But suppose the only way to save a starving child's life is to steal food from a supermarket? Most people would say that if there is really no other way it is moral to steal the food from the supermarket and immoral or questionable to allow the child to die as a result of not stealing the food. The ultimate basis for this judgment is that following the rule-of-thumb against stealing would in this case not promote being but diminish it. Here prescriptive Arta, or the search for interaction patterns which optimally promote the being or experience of interacting beings, is used to over-turn the application of a rule of thumb which would in this case diminish being.

Ethics Draw Their Validity From Conformity to Arta

It is, then, from the law of Arta that other ethical principles derive their applicability. They are applicable so long as - and only so long as - they serve to promote optimum experience or being for interacting beings.

The validity of other ethical principles is also derived from the law of Arta. By 'the validity of other ethical principles', I mean their fitness to serve as ethical principles or rules-of-thumb in the first place. From the perspective of prescriptive Arta, ethical principles or rules-of-thumb ought to be adopted only if they effectively promote optimum interactions between beings.

Consider the custom of burning women thought to be witches during the European middle ages. Or the custom of immolating widows on their husbands funeral pyres in pre-colonial India. Both of these practices were at one time thought by the cultures which practiced them to embody important ethical or moral principles. Rather few would, however, argue today to bring them back. The resistance to re-introducing such practices as 'witch-burning' is, at bottom, the sense that ethical principles or rules-of-thumb ought to be adopted only if they represent interaction patterns which contribute to optimum experience or being for beings. In short, people no longer want to burn women because they have become convinced that the suffering and diminution of being which this brings is in no way compensated for by any greater promotion of being through this action.

Finally, I want to conclude this chapter with a brief comment on the ethical implications of the the currently popular school of 'deconstructionism' propounded by Derrida and others. My comment could be viewed as an attempt to "deconstruct deconstructionism". My view is that by reducing - or attempting to reduce - the world to a series of interpretations, deconstructionism amounts to a sophisticated form of solipsism, which: 1) in effect denies the existence of other beings; and 2) thereby negates any possibility of serious moral engagement or concern for those other beings whether human, natural, or divine which surround us and which actually exist quite independently of us or our interpretations of them.

CHAPTER 47. ARTA AND FREEDOM, JUSTICE, EQUALITY, FORMS OF DECISION-MAKING, AND DEGREES OF CENTRALIZATION

In the previous chapter I proposed that ethical principles derive their applicability and validity from the contributions which they make to Arta or being. Other ethical principles are not 'written in stone' but are 'rules-of-thumb' for promoting being. They remain valid and applicable so long as - and only so long as - they effectively contribute to interaction patterns which optimally promote the being or experience of interacting beings.

This argument applies also, I think, to 'political ethics'. It applies, that is, to such principles as freedom, justice, and equality.

The political progress of our world is to be marked in no small measure in the the development of such concepts as freedom, justice, and equality, and in their extension into new areas of social life. These principles have made, and continue to make, an essential contribution to the ability of human beings to work together and co-operate in ways which mutually promote their beings.

But principles such as freedom, justice, and equality are not ends in themselves. They are valid and applicable so long as -and only so long as - they effectively contribute to interaction patterns which optimally promote the being or experience of interacting beings.

My freedom to swing my fist, for example, ends or ought to end somewhere short of the beginning of your nose. My equality with you may stop somewhere short of my equal right to enter and use your apartment. And my right to justice may stop somewhere short of my right to take every social slight I encounter to court.

Now I want to briefly touch on two other issues in political ethics. These issues are 1) how political decisions should be made and 2) the degree of centralization or decentralization of political and other social institutions which is desirable.

Positions regarding these two issues are generally rigidified. People commonly argue that there is one form of political decision-making which is universally correct. They also commonly argue that there is one degree of centralization or decentralization of political and social institutions which is universally correct.

Some schools of thought argue that people should always arrive at their political decisions by consensus; some schools of thought argue that people should always arrive at their political decisions by the use of representative decision-making institutions such as parliaments or elected committees; and some schools of thought argue that people should always arrive at their political decisions by some other kind of decision-making system such as committees of experts.

There are also schools of thought which argue that centralization of political and social institutions is always better, just as there are schools of thought which argue that decentralization of political and social institutions is always better.

What I want to suggest here is that political decision-making methods and degrees of centralization or decentralization are not ends in themselves. They are, like other ethical decisions, means to promote being. As such there cannot be any absolute principles regarding them. Rather, we must in each case inquire into what would best serve the being of those beings who will be effected by our decision-making systems and by the degree of centralization or decentralization in our political and social institutions.

Before passing on I want to make one additional comment on the relationship between prescriptive Arta and political ethics.

Enshrined in the Laissez-faire fair economic doctrines of most modern industrial or post-industrial societies is a central principle. This is the principle that identifies 'individuals pursuing their own self-interest' with 'the good of all'. In promoting the pursuit of self-interest as the ultimate good such societies in effect promote selfishness.

Prescriptive Arta stands against such market-based morality. It advises us, as previously discussed, to be neither an altruist nor an egotist. It advises instead that we seek to discover and enact interaction patterns which optimally take into account both our own possibilities and concerns and the possibilities and concerns of the other beings we are interacting with.

The choice of egotism, altruism, or primary Arta is always present. It is a more crucial choice in some cases than in others - but it is always present. Our moral, spiritual, and social development as human beings depends upon our increasing awareness of this choice and on how we respond to it.

CHAPTER 48. ARTA AND THE BEING-VALUE OF INFORMATION

In this chapter I want to introduce a key idea. This idea is that the value of any piece of information is its ability to help us to promote being. In a previous chapter I defined information as any direct experience encountered by a being and treated by it as an indicator pointing to other possibilities for experience.

Suppose, for example, I encounter a barking sound. This sound, taken as a bare presentation or experience, is not yet information. But if I treat the barking sound as an 'indicator' pointing to the possibility that a dog is nearby, I have converted, as it were, the sound into information.

In this chapter I will be exploring the relationship between prescriptive Arta, or the search for optimal being-promoting patterns of interaction, and information.

My first move in this direction is to suggest that the value of any piece of information is proportionate to its ability to help us to promote being. I want, however, to immediately add the caveat that the being-value of information may not be in the information taken by itself but rather in its ability to be combined with other information in the mind of the recipient or in the minds of other actors.

Finally, I want to note that the value of information is relative to the being or set of beings receiving it. The means of cognition and means of conation of those beings determine whether and in what ways it can be used. $E=mc^2$ would, for example, have meant little to most people on the planet at the time Einstein developed the equation.

CHAPTER 49: ARTA AND INFORMATIONAL ETHICS

In simpler social periods 'thou shalt not lie' and 'thou shalt not bear false witness' were central ethical principles for human information processing.

Today we still - possibly more than ever - need to build a society in which these basic principles can be actualized in order to build and maintain trust between human beings.

At the same time, however, the greater complexity of our world requires a commensurately greater or more elaborated ethic for human information processing. In classical Greece 2200 years ago the number of different vocations or slots in the division of labour was something like 30. There were, that is, 30 or so different kinds of jobs that people performed. The society - and the people and social and technical processes in it - were therefore relatively transparent to the individual. He or she could discern through direct experience a great deal of what was taking place. By contrast, the U.S. Labour department estimated 20 years ago that there were approximately 20,000 slots in current division of labour. Such a vast array of jobs makes the contemporary social world unimaginably complex, and literally beyond the comprehension of any individual mind.

Adding to the difficulty is the reality that we have moved far away from the traditional societies in which people tended to primarily communicate with people from the same or similar ethnic backgrounds to their own. Today, we live in a far more complex society in which the vast majority of our information is socially acquired from other people, who may be quite different from ourselves in ethnic or sub-cultural background and/or vocation, and from media such as the internet, television, computer data-bases, books, and newspapers.

In such a world the accurate and proper use of language is an ethical

responsibility. By 'accurate and proper use of language', I do not mean the use of 'elegant language', 'educated talk', or 'grammatical niceties', though these all have their appropriate place in the world. I myself have always been fond of such 'non- educated' usages as 'you ain't nothin' but a hound dog', as found in the classic rock song of the same name. So my concern here is not primarily with the distinction between proper and improper usage, as conceived by English teachers or grammarians, but rather with something more basic. It is with language as a fundamental medium through which we may 'hear, and see, and know one another, and work together to promote being' that I am concerned.

In 'proper speech', as this concept is meant here, we show such qualities as:

Willingness to be asked for, and to provide, evidence for our assertions;

'Windows' or 'spaces' in our speech and attitudes which allow other people's views and feelings to be expressed;

Adequate precision and attention to both the accuracy and the recency of our information;

Willingness to listen to perspectives different than our own;

Respect for other people's expression of their life-choices when these are non-harmful;

Openness to new ideas and new experiences (where these are non-harmful)

Willingness to change our minds due to evidence, even when it is painful to admit our mistake.

Above all, proper speech is concerned to follow the dictum which writer William Covey has described as: "Seek first to understand (the other party) and only then to be understood."

Covey has also made the profoundly important point that in proper listening - and this might be extended to reading as well - we must get our own biography, our immediate concerns, our own way of relating to things, out of the way, in order to cognize, to see and take in, the total picture of the slice of the other person's life which is being presented.

All of these qualities of good communication, or their absence, show through not only in words but in the tone, the manner, and the gestures which accompany words.

The kind of speech which is being advocated here might be called 'intelligent communion' or 'commune-cation'. In this 'commune- ication' or proper speech we

seek to care for, understand, and work with one another to promote one another's being, as well that of the other beings of the world.

CHAPTER 50. TWO LEVELS OF ARTA PRACTICE

In this chapter I want to discuss a subject which is essential to the practical realization of Arta. This subject is what might be called 'the two levels of Arta-practice'.

The first of these levels is the Arta-practice aimed at interacting or working together in a way which promotes being. Such patterns of interaction, when achieved, produce optimum being-states or experience states for the beings thereby effected.

Suppose two people encounter each other for the first time on a bus, enjoy a friendly and mutually informative conversation, and then part company and never see each other again. Such a conversation may well be being-promoting for both people and, if it is so intended by both people, it is also an example of the first kind of Arta-practice. It is an interaction or a 'working together' in which we beings are promoting however, the Arta or being-promoting effect of the action in a sense stops with the action. In this first kind of Arta-practice one or more people are seeking to interact or work together to promote being.

Becoming Able to Work Together to Promote Being

The second kind of Arta-practice is that of actions or interactions which aim at creating conditions which allow us to become more able to interact or work together to promote one another's being. In this second kind of Arta-practice we seek to build up the 'means, media, tools, conditions, and channels of interaction' which will increase our ability to work together to promote one another's being. (This chapter to be expanded.)

CHAPTER 51: ARTA, HUMANISM, AND UNIVERSAL LAW

I do not have space or time here to explore all the connections between Arta and the other philosophic, religious, and humanistic currents in our world. I will simply note that, from my perspective, Arta, or optimal interactions for all beings, appears as the ultimate principle which underlies all other valid conceptions of 'universal law'. Such concepts of universal law are found in both aboriginal and world religions; in the western philosophic tradition including both Platonism and the ancient Stoic concept of natural law; and in humanism.

Arta And World Religions

Consider the relationship between Arta and, for example, the 10 commandments and emphasis on justice in Judaism; between Arta and the principal of Christian

love for others in Christianity; between Arta and the great Islamic emphasis on charity; between Arta and the Buddhist emphasis on right doing, non-harming, and non-attachment to particular forms; between Arta and the Hindu emphasis on Karma, social duty, and the vastness of the universe; between Arta and the Confucian ethic of expressing caring and propriety through optimum enactment of your social roles and relationships; between Arta and the Taoist emphasis on nature, on connection with nature and on balance, and finding the `true way' , in all things.

Or consider the relationship between Arta and Marxism, which at least in its theoretical form calls for a classless society, the elimination of economic exploitation of one person by another, and the planning of social production so that each person's needs can be optimally met, and so that each can develop to his or her maximum as a human being.

Arta And Humanism

Or consider the connection between Arta and humanism.

By `humanism', I mean those systems of belief and practice which seek to uphold the worth and dignity of humanity as a whole and of all individual human beings. In both its secular and religious forms, humanism has promoted freedom, equality, love, and concern for all human beings. It has also emphasized the use of reason, and in some of its versions science, in the understanding of the world and in its improvement.

Prescriptive Arta seeks to extend this humanist love of human beings to all beings, whether human, natural, or divine. It seeks, that is, to create interaction patterns between beings which promote not only our own being as human beings but that of all other beings as well. Arta is a principle of universal ethical responsibility towards all beings. This aspect of Arta can be expressed in a revised version of the Kantian maxim: "Treat all beings not only as means but as ends in themselves."

Finally, in addition to its other connection, Arta is related in various ways to the spirituality of aboriginal or native peoples.

There is, to cite just one example, a mystical vision reported by the American Indian seer black elk. Particularly significant in terms of parallels to Arta is black elk's image of a "shape of all shapes" - i.e., a pattern - whereby all beings must "live together as one being". Black elk's vision is, I think, a fitting way to end this section:

"Then I was standing on the highest mountain of them all, and round about beneath me was the whole hoop of the world. And while I stood here I saw more than I can tell and I understood more than I saw. For I was seeing in a sacred

manner the shapes of all things in the spirit, and the shape of all shapes as they must live together like one being. And I saw the sacred hoop of my people was one of many hoops that made one circle, wide as daylight and as starlight, and in the center grew one mighty flowering tree to shelter all the children of one mother and one father. And I saw that it was holy."

Part Four: Human Nature

CHAPTER 52: HUMAN NATURE INTRODUCTION: THE BODY-MIND-I SYSTEM

Now we come to the subject of human nature. The model of human nature set forth here goes under the name of 'the body- mind-I model'. This model is, at its present stage of development, somewhat 'rough-hewn'. It is also, like all aspects of this world view, subject to revision and improvement by further inquiry.

Be that as it may, the 'body-mind-I model' posits that each human being is composed of at least three elements or beings. These elements or beings are closely associated but distinct. They are 1) the body, 2) the mind, and 3) the self or 'I'.

Strictly speaking, this model applies only to human beings. However, I think it probable that there are analogous structures in other living, and to some extent non-living, beings. In the next few chapters I want to describe the three components of the human individual and to discuss the relationships between them.

Why I Am Not My Mind Or Body

But first, in this chapter, I would like to give you my reasons for suggesting that human individuals are composed on the one hand of an 'I' or self and on the other of a body and mind and are not self-identical ones. It is important to give you these reasons because in recent years a number of other approaches which treat the body, mind, and self as identical have gained currency.

There are schools of thought which hold, for example, that 'you are your body'; or that 'you are your body-mind system'; or that 'the I is an emergent or wholistic property of the bodymind,' or that 'the distinction between body and mind is a false dichotomy'.

Such approaches point correctly to complex, subtle, and previously overlooked connections between body, mind, and self or 'I'. But in claiming that bodies, minds, and selves are identical these approaches are, I think, ultimately muddled and misleading.

Now my reasons for contending that human individuals are composed of an 'I' or self on the one hand and a body and mind on the other.

My first reason is that 'I' am not my body or my mind. My evidence for this takes several forms. First, there is the ability of my self or 'I' to 'disidentify' with its mind and body and to experience them as separate from itself. Anything which I can disidentify with, and anything which can appear in my experience, is not me, as explained in the chapter on 'disidentificaiton'.

Other evidence for my mind and body as separate beings is that they conform to the criteria established earlier for identifying 'other beings', beings other than 'I'. The first of these criteria, as you may remember, is that 'other beings' lack complete amenability to my will. They display the fact that they are not 'I' by not always behaving as 'I' like. Both my body and mind demonstrate this trait to a significant degree.

My body, for example, works best when fed nutritious food although 'I' might prefer that it thrive on 'junk food'.

My mind at times produces thoughts which 'I' might prefer not to think about. And my mind and body together produce certain emotions - such as anger or sadness - which 'I' might prefer not to experience.

Such phenomena suggest that my body and mind have their own character, a character independent of my willing, and of my likes and dislikes. Such phenomena, which appear to operate independently of my will, suggest to me that 'I' am not the sole power or cause behind the phenomena I associate with my mind and body. They lead me to posit the existence of my mind and body as 'other beings'.

The Importance of Surprises

This impression that my body and mind are beings other than my 'self' is reinforced by the surprises they offer me.

I expect my body to take three days to recover from a bad flu; but the flu disappears after a day and a half.

I believe my body to possess adequate micro-nutrients; but a blood test shows that I am deficient in a particular vitamin.

I expect my mind to remember a certain fact or word; but it cannot do so. I believe my mind to be incapable of solving a particular problem; but it delivers a surprisingly effective answer.

Such surprises again suggest the existence of my body and mind as beings or

powers other than 'I' or my will. I posit my body and mind as these 'other beings' in order to explain those 'bodily' or 'mental' experiences which do not seem to be solely due to 'I' or my will.

In resisting my will, and in offering me surprises, my mind and body compel me to recognize, in practice if not in theory, that they exist with their own characters quite apart from 'I' or my will. The distinction between self on the one hand, and mind and body on the other, is also highlighted by the reports of 'out-of-the body' experiences and of 'after-death experiences'. Such reports point not only to the existence of the self as a being in its own right but to its possible ability to exist independently of its body and mind.

I have now placed before you a case for distinguishing minds and bodies from 'I's or selves. But, it might be objected, how do we know that the 'I' or self exists? How do we know that, in the words of some mystical and other religious schools, the 'I' or self is not merely a 'verbal convenience', a fictional entity without substantive existence? For my answer I turn to the fundamental character of experience itself.

My experience, as we saw earlier, is my encounter with the world as seen from my side of the encounter. What enables me to encounter my world, and to experience it, is precisely the fact that I exist as an individual being with a particular character. If I did not so exist, or if other beings did not so exist, I could have no experiences at all. For in that case my character would not be there to receive the impress of the other beings or potentialities of the world and their characters would not be there to be received or experienced by me.

I may encounter or experience the characters of other human, natural, or divine beings; I may encounter or experience the characters of my own mind or body: and I may even encounter or experience the character of the 'void' spoken of by those who present it as evidence that individual beings have no fundamental individual existence.

But whatever I experience, my experience depends on my existence as a particular being with a particular character able to encounter other beings, entities, or powers with their particular characters. To experience even the 'void', 'nothingness', or 'suchness' spoken of by those who deny the existence of the 'I', I must be there to encounter it.

If I am not there, I cannot encounter or experience anything. The correct formulation, I think, is that I have a mind (which I value and care for) but I am not my mind (but I am not my mind); I have a body (which I value and care for), but I am not my body.

"I Experience Therefore I Am."

"I think," said the philosopher Rene Descartes, "therefore I am." I propose that we update this in universal terms applicable to all beings: "I experience therefore I am."

CHAPTER 53. THE BODY-MIND-I SYSTEM: THE `I' OR SELF

In the previous chapter I presented my reasons for proposing that human individuals are composed of an `I' or self on the one hand and of a body and mind on the other. These reasons are that my body and mind have a character of their own and can resist `I' or my will; that my body and mind offer me surprises which do not stem from `I' or my will; and that my ability to experience other beings - including my ability to experience my own mind and body - requires the existence of my `I' or self as a separate individual being able to encounter and experience its world.

In this chapter I want to sketch the basic character of the human body-mind-I system. I begin with the `I' or self.

The `I' Is The Center of Awareness And Action

In the human individual the `I' is the primary center of awareness and action. There are other centers of awareness and action in the body-mind of a human being. But the `I' or self is the primary center and bears the primary responsibility for coordinating the body-mind-I system as a whole. I will discuss the central role of the `I' in the body-mind-I system in more detail in a later chapter. But for now I want to emphasize that to understand the `I' we must begin by recognizing that it is in fact a being and shares the general characteristics of beings.

The `I' has, for example, its own individual character consisting of the potentialities for experience which it carries. The `I' also dwells, like all beings, in its own individual phenomenal world. This phenomenal world consists of the `I's current experiences as these are generated by the interactions between its character and the character of the other beings it encounters. These `other beings' which the `I' encounters and experiences are, first its own mind and body or portions thereof, and secondly the other beings in the external world.

The Three Basic Powers of The `I'

In its encounters with its body and mind, and with the beings beyond them, the `I' displays `the three primary powers' which it, like all beings, possess. These three powers are:

- 1) cognition - the `I' cognizes or receives and is effected by its world;

2) conation - the `I' conates or effects its world;

3) processing - the `I' processes or fits the cognitions which it receives from its world to its own particular character.

Like other beings, the `I' also has a world view consisting of: 1) Its experiences which are its current encounters with the world; 2) Its beliefs which are its assumptions regarding the potentialities for further experiences which the world contains; and 3) Its purposes which are its desires to elicit some of the potentialities for experience which it believes the world to contain and its desires to avoid others.

The `I' Is Not The Personality Or Ego.

I want to emphasize that the `I' is not the personality or ego. The personality and ego reside not in the `I' but in the mind and body.

The personality and ego are a set of patterns built in the mind and body by the mind and body's interaction with the `I' on the one side and by their interaction with the wider world on the other side. The `I' is, in one sense, very much simpler than the personality or the mind and body. It is in fact a `simple' being or monad in the sense discussed in brief treatment of compound beings and simple beings in the second chapter.

The `I', like all simple or monadic beings, is inseparable into smaller units. This accounts for the inability of the `I' to encounter itself. If the `I' were a compound being composed of parts, its different parts could encounter one another, just as the `I' can encounter its mind and body or portions thereof. But since the `I' is a simple being, not divided into parts, it can never directly encounter itself.

The `I' Knows Itself By the Traces It Leaves

The `I' therefore knows itself not by direct encounter but by the `traces' or effects which its actions leave on the beings - including its own mind and body - around it. This inability of the `I' to directly encounter itself is why in certain states of meditation the `I' appears to `disappear'. These meditative states are ones in which the `I' is concerned with accepting or observing all of its experiences, rather than moving its experiences in any particular direction.

In such states of meditation, based on acceptance and observance, the `I's' ordinary activity is reduced; its traces or impacts on the beings around it are therefore also reduced; and - since its purpose in such meditations is to accept and observe rather than to effect or control - the `I's' motivation for noticing the impacts or resistances of its character in relation to other beings, or the impacts or resistances of other beings in relation to its character, is also reduced.

Consequently, the 'I' may receive the impression that it has ceased to exist. This impression arises inasmuch as the evidence for the 'I's existence is no longer present or noticed.

Once the individual leaves such meditative states, however, the sense of 'I'ness generally returns rather quickly. It returns because the character, purposes, impacts, and resistances of the 'I' are again actively conating/encountering the character, purposes, impacts, and resistances of the other beings of the world.

Before leaving this chapter I want to emphasize that in speaking about the human 'I' I have not been talking about the human mind or body. The 'I' is not a mind or body but a being able to experience, to interact with, and to observe its mind and body. Its experiences, and its general character are different from those of a mind and body.

The mental powers of the 'I', for example, are quite limited. The 'I' does most of its thinking not on its own but with the help of the human mind with which it is associated. The movement powers of the 'I' are also quite limited. The 'I' derives its powers of locomotion not primarily from its own abilities but from the human body with which it is associated. I have now set before you an introduction to the human 'I'. We have seen that the 'I' is the center of awareness and action in the human individual; that it shares the general powers such as cognition, conation, and processing possessed by beings; that it is a monad or simple being not made-up of parts; and that it is distinct from and unlike the body and mind with which it is associated. I will return to the 'I' when I discuss the inter-relations between the body, the mind, and the 'I'. For now, however, I want to turn to the mind.

CHAPTER 54: THE BODY-MIND-I SYSTEM: THE MIND.

In this chapter I discuss the mind, which is the second component of the body-mind-I system. The mind is the realm of such mental phenomena as thoughts, feelings, memories, certain subtle energies, and so forth. I want to emphasize from the outset that such mental entities or mental beings are not to be dismissed as unreal. The 'mental entities' which we encounter in our minds are quite real and have definite effects on us.

Distinguishing Mental Entities From Other Entities

At the same time mental entities and the experiences they engender differ in certain fundamental respects from other entities and experiences. Encounters with mental entities, for example, frequently lack the reality tone and vividness of our encounters with the external world. This absence of reality tone and vividness is one criteria which we use for distinguishing mental experiences from other

kinds of experiences.

But reality tone and vividness are not always a reliable means of distinguishing mental entities from other kinds of entities. Mental entities can dramatically drape themselves in visual, auditory, kinesthetic, or olfactory imagery. Such mental experiences can be as vivid or colourful as any we might encounter in the rest of the world. It is therefore not on the basis of reality tone or vividness alone that mental experiences can be definitively distinguished from other experiences.

The primary distinction between mental entities and other entities lies elsewhere. It lies in the greater amenability of mental entities to my will.

Experiences which are purely mental generally display greater plasticity and willingness to conform to my wishes than experiences involving other kinds of entities. There are exceptions such as painful emotional states or obsessive thoughts which may strongly resist my will. But generally my mental experiences are more responsive to my will than my other experiences.

It is, for example, easier to build a mental house on a mental empty lot than to build an actual house on an actual empty lot.

It is easier to dismiss the thought of Jackie and Jennifer being in my presence than to get the actual Jackie and Jennifer to leave my presence.

And it is easier to imagine myself as rich, famous, or happy than it is to actually become rich, famous, or happy.

Mental Entities Lack Externality

Besides greater amenability to will, mental entities are also distinguished from other entities by their inaccessibility to other beings. Non-mental entities generally have at least some degree of 'externality'. By 'externality', I mean that an entity is capable of appearing not only in my phenomenal world but in the phenomenal worlds of at least some other beings. Purely mental entities generally lack such externality. They are ordinarily unable to appear in other phenomenal worlds.

If I see an actual chair, for example, I may observe other people around me orienting to it by such behaviors as looking at it or sitting in it. This suggests to me that the chair is appearing not only in my phenomenal world but in theirs. This 'externality' of the chair is one of the ways that I know it is an actual chair.

But suppose a chair lacks externality. In that case I will not see the other people or beings around me sitting in the chair or otherwise orienting to it. Such absence of 'externality' will suggest to me that the chair is a mental chair and not an actual chair.

I want to emphasize that 'externality' does not mean that every non-mental entity I

encounter must appear in the phenomenal world's of other beings. I see no reason to rule out the possibility that non-mental entities may appear in only a few, and in some cases possibly in only one, phenomenal world.

But observing the orienting behavior of other beings towards entities which appear in my phenomenal world, or receiving their reports about their encounters with these entities, is still generally an important criteria for distinguishing purely mental entities from other kinds of entities.

It should be noted that if phenomena such as mental telepathy or 'mind-reading' exist, then mental phenomena would under certain conditions also have externality and be capable of appearing in more than one phenomenal world.

It remains true, however, that the ability or inability to appear in the phenomenal worlds of others is one criteria by which my purely mental experiences can ordinarily be distinguished from those involving other beings.

Now I want to pull together the discussion of mind so far. The mind is one of the three components of the human body-mind-I system. It is the realm of such mental phenomena as thoughts, feelings, memories, certain subtle energies, and so forth. What distinguishes this realm of experience from other realms of experience is that:

- 1) purely mental entities generally - though by no means always - display less 'reality tone' or vividness than experiences involving other beings;
- 2) purely mental entities generally - though not always - are more amenable to my will than experiences involving other beings; and
- 3) purely mental entities generally - though perhaps not always - are ones to which only I have access due to their lack of externality.

Conscious And Subconscious.

Now I Want To Discuss The Relationship of the 'I' and the mind.

The human mind is partly noumenal and partly phenomenal to my 'I' or self. The part of my mind which is phenomenal to my 'I' includes all of the thoughts, feelings, memories, and other 'mental material' which 'I' am currently encountering or experiencing.

The part of the mind which is noumenal includes all the thoughts, feelings, memories, and other 'mental material' which the mind has stored as potentialities but which 'I' am not currently encountering. The noumenal part of the mind includes also the powers of potentialities of creative imagination and reason. These powers are used by the mind to build mental images, mental worlds, and mental models of the wider world. By far the larger portion of the mind is ordinarily noumenal. Most of the mind's potentialities for thoughts, feelings, memories, and other mental experiences are at any given time ordinarily outside the experience

or awareness of my 'I'.

Most of my mind's contents are, as already explained, outside my current awareness. These out-of-awareness mental potentialities may be roughly sorted into two kinds.

First, there are those mental contents which are out of awareness but relatively readily available for awareness. Ordinary memories, such as what I had for lunch today, are of this kind. I am not currently experiencing my memory of what I had for lunch. But if I want to experience such a memory it is relatively simple to bring it into awareness.

Secondly, however, there are those mental contents which are out of awareness and which resist awareness. These consist of those memories, thoughts, feelings, beliefs, and so forth which are 'repressed'. Such repressed mental contents are accessible to my mind or at least to parts of my mind sometimes labeled the 'subconscious'.

But these out-of-awareness mental entities are not directly available to 'I'. They are not available because sometime in the past 'I', my mind, or my body, made decisions to seal them off from my awareness. These out-of-awareness mental entities are therefore likely to remain inaccessible to me unless special measures are taken to bring them back into awareness.

Meanwhile, although 'I' am unaware of them, these out-of-awareness thoughts and feelings remain resident in my mind and body where they exert a continuing effect on my 'I'm my mind, my body, and my relationships to other beings. These repressed out-of-awareness thoughts and feelings account for the fact that the facial expressions, voice tones, body postures, and general demeanor of people can suggest that they are experiencing emotions such as sadness, fear, or anger of which they themselves are quite unaware.

Now I want to make a final point before I leave the subject of the mind. This point is that mind should not be thoughtlessly identified with brain. Evidence suggests that the noumena or power behind the mind may at least to a significant degree be the brain. The precise relationship between mind and brain is, however, one for scientific experimentation and model-building and I will not further address it here. However, I do want to emphasize that mind, at least as a phenomenal presentation in my experience, does not consist of the 'gray matter' inside my skull.

Mind, as a phenomenal presentation, consists rather of presentations such as thoughts, feelings, and so forth which my 'I' encounters. Brain, as something phenomenally encountered in my experience, is not properly speaking mind but rather part of the body.

CHAPTER 55: THE BODY-MIND-I SYSTEM: BODY

In this chapter I discuss the body, which is the third term in the human body-mind-I system.

A chief feature of the body, and the one which fundamentally distinguishes it from mind, is externality. My thoughts or feelings do not ordinarily appear in any mind but my own. But my body has the ability to be encountered not only by me as its owner but by other beings. Not only I but other appropriately equipped beings can see, hear, touch, taste, and smell my body. Unlike minds, then, bodies ordinarily have externality and appear in more than one phenomenal world.

My body is the part of me which is, as it were, shared with the rest of the world. It is my 'interface' with the world. It is ordinarily only through my body that 'I', or more exactly the manifestations or mediated effects of 'I', am able to appear in the phenomenal world's of other beings.

I will not be going over the anatomical details of the body. I refer interested readers to standard works on the subject such as 'Gray's Anatomy'.

Here I want primarily to emphasize the body's most important general features. The human body is, to begin with, equipped with a set of specialized 'instruments of conation' and a complementary set of specialized 'instruments of cognition'. By the body's 'instruments of conation', I mean its organs or means for going out to effect the world. By the body's 'instruments of cognition', I mean its organs or means for going out to receive the world.

The Body's Instruments Of conation And Cognition

The body's 'instruments of conation' include:

The human hands with their four fingers and opposed thumb which are uniquely suited to manipulating, shaping, crumbling, holding, and carrying objects;

The human arms with their ability to rotate at the elbows and shoulders so as to move the hands wherever their manipulator powers may be needed;

The human legs with their ability to move the body through space by walking, jumping, running, kicking, and dancing.

The human vocal apparatus and the body's general powers of speech and symbol-making which allow me to go out to effect other people with statements regarding my experiences, beliefs, or purposes.

These instruments of conation are complemented by the body's 'instruments of

cognition'. In using my hands, arms, legs, and symbolic capabilities such as vocal statements, I am going out to effect or shape my world. I receive back at least some of these effects as my experiences or cognitions.

If I use my hand to strike a chord on the guitar, for example, I receive back the musical effect through my ears. My experiences or cognitions, when they concern the `external world', come back to me through `instruments of cognition' which are known as sense organs.

Sense Organs are Instruments of Cognition or Reception

These instruments of cognition or sense organs are my eyes, ears, nose, taste receptors, and the nerves responsible for my sense of touch. There may well be, in addition, a number of `subtle senses' and `subtle sense organs' responsible for other modes of perception such as are ordinarily categorized as clairvoyance, mental telepathy, and so forth.

Such possibilities are addressed in a later chapter. What I want to emphasize here is the reciprocal relationship between my body's instruments of conation and its instruments of cognition. In using its instruments of conation to effect its world my body also requires instruments of cognition to monitor or receive those effects.

The powers of my hands, arms, legs, and symbol-projecting capacities are therefore complemented by the powers of my eyes, ears, nose, taste receptors, and sense of touch.

If I want to plant a seed at a certain depth in the ground, for example, I require an instrument of conation such as a human hand to do it. But I also require an instrument of cognition such as a human eye with its ability to see the effects of what my hand is doing and to closely calibrate distances and to distinguish small objects like seeds from a general background.

Bi-Pedal Posture

Now I want to briefly discuss the `bi-pedal' posture of the human body. By `bi-pedal' posture, I mean the fact that human beings, once past infancy, ordinarily stand and walk on their legs with their arms and hands free for other activities. Other four limb-ed animals belonging to the mammal family generally do not have this capacity to the same degree. Dogs, for example, walk on all four of their limbs.

The bi-pedal stance of human beings favors the use of the human body's specialized instruments of conation and cognition. By standing on two legs the hands and arms are freed to manipulate and move objects; and the human head, on which resides four of the five human senses, is elevated farther above the ground with the face and the eyes turned outward to take in the wider

environment. The ability of the back to bend and the hips to swivel are similarly important. Bending the back and swiveling the hips assists us in moving the instruments of conation such as the hands and the instruments of cognition such as the eyes into appropriate positions.

The Body Is A Compound Being

I pointed out in the chapter on the self or `I' that it is a simple being or Mona. The body, however, is like the mind in being a compound being. It is, that is to say, made up of a series of other beings.

Starting from the inside the body is composed of a skeleton of bones; organs such as the heart, lungs, brain, stomach, kidneys, and liver; muscles such as those in the arms, shoulders, legs, back, and stomach; a covering of tissue called the facie extending over all of them; and a vast network of arteries and veins to carry fresh oxygen and nutrients to the various organs and areas and to take away waste materials and carbon dioxide from them. Finally, over all of this there is the epidermis or outer skin.

Each of these organs and parts making up the body performs a specialized job or function within the body. The heart pumps the blood, the lungs do the breathing, and the stomach digests the food.

Moreover, these specialized organs and parts are compound beings in their own right. Each of them, that is, is made up of many other parts and cells. The body is, on one level, an association or society of these specialized organs or compound beings working together to promote the well-being of the whole. Each organ or component of the body has its own character, its own dispositions or potentialities, and, it might be said, its own concerns.

The Body is Partly Phenomenal and Partly Noumenal To The `I'

Finally, I want to emphasize that the human body is partly noumenal and partly phenomenal to my `I' or self. The part of my body which is phenomenal to my `I' or self includes the portions and potentialities of the body which are currently present in my awareness. Any sights, sounds, touches, tastes, smells, or other inner or outer encounters I am having with my body are part of my direct experience of it.

By far the larger portion of my body, however, is ordinarily noumenal to me. Most of its bones, organs, tissues, muscles, possibilities for action, potentialities for health or illness, and so forth are ordinarily outside the current experience of my self or `I'.

CHAPTER 56: THE BODY-MIND-I SYSTEM: THE FUNCTIONAL INTERDEPENDENCE OF THE BODY AND MIND

In this chapter I want to briefly discuss the 'reciprocal functional relationship' between the human body and mind. By the 'reciprocal functional relationship' between the body and mind, I mean that the two logically require one another in order to function or work as they do.

The human body has, as we have seen, great power to go out to effect and receive its world. The human mind, as we have also seen in earlier chapters on knowledge, is also endowed with great powers. It is endowed with powers of imagination and reason which enable us to build imaginal worlds and mental models and to treat these as information pointing to the possibilities which the rest of the world holds.

My body's powers of conation and cognition are necessary for me to walk into a field and plant a seed. But my mind's powers of mental modeling are also necessary to tell me how the seed is to be planted and that doing so will bring forth a plant.

Human beings, with their opposed fingers and thumbs, can 'pull out' a far greater range of potential experiences from their environment than can the other creatures of the world. But these experiences to which our bodily instruments give access are not all part of the manifest character of the world. Many of them are 'behind the scenes', and gaining access to them therefore requires not only the conative and cognitive powers of the body, but the modeling and imaginal powers of the mind.

In short the human body and the human mind require one another in order to effect and receive the world as they do.

The Hand And The Mind Mirror One Another

The universality of the hand is mirrored by the universality of the mind. The hand yields the manipulative power -the power to pull out a wide range of potentialities from the environment; the mind yields the information-processing power - the power to anticipate, through knowledge and simulation, just what those potentialities might be.

Finally, just as human beings have developed one set of 'matter manipulating tools' to extend the manipulative powers of the hand, so another set of 'information management tools' has been developed to extend the knowledge or information-processing powers of the mind.

CHAPTER 57: THE BODY-MIND-I SYSTEM: PUTTING THE PIECES TOGETHER.

In the preceding four chapters I briefly described the character of the body, the

mind, and the self or 'I'. I also briefly described the functional relationship between the body and mind. Now I want to put the pieces together. I want, that is, to sketch the relationship between the body, the mind, and the self.

Distinction of 'I' from 'Body-Mind' Is Central

To begin with, I want to point out that in most depictions of human nature the distinction between mind and body is portrayed as fundamental. In this worldview, on the contrary, the distinction between the 'I' or self on the one side and the body and mind on the other is a distinction of at least equal importance. In this chapter I will be exploring a number of the most important aspects of the I/body-mind relationship.

The Body And Mind Are The Immediate Environment of the 'I'

The first aspect of the I/body-mind relationship I want to explore is that of the mind and body as the immediate environment of the 'I'.

The 'I', like all beings, dwells in a social environment. This social environment, as we saw in a previous chapter, consists of the other beings, and the patterns of interaction between those other beings, which are accessible to the 'I'. The social environment of the 'I' includes all beings which can directly interact with it as well as those beings which can indirectly interact with it through the beings with which it has contact. The social environment of the 'I' therefore ultimately includes all of the other human, natural, and divine beings of the universe.

The primary or immediate environment of the 'I', however, is ordinarily made up of its own mind and body. These are the parts of its world with which the 'I' usually is able to directly or relatively directly interact. As the parts of its environment ordinarily most accessible to it, the mind and body are also the parts of the environment whose condition and behavior most directly effects the 'I'.

If the body is in pain, for example, this pain will generally be communicated to the 'I'. Pain in the body of another individual may also effect the 'I', as when a friend vividly describes her or his suffering with a stomach ache. The discomfort such a description induces will, however, ordinarily be substantially less than if the stomach ache were taking place in the 'I's own body.

If the mind and body are happy, healthy, well-developed and well- developing, on the other hand, they will communicate that to the 'I' through their interactions with it.

The Mind And Body Are The Primary 'Vehicles' Of The 'I'

As the immediate environment of the 'I', its mind and body also serve the 'I' as its

primary or immediate `vehicles'. By `vehicles', I mean that the mind and body serve the `I' as its instruments or means of interaction with the other beings of the world.

My presence in a mind and body is what allows me to communicate with other beings, to interact with them, and to attempt to promote their being as well as my own through my interactions with them. I have already pointed out that my body and mind are the parts of the social environment which `I' ordinarily most directly interact with.

The Body and Mind Are The Primary Means By Which The `I' Effects And Receives The World

This proximity to the `I' positions the mind and body to serve the `I' as the mediators or instruments between it and the rest of the world. The purposes of the `I' ordinarily must pass from the `I' to the mind, and from the mind to the body, before these purposes can appear within or effect the phenomenal worlds or experiences of other beings.

Moreover, before the purposes of other beings or `I's can effect the `I', these purposes must pass from the other beings to the `I's body, from the `I's body to the `I's mind, and from the `I's mind to the `I' itself.

The outgoing route from the `I' to other beings - I/mind/body - is the route or set of routes by which the `I' cognates or goes out to effect the other beings of its world.

The incoming route from the other beings to the `I' - body/mind/I - is the route or set of routes by which the `I' cognates or goes out to receive its world.

In previous chapters on the body-mind-I system I have discussed the specialized instruments of cognition and conation with which the body and mind equip the `I' to receive and effect its world. The ear and the stomach, for example, are instruments of cognition which help the `I' to go out to receive its world. The hand is an instrument of conation which helps the `I' to go out to effect its world.

Communication Between `I's Is Ordinarily Indirect

The mind and body, then, ordinarily serve as the instruments or mediators between the `I' and the rest of its world. One consequence of this is that human `I's or selves are ordinarily not in direct communication with one another or with the other beings in their social environment.

Other people, and other beings generally, encounter my `I' or self only in the form of effects which have passed through, and been modified by, my mind and body. In the case of other human beings the mediated effects of my `I' must also pass through, and be modified by, their bodies and minds before being received or

cognized by their `I's or selves.

Human `I's therefore stand to one another as theoretical entities. In our interactions with one another we must infer the character, purposes, and motivations of other `I's not from direct experience or encounter but from cogitation of one another which have been mediated - and modified by - our minds and bodies.

Down-To-Earth Examples

In conclusion, I want to go over some of the key points in this chapter while giving some down to earth examples.

Suppose `I want to conate my world by speaking to you in a loving way. To achieve this purpose `I must decide or will to do it; my intention must then pass from my self or `I to my mind; my mind must then cloth the purpose of speaking in a loving way in appropriate words and concepts; the `appropriately-clothed' purpose must then be passed from my mind to my body; and my body must then use its physical structure to speak my message aloud.

Or suppose I want to co mate my world by drinking a glass of water. My self or `I must decide or will to drink a glass of water; this purpose must then be passed to my mind; my mind must then cloth the purpose in images of picking-up and bringing the glass to my lips; my mind must then pass these images and the intentions accompanying them to my body; and my body must then actualize the purpose with the arm and hand movements necessary to move the glass and drink the water.

Routes Of Cognition And conation

In these examples - making a loving statement, picking up a glass of water - you may have noticed a particular sequence. This sequence is that of a purpose passing from `I to mind to body to the rest of the world. This sequence is the route by which the conations of the human `I' ordinarily proceed outward to the world. It may be abbreviated as I-mind-body. It is a sequence which also applies to the cognitions of the human `I' but in reverse. In other words the human `I' ordinarily receives its cognitions from the rest of the world along the route body-mind-I.

Suppose, for example, that I want to receive a loving statement which you make to me. In the first place my body, and in particular my eyes and ears, must be able to receive your message; next my mind must be able to accurately interpret your message as it receives it from my body; and finally my self or `I' must be able to understand and accept your loving message as it receives it from my mind. In other words, for me to receive your loving message it is not enough that you convey it. My body-mind-I system also must be capable of receiving it.

CHAPTER 58. THE BODY-MIND-I SYSTEM: COMMONALITIES AND INDIVIDUALITY

In this chapter I want to discuss the 'body-mind-I Commonalities and 'body-mind-I individuality' of human beings. By 'body-mind-I Commonalities, I mean that we as human beings all possess a 'shared human status'. This shared human status consists of certain commonalities arising from the fact that each of us is a human self or 'I' operating through a human body and mind.

I want to note in passing that our shared human status also depends heavily on our use, through our body-mind-I systems, of human culture to relate to one another and to our world. I will not, however, be explicitly discussing this cultural element here.

Commonalities of Human Body-Mind-I Systems

What I want to focus on here is the basic fact that as human 'I's or selves, living in human minds and bodies, we possess certain potentialities for experience which are common to all human beings.

Suppose, for example, that two human beings with 'normal vision' are familiar with balls and with the colour 'red'. These two people will have certain similarities in their experience when they encounter a red ball.

Or suppose two human beings each lose a 'loved one' through illness or accident. These two people will have certain similarities in their experience regarding their losses.

Or suppose two human beings both have large, spacious, and peaceful houses. These two people will have certain similarities in their experience regarding their housing.

Such commonalities in human experience spring from commonalities in the character of human body-mind-I systems. These commonalities are partially responsible for our ability to reconstruct, understand, and sympathize if we wish to with the experiences or states of other human beings.

Differentiation Within Human Body-Mind-I Systems

In addition to these commonalities of human body-mind-I systems, there is also the individuality of human body-mind-I systems. This individuality takes two forms. To begin with, my body, mind, and 'I' are individual beings, each with its own particular character, and each existing in its own world of experience.

'I' have my own character and exist in my own phenomenal world. My mind has

its own character and exists in its own phenomenal world. And my body has its own character and exists in its own phenomenal world.

Due to this individuality within human body-mind-I systems, no part of the system has perfect knowledge of the whole. My body, mind, or self may - and frequently do - have experiences or potentialities which are not known by the other two parts of me. From the perspective of my self or 'I', my body-mind-I system is greater than my knowledge of it. It should be emphasized that even when an experience or potentiality in another part of me is known by my 'I' it is not the same experience.

When an experience or potentiality in my body is, for example, known to me it is because the state of my body has produced an effect on me, perhaps after passing through my nervous system, brain, and mind. This knowledge may therefore be far from perfect, as when I notice myself sniffing and think I have a cold when in fact I am having an allergic reaction.

The first form of body-mind-I individuality is, then, that human bodies, minds, and selves are each individual beings with their own characteristics, experiences, and knowledges.

People Are Different

The second form of human body-mind-I individuality is the individuality which exists between body-mind-I systems. People, that is to say, are different. There are broad, and important, similarities between people. These similarities are what makes us all human. But alongside these similarities there are also important differences.

Studies show that the shape, size, bio-chemistry, and capabilities of human bodies vary widely for example. One person's digestive organ may, for example, be up to several times as large or small as another's. Or consider the wide variation in the capabilities of human minds and in the capabilities and purposes of human 'I's.

Or consider the differences in human abilities to perceive - and to be effected by - particular things in the environment. There are, for example, some people who are born deaf or hard-of-hearing. There are other people with unusually acute hearing or who like myself are unusually sound-sensitive. (I find myself wearing ear-plugs in environments where other people are quite comfortable with the sound level.) A similar difference in human perceptual abilities is the capacity of some people to see fine-grained differences in colours which are invisible to others.

Still another example of body-mind-I individuality is the propensity of people to process information using different 'internal sense modalities'. Studies show that

some people think primarily by using internal visual images, others use internal 'auditory images', others use kinesthetic or 'body-feeling states', others engage in an internal dialogue with themselves in words, others use abstract concepts, and so forth.

Such Body-mind-I individuality may also account for the ability of some people but not others to perceive the emotional states or subtle energies of other human beings.

CHAPTER 59: THE BODY-MIND-I SYSTEM: DIFFERENCES IN EXPERIENCE - AND TESTING THE TRUTH OF OTHER PEOPLE'S OBSERVATIONS.

An important subject discussed in the last chapter is that of differences between human body-mind-I systems. People, as I said there, are different. These differences mean that any two people will, at least to a certain extent, be intrinsically different in the potentialities for experience which they possess.

Due to these basic differences characters, any two human beings - in interacting with any third being - will have some commonalities and some differences in their perceptions or experiences.

My body-mind-I system, to cite just one example, may enjoy eating carrots while you abhor their taste.

Or, to cite just one other example, you may find Joe a great guy while the volume or pitch of his voice is intrinsically unpleasant to me.

Overlooking such intrinsic differences in our potentialities for experience can lead to great suffering in our lives. Much unnecessary human conflict and misery is caused by the false belief that all human beings experience, or at least should experience, the world and the other beings in it in the same way that we do.

Testing The Truth Of Other People's Reports

Now I want to discuss an important issue which springs from body-mind-Individuality, and from the individuality of experience and perception arising from it. This important issue is that of testing the truth of other people's observations when these do not correspond to those appearing in our own phenomenal world.

Suppose I see what I take to be signs of paranoia on someone's face but you do not see these? How can you determine whether my observation reflects the actual state of the other person? The methods for testing such assertions are ones which I discussed in the chapter 'how knowledge is tested'.

One method is to attempt to bring the entity to which my knowledge concept refers directly within your phenomenal world. This is the 'method of direct encounter'. You might, for example, look closely at the other person to see whether you can see signs of the emotional state I am describing.

The other method for testing the truth of my observation is the 'indicator method'. This is the method of attempting to bring experiences into your phenomenal world which you regard as 'indicators' of the existence or non-existence of the emotional state I am describing. If you cannot directly see the paranoid expression, you might choose to ask other people who know the person what that individual's character is like.

Or you might spend time with the person in order to see whether he or she acts in a way which you regard as paranoid. If people say, "he is somewhat paranoid" or if spending time with him reveals behavior which you regard as paranoid, you might assume that my original observation of a paranoid expression may have been an accurate report of a phenomena which was unable to appear in your phenomenal world. If such examination fails to turn-up corroborating evidence for my assertion, you would have grounds to doubt the validity of my statement.

CHAPTER 60. THE BODY-MIND-I SYSTEM: BOUNDARY PHENOMENA.

In this final chapter on the body-mind-I system I want to discuss experiences of a mystical, spiritual, religious, or other non-ordinary character. These experiences may conveniently be lumped together under the rubric 'boundary phenomena'.

I call them 'boundary experiences' because they exist at or beyond the edge or boundary within which our more commonplace experiences and our explanations for those experiences exist.

In discussing boundary phenomena, I want to begin by setting a wide general framework in terms of the human body-mind-I system. Like all of the 'I's experiences, boundary phenomena are generated by an encounter between the 'I' and one or more other beings or powers. The 'I's encounters with these other beings or powers may be mediated through its body and mind. Or, in the case of boundary or 'non-ordinary' experiences, the 'I's encounters may conceivably involve direct encounter between it and the other beings or powers without the usual necessity that these experiences pass through its body and mind.

Boundary Phenomena Frequently Lack Externality

A important characteristic of boundary or non-ordinary experiences is that they frequently lack externality. Such experiences are, that is, not directly accessible to other people. Or at least the presence of such experiences in the phenomenal worlds of others is not confirmed by the kinds of orienting behaviors or reports I

see when people look at the trees I am also seeing or sit down in the chairs which I am seeing.

If I am standing on the street and believe myself to be intercommunicating with God through prayer, or if I find myself in the 'sacred light' or another realm spoken of by mystics, for example, I may observe other people passing by me on the street just as if God or the sacred light isn't there at all.

This absence of externality suggests that at least some non-ordinary experiences could be of a mental character produced by the body-mind-I system itself. There is, however, no logical reason to rule out the possibility of powers or beings outside the body-mind-I system which can interact or communicate directly with the 'I' without having to pass in the usual way through its body-mind system. Many millions of people, for example, claim to have directly communicated with god or a sacred dimension through prayer or meditation.

There is also the whole area of parapsychology dealing with mental telepathy, clairvoyance or 'distance vision', out-of-the-body experiences, and so forth. Research in these areas suggests that the 'I' may be able under certain conditions to leave its body and mind or to interact directly with other beings or parts of the world without having to go through its mind and body.

Applying Open Inquiry To Religious and Paranormal Domains

The realm of religious and paranormal experiences, the possibility that there are spiritual or divine beings or powers which can interact directly with the 'I', and the possibility that the 'I' may at times be able to interact directly with other beings or parts of the world, is an area deserving of dispassionate and unbiased

Part Five: Inquiry

In this chapter I want to introduce the concept of 'onto-poetic' or 'being-seeking' inquiry. This kind of inquiry is an essential tool for those who would build patterns through which the human beings of the world, the natural beings of the world, and - if we believe in them - the divine beings of the world can cooperatively work together to care for one another and the planet.

Inquiry As An Attitude

Before beginning my formal discussion of inquiry, I want to give you an idea of the attitude involved in it.

As an attitude, onto-poetic inquiry involves a willingness to explore. It involves, that is, a positive but selective openness to our world. It is an active

seeking, and a willing receptivity, to new information, new experiences, new perspectives, and new tools which may help to expand our being or that of others. it is a willingness to explore alternatives to our present concepts or patterns. it is a capacity to supplement, and where appropriate to eliminate, our old patterns in favor of new more being-expanding patterns.

In exploring the world through onomatopoeic inquiry we go beyond ourselves. We experience the refreshment and adventure stemming from stepping out from the circle of the habitual, from encountering the novel. We discover that the world is subtler, deeper, wider, more variegated, more curious, more ugly, and more beautiful than we imagined.

Meaning of Onto-poetic or Being-Seeking Inquiry

Now I want to explain the derivation and meaning of the phrase 'onomatopoeic inquiry'.

'Onomatopoeic inquiry' is a phrase which I coined, as I was not able to find an existing word which would convey my meaning. 'Onto-poetic' is derived from 'onto' meaning being, and 'poetic' which originally meant making. So 'onto-poetic' means 'being-making'. As for 'inquiry', it means, broadly speaking, the practice of exploring our world. This exploration may take various forms, but typically involves developing theories or hypotheses which are then tested by experiments or experience.

So 'onomatopoeic-inquiry' means, broadly speaking, exploration of the world and its potentialities - sometimes by way of theory-building and experimentation - in order to expand being. In terms of the previous discussion of ethics and Arta, Onto-Poetic Inquiry is the means of discovering - and enacting - patterns of interaction which best promote the being of a set of interacting beings.

More succinctly, onto-poetic inquiry is being-seeking inquiry. In still another phrase, onto-poetic inquiry is exploration for the purpose of expanding being.

As shorthand, I will sometimes refer to 'ontopoetic inquiry' as 'inquiry'. But when I use the word inquiry in this chapter or in subsequent chapters I will, unless otherwise noted, mean onto-poetic or arta-seeking inquiry.

The necessity for onto-poetic, or being-seeking, inquiry flows from three factors. First, it flows from the nature of Arta, the law of being. this law states, as previously explained, that for every interaction involving human, natural, or divine beings there is a network or range of choices or possibilities. These possibilities may be arrayed on a hierarchy from least to most desirable. But this set of possibilities is not necessarily self-evident.

Nor is the optimal or artagrade selection from among a set of possibilities

necessarily a self-evident matter. For the world, and its collection of potentialities, is greater than our knowledge of it. Inquiry is therefore necessary if we are to discover and enact optimal interaction patterns between beings.

The second reason for onto-poetic inquiry is that our world is characterized increasingly by interconnection, complexity, and rapid change. The increasing integration of our world in terms of production, communication, consciousness, and cultural exchange makes the Arta of an interaction, or situation, ever less likely to be self-evident.

This 'planetization' process, with its increasing interconnection of our planet, and the expanding problems and possibilities related to this process, makes the use of being-seeking inquiry increasingly essential.

In a complex world we are apt to be initially unaware of the potential resources, or the potential hazards, for a particular interaction. Only being-seeking inquiry can enable us to effectively utilize the potentialities, and respect the well-being, of our planet.

The third reason for onto-poetic inquiry is 'diremption' or 'fragmentation'. By 'diremption' or 'fragmentation', I mean the fragmentation of our relationships to the other human beings, natural beings, and - if we believe in them - also to the divine beings resulting from the present stage of 'economic culture' based on market-place relationships on our planet.

This fragmentation or diremption is a condition in which we and the other beings of the world are not able - or at least not optimally able - to work together to promote one another's beings. Factors ranging from our emotional and spiritual structures, to patriarchal or racist attitudes, to culture clash due to different ethnic or sub-cultural backgrounds, to ingrained and unnecessarily divisive communication styles, to the pursuit of separate career tracks in the market place, to simply living in different areas of the community, all act as barriers to effectively working together to promote one another's being. Only conscious inquiry into how to counteract these centrifugal forces which are tearing us and our world apart can prevent disaster.

We see, then, that there are three factors pointing to the necessity for increased use of inquiry. These three factors are the search for Arta; the planetization and complexification of the world; and the diremption or fragmentation of our relationships. All of these factors point to the need for a new kind of inquiry. This kind of inquiry, which I call 'onto-poetic inquiry' or 'being-seeking inquiry', is the practice of discovering and enacting interaction patterns through which we can work together to promote one another's being.

Specific inquiry procedures for Stewards groups seeking to work together to care for one another and the Earth can be found in the section on inquiry in 'The Stewards Code: Building A future Together'

More to Be added to this section

Advanced Topics

CHAPTER 61: INTRODUCTION TO SYNERGEIS, PART-SYNERGIES, ORGANIZATIONS, AND NETWORKS

In this section I want to use the preceding development of the categories of being, experience, interaction, knowledge, ethics, and human nature to elaborate approaches of special interest to people concerned with modeling complex interaction systems.

In this chapter I will concentrate on introducing the concept of 'synergy', while touching lightly on the other related concepts of 'organizations' and 'networks'. By a 'synergy', I mean a system of interactions between two or more actors or centers of action. The word 'synergy' comes from a Greek work meaning 'working together'. Any set of two or more interacting beings may be regarded as a synergy. Two people in a conversation, two people bumping into each other on the street, a bee visiting flowers and polinating them, or two armies at war may all be regarded as synergies. All of them involve interactions or systems of interaction between two or more beings or centers of action.

Synergies can involve beings interacting or working together in any way or for any reason. To qualify as a synergy, beings need not be interacting or working together for a common purpose. Such 'common-purpose synergies' are of a special kind known as 'organisms' or 'organizations'. These will be discussed later in this chapter.

A synergy, then, is any set of two or more interacting beings. Such a set of interacting beings may, if it belongs to a larger set of interacting beings, also be regarded as a 'part synergy'. As a 'part synergy' (holon), it has 'synergial properties' unto itself as well as being a part of a larger synergy or set of interacting beings.

The larger synergy to which a part-synergy belongs may itself belong to a still larger synergy, and it may belong to a still larger synergy, and so forth until the ultimate synergy or universe as a whole is reached.

Now I want to consider various ways of breaking down or analyzing synergies. A synergy includes, to begin with, a set of beings. Each of these beings brings its

particular character to its interactions in the synergy. The characters which beings bring to their interactions in a synergy include all of their potentialities or dispositions including the experiences, beliefs, and purposes which make up their worldviews. In addition to beings and their worldviews, a synergy also contains the interactions and patterns of interaction developed between its beings. Finally, a synergy includes the special uses its beings make of one another as media or instruments. Beings in a synergy serve one another as such instruments or media whenever they function as mediators or means by which other beings in the synergy interact with one another.

I now want to briefly pause to address a widely-held view of synergy - a view which is to my mind helpful but one-sided. This is the view that emphasizes the significance of system interactions - as opposed to the character of the interacting system-resident parts or beings - as the key to understanding synergy. This one-sided view emphasizes the 'relationships' or 'wholeness' of systems, while belittling or DE-emphasizing the parts which make up the whole. This view correctly points out the existence of 'emergent properties', which are properties which are manifest only within a system or synergy, and which cannot be found in manifest form in the individual parts of the synergy when these parts are viewed separately.

In the case of water, for example, it is said that 'wetness' is an 'emergent property', which is not found in either hydrogen or oxygen, but which only emerges when the two are brought together in the water molecule of H_2O . Where the use of this example, like the doctrine it supports, goes awry - at least in my view - is in tacitly assuming that the parts have nothing to do with the synergistic results or emergent properties. I would suggest, contrariwise, that the parts or constituent entities have -everything- to do with the results of a synergy.

From my perspective, the character or potentialities of the interacting entities or beings, as well as the interactions between them, must both be taken into account to understand a system or synergy and the properties within it. If I kick a stone, the experience and the consequences - for myself as well as the stone - are rather different than if I kick you. A system or synergy might, in fact, be defined as 'a particular set of interacting beings in which particular potentialities of those particular beings are actualized'. In the case of water, for example, the character of hydrogen and oxygen is such that they have the potentiality to produce wetness -if they interact with each other in certain ways. The character of carbon, however, is such that it cannot interact with oxygen (as far as I know) to produce water.

A complete formula for understanding synergies or systems must, I think, take account of both the particular entities with their particular characters, and of the particular ways in which those entities come together or interact within the synergy.

Finally, I want to briefly define the special kinds of synergies known as

organizations or organisms. Synergies, as I said previously, can involve beings interacting or working together in any way or for any reason. They need not, to qualify as a synergy, be interacting or working together for a common purpose. This is the *differentia specifica* which sets apart organizations or organisms from other kinds of synergies.

An organization or organism is a 'common-purpose synergy'. By an 'organization' or 'organism' I mean a set of beings co-adapted and coordinated in order to achieve a common purpose. Two surgeons working together in order to perform an operation, the human body-mind-i system with its three parts working together for the good of the whole, or a group of people working together to plant trees are examples of organizations or organisms.

'To organize' is, then, the act or process of co-ordinated and adapting a set of beings in order to achieve a common purpose. To organize a picnic is to co-ordinate and co-adapt a set of beings such as people, food, utensils, and a natural environment for purposes of consuming an enjoyable meal in the rural outdoors.