

RETHINKING SELF

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The Marianne Fry Lecture. 2007¹

The scene is set beside my father's deathbed. It was the time of the oil crisis in 1972. Dad was reading his newspaper; he'd had a serious heart attack and he was to die the following morning. That evening he was very lucid. He was reading about the world crisis of that time, and I was sitting with him. He put down his paper and he said to me, "John, you know, I always used to think I would like to come back in the future and see how everything is going on. But you know now I really don't think I want to come back; things look just too bleak." I was always sad about these last thoughts of my father, and I resisted them over many years. Yet, I have to confess that in the last three years I have come to have a lot of empathy with what he was saying. I am not at all sure I would want to come back in 20 or 30 years' time. And that's within the lifetime of my grandchildren. It's within the lifetime of the grandchildren of all of us.

The problem of decadence.

It now seems certain that in the next 30 years or so the planetary world as we know it ecologically today will change dramatically. We can already see the changes happening. Furthermore, without being alarmist, we also have to say that scientists do not know what the thresholds involved in these changes are. There could be trigger points that may bring about far more rapid and catastrophic changes than we are thinking of at the moment. It is just very uncertain indeed. Let us hope things will proceed smoothly; let us hope that we manage to get on top of it, but there are no promises.

Why did my father feel that way? My Dad was an Edwardian who had come through the First and Second World Wars, who had seen the victory of democracy over Nazism and Fascism, who had also seen the fall of the Iron Curtain and the change in politics towards what appeared at first to be a much more optimistic scenario. This was a direction of change that would have fulfilled his humanist-Christian values. He had been an engineer and was proud of all the progressive advancements in the world. He'd seen all of those things but the changes which were then occurring were disappointing and seemed chaotic. I think he felt that the world had entered a period of marked decadence. Today I would agree. I put it to you that we are living in a decadent world. And I'm also going to suggest

to you that the reason for that decadence is us, you and I in our time, I mean the current Western cultural attitude to this world of ours.

What is decadence? Well the Oxford English Reference Dictionary defines ‘decadence’ as “moral or cultural deterioration especially after a peak or culmination of achievement”. The juxtaposition of these opposed ideas – moral or cultural deterioration after achievement – is a very sad one to reflect upon. We have to realise that, as Prime Minister Macmillan said long ago, we in the West have never had it so good. The scientific advances, the inventions, the extraordinary speed of communication, email and all that is really staggeringly significant and has brought about an ease and comfort in life that no previous generations ever had. Not only that, up until relatively recently the victories in the Second World War and the fall of the Iron Curtain did indeed suggest that we might be moving towards a more stable historical situation on the planet with a greater importance of the rule of law, the United Nations, a World Community, and the development of something approaching democracy over at least very large areas of the world. Yet, then what happened? Well I needn’t rehearse for you the history of the last 15 years, but I do want to refer you to another definition – the definition of the adjective ‘decadent’. The Oxford English Reference Dictionary refers to the adjective ‘decadent’ as “self-indulgent”. Now, as we’ve seen, the title of this talk is ‘Rethinking Self’ and if our world is failing on account of a decadence that is self-indulgence, then it is attention to the ‘self’ itself that we will need to pay attention.

I don’t want to spend too much time talking about the well-known problems of our time, the faulty politics, bad decisions, poor economics: Kosovo; Iraq; the state of the Middle East; Islamic religious fanaticism due largely to deprivation and poverty distorting Islam into the terrorism of resentment. This is matched by equally perverse and self-concerning policies of the Christian Right in the United States – the Neo-Cons. The collision of Islamic fanaticism and the Neo-Cons, if it continues, (and thank goodness it looks as though it isn’t) could produce the ending of our cultural world, both in bangs and in whimpers. Fortunately, the victories of the democrats in the recent elections in the United States show the American people are at last waking up to the mistakes of their leadership: understandable mistakes perhaps because driven by the terrible disasters in New York of ‘9/11’.

Yet these dangerous political and terrorist issues are of relatively minor concern when compared with the problems of global warming and the concurrent political resistance to adequate action in changing our

economic practices in relation to ecology. Again, sad to say, it has been in the United States that the major resistance has been seen – political resistance to doing anything about the planetary ecology. Furthermore, the lack of leadership by the United States is allowing or encouraging China to produce incredible amounts of pollution as it fills the US demand for cheaper goods. This does not stay in China but begins to drift around in the world's wind systems.

All this is the background to something else, which is perhaps the saddest point directly and immediately facing us in Britain. I refer here to the extraordinary social alienation of large sections of our young people –the lethal teenage gangs, the Ladism and the lunatic binge drinking. In Bristol, only a few weeks ago, I went to see a film and came out to the street at about 8 o'clock in the evening to find it full of drunk and half-clad young people. It was from any perspective socially disgusting. Then again, not much better was the behaviour of our football supporters in Barcelona a few months ago. The Spanish people very politely were putting up with a good deal of shouting, violence and excessive bravado. Beyond these symptoms of decay, we have all the well-known effects of family breakdown.

I could go on like this but to do so would be merely depressing. We all know these things. So I want to make the one major point which makes our world decadent, truly decadent. We are actually engaged in the spoliation and destruction of our planetary ecosystem upon which our civilisation depends. The way in which we are behaving economically and socially is bringing about climate changes that may be extraordinarily destructive over time. What is so extraordinary is that when we know we are faced with severe damage to our own planet, to our own cultures, to our own cities, we're doing so remarkably little about it. Two days ago we had headlines about the Queen getting a bit cross during an interview. Such triviality is typical of the media. There is very little adequate focus on the truly serious situation which we are in.

We might ask - haven't things always been difficult? For my Dad things were pretty ominous in 1939. Yet, in 1939 it was not the state of the planet that was at stake. This is what makes the word 'decadence' truly potent in our time. It is unbelievably decadent, in my book, not to take this planetary issue enormously seriously as the most important issue of our current existence and one that will affect our grandchildren and our great-grandchildren enormously. Nero fiddles while Rome burns.

World-views

These pressures – these gloomy pictures, which I’m sorry to have to present to you – do have personal effects on all of us. I myself find that listening to the 10 o’clock news bulletin is commonly a highly depressing experience, it’s often grim. I want to refer to the essay written by a young woman student in the University of Bath which Peter Reason, Professor of Management Studies in Bath, quoted in his inaugural lecture about two years ago. Peter Reason quoted the following paragraph from an essay which one of his young women students had written. She said: “As I approach the end of my studies I can’t help feeling that freedom is a fallacy, and that somehow I’ve been walking a predetermined path to mortgage repayments and commuting nightmares. Further, I’m not alone. Despite a whole array of graduate opportunities, there is a growing mood of claustrophobia and a sense of powerlessness. For all the relative luxuries of the Western world we are still unsatisfied, there is an unmistakable sense of longing, a deep craving for some kind of release or escape.” In quoting this essay and going on to discuss it, Peter Reason argued that what this young woman was trying to escape from was the Western world-view itself, that is the unthinking collusion in a certain image of our world that almost all of us entertain.

What is a world-view? We have to spend some time thinking about this. A world-view is that complex set of integrated social images and understandings that, as it were, passes as the norm of one’s time. A world image of a period of time drives the history of that period. You could say that the world-view of the Victorian era had to do with imperialism, to do with white supremacy, to do with the cocky arrogance of the West, to do with Christian dominance. Yet, it also to do with the rights of man, European enlightenment, free play, democracy, and the ending of the slave trade. That complex made up the prevailing world -view of the majority of educated people in the Victorian era.

What is the set of components that determines the world-view of most of us today? Well, I think very few of us ever actually sit down and ask what is my world view, or what is our world view, or what is the British world view, or what is the European world view, or what is the Western world view. Of course, there’s a good reason for that – it’s very complicated.

I want to list three features of our current world-view to put to you as being characteristic of our time and which are operating for the most part unconsciously in that we don’t reflect upon them and are not educated to reflect upon them.

Capitalism

First of all, there is the overriding power of capitalism in its consumerist form. We have to realise that this economic system is amazingly dynamic based upon the system of business institutions, firms, which requires investment to yield products which in turn produce dividends for the investors. In order to make that cycle work, there has to be novelty, exploitation of ever more resources, and growth creating value addition beyond the cost of labour. The system naturally sustains the division between the relatively poor producers and the often tremendously rich investors.. Needless to say, some of these industrial activities involve arms sales utilised in regional violence and the potential for atomic war. Nowadays so powerful is consumerist capitalism that many of the really big trans-national corporations are much bigger than national states. If one asks who is responsible for the activity of a trans-national corporation it would be very difficult to put a finger on anyone because these are machines – machines driven by a very effective economic process. One could say that the people who are responsible are the investors , that is you and I. Yet we rarely know exactly where our funds are invested. They are invested by brokers. Only a few of us have actually conducted an ethical investigation as to what these investments are actually supporting. One of the effects of the system has been the enormous expansion in the search for raw materials into all parts of the globe involving the destabilisation of tribal peoples, the creation of enormous dams sometimes requiring the removal of whole populations, and the breakdown of the culture and language of many small peoples.²

This extraordinary system, we must realise, is historically completely new, a novelty. Before the industrial revolution the great empires of, say, the Turks, the Moguls, of China, were all based on agricultural riches. Of course, there were trade routes, of course, there were banks, of course there was exchange – these systems were also dynamic. Yet, the limitations of agriculture and the seasonality of production meant that such empires could never gain more than a certain amount of power. Such economic systems couldn't be endlessly progressive in the manner of post-industrial economies. Britain with its dynamic world-view of industrialisation created something entirely new when compared with any of the agriculturally based empires. It is this very European novelty, adopted by all the powers of this world that is now destroying the natural systems that it exploits.

Individualism

What is this consumerist capitalism riding upon? I put it to you it's driven largely by another feature of our Western world-view - our extreme sense of individualism. This is the second feature I wish to stress. We value our individuality enormously, perhaps excessively. One of the crudest indications of this is the way in which every time a British or an American soldier gets killed in either Afghanistan or Iraq, flags go up, ceremonies are performed, corpses are brought home covered in national flags, relatives are informed, great sadness is publicly expressed and, because of a few hundred American dead, new policies are presented in Congress. But what about the hundreds of Iraqi civilians run over by American convoys rushing at high speed to supply their fortresses and so terribly fearful of roadside bombs as to drive recklessly through crowds of civilians smashing any cars in their way? I was reading a whole set of such accounts in yesterday's Guardian, interviews with American soldiers now back in the States currently recording the grotesque brutality in the way in which Iraqi civilians have been treated.

These are signs of our preoccupation with ourselves as individuals and our failure to generalise this preoccupation to others with whom we fail to identify. At a subtle level, there is an extraordinary self-confidence about the individual in the West. Our education encourages us to focus on becoming the brightest boy in the school or the most beautiful girl in the class. Some very interesting psychological testing has shown how this focus on the individual creates a very selfish attitude towards purchasing, buying, being – all focused on me, me, me. Furthermore, psychological enquiries reveal a very different situation in Japan or in China where research directly comparable to research done in America has been done. Briefly, the average Japanese or Chinese is not particularly concerned with 'me'. What they're concerned with is relating to the community within which they belong. First and foremost is the family – a strong communal sense of the family. And that extends outwards to the company within which individuals work. If individualism can be said to be the hallmark of part of our Western world-view, so communalism is actually the hallmark of much of Asian world-views.³

Of course, this means the Western media are very strongly focused on things that happen to individuals – the cult of celebrities, discussions about the differences between the last Prime Minister and the present one. The focus is far more on individuals than it is on policies and viewpoints. Our general assumption of the importance of the individual is one of the reasons for the success of Western capitalism.

Dualism

The third of the characteristics that seem to define our Western worldview at the present time is what I would call metaphysical dualism, and there are two forms of this. One is philosophical and one is religious. The philosophical form of metaphysical dualism comes from Descartes and the whole Cartesian way of viewing science. The object to be studied is completely distinct from the person or the process doing the studying. The two are kept apart. Mind and matter – the thinker and the studied – are kept rigorously separate in classical science. This, of course, promotes a kind of almost schizoid activity within science. What such a scientist actually does is not necessarily effected by what he or she values.

As you know, I'm a scientist and I have a great many scientific friends who I respect enormously and who hold more or less this so-called reductionist attitude. But what are their values? Some people denigrate science as being somehow valueless and not contributing to our world. This is not true. The orthodox scientists of my acquaintance think very carefully about the world. But what do they feel about themselves in the world of their understanding? The scientific enquiry reveals a universe in which there is no ultimate point, just an extraordinary complicated mystery. There is no personal security offered in the investigations of science to bring comfort in the face of universal death. After all, however exciting and intriguing may be the wonders of the Big Bang or the recent discovery of some galaxy so far out it's light was created so many millions of years ago that one can't even imagine it – at least I can't – and which reveals something about what happened within the first few seconds of origin of our universe, what does that mean to an individual with a mere three score years and ten of transient existence?

Most of my scientific friends are, I would say, stoics. Really, they think very much in the way of a Roman Stoic. Many would say this is the way it is, this is the way the world is, we adjust our lives to fit it. We investigate what the truth is. The truth is something we have to live with and discover. Values and idealism here tend to become highly utilitarian, because the values that such people hold are about making utilitarian differences in the world, improving the water supply, flying better aircraft, speeding up communications. Scientists are dedicated to utilitarian results that make our lives more comfortable, more 'happy' in a material sense. The philosopher Charles Taylor argues that what we lack are 'hyper-goods'.⁴ By hyper-goods he means values that have, as it were, a fundamental relevance in some sense, not merely things being

done for some utilitarian effect but things being done because it is right and proper to do them, driven by some universal perspective. Such values are not so common among my scientific friends. A mere utilitarianism in values has percolated very widely throughout our culture. We can call this a philosophical dualism. Action for utility.

The religious dualism is more potentially dangerous. What is religious dualism? Well, it's the form of belief that has been traditional for many centuries in monotheistic cultures. The thinker reifies some abstract idea and promotes it into the key position in a discourse. For example, when we don't understand the universe, we may well say it must be due to 'God'. We reify the idea of a causal God and project him into the universe and go on to believe it. This is dualism in that the entity placed up in the heavens is a production, a product of our reasoned inferences. It is not something up there to which we can be intimately related except in illusion. It is simply a projection. This mode of thinking is known to philosophers as logocentric discourse; a discourse which pivots around one key theme and everything else hangs on it.⁵ So for example, in Christianity or Islam, everything hangs on the concept of God.

I must have been a really unpleasant student. When I was at university I was troubled about this word 'God', so I used to go along to theological lectures. I used to sit deliberately in the front row and of course the speaker, being a theologian, would very soon use the word 'God'. I would put up my little 19-year-old hand and I would say "Excuse me, you have just used the word 'God', could you please give me a definition of God because without a definition I don't see how the lecture can proceed". Bastard! I never ever got an answer, which just goes to show that if you have a logocentric discourse you cannot query the logos in the middle of the discourse otherwise the entire thing falls apart.

The tragedy of these logocentric religious discourses, however, is that there is more than one of them. So we have Islam versus Christianity, where we have two versions of 'God' that share a lot of common history but whose rules and regulations have come down in a rather different way in the two cases and, because neither of them can be questioned within the belief, one side is always the infidel to the other – hence Crusades, hence Jihads.

Jihads and Crusades are fundamentally rooted in a particular kind of dualistic position and such attitudes in the modern world need to be very seriously interrogated. Yet, if you listen to the radio, if you listen to what's going on in the world, you will find that a general assumption that

this kind of dualistic religious thinking is fine, nothing wrong with it, perfectly OK. Yet, the troubles between them fester. We have to discover a philosophical position allowing tolerance between the two of them. It is very difficult to find tolerance between two ultimately absolutist dispositions. It requires a third perspective, a third philosophy that might compensate for and integrate the schism between the two. This will not be easily achieved and is not yet achieved.

I've chosen these three features— capitalism, individualism, and dualism – as three cardinal points within the Western world-view. Now we need to understand a little more clearly what world-views are and how they may have changed through time, because none of these world-views, none of these elements in our world-views which I've been talking about, are in any way sacrosanct throughout history.

The History of World-views.

There is a wonderful Russian philosopher called Mikhail Bakhtin who is not very well known in this country. He is mainly a writer on the structure of novels and the way in which the structure of novels and similar literature is related to the world -views of the times in which they are written. As part of his project he has considered the historical sequence of world -views. He argues for three main periods, chronotopes he calls them.⁶ The first period is Shamanism – the ancient matrix as he says it. Shamanism is extraordinarily interesting. It's a pattern of varying beliefs in the cyclicity of nature. It creates relationships with 'gods', which are actually forces of nature – forces of nature which determine the annual cycle. Its practices bring about adjustment to forces of nature through visualisation and often the use of psychedelics to create a close association between the Shamanic yogin or 'priest', the natural powers and the manner in which village people relate to those natural powers. Some of the Shamanistic systems are extraordinarily well adapted to the ecologies in which they exist, as in the Amazonian forest or in the Siberian tundra – quite extraordinary examples of intuitively skilled metaphysical adaptation to ecology.

The shamanic phase in the history of world-views gave place to viewpoints that we can call progressive dualism. Once overproduction of some commodities was achieved through agriculture, markets were established through the flow of goods. You had banks, you had businesses. Life was less concerned with cyclicity of the seasons, but rather with the acquisition of money and power, hierarchy, of leadership

or kingship. This was a linear vision instead of a cyclic one. You got a division between authority and those who were dominated. It was in this context that the the logocentric discourses emerged. You also got the emergence of high priests, bishops, popes, authorities, dogmas , coercion within religion. Here emerged a kind of authoritarianism including such things as the assumption of infallibility and the inquisition, and so on; a system of power in which the state and the religion became highly intermingled.

As for the third phase, Bakhtin argues very interestingly for a period characterised by reflection, a reflective world-view. In a reflective world-view the mind of the thinker becomes aware of the nature of what it has thought, the limitation of thought and begins to accept responsibility for what it has thought. For example , a thinker might discuss God. God? God is in his heaven. Maybe yes, but that's just my idea. Actually - I don't know. Mmm. That's reflective thinking. It doesn't necessarily mean that the thought was wrong, it just means that it was a thought and no more than a thought, a 'reification' in fact. It was the great philosopher, Kant, who really began to uncover this whole issue in Europe exploring how far we can ever understand ultimate reality, when ultimate reality is always in a sense a production of our own minds. This viewpoint became a key element in so-called post-modern thinking, and therefore it's relatively common today. Yet, as we shall soon see, it also appeared at least 2500 years ago , in the iron age of India, with the thought of the Buddha.⁷ We shall investigate the implication of this shortly.

So, our current Western world-view is a strange one in which we have a conflict between religious dualism and the scientific understanding of the world creating for many a deeply schizoid tension between the values of scientific exploration, the utilitarianism of economy, and the quest for something spiritual in the absence of any 'hypergoods.. There's an enormously confused interest in the spiritual in 'New Age' movements of various kinds. Most of these are easily perceived to be projections of individual minds despairing of something more relevant to life and death within a world of utilitarian values.

West and East.

This Western world-view is deeply divisive yet few realise that it's not the only one on offer. If you read learned texts about the history of world culture you quite often find they begin with Ancient Greece and proceed to the present time without a mention of the tremendous philosophical importance of India and China. Their cultures and philosophies are quite

often bypassed and simply ignored. This is indeed amazing today when the literature of great Indian thinkers and great Chinese thinkers in translation is well available through superb scholarship, particularly in North America. No-one really has an excuse for assuming that world culture began with the Ancient Greeks. A lot of very important things did indeed begin with the Ancient Greeks but that's not the whole story.

The key thing about these Asian world-views is that they are not dualist. They are holistic. Let's take an example – Confucianism. Chinese Confucianism, which is touched also by Daoism, assumed an intimate relationship between the Emperor and the natural world. The Emperor held the 'mandate of heaven'. Heaven was the natural world. Heaven was the universe. When something went wrong in the rule of an Emperor it was said that he had 'lost the mandate of heaven'. This means that in Confucianism there was a connection between political power and the natural world. They are not separated by thinking that allows the natural world to be forgotten while the political world is retained. No, the political world and the natural world interact with one another. This is an important holism. And we find much of this also in philosophical Hinduism, in Daoism, and especially developed philosophically and experientially in Buddhism.

If we are looking for an alternative to our western perspectives or for a way to modifying them then I put to you that Buddhism is the most useful of these Asian visions because Buddhism is essentially a never-ending enquiry. As my friend, the philosopher Steven Bachelor, puts it, 'Zen is enquiry'. That's what it is – it is enquiry. We shall see in a moment it is a special sort of enquiry, but it is enquiry. It's not an answer, it's an enquiry.

The essential point to realise in approaching Buddhism is that it is not just a rationalised philosophy or belief system. It is based in a never-ending enquiry rooted in the methodological practice of mental yoga. It resembles science in being a *subjective* empiricism.⁸ That is to say, an experimental investigation of the nature and practices of mind rather than an *objective* empiricism concerned with nature as perceived and measured by a mind. Unlike psychological science, however, its prime focus is not actually mind itself, but rather suffering. One could say, rather pompously, that Buddhism is a phenomenological soteriology. Sorry about that - but it's rather a good definition. What does it mean? Phenomenology means a psychologically based experiential investigation of suffering and soteriologically means that its function is to produce 'salvation', a resolution of suffering.

So we have here a system of active enquiry, a philosophical inquisition which is aimed at understanding the suffering of the mind with the purpose of finding something which is termed ‘enlightenment’, the relief from that suffering. The most important thing about this is that it is rooted in mental yoga as a prime method. The yogic enquiry is the essence of Buddhism. What is the yogic enquiry? Well, to put it very simply, meditation is a yogic enquiry. Why? Because when you sit in meditation you are looking into the mind and you are saying what is this? What is this experience now? Where is it? What is it? How is it? It is endlessly going in to the nature of mind. That’s what I call *subjective empiricism*. It’s just as significant for us as the objective enquiry in psychology that is essentially the description of mind, and the analysis of people’s behaviour. That’s objective. It’s fine. Nothing wrong with it but it is incomplete. The key point here is that the essence of Buddhism is subjective enquiry. Buddhism parallels Science in this very fact of enquiring. Of course, these two modes of enquiry are related and we must go on discuss their relationship.

The perspectives of Buddhism in relation to Science

One cannot simply assert that Buddhism is like science; one has to demonstrate it. The first thing to say is that there is no dogma in Buddhism. The Buddha himself said quite clearly that here’s an argument, here’s a viewpoint – if you like it, fine, come along and we’ll participate in investigating it. If you don’t like it, fine, find something else. This has remained true throughout the history of Buddhism; there is no coercion within Buddhism. This resembles Science in that the scientist can put forward a theory, an idea, and no-one has to believe it. It’s put there as something to be evaluated. Of course, that releases enormous discussion between those in favour and those against but there is no coercion to believe and no personal problem if you don’t follow it. In Buddhism there is no sin, but there is the making of mistakes. This shift in vocabulary marks a whole difference. No sin, but yes, one can make mistakes and one pays for them through karmic retribution.

What is the prime hypothesis of the Buddha? It’s called the ‘Law of Co-dependent Arising’ or ‘inter-dependent origination’.⁹ This argues that the universe has no single origin; it has always been a flux of causes and effects. The cause A comes up, has an effect B. B has an effect C. C has an effect D. B and C may also affect something out to one side – a parallel discourse going along. So there is a network of causes and effects always going on and on and on. This is what is meant by ‘inter-dependent

origination' because A, B, C, and D are all inter-dependently related with one another. The process can also come back in a circle so that the original A is also caused by the sets of circumstances within which it arises. Buddhism is a philosophy of causes and conditions. Causes arise and produce effects dependent upon conditions. This is an extremely simple statement, but it is enormously far-reaching. It means among other things that nothing can come out of nothing. There are always causes and effects and conditions. Equally well nothing can ever come solely out of itself for the same reason. And so on. There are therefore whole sets of logocentric, metaphysical theories which simply collapse in the face of the law of inter-dependent origination. Many of the great Buddhist philosophers spent a lot of time enjoying themselves destroying metaphysical theories through subjecting them to the arguments of inter-dependent origination.

This theory, this viewpoint, this 'law', is itself a hypothesis – it's a way of seeing. The fascinating thing about it is that it has some extraordinary parallels within Science. Now I'm not a physicist, so I'm on dangerous ground here, but there is support for this general view from quantum mechanics.

The story is this –the simple law of the Buddha became very much enlarged in a wonderful philosophy developed in China called Hua Yen, which is based in the Garland or Avatamsaka Sutra. It contains an extraordinary metaphor, a picture of the Law of Co-dependent Arising. Imagine a huge sky, hanging in it is a net known as the Net of Indra – Indra simply being the King of the Gods. This network consists of hundreds and hundreds and hundreds of diamonds, multifaceted diamonds all hanging in space. They are all mutually reflecting one another. Everything is reflected in everything else. The Empress Wu of China couldn't quite understand this metaphor and asked a leading teacher to demonstrate it for her. So he said - well it's like this. He fixed up a room with many mirrors – I think an octagon of mirrors. And in the middle, he put a lamp. Then he brought Her Majesty into the room and said, "This is the demonstration of the Net of Indra", because the lamp in the middle was now reflected millions of times in the octagon of the mirrors in the room.¹⁰

When these ideas first began to come to the West, people thought that's just amazing but how on earth does it relate to what we're talking about in Science? Yet then along came quantum mechanics, and the extraordinary thing about quantum mechanics is that the inter-relations between the quanta, the 'particles' or 'waves' of energy, which operate as

the most fundamentally known constituents of matter, perform in a way that makes that metaphor very valid indeed. I'm not qualified to go into quantum physics but my reading of the matter and checking it out with physicist friends shows that the way in which quanta relate together is in a mutual interaction of great complexity that could very well be expressed through the ancient metaphor of Indra's net.

So, right at the foundation of Buddhist thinking we have an extraordinary parallel with some of the most advanced thinking in contemporary Science. Furthermore, if everything is dependent on everything else, one would expect that in evolution the emergence of novelty would have been dependent upon conditions. Indeed, the evolution of humanity has depended on certain conditions in the past out of which the causal processes of genetic selection produced our species.

A lot of evolutionary theory has been quite simplistic, that is up until about 10 years ago. The way in which evolutionary theorists – and I have been one of them – used to think about evolution was to think of the environment and the organism as a dualism. The organism adapts to the environment. It does this by producing broods of offspring in every generation of which the individuals vary. Some of them are more suited to the environment than others. The ones that are most suited reproduce and spread and the population becomes adapted to the environment. In this view, there is always a fixed environment and a dynamic process of reproduction which is endlessly adapting to the environment. Two things therefore – life and environment; a dualism.

Recent evolutionary theories have shown that this approach is far too simple. Why? There is a viewpoint being developed by a colleague of mine, John Odling-Smee at Oxford, who talks in terms of 'Niche Construction'.¹¹ Niche is a term describing the way in which a species lives in its environment. For example, take the bird the Great Tit. It's quite a large Tit, a member of the Paridae family. It lives in trees but will also explore food on the ground, bird tables and so on. That's its 'niche'. The Coal Tit, a smaller darker coloured Tit prefers conifer woods. They are a prime feature of its niche. So the question is how do species evolve in their different niches?

John Odling-Smee has argued that species play major roles in creating their own niches. How does this argument work? Well, a very simple illustration of this comes from one of my own first PhD students – Steven Gartlan – who very sadly died recently. Steve was out in Africa studying a forest monkey and he noticed that along the forest fringe the

monkeys used to bring their fruit out of the forest, go 100 yards or so outside and climb up on a termite mound and eat the fruit there. What happened? They dropped the seed. The seed germinated and the forest expanded. So the monkeys were actually producing the extension of the forest which was their own habitat. There's a feedback here. The monkeys were helping create the habitat within which they were eventually to live. It's not simply a dualism of habitat and selection, the monkeys were participating in creating their own habitat.

This idea goes further. If you introduced some burrowing animal into a small island, what would happen? Well, first of all you had a nice neat and tidy virginal island with sand dunes and hills and a few trees. You introduce these animals. What do they do? They start creating burrows. Before you know where you are, they've spread widely and the whole environment is full of burrows. Now the appearance of burrows in a habitat where there have been no burrows before will produce a lot of ecological changes. The humidity of the soil is altered. The topography of the soil changes. The presence of nesting sites changes. The whole habitat begins to change as a result of the activities of the animals. So that after 10 years or so, when you come back to see what has happened, you find an entirely different habitat on that island as generated by the behaviour of the animals. The animals in relating to their habitat as first encountered have created their own domain.¹²

Such a viewpoint is obviously a holistic position, not a dualist one.¹³ What we evolutionists now have to consider is the way in which the activities of organisms themselves modify the habitat to create a changing world, the niche of the species. This example shows how something like the Law of Co-dependent Arising can be a relevant if simple expression describing a modern problem, the evolution of species in relation to their habitat.

The Buddha put forward a very simple yet elegant model of the mind. It is also based on the Law of Co-dependent Arising. He argued that there are five main features of the mind in constant interaction with one another. The first is sensation. If I pinch Malcolm, he'll feel a sensation. Secondly, there is perception. Perception is when Malcolm realises that it is John who has pinched him. Thirdly there is cognition. Malcolm is now calculating fast and comes to the conclusion that it's a joke and not an assault (Hopefully he comes to that conclusion) And fourthly there is the conditioned historical background to his cognition. If he was a particularly aggressive person, he might come to the opposite conclusion and bash me one. So you have sensation, perception, cognition, and

what's known as Sanskara in Sanskrit, namely the pre-determining conditioning factors which affect cognition. Lastly there is consciousness. You have a whole system here in which these psychological aspects are interrelating, co-determining features of mind. Although this is a relatively simple model, it's not so different from those which we use today.

But where is the self? No self appears in this system. Self, Buddha argued, is an imputation within cognition that arises from the activities of the five features. So I'm sorry, Buddha thinks you're just an imputation derived from your sensation, your cognition, your perception, and your predispositions and your consciousness – all that produces the impression that there's somebody sitting there. Sorry, says the Buddha, you're just not there in the way you think you are.

Now when a person holds onto this false impression that he or she exists as some sort of a 'thing', s/he will go on to examine what happened to him or her in the past and what might happen in the future and begins to create a narrative. This narrative emerges as the basis for the constitution of a self image, an identity. Amazingly therefore in the Buddhism of 2500 years ago we find this very sophisticated idea of the self as narrative which, I think you will agree, is not far different from a lot of ideas which we hold in modern psychotherapy and in modern psychology.

Indeed, after 2500 years, it seems we really haven't got very much further on. These parallels show that these fundamental ideas in Buddhism are compatible with scientific enquiry. As we have already discussed, Buddhism is fundamentally concerned with subjective rather than objective enquiry. The Buddhist Law of Co-dependent Arising came from the Buddha's direct observation of his own mind. He had been told by his Brahminical teachers that if he looked deeply into his mind he would eventually discover Brahman and that would be the solution to everything. But the Buddha was a deeply sceptical thinker. When he did this meditation - and he was a superb meditator - he found that whatever was going on there was caused by something which had happened previously; there was always some kind of process or condition which shaped what the mind was doing, even to the extent that when the mind began to disappear seemingly to become Brahman, that was simply because the removal of certain attributes of mind had left an empty space; it's not something which is absolute and final, it is part of the process of meditation. So the Law of Co-dependent Arising was born. The absolute Brahman was just another imputation.

I hope I've managed to persuade you that there is sufficient overlap between the empiricism of Buddhism and the empiricism of Science and, indeed, the empiricism which underlies the enquiry of psychotherapy, to justify an interest in the Buddhist viewpoint. What I want to do now is to suggest in a broad way that the manner in which our world-view needs to move is towards a holism that could repair the schizoid quality of our present split between economics and ecology, between self and other, between 'God' and person. What we need to do to replace that schizoid world-view is to regenerate some kind of a holism.¹⁴

Obviously, this cannot be the ancient Shamanism. Too much complex superstition is involved. Yet Buddhism, although ancient, is actually an exercise in the reflexivity of Bakhtin's third stage in world-view history, supposedly a modern development. Essentially the Universe is a mystery for us. We project images and ideas upon it – logocentric visions as powerful and divisive alternatives.. In relation to mystery, there can only be rational inference as a product of our own minds. Reflexive understanding knows this and does not promote dogma or coercion.

There are real problems for education here. One can appreciate the danger of illusions that may be fostered by 'faith' schools for example. Yet, in school, teenagers would be easily excited by the universal mysteries of world, mind and self. An educational approach openly presenting them would set the young thinking, wondering, get them going. Instead of having to believe this or that about Allah, God or whatever – however ethically sound such values may be, the fundamental metaphysical assumptions need to be exposed as out of date – actually by two thousand years!^{15 16},

Meditation and revisioning Self.

In the book from which I have drawn the material for this lecture, I end with discussion of such a possible education as a means for changing the global world-view. Here, however, before an audience with mainly psychotherapeutic interests I want to discuss something a little bit more specific to your own concerns.

One of the most important enquiries in Buddhism focuses upon the nature of 'self'. What then are the key Buddhist themes in this area. The first one is the Law of Co-dependent Arising, which we have already discussed.. The first 'Noble Truth' following from this is the truth of suffering, the fact of suffering. Why is there a fact of suffering? The second 'Noble Truth' says that the fact of suffering is because we believe in a self but

the self is necessarily impermanent. It has no ‘inherent existence’. This desire for permanence creates suffering. Why is it impermanent? Because of the Law of Co-dependent Arising. Processes endlessly keep moving; everything is impermanent; nothing is stable. Likewise the self. The self in a sense only exists as part of a process. We resist that. However bright and intelligent we are, we still want to hold on to ourselves as ‘things’. I want to hold on to John as an agent in the world. I don’t want to admit that I’m just a process with very dubious validity. I don’t particularly like that idea. None of us do. So, conventionally, we think of ourselves as agents in the world, agents with no actual reality as inherently existing ‘things’. John is just a name. The third Noble Truth argues that one can overcome suffering by intuitively examining the actual processes of the self. Meditation using yogic approaches to awareness leads to an understanding that when you dissolve the idea of agency you find yourself as part of a much wider process.

Such realisation can be an extraordinary relief because the self as constituted within its narrative is a kind of prison. If you practise certain meditations you may step out of that prison, you don’t discover yourself as an entity, agency has disappeared, but there is something otherwise completely wonderful that may be found, an openness to an un-self-concerned awareness of universal functioning. This is an empirical discovery, not a theoretical argument. But you’ve got to ‘do it’. The last of the four Noble Truths is the way to do it, and that talks about all sorts of things – basically morality, kindness, compassion, and wisdom. And wisdom is the tricky area within which you have to come to an understanding of what the ‘self’ actually is.

It may therefore be useful here to tell you about the kinds of retreats we do in the Western Chan Fellowship. The first one is called the Western Zen Retreat. This makes use of a process invented by an American called Charles Berner called the Communication Exercise. The Communication Exercise involves two people exploring a question together. The first question is always “Who am I?” Familiar kind of question? When Berner invented this system he called it the Enlightenment Intensive. We have to remember that Berner was an American and wanted to get places fast. He knew that enlightenment was a goal of Zen, so he called his thing “Enlightenment Intensive- “Man you can get there fast”. Actually in our system, we don’t think we get there so fast. But we do find things out. What is it that we find out? Well here’s how the process works. Imagine yourself doing it.

Suppose we were going to do a Western Zen Retreat here in this room, I would ask all of you to divide up into pairs. We create dyads – pairs. And each person in that dyad is going to ask the other a question. It's going to be – since we are all new to the system – “Tell me who you are?” Now the person receiving this request has five minutes to answer. After the five minutes the bell goes – ping – and the question is reversed. The person who has been asking the question now faces the question – “OK, now tell me who you are?” And so it goes on – ding, dong, ding, dong – for 30 minutes. After that there's a pause and then we start again, except that now each person is working with somebody else. So we shuffle around the room. If there's 30 people in the room there are 30 minus 1 – 29 people – to work with. So choose anybody and off you go again. Same question, no changing of question. The whole retreat requires a minimum of four days.

What happens? (Some of you may have actually done this.) What happens is a process which Berner called “clearing the barrel”. It works like this. Imagine yourself doing it. You're receiving a request repeatedly - every five minutes, “Tell me who you are?” And this is going on for say three or four days non-stop, except for breaks. To begin with people react naturally by describing things like I'm a dad, I'm an engineer, I'm a priest, whatever it might be, I'm a this, that or the other. They define themselves in terms of their roles – which is what usually happens in conversation at a cocktail party. What do you do? Well I'm a do-dah. OK, so everybody starts with that. But after an hour or two, this gets a bit tedious. So you may begin to say things like “Well, every time I listen to the news I feel quite depressed”, or “My mother died last week and when I think about that I feel terribly sad.” So something more personal is beginning to come up. That may go on for a while. The personal and the emotional are beginning to get linked. And, sooner or later, you begin to open your mouth and say, for example, “When I think of my mother's death --” and before you know where you are you're crying. Crying of course is absolute truth – that's where you are. There is no counterfeiting crying, - unless you're a brilliant actor – you're crying. And the other person receives this. What will often happen then is that this other person also picks up on something in their own life which involves grief, so that when it's their turn they are facilitated to express emotion, not necessarily the same emotion, but emotion too. So round about day 2_ -3 a room of people doing Western Zen Retreat is in a pretty emotional state. Also, they are playing a real truth game. Because if you don't play a truth game you can't move on the question – you're stuck – it just happens that way.

There are certain big barriers that arise. For example, I might remember something, say in my teenage, of which I am deeply ashamed. Whoops, I can't say that. So you don't. After a few hours it's still there, still coming back, so you start playing a cunning game in your head – Who can I safely tell this to? You look around the room until you see some nice warm cuddly kind of person who you think will receive what you have to say and you choose them for your next exercise and then you tell this shameful story. What happens? We all of us have something shameful to talk about – well most of us do. The person to whom the shameful story has been told realises that they can trust their partner, and may well reciprocate with a similar story. And this is true of things like shame and guilt and so on. And some of the stories that now start coming out are pretty hair-raising. All of us have some pretty tough stories to tell of our lives. And they begin floating around the room.

Do people get scared? Well, this is where the leadership of the Western Zen Retreat is very important. There are interviews available all the time. And interviews either arise when somebody wants one because they're stuck, or when you as an interviewer intuit that somebody needs an interview. The interview consists of just going over the same ground with the same question. The task of the interviewer is to make some suggestions from his or her intuition about where the practitioner is, so that when they return to the room they've gone past their block and are feeling free to explore further.

Now there are several strange features about this Retreat. Once you've thoroughly stated something, it does not come back within the frame of the Retreat. It may well come back afterwards, but within the frame of the Retreat it's gone. So the fact that I have told somebody or maybe several people about some painful event when I was a young man or a boy means I become free of it. This is what Berner called 'Emptying the Barrel'. and Berner, being American – a bit like Fritz Perls – used a pretty strong vocabulary about it. He used to say –“Well some things are very difficult, man, that's elephant shit, and some of it is not so difficult, that's chicken shit, and some of it is mosquito shit.” I think Berner worked with Perls sometimes.

The point is this - as you approach the end of the Retreat, people are coming across a sort of realisation. It might be something like this. Who am I? Look at all the things I've said, look at all the stories I've told – I must be all of that. Yes, I am all of that. Who am I? What is this 'all' that I am? And you may then go for an interview. And what the interviewer will say is - Are you sure about that? You might be not quite so sure,

there may be some residue which is not quite complete, not quite fully digested, and you go back again to some more sitting, some more “Who am I?” But eventually you may come into the interview room and say “Yes, I’m me. It’s OK. It’s all finished. I’m me, I’ve always been me. It’s a big joke really. Despite of all that dreadful stuff with Suzie, dear oh dear, it’s OK being me, I’m OK”, and then go out and suddenly, if you’re lucky, the world hits you. You go out into the yard of the farmhouse, you look at the landscape – oh, so beautiful. And you may, after some time, return to the interview room and say “You know, that we are all one thing, all one, it seems as if I wasn’t really there. No separation”. This is what we call a ‘one-mind experience’, and it can change a life because it is rooted in self acceptance.

How successful are these retreats? Well we’ve a few statistics. Broadly speaking about one quarter of attendants on a Retreat reach that kind of very positive conclusion; others have a very good wrestle with themselves and come to understand the way in which their minds work. Above all, they observe the extraordinary ways in which other people’s minds work and how all those other people’s minds work in ways very like their own, which is very comforting. They’re not alone any more. All of us have these problems. All of us share these problems. They go away feeling they’ve had a very valuable experience. There are a small number of people who don’t get it, and those are always a source of some concern. But most of them will say “I’m coming again, there’s something I don’t get here but I feel it’s important and I want to come and do it again.”

What do we make of this from a Buddhist point of view. The prime theme here is working with the ideas about the self. Note this is not purely an introspective activity. People are not being asked to endlessly introspect about themselves or to go on telling their stories for ever or to worry about their neuroses. The key to this process is a kind of self-disappearance of one’s narrative as one goes along. The actual nature of the conscious state changes, the subjective state alters. It’s no longer holding on to habitual self-concern. For those who eventually have a one-mind experience, all the stuff has just gone, it’s evaporated. They discover a state of consciousness where self concern has fallen away. In our lives, such a condition is rare. It’s not often that we actually drop self-concern.

I challenge people on retreats. I say, “What percentage of your thoughts are not concerned with yourself? Try it out for the next hour.” People come back looking a bit grim, because the truth is that we are subtly

concerned with ourselves almost the entire time – subtly if not grossly. We're not talking about gross egotism. We're talking here about the way in which one puts on one's lipstick, the way in which one adjusts one's face, the way in which one alters one's posture in relation to one's perception of another – all of these things are about self in varying situations. All of this is self-concern at a relatively low and innocuous level, but it still a subtle preoccupation with one's self. Should I have said that? Why didn't I say that? Whoops-that was a bloomer. It's all self-concern. It's quite shocking sometimes to realise that 90% at least of our time is actually self-concerning in that way. Check it out and see. See if you agree. Not a very pleasant thing to admit, but it's true. But if you go through this meditational process of 'Who am I-ing', you eventually end up in a state where you have dropped so much that, as it were, the curtains of the stage open and instead of seeing the landscape through a screen of self-reference, you see the landscape just as it is. The fact that this is extraordinarily freeing and wonderful allows one to call it a spiritual, experience. Indeed spirituality can perhaps be best defined as the absence of self-concern. Buddhism seeks the freedom of 'No-self'. This is the first form of it. Yet, this is not what is meant by 'enlightenment'.¹⁷

The Silent Illumination retreat is different. This is completely classical Chinese Chan. It follows the form taught by my teacher, Master Sheng Yen, a great Chan Master, who has been causing me a lot of trouble for a number of years! Silent Illumination is a fundamental Chinese approach. It consists of two elements: 'calming the mind' and intuition into the 'nature' of mind.¹⁸

The problem here is that until the mind is calm it's very difficult to see its fundamental nature. Why? Because self-concern is getting in the way. There's an endless network of mutually reflecting causes and effects, all of which are expressions of one's self-concerning narrative. 'Calming the mind' is not at all an easy process. There are many yogic methods for doing this –the one we use is called Total Body Awareness. We are trying to shift attention away from self-concern on to the simple experience of the body just being present on a cushion.

So we do a practice, which I've sometimes done with an audience like this. We sit and we focus exclusively on the sensation arising in a hand, then we extend that focus to elbow, shoulders, the opposite elbow and back to the opposite hand -around the circle of the arms. Then we focus on our buttocks on the cushion, legs and knees on the floor. Then we experience the back. And finally we put the head on top. All the while, we

sustain awareness of the circle of the arms and, if we lose it, we go back through the sequence again. Eventually, you become totally aware of the sensation arising within the body. The clear focus cuts out thinking very convincingly. You are then asked to open your ears and you begin to get a sense of huge space. Bare hearing is very strange. Supposing you're sitting near a stream, you can hear nearby bubbling, you can hear smooth flow. Further away you can hear a waterfall. And that measurement, that kind of mind measurement of distance gives one a sense of space.

In this meditation creating Total Body Awareness you thus allow yourself to be aware of space, you find yourself sitting in a vast space. The Tibetans call it 'Vastness' – a very good word for it. There's a sensation of floating in some spatial vastness. Something else happens. Those who are fully into total body awareness often think they've been sitting for five minutes when they have actually been there for half an hour. In other words the measurement of time changes. If you're really meditating well you lose sense of time. You enter a timeless world of vast space. And the more you do that, the more the subjective condition becomes clear.

To begin with, of course, many intruding thoughts are coming in. But eventually the silence practice brings you to something like a vast empty state. The question arises - What is this? What is this vast silent timelessness? The enquiry, an inner investigation, then consists of looking into this space with an implicit question – “Hey what's going on here?” Now this is not thought; it's rather like somebody going into a wood with the question “I wonder how many birds there are here?” You aren't actively searching– you're just waiting to see what birds come up. Similarly, this kind of enquiry is open to whatever arises.

You may come to a conclusion that what you are looking at could be described as something like a ground of being, the basis within which thought arises. It is like a mirror within which self as imputation and desire arises. It seems to be the root of what you're looking at. Such a place is extraordinarily freeing; there is no fear. In fact there is no emotion at all for there is nothing an emotion can be tied to. That's the practice of Silence with Illumination.

There's another practice for doing this which is a more Tibetan way. It's called Dzogschen meaning “great completion”. What is Dzogschen? It is primarily an investigation of this feeling of timelessness? Timelessness, if you think about it, is now, it cannot be past or future. If you start thinking about your own narrative, you're in the past. If you start thinking

about the future, hopes and fears, that's in the future. You are, in either case, in what the Buddhists call 'being in the three times' (past, present, future). Yet if you are in the timeless state I've just been describing, it is just 'now'. But what is 'now'? 'Now' is always already gone. There isn't even a now!. How could there be a now? It's gone. The now of 'now' has already gone. One becomes aware of a mere presence that's continuous. It's what I call 'surfing the wave of time'. Time 'now' is like a wave endlessly moving. When you meditate and get yourself into this state you are on the crest of the wave of time and you're just gliding across an empty ocean with no shores. Krishnamurti called it 'bare awareness'.

Sometimes after such experiences somebody may have a strange experience of ego reference dropping out entirely and for a period they will be experiencing the world as quite normal, absolutely normal but with no 'me' present. This is usually a consequence of practice yet it is not something that can be induced by will or wanting. If I want to induce it, I'm obviously still there with an active ego. This state is something that comes over one by 'grace'; it cannot happen by will of any sort whatsoever. This very exceptional experience is what is known as an Enlightenment Experience. As we have seen, the way to an Enlightenment Experience involves the uncovering of much groundwork. One may say that such an experience is the confirmation of 'no-mind'.

Buddhism is suggesting that we should look far more deeply into the nature of our own minds and our own attachments because whenever you get attached to anything, whenever you cling to anything, all of that is within the realm of the conventional. You are projecting 'realities' upon all the things to which you are clinging and attached. If you go deeply and experientially into the nature of phenomena and into that which the mind becomes when it disconnects from attachments, there arises an extraordinary freedom. How might that affect a world-view?

One can put it this way - if you are no longer attached to your self, you can afford to be more interested in other people. And, indeed, in Buddhism limited wisdom, merely understanding the self, is not enough. Enlightenment implies the arising of selfless compassion and of course, such a perspective would drastically reshape our views of others, society and the world. Could it be the basis of world education ?

The last thing I'd like to tell you about is the beautiful ikon of Avalokitishvara – the idealised Buddhist figure representing compassion. It is a tantric image for meditation. Avalokiteshvara has four arms. The first two arms are in front with the palms pressed together and the thumbs

inside. The right arm is out to the side turning a mala of beads, and the left hand one is out to the left holding a visualised flower. The two hands in front represent compassion and the Tibetans have a very precise meaning for ‘compassion’. Compassion is empathy with those who are suffering. The two thumbs that are inside the palms represent love – empathy with those who are happy, again a very precise definition. So, as you visualise your two hands in front enclosing the thumbs you give rise to empathy – empathy with all sentient beings, those who are suffering and those who are happy. The turning of beads represents all sentient beings without exception. Not only humans – all sentient beings. You are wishing this love and compassion to arise for all sentient beings. Meanwhile, the flower represents emptiness or ‘no-self’ as the root of insight and practice. Self as we know it has been revisioned. It becomes empathy with others and the whole of the universe.

¹ This lecture has been developed for a primarily psychotherapeutic audience from ideas in my forthcoming book: Crook, J.H. In press. *World Crisis and Buddhist Humanism. End Games -Collapse or Renewal of Civilisation* . New Age Books . Delhi. It is my hope that interested psychotherapists may develop these ideas in their own way.

² For good reads on this topic see: Boyden, S. 1987. *Western Civilization in Biological Perspective*. Oxford. Also; Stiglitz, J. 2002. *Globalization and its discontents*. Penguin.

³ See: Neisser U and D.A. Jopling. Eds. 1997. *The Conceptual self in Context*. Cambridge.

⁴ Taylor, C. 1991. *The Ethics of Authenticity* . Harvard.

⁵ See further: Belsey, C. 2002. *Poststructuralism. A very short introduction*. Oxford.

⁶ Bakhtin, M. 1981. *The Dialogic Imagination*. University of Texas. Austin

⁷ See discussion : Crook, J.H. 2007. *Shamans, Yogins and Indigenous psychologies*. In: Dunbar, R.I.M. & L. Barrett. (Eds) *Oxford Handbook of Evolutionary Psychology* . Oxford.

⁸ See : Crook, J.H. 1980. *The Evolution of Human Consciousness*. Oxford.

⁹ See :Loy, D. 1998. Nonduality; a study in comparative philosophy . Humanity Books. New York. Also : Macy, J.1991.Mutual Causality in Buddhism and General Systems Theory . The Dharma of Natural systems. SUNY.

¹⁰ See: Chang, Garma C.1972. The Buddhist Teaching of Totality. The Philosophy of Hwa yen Buddhism . George Allen and Unwin. London.

¹¹ Odling-Smee, F.J; Laland,K.N. & Feldman,M.W. 2003. Niche construction: the neglected process in Evolution . Princeton.

¹² For a psychological version of the above approach in application to humanity see: Crook , J.H. Psychological processes in cultural and genetic co-evolution . In : Jones,E and V.Reynolds.(Eds) 1995. Survival and Religion. Biological evolution and Cultural change. Wiley. New York.

¹³ A further notable and very important example of biological holism is the global perspective of James Lovelock. See Lovelock,J.1989. The Ages of Gaia. A biography of our living earth . Oxford.

¹⁴ There have of course been Western holistic philosophies starting with Heraclitus. In recent centuries Jan Smuts and A.N Whitehead have put forward suggestions. A most recent advocate is Thomas Berry : see Berry, T. 2006. Evening thoughts: reflecting on Earth as Sacred Community . Sierra Club. San Francisco. They have contrasted markedly with the main stream Cartesian approach to Science.

¹⁵ My book in press, World Crisis and Buddhist Humanism (note 1), ends by focussing on the significance of buddhistic (not necessarily Buddhist) education as a global orientation.

¹⁶ For a contrasting approach to this issue see: Hinde,R.A. 1999. Why Gods persist. A scientific approach to religion. Routledge. London and New York.

¹⁷ For further discussion of this retreat see: Chapters 8 and13 in Crook ,J.H.& D.Fontana (eds) 1990. Space in Mind. East -West psychology and contemporary Buddhism. Element. Warminster.

¹⁸ Sheng-Yen,Master (J.Crook editor.) 2002. Illuminating Silence. The practice of Chinese Zen. Watkins, London and New Age Books, Delhi.