Discussion paper

Reverence and responsibility in forest ethics

Inserting the meaning of life back into the culture of possession.



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Abstract

Current ideas about development often pander to one small subset of human interest maximising individual wealth. Desire for wealth is sweeping aside natural tropical forests. These forests cannot compete in terms of revenue generated per unit area with other land uses (such as cattle, soybean or palm oil). To avert the catastrophic consequences for global human well-being of such forest conversion, values other than profitability must govern forest areas. We may wish to change the value system purely out of human self-interest. But other nonhuman forest values also deserve serious consideration. These include values intrinsic to other living organisms in forest ecosystems, and to the spiritual dimension acknowledged by the human majority in its various forms. Such values challenge forest ethics and decision-making based entirely on human utility. The paper argues that spiritual reverence and biocentric responsibility deserve a place in the foundations of our forest ethic. We find a pattern to copy in the African notion of ecotheandric balance (balancing the interests of ecosystem integrity, spiritual reverence and human interest). African models of local democracy beneath the palaver tree also offer a way forward (their traditional local meeting place for reaching consensus through discussion). Humanity needs rational alternatives to forest ethics based on maximising individual wealth. It also needs systems of forest governance that are accountable to local communities.

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Disclaimers

- This paper is not an endorsement of (or attack on) any particular religious or environmental viewpoint. While I believe that there are good rational grounds for discriminating between different viewpoints, I make no attempt to do that here. Instead, this paper displays the extent of religious and non-religious beliefs that contradict the current development paradigm. It also highlights two areas of consensus with powerful implications for forest ethics.
- 2. This paper is not an attempt to use religions to bolster a preconceived development agenda. History is littered with inappropriate and often abhorrent attempts to twist religion in the service of such agendas. My intent is not to repeat such errors here.
- 3. This paper acknowledges that peoples declared adherence to world faiths does not necessarily equate with their real beliefs. It also acknowledges that people interpretations of faith may differ quite markedly. For this reason I limit the discussion of faith's impact on forest ethics to central themes of each faith. Even the most nominal adherents should at least be aware of such themes. I do not attempt to derive highly nuanced forest ethics from each faith. While this would be possible, such derivations would inevitably lead to arguments over scriptural interpretation which I am keen to avoid.

1. An introduction and structural overview

"If forests are the lungs of the world, then our planet is now in the throes of a coughing fit" (Heinonen et al. 2002)

To stop deforestation and its human fall out we need to use values beyond making-as-muchmoney-as-possible in decisions about forests (Earl, 1972). We could derive such values solely from humans and their interactions (Macqueen, 2004). So forest ethics – and forest decisionmaking - would restrict itself to assessing the current or foreseeable future balance of good and bad to humans (anthropocentric utilitarianism or consequentialism - Pinchot, 1947; Wood, 1991).

Forest ethics could also consider human interactions with 'others' that have intrinsic value and deserve moral consideration (Goodpaster, 1978). These 'others' might include God or other spiritual beings (Meye, 1987). They might also include other living organisms (Leopold, 1949). We prefer this broader approach because both spiritual beliefs and other living organisms (e.g. spirits, pandas or mahogany trees) observably shape the behaviour of lots of people.

How important might non-human influences be in affecting what humans do with the forest using their capabilities and freedom? Macqueen (2004) argued that just increasing choice - greater capabilities and freedom - is insufficient for development. It matters what we do with those capabilities. What we do with our capabilities or freedom hinges on three things:

- what we think has intrinsic value and therefore deserves moral consideration.
- how this moral consideration shapes day to day politics and decision-making concerning the forest
- how we strengthen social approbation for actions that include such moral consideration and social disapproval for actions that do not (Leopold, 1949).

The paper starts with evidence that spirituality and non-human life affect human behaviour. It then looks in more detail at the motivational power of divine logic or non-human concern. It also highlights the strong interactions between the two. Because these motivational powers have such wide currency it is necessary to consider some serious additions to anthropocentric approaches to forest ethics. We propose that spiritual reverence and biocentric responsibility might also be necessary foundations. We argue that their inclusion resonates with the traditional patterns of decision-making and resource use in many parts of the developing world.

2. The importance of extending moral consideration to non-human agents in forest ethics

Human interests tend to dominate what happens to the forest. In many instances, a very limited subset of human interests affects forest outcomes. For example, the desire for more money is often at odds with the low profit margins and long time frames of sustainable forest management in natural forests. Forests are often cleared as a result. Is this legitimate? Setting aside for the moment whether it would practically be possible to implement an alternative, a first question is this:

• "Are there sufficient grounds to merit a detailed consideration of non-human interests in defining what happens to the forest?" (this paper argues - yes)

Attfield (2003) argued that we *express* value systems through human judgements (anthropogenic). But this does not necessarily mean that we need to *derive* value systems

solely from human interests (anthropocentric). Other locations of intrinsic value may deserve a look, even if these do not necessarily rank on a par with human interests. Many writers argue that value resides with God or the spiritual domain (WWF, 1986; Tucker and Grim, 1994). Some insist that we extend moral consideration to all sentient beings (sentientist – such as animal rights activists – Singer 1976). Others wish to broaden this to all living organisms (biocentrism – where trees are also afforded intrinsic value -Attfield, 1981). Yet others wish to broaden this still further to ecosystems as a whole (ecocentrism – such as the Gaia theory and those who value ecosystems beyond their constituent parts - Lovelock, 1979; Rolston, 1983). But it is difficult to see what practical outcomes ecocentrism might add to those of biocentrism (Attfield, 2003).

It is notoriously difficult to know what people really believe. Relatively robust statistics exist regarding what faith people declare their allegiance to (see Figure 1). Yet experience suggests that there will be a spectrum of spirituality among such adherents. The spectrum runs from fundamentalism to complete nominalism. Moreover, diverse interpretations of scriptures and traditions by adherents also complicate ethical analyses! Even so, from a cursory glance at global statistics it is clear that we cannot dismiss non-human values out of hand (Gardner, 2002). For example, some 55% of the world's population declare adherence to two main monotheistic religions (Christian, Islam). Whether or not their adherence goes beyond superficiality, these people have at least nominally signed up to particular sets of values. And while many of these values may be open to interpretation, the core themes of these faiths have withstood many centuries of challenge. For example, judgement and value in Christianity and Islam rest with God – they are non-human in origin. Human roles are defined in terms of stewardship (e.g. Hessel and Ruether, 2000; Foltz et al; 2003).

A further 31% of the world's population declare adherence to multiple traditional religions (of which Hinduism, Buddhism, Chinese and African indigenous traditions form the largest part). Reverence towards plural deities and the interconnectedness of all things are prominent themes in such faiths. Adherents of these faiths therefore afford serious moral consideration to other living organisms (e.g. Chapple and Tucker, 2000; Tucker and Williams, 1997).

Only 14% of the world's population declare themselves as non-religious. But many of these would also champion the value of non-human life (agnostics, secular humanists and atheists etc) (See figure 1 – source Adherents, 2004). We have already noted that not all adherents will act on their beliefs and that figures of adherence are therefore open to dispute. The argument here is that the extent of professed adherence justifies the inclusion of non-human values in our ethical considerations. Irrespective of whether people fail to live out their professed faith – their declaration alone is sufficient grounds to consider non-human interests in defining what happens to the forest.

Starting assumptions are that any forest ethic should have widespread legitimacy or at least some semblance of statistic democracy. We must therefore pay attention to the implications of spiritual and non-human entities in these statistically important faiths. Significant areas of overlap and divergence between them are important for forest ethics. This is not to say that we should surrender our cognitive objectivity – where no opinion is better than any other and no values or obligations are binding. That there is discernable truth and falsehood is a prerequisite for deductive and observable logic (without which philosophical argument could not be made nor scientific conclusions drawn - Lewis, 1943). Objectivity about 'what-is', the traditional domain of scientific fact, is no more important than objectivity about 'what-ought-to-be', the traditional domain of religion and ethics (Gardner 2002).

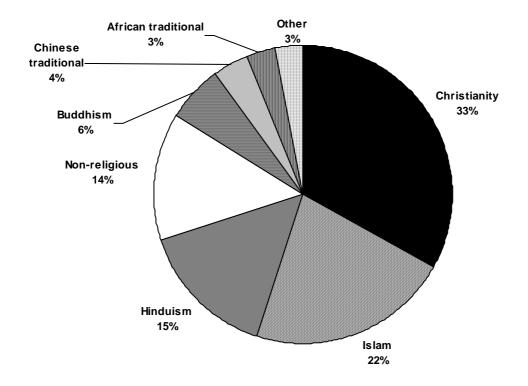


Figure 1. Adherents of the main world religions

Source: Adherents, 2004.

Two main areas of convergence amongst faith-based values of the world religions are:

- (i) **Spiritual reverence** there is both logic and wisdom in the recognition of the insignificance of humanity and the magnificence of the divine and / or the visible universe in our dealings with forests.
- (ii) **Biocentric responsibility** there is a both logic and wisdom in the recognition of the intrinsic value of all living organisms, their interactions with humanity and consequent obligations for sapient species in our dealings with forests.

Each of the major faiths contributes to notions of spiritual reverence and biocentric responsibility. It would be impossible to consider in detail the totality of even one such belief system in this short paper. Instead this paper opts to view these two concepts through the lens of the major themes in different faiths – looking at spiritual reverence in the light of two major themes of Christianity and Islam – and looking at biocentric responsibility in the light of two major themes in Hinduism and Buddhism. We could equally have chosen any other combination of faiths – no disrespect was intended by the order or content of the examples that follow.

3. Reason without repetition? The challenge of divine logic to forest ethics

For many, faith in God is an affront to science logic. Repetitive observation provides the basis for science, and science consequently allows predicable manipulation of our environment. Faiths are often tied to unique events and personal experience; one-off events of single

individuals with unusual or even miraculous outcomes. Faiths provide meaning within which to interpret our environment. Our second question must therefore be:

• "Are the positions of scientific logic and faith and their implications for forest ethics irreconcilable?" (this paper argues – no)

For adherents of monotheistic faiths such as Christianity and Islam the central theme is reverential faith - faith in and reverence towards or submission to the will of the creator God. Moreover, the will of God is quite explicitly defined through revelation. For example, prescriptions for human behaviour arise from a revelation of God's redemptive love in the Bible (Rebecca, 2003). In the Quran there is revelation of a viable social order that is just and ethically based (Ammah, 2003). While the detailed interpretation of God's will differs between these religions, respect for God and his absolute authority over creation is common ground. God establishes the intrinsic value that resides in the created order. At the same time, the revelation of divine will is clearly orientated towards human well-being. The sacrificial death of Jesus to set people free from slavery to sin in the Bible has a clear focus on humanity. The prescriptions for social order in the Quran also have human interest at heart.

Turning now to scientific logic – we might mistakenly assume that human interest must inevitably trump all other concerns. Yet scientific logic is just a tool – it need not be driven by anthropocentric interests. We can use it just as readily to expose the insignificance of humanity in the expanse of the universe. Or we might use it to champion the rights of other living organisms. We should not therefore expect the positions of science and faith to be irreconcilable. Both science and faith are linked to anthropocentric logic without necessarily being a slave to it.

If we take the main realms of human aspiration developed from anthropocentric logic (Macqueen 2004) we see a progression starting from subsistence needs and beyond as indicated by the downward arrow beside the first column in Table 1. We might then assess the contribution of forestry to each type of human aspiration (column two) and view them through the lens of monotheistic faiths (column three). An important point to note is that Islam and Christianity also describe a progression of human aspiration. But for these faiths the progression goes the other way as indicated by the arrow on the right. We return to this shortly.

 Table 1. Adjusting anthropocentric aspirations related to forests in the light of belief in God.

	Realms of human aspiration	Contribution of forestry to collective human interest	Adjustment for 'morally considerable' deity
ς 7	Subsistence, health and vitality	Distribution of forest contributes to global subsistence demands upon it equitably	out of reverence for the divine gift of life
	Present and future security	Distribution of forests contributes to a stable environment and secure future for all	out of reverence for the value intrinsic to all living organisms
	Inclusive social contributions and fulfilment	Distribution of forests contributes to social space for shared decision making and productive partnerships	out of reverence for the spiritual nature intrinsic to all humanity
	Creative work and use of its returns	Distribution of forest contributes to equitable global opportunities for creative endeavour (and returns from it)	out of reverence for divine purpose and our part in it
	Intellectual and aesthetic appreciation	Distribution of forest contributes to fair global opportunities for intellectual stimulation or aesthetic appreciation	out of reverence for the good in creation
	Identity, faith and culture	Distribution of forests contributes to global cultural and faith needs as and where appropriate	out of reverence for God

Neither Christianity nor Islam necessarily alter the content of human aspiration which might be derived purely from anthropocentric logic. This is not surprising, since the revelation of God in both major monotheistic religions is orientated towards the elevation of human aspiration. Instead, faiths deal with our identity and the motives for our aspiration. Put another way – there is nothing in major faith's aspirations for humanity that is illogical from a scientific perspective. Far from being irreconcilable with each other, science and religion can share logical conclusions about what is good for humanity.

But if human aspirations derived through scientific logic sit comfortably with belief in God we must answer another question:

• "Do faiths have anything to add to ethical prescriptions about forests?" (this paper argues - yes)

An immediate observation is that faiths turn the logic of anthropocentric aspiration on its head – inverting the downward arrow (on the left) into an upward arrow (on the right) in Table 1. Hierarchies of human need tend to start from basic survival needs (e.g. Maslow, 1943). For example, most development assistance programmes focus in on severe poverty and move onward once this is achieved. But Islam and Christianity both start with the central call to revere God:

The Quran places reverence for God at the centre of Muslim life, captured also in the *Shahada* or declaration of faith:

"In the name of God, the Merciful, the Compassionate. Praise belongs to God, the Lord of all Being, the All-Merciful, the All Compassionate, Master of the Day of Doom. Thee only do we serve; to Thee alone we pray for succour. Guide us in the straight path, the path of those whom Thou hast blessed, not of those against whom Thou art wrathful, nor of those who are astray (Quran 1:1-7)".

Shahada: "There is no God but God. Muhammad is the Messenger of God".

This Jewish *Shema* or confession of faith becomes also the first and greatest commandment of Jesus:

"Jesus replied "Love the Lord your God with all your heart and with all your soul and with all your mind. This is the first and greatest commandment. And the second is like it: 'Love your neighbour as yourself. All the Law and the Prophets hand on these two commandments" (Matthew 22 37-39).

The logic is simple, reverence for God spawns an intellectual understanding of the world, a creativity of endeavour, equity of social justice, a resultant peace and security, which together should ensure survival of humanity. The substitution of anthropocentric aspiration with spiritual reverence is more than rhetoric. Spiritual reverence provides both the motive for and societal framework within which transforming action takes place.

Such ideals are not automatically applied. There are many examples of calamitous misinterpretation or deliberate ignorance of central religious principles in pursuit of a particular end, often by nominal adherents of those faiths. Because of this, religious communities draw believers back to central themes that provide the motives and framework that shape human behaviour. So what is it that is counter-intuitive about spiritual reverence? What does it offer over and above anthropocentric logic? As an example, this paper briefly explores two important themes in Christianity and Islam.

In Christianity, perhaps *the* central theme is redemptive love from a Holy God to sinful humanity. Forgiveness establishes the context of moral freedom in which Christians act. God's unconditional love for sinners is counterintuitive. Jesus death pays the price for sin in all those that believe. Guilt or fear of divine retribution need no longer shape lives. Is the resultant freedom merely a freedom to act with impunity? The biblical response is a resounding 'No!' (Roman 6v1) Instead Christianity invites adherents to celebrate the beauty of Gods creation and channel their gratitude towards the fulfilment of the law (summarised as love for God and neighbours as noted above).

What relevance has this for forest-based livelihoods? The main issue is one of motive. The primacy of love towards God and fellow humanity, in the context of forgiveness and the celebration of Gods creation, stands against pursuit of profit as the main grounds for forest use. Indeed there are numerous biblical injunctions against the accumulation of material wealth – even though these are widely ignored in some nominally Christian cultures:

"The love of money is the root of all evil" (1 Tim. 6v10)

Instead spiritual reverence should direct our use of forest towards environmental justice (Miller-Travis, 2003). We can learn from quite revolutionary notions of Christian ecotheology being implemented in Africa for the conservation of forest-based communities (Daneel, 2003). A combination of careful stewardship founded in spiritual reverence and human concern is the way forward (Dryness, 1987). In short, the spiritual reverence found in Christianity should prompt much greater concern for each believers ecotheandric balance (Opio, 2004) than their bank balance. Their religion provides motive for environmental justice.

In Islam, the central theme of congregation (a just and equitable social order) provides the societal framework in which transforming action takes place. Three-dimensional sets of

relationships are defined in some detail in the Quran: *ibāda* - ritual faith and worship; *mu'āmalāt* - commercial and related transactions and; *imāra* - political governance (Dockrat, 2003). Within the Islamic model, trade is a means of ensuring equity, not profit. Each community ideally preserves geographical space for a 'free market' in which labour is rewarded rather than shop floor-space or other measures of capital wealth. Islam has traditionally been associated with an outlook based on human utility (Afrasaibi, 2003). But some recent scholars have argued that the Quran ascribes value to all living creatures as "signs of God", their very being a manifestation and revelation of his majesty and mercy (Özdemir, 2003). Yet others observe that environmental degradation is merely a symptom of a broader calamity that human societies are not living in accordance with the will of God.

From the perspective of forest-based livelihoods, Islam recasts human priorities towards a society ordered for the collective good out of reverence for God. There are numerous injunctions to use natural resources (including forests) for the benefit of the whole community – and not private property – guarding and protecting them. Similarly, there are many teachings against usury, wasteful consumerism and the excessive amassing of wealth (Nasr, 2003). This framework of a just society using forests for the common good and without excess also provides a strong motive for environmental justice.

In conclusion, two main themes from Christianity and Islam turn the conventional order of human aspiration upside down. Both faiths provide motives for alternative forest decision-making. They prompt a quest for environmental justice out of reverence for God and respect for neighbours and just society. They advocate forest solutions that are chosen despite their cost not because of it.

Faiths based on one-off revelations may prove problematic to scientists on account of reason that cannot be tested by repetitious observation. But the extent of religious adherence and its capacity to provide meaning and motive alongside scientific logic requires that we take such values seriously in developing a forest ethic.

4. Rights without reason? The floristic challenge to forest ethics

Having briefly explored, though by no means exhausted, what theocentric values might have to offer a forest ethic, we now turn to values intrinsic to other living organisms – and in this forest orientated discourse, we focus particularly on trees. Trees are a good test case because, while forest ecosystems comprise many different types of life, it is hardest to justify intrinsic value in non-intelligent life. To the best of our knowledge trees do not reason. Does this rob them of all moral consideration? In our series of exploratory questions we might therefore ask:

• Do trees have intrinsic values that might temper our use of them? (this paper argues – yes)

It is not possible here to rehearse the arguments for the value of trees so ably covered by Attfield (1981). It is possible to frustrate the ends pursued by human users of trees. This means that users of trees impart 'value' to trees. But trees also have ends of their own, a pattern of genetic coding geared to survival and reproduction. Trees and other living organisms therefore have moral status all of their own. Frustrating their ends - chopping them down before they reproduce - cannot be said to be morally neutral. This is before we consider any reciprocal duty that we might have for products and services received from adjacent living organisms (shelter, fuel, food, environmental stability etc).

If what we do to trees and other living organisms is not morally neutral, we must view our forest ethic through a biocentric lens. Taking the main realms of human aspiration developed

above (from Macqueen 2004) a biocentric outlook might look like the right hand column of Table 2.

Realms of human aspiration	Contribution of forestry to collective human interest	Adjustment for 'morally considerable' other living organisms
Subsistence, health and vitality	Distribution of forest contributes to global subsistence demands upon it equitably	Balance, not excessive demand from any one species, is sought for interdependent living organisms within changing forest ecosystems
Present and future security	Distribution of forests contributes to a stable environment and secure future for all	Ecological integrity is fostered (not undermined) by adjustments to biological diversity rather than the transition to unsustainable technologies in the face of change
Inclusive social contributions and fulfilment	Distribution of forests contributes to social space for shared decision making and productive partnerships	Social contributions within forest ecosystems are framed in terms of environmental justice.
Creative work and use of its returns	Distribution of forest contributes to equitable global opportunities for creative endeavour (and returns from it)	Creative forest production systems prioritise restraint and respect the ends to which each interdependent living organism is geared.
Intellectual and aesthetic appreciation	Distribution of forest contributes fair global opportunities for intellectual stimulation or aesthetic appreciation	Forest ecosystems are valued and appreciated for their integrity and diversity not for their manipulation towards human utility.
Identity, faith and culture	Distribution of forests contributes to global cultural and faith needs as and where appropriate	Identity and culture is defined by the realisation of our interconnectedness, the intrinsic value of all life, and the responsibility that entails for sapient species

Table 2. Adjusting anthropocentric aspirations related to forests in the light of biocentric considerations

Consideration to other living organisms is a prominent theme of non-religious and religious groups alike. In the two monotheistic religions, for example, there are strong advocates for value intrinsic to other living organisms (Cowdin, 2000; Özdemir, 2003). Yet the interconnectedness between humans and their biotic neighbours is perhaps most fully treated in the Hindu and Buddhist faiths and other traditional belief systems.

In Hindu literature, one of the main themes is that the Supreme Being resides in all (which in the *Śrīmad Bhāgavata Mahāpurāna* includes trees). The priority is to see the presence of God in all, and treat creation with respect without harming or exploiting others (Diwivedi, 2000). Human beings have no special privilege or authority over other creatures. On the other hand they do have more obligations and duties as befits their sentience. The doctrine of reincarnation (largely as other animals) further underpins the caution with which one must treat other living organisms. The righteous path of the Hindu religion, like that of Buddhism, is called dharma which in the *Mahābhārata* is defined as existing for the welfare of all living beings: hence:

"That by which the welfare of all living creatures is sustained, that for sure is dharma".

Karma, the consequences of actions, will reflect the path by which life is lived. A movement such as the Chipko movement (hugging trees to stop them being felled for profit) was one attempt at Dharmic ecology to ensure good karma (Diwivedi, 2000).

The Hindu theme of "God in all" includes specific treatment of forests in two epic narratives, the *Mahābhārata* and the *Rāmāyana*. It is here that the heroes of the books find their true nature (Lutgendorf, 2000). Sacred groves consequently form the basis for many Indian conservation areas. Yet it is the day to day respect for all nature that forms the central strand of Hindu belief. There is no separation of nature from the daily lives of humans pursuing their livelihoods – livelihoods that are hopefully saturated with Gandhi-like morality and restraint in the expression and fulfilment of human desires (Apffel-Marglin and Parajuli, 2000).

The central Buddhist theme is also that of interconnectedness. We act with wisdom when we fully realise our interconnectedness – a defining virtue of Buddhism (Sivaraksa, 2002). Buddhists believe that all things (not just living things) have Buddha-nature. There is one mind, which has Buddha nature as its essence. It shares a common aspect of every part of insentient nature, which also possesses the same Buddha-nature (Lancaster, 1997).

In a meeting on Culture and Environment in Thailand, most of the Thai delegates agreed that moral collapse was the cause of the growing ecological disequilibrium in Thailand. Failure in allegiance to the teachings of Buddha, also referred to as *dharma*, was the root problem (Sponsel and Natadecha-Sponsel, 1997). In some Thai monastic communities (*sangha*), monks 'ordained' trees. They wrapped them in saffron ribbons in much the same way that monks were ordained in order to save them from logging (Williams, 1997). The history of Buddhism as found in many Pali texts clearly indicates that monks saw the forest as a place to practice *dharma* – copying the Lord Buddha himself, born in the forest garden of Lumbini, leaving his palace on a quest for truth in the forest and finally, his *parinibbāna* enlightenment under a Sāl tree (Swearer, 1997).

In relation to forest-based livelihoods, we see great respect for the intrinsic value of trees in Buddhism. The faith stands against the use of trees as inanimate objects at the whim of human desire. Buddhism advocates restraint of human desire and boundless love for all beings as the foundation on which to build a forest ethic. As in the monotheistic religions, a combination of spiritual reverence and biocentric responsibility form a pivotal platform for human obligation towards the forest. More than 75% of the world population share such sentiments at least in their professed religious adherence.

5. What does reverence and responsibility mean in practice for forest ethics?

Ethics risk sounding good in theory, but meaning precious little in practice. The challenge is to transfer agreed rights and responsibilities concerning forests into the formulation and implementation of real policies. It needs to inform international conventions (such as the Collaborative Partnership on Forests, the Earth Charter etc.) and national policies (such as National Forest Programmes, Poverty Reduction Strategy Papers etc.). It needs to empower individuals to challenge policies that fail to build on reverence and responsibility. Our penultimate question is therefore:

• How can we harness the widespread acknowledgement of spiritual reverence and biocentric responsibility towards practical change?

Each individual with an interest in forests has a responsibility to fight to improve the content of operational documents and actions within their sphere of influence. The role of this paper is to clarify some of the improvements that might be made – and about which there is widespread moral consensus. An illustration of what to fight for is given below in Table 3. The first three sections of this table deal primarily with spiritual reverence and the latter three primarily with biocentric responsibility.

Replace policies and institutions and behaviour that	With policies and institutions and behaviour that	Key indicator – if the former, then press for change
View forests as a human possession or asset	View forests out of spiritual reverence towards biocentric responsibility	Are forest policies formulated in terms of ownership or stewardship (sacred trust)?
Strive to maximise forest utility	Celebrate the beauty and intrinsic value in diverse forest ecosystems and seek to restrain the consequences of human demands on them	Are forest policies based solely on consumption or do they consider wider ecological responsibilities?
Pursue exclusive interests particular to one nation or human interest group	Strive for stewardship of forests towards equitable collective benefits for all human and biotic agents	Are forest policies couched in terms of individual / sovereign rights or collective responsibilities?
Embrace technological progress and quantitative gains as the route to development progress and future security	Ascribe value to living organisms and see development progress and future security in terms of continuing ecological integrity	Are forest policy statements of development or progress phrased in terms of technical dominion or ecological sustainability?
Put economic growth and consumption first	Consider the full breadth of human aspirations and non- human values linked to the forest and pursue environmental justice - despite not because of cost	Are forest policies entirely based on human perspectives or are the impacts on non- human organisms given explicit treatment?
Evaluate forest outcomes on the basis of financial profit	Assess outcomes on issues that reflect the full extent of our responsibility (e.g. cultural identity, aesthetic beauty, creativity (toward restraint), environmental justice and ecological integrity.	Are forest monitoring frameworks based on financial summaries or qualitative indicators of broader ecological well- being?

Table 3. Checklist for change based on a forest ethic grounded in spiritual reverence and biocentric responsibility

The forest decision maker or practitioner can interrogate existing policies and institutions with such questions. She/he can challenge the legitimacy of such policies where they fall short of the broad consensus outlined above. More ambitious would be to map out a process of ethical dialogue on forests that might have the following aims (from Macqueen, 2004):

- Develop a workable consensus on the main realms of aspiration to do with forests grounded in spiritual reverence and biocentric responsibility
- Identify specific forest targets within each of these realms (e.g. 'desirable states' for the distribution of and benefits from different types of forests)
- Prepare practical criteria and indicators to monitor progress towards those desirable states.
- Insert such criteria with the national forest programmes of sovereign nation states
- Assess areas of potential conflict due to the unequal distribution of costs and benefits in pursuing these aspiration in nation states with different forest endowments

• Develop international mechanisms and institutions to compensate nation states for the unequal expectations on particular nation states in order to realise global collective aspirations for the forest.

6. Conclusions – searching for ecotheandric balance under the palaver tree

Our well-being requires a balance between physical demands of the body, intellectual demands of the mind and spiritual demands of the soul. Forests play a part in all three spheres. Readers might mistakenly assume that this paper calls for a forest ethic involving extreme aestheticism. We do note the widespread religious demand for restraint in terms of material consumption. But this paper does not advocate a path of complete mysticism, or a totally fruitarian diet (however beneficial these might be on the right occasion!).

Instead, this paper calls for a shift in forest ethics from preoccupations of 'having' and 'manipulating' towards 'being' and 'understanding'. Any serious contemplation of the world faiths or global ecosystem makes such a shift almost inevitable. Faiths challenge us to restrain our demands on the environment, refocus our intellect from technological dominion towards ecological appreciation, and make some appreciable gains in spiritual fulfilment into the bargain. That such trade offs can be made (and beneficially so) seems to be the only reasonable reading of global patterns of belief. It may soon become the only plausible option for our environmental future. Our final question is therefore open-ended:

• How might we bring a shift in global forest ethics about?

Challenging powerful institutions that shape the international forest context might seem an obvious starting point (e.g. UNFF, ITTO, World Bank etc). Yet in many ways it is these institutions that might find notions of ecotheandric balance most alien (i.e. balancing the interests of ecosystem integrity, spiritual reverence and human interest).

An complementary route lies in individual action. The cradle of civilisation in Africa, and many other traditional cultures and communities, provide patterns of reverential restraint and biocentric responsibility for us to copy (Opio, 2004). They are patterns that require individual commitment to collective ethics of restraint. For example, the Oromo ethnic group live with obligations to preserve resources for future generations on account of the web of spiritual, social and environmental links those entail (Kelbessa, 2001). The relationships that create such ecotheandric balance require a sense of local ownership, accountability and non-adversarial means of resolving disputes. Many Africans have traditionally done this under the palaver tree a communal place for discussion and decision (Sopova, 1999).

Local stewardship, responsibility and non-adversarial means of resolving disputes feel a long way from the corridors of global forest power and commercial influence. Yet forests are increasingly under communal control throughout the world (White and Martin, 2002). Proximity to forests in communal areas allows their magnificence to be keenly felt. Perhaps it is here that we might build a forest ethic that eschews consumption in favour of spiritual reverence and responsibility. The small unit scale of potential progress gives us each a role.

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