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TOWARDS AN ETHICAL FRAMEWORK FOR CLIMATE CHANGE POLICIES

INTERIM REPORT

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I. INTRODUCTION

There is widespread agreement that climate change poses serious challenges to humanity and the environment that require urgent policy responses from nation states, international organizations, business corporations, NGOs and governmental structures within nations cooperating with and supporting one another on a multiplicity of levels and across conventionally drawn sectoral boundaries. It is of equal importance to consider these challenges and policy responses from an ethical and not simply a scientific or political perspective. In fact, it can be argued that climate change first and foremost constitutes an ethical challenge to which we respond on the basis of scientific knowledge and with the tools of national and international policy. The ethical dimension of climate change, however, is not only related to its effects, but also to the manner in which we respond to these challenges. Furthermore, important ethical issues are raised by the manner in which we define the challenges of climate change.

The reason for this is that policies to respond to complex problems such as climate change depend on assumptions that rarely if ever derive directly from the issues to be addressed. Such assumptions typically include judgements about the nature and causal dynamics of the phenomena that constitute the problem. Even when firmly based on evidence, the judgements that frame policy are rarely immune from challenge, because they also include fundamental value choices about the kinds of lives and the future that we envision for ourselves and our descendents; indeed, there is often serious debate about what counts as “evidence” or “a problem” in the first place. Policy deliberation, therefore, inevitably has an ethical and not simply a factual thrust. Deeply held value assumptions and principles shape the definition of “problems” and the priority given to them, the kinds of “facts” that can be regarded as the basis of these problems, as well as the criteria that serve to map acceptable solutions. These ethical dimensions of policy deliberation, however, are usually not made explicit, and thus it is mostly very difficult to scrutinize and to critically discuss them rationally.

In this report we discuss the results of a study that was conducted by COMEST between November 2009 and June 2010 as part of its ongoing work on the ethical dimensions of climate change. The broad aim of this study was to determine the nature, scope and possible content of an ethical framework that could inform policy responses to climate change. The study included, among other things, regional workshops and continued reflection within COMEST and its working groups. COMEST has also taken note of views expressed by UNESCO Member States as to the desirability of a declaration of ethical principles in relation to climate change. In this study a number of issues were considered, one of which was the question whether a universal declaration of ethical principles related to climate change should form part of such a framework, and, if the answer to this question was “yes”, what, in broad outline, the principles are that could form part of such a declaration.

With a view to answering these questions, the steps that were followed in this study, within the context of expert workshops, were to consider firstly the issues ethically relevant to climate change, secondly the principles available to address

them, and thirdly the various policy options available to respond to the issues in light of the principles. It was only against the background of these first three steps that certain matters relating to the desirability of preparing a declaration of ethical principles in relation to climate change could be discussed. The structure of this report thus follows the discussion framework that was used in the expert workshops.

One of the significant findings of this study is that strong support for a universal declaration of ethical principles related to climate change was expressed by the experts participating in this study, although they were not unanimous in identifying which principles should be included in such a declaration, or on the question how some of the principles already recognized by the international community that have a direct or indirect bearing on climate change should be elaborated with a view to including them in such a declaration. There was also considerable support among the experts for a range of other policy responses to climate change in addition to, and in combination with, a universal declaration of ethical principles. However, before we report on the details of our study, it is expedient to provide relevant institutional background, and give an overview of the study method that was followed.

II. BACKGROUND

In 2008-09, the Environmental Ethics Working Group of the World Commission on the Ethics of Scientific Knowledge and Technology (COMEST) conducted a study on the ethical implications of global climate change. The study started from the observation that it is generally both naïve and unworkable to attempt to move directly from definition of a problem – even on the basis of evidence – to adoption of solutions. The policy relevance of ethics lies precisely in its ability to facilitate reflexive questioning about both problems and solutions.¹ Ethically grounded policies may be expected to be more robust and more inclusive than those that short-circuit ethics, whether by science or by political fiat.

The report of the study was discussed and approved in general terms at the 6th Ordinary Session of COMEST, held in Kuala Lumpur, Malaysia, from 16 to 19 June 2009, and the text was subsequently submitted as an information document to the Executive Board and to the General Conference of UNESCO.² Following minor revisions, the report was published in June 2010 under the title *The Ethical Implications of Global Climate Change*³ and is now an official COMEST document.

Reviewing the academic literature on ethics in light of the scientific and technological challenges of climate change and of the political context of climate change policies, the report concluded that ethics is “a constitutive part of all of the reasonably justifiable responses to the challenges of climate change. Therefore, it can be stated unequivocally that climate change cannot be dealt with adequately and properly if [its] ethical dimensions ... are not highlighted, well understood, and taken into account in decisions about responses.” (p. 38). The report was not intended simply “to make climate change a (new) theme of ethics, but rather to make ethics a core and necessary element of any debate about climate change and its challenges” (p. 38).

Furthermore, on the basis of its discussion of the draft report on *The Ethical Implications of Global Climate Change*, the 6th Ordinary Session of COMEST judged that “in view of the nature and extent of the scientific, social and human challenges of global climate change, which necessitate adoption of policies at the global level to address the pressing needs of the most vulnerable in the face of major uncertainties and the exigencies of international cooperation, it is

¹ *The Precautionary Principle*, Report by the World Commission on the Ethics of Scientific Knowledge and Technology (COMEST), UNESCO, 2005, offered a detailed statement of this procedural approach to ethics as a contribution to policy formulation. COMEST argued that the value of the precautionary principle lies precisely in its capacity to favour critical and participatory dialogue between scientists, policy-makers and the concerned public on possible risks and on provisional and revisable solutions. Available online at: [<http://unesdoc.unesco.org/images/0013/001395/139578e.pdf>]

² The version of the report submitted to the 35th UNESCO General Conference is available online as document 35 C/INF.31: [<http://unesdoc.unesco.org/images/0018/001849/184907e.pdf>].

³ *The Ethical Implications of Global Climate Change*, Report by the World Commission on the Ethics of Scientific Knowledge and Technology (COMEST), UNESCO, 2010. Available online at: [<http://unesdoc.unesco.org/images/0018/001881/188198e.pdf>].

urgent to determine universal ethical principles to guide responses to such challenges” and adopted a recommendation to the Director-General of UNESCO “that UNESCO should develop an ethical framework of principles in relation to climate change”.⁴

However, on that occasion, the precise nature of the ethical framework proposed and its specific policy implications were not explored. Furthermore, the report emphasized that climate change constitutes a challenge to established modes of ethical thinking that requires new work in ethics, and not just application of ready-made ethical approaches to new problems. Therefore, the development of a policy-relevant ethical framework is inseparable from the additional conceptual study to which the present report constitutes a preliminary contribution.

The report and recommendation of COMEST were among the factors that led the 35th session of the General Conference of UNESCO, in October 2009, to adopt a resolution⁵ requesting the Director-General to submit a report to the Executive Board at its 185th session, in October 2010, on the desirability of preparing a draft declaration of ethical principles in relation to climate change, following

- (a) consultation with Member States and other stakeholders, including relevant United Nations’ agencies, and
- (b) further study on the matter by COMEST and the UNESCO Secretariat.

Further study by COMEST entails, in the first instance, more detailed exploration of the policy implications of the ethical analysis developed in the report on *The Ethical Implications of Global Climate Change*, with particular reference to options for practical action that could be taken up by States, international organizations, corporations, civil society, and other stakeholders, and could enhance the capacity of societies to respond effectively to the present and future challenges of climate change.

In order to conduct its work in this respect, COMEST has organized a series of regional workshops, in conjunction with the UNESCO Secretariat, to discuss the key ethical and policy issues with experts from a wide range of disciplinary and geographical backgrounds.

The regional workshops – held in Dakar, Senegal (16-17 March 2010), New Delhi, India (29-30 March 2010), Yerevan, Armenia (19-20 April 2010), Yokohama, Japan (22-23 April 2010), and Montevideo, Uruguay (17-18 June 2010) – addressed four main issues:

- (a) the nature of the key ethical issues raised by response to the challenges of climate change;
- (b) the principles that are available, or could be developed on the basis of existing normative frameworks, to address such ethical issues;
- (c) options for action on the basis of such principles;

⁴ Recommendation of COMEST to the Director-General adopted at its 6th Ordinary Session.

⁵ 35 C/Resolution 36.

- (d) with respect to a possible declaration of ethical principles in relation to climate change, its advisability and, if considered advisable,
 - its aims, scope and structure;
 - its application, follow-up and impacts.

In addition, regional governmental consultation meetings were organized by UNESCO in Auckland, New Zealand (26-27 April 2010), Bangkok, Thailand (11-12 May 2010), and Belgrade, Serbia (24-25 May 2010). In agreement with the respective host countries, individual experts were invited to participate in these meetings. Individual experts' contributions are taken into account in the present analysis. Official government positions, on the other hand, are reported on separately by the UNESCO Secretariat.

The work conducted by COMEST since November 2009 has thus sought to respond to two distinct but complementary objectives. On the one hand, it is necessary to pursue ethics and climate change, in conjunction with UNESCO's established environmental ethics programme, with a view to sharpening the conceptual tools required to give an adequate account of climate change and its implications, including but not limited to policy response. On the other hand, COMEST is required to contribute to study by UNESCO of the issues relevant to assessment of the desirability of preparing a declaration of ethical principles in relation to climate change.

The connection between these two lines of work is that the hypothetical adoption of a declaration of ethical principles in relation to climate change is one possible policy response, the desirability of which should logically be considered with reference to a comprehensive policy-relevant ethical framework and in conjunction with other policy options.

Consistently with this approach, the present report constitutes an interim statement of provisional conclusions. After review by COMEST, taking account of the conclusions of the UNESCO Executive Board at its session in October 2010 with respect to the desirability of preparing a declaration of ethical principles in relation to climate change, the study on an ethical framework for climate change policies will continue. The focus will be on those issues specifically identified as relevant in this interim report, and a follow-up series of workshops will be organized.

III. ETHICAL ISSUES RAISED BY RESPONSE TO THE CHALLENGES OF CLIMATE CHANGE

The ethical issues related to climate change are not circumscribed to specific policy sectors. Nor can they be meaningfully compartmentalized to correspond to pre-existing divisions of responsibility between institutions, such as United Nations agencies, at the international level, or sectoral ministries, at the national level. The most characteristic feature of climate change is, on the contrary, that it cuts across the policy agenda in ways that call into question familiar framings and may require new forms of thinking as well as new modes of organization.

This is not a new finding. Indeed, it has been widely discussed in policy literature since the mid-1990s and largely contributed to the choice of structure for COMEST's work on ethics and climate change since the 35th session of the General Conference, including the organization of the regional workshops convened to canvass expert opinion on ethical approaches to climate change policies.

However, the initial assumption, derived from the work conducted by COMEST in 2008-09, now appears both better grounded and more practically relevant. This is the assumption that ethics is not one specific area of climate change policy, or an external perspective on it, but rather runs through all climate change policies.

Ongoing COMEST work, including the specifically convened workshops as well as other contributions, has revealed a fairly broad expert consensus that the challenges of climate change are not being adequately met – in terms both of understanding and of action – because they continue to be addressed in a fragmented manner that distorts their most significant features. Evidence of this fragmentation is clearly visible in the manner in which mitigation policies have, until fairly recently, been given priority over adaptation policies, the manner in which carbon reduction has been given centre stage in the design of mitigation policies, and the manner in which ethical considerations are virtually absent in international negotiations about climate change responses.

It is true that consultations with Member States on the desirability of preparing a declaration of ethical principles in relation to climate change, which have been conducted by UNESCO in parallel with the COMEST study, have not pointed to a consensual position. A number of UNESCO Member States have, in particular, expressed concern that the kind of comprehensive ethical approach to climate change policies suggested by the structure of the COMEST study, and broadly supported by expert communities involved in the process, is inappropriate because it ignores the limitations of UNESCO's mandate and tends to undermine the current architecture of the United Nations response to climate change.

However, while such objections undoubtedly bear on the desirability of preparing a declaration of ethical principles, especially in the short term, it is less clear whether they serve to undermine either the kind of comprehensive ethical

approach proposed here, or the work done by COMEST towards the development of an ethical framework for climate change policies.

III.1 Analysis of specific policy issues

In the expert workshops and related studies, a number of specific policy areas – suggested by various participants in international debate on climate change to be of ethical significance and deserving to be addressed in light of explicit principles – were proposed for discussion:

- Access to a scientific knowledge base adequate for design of appropriate response policies
- International development assistance
- Energy policies (including technology choices for electricity generation, taxation, building codes, etc.)
- Land-use policies (including agricultural policies, urban planning, etc.)
- Transport policies (in particular infrastructure planning)
- Policies with respect to migration and asylum
- Analysis of risk and vulnerability (including impact assessment)
- Curriculum design and other educational issues

Depending on the internal dynamics of each workshop, some of these issues were discussed in more detail than others. In this report, we reflect the extent to which these issues were discussed in the respective workshops, highlighting the themes actually featuring in the discussions.

Broadly speaking, a consensus has emerged from the expert workshops with respect to the key sectoral issues of *energy*, *transport*, *urban planning* and *agriculture*, all of which, it is argued, can be fruitfully addressed by explicit ethical consideration. Similarly, it appears to be widely agreed among expert communities that climate-driven *migration* raises issues that should be addressed in ethical terms, especially if – as seems likely – no structural changes are made to the international legal regime of asylum. It was duly noted that policy formulations in these areas do not fall within the competence of UNESCO. Action on the basis of ethical principles would thus necessarily depend on national policies or on coordinated action by other UN agencies. Nonetheless, clarification of ethical principles across sectoral boundaries would contribute to effective policies in response to an inherently cross-cutting agenda. Any questions bearing on the appropriateness of action by UNESCO therefore do not undermine the ethical significance of the issues themselves.

The other policy issues discussed in the course of the study proved more controversial, albeit for quite diverse reasons.

With regard to the issue of *international development assistance*, the international political, social and economic order was often analyzed in explicitly ethical terms. Indeed, some experts made very strong claims that climate change cannot be addressed at all if the fundamental structures of production and consumption within the global economy are not profoundly rethought. However, such claims are contestable, and in addition do not necessarily imply

support for an ethical approach to international development assistance, since a politically radical agenda of this kind calls into question both the language of “development” and that of “assistance”.

On the other hand, questions of *international justice* in relation to climate change were raised in other terms, notably with reference to the “compensation” that could be owed by major historical emitters of greenhouse gases to those, particularly in Africa and in Small Island Developing States, who could suffer disproportionately from the consequences of a problem to which they have contributed little or nothing. These considerations, which did not receive general support, were related to concerns about a reduction of international development assistance if funding for climate change mitigation – and even adaptation – was not allocated in addition to existing funds for development. In the absence of a criterion such as additionality, it was argued, international assistance for climate change mitigation and adaptation might primarily benefit emerging economies with fast growing emissions rather than the most vulnerable developing countries.

Access to an adequate scientific knowledge base was not discussed in detail during the workshops, although a link was made between risk assessment and the precautionary principle which is discussed in the following sections. Nonetheless, COMEST is of the opinion that such a lack of discussion does not mean that these issues are not important to consider from an ethical point of view and require further study. In section V of this report, we return to the topic of access to an adequate scientific knowledge base.

Risk assessment was also not discussed as a policy issue. Instead, themes related to risk assessment were discussed under the rubric of other topics, for example future generations, on which we report in section V. Similarly, the issue of *the integrity of climate science* did not receive much attention among participants of the expert workshops as an ethically significant policy issue. COMEST, however, is of the opinion that the ethical significance of quarrels about the validity of climate science is an important theme that deserves further study, particularly within the context of an assessment of the fundamental uncertainties that are addressed in climate science.

Finally, *education* was among those specific issues not discussed in much detail under the headings proposed for discussion in the COMEST study. However, as will be noted in section V, there appears to be widespread support for action by UNESCO, within the framework of education for sustainable development, to enhance awareness of the ethical challenges of climate change and build capacity for appropriate ethical reflection to enhance the ability of policy-makers and of societies generally to deal with them.

III.2 Analysis of broader issues

In addition to the specific issues discussed in the previous section, participants in workshops were invited to consider a range of broader issue areas, each of which is arguably of ethical significance with respect to climate change. The

following list was proposed, and participants were further invited to offer complementary suggestions:

- Human dignity
- Future generations
- Populations particularly vulnerable to climate impacts
- Climate-related disasters
- Access to vital resources
- Human security
- Empowerment and participation, with particular reference to the role of women
- Assessment of costs and benefits
- Biodiversity
- Moral status of nature and natural entities
- Indigenous peoples
- Cultural heritage

Based on time available, each group of experts concentrated in this section of the workshops on certain topics while some themes received less attention. For the purposes of this interim report, emphasis will therefore be put on those areas in which conclusions did emerge, whether based on consensus or on identification of specific disagreements.

In this regard, the most important lesson from this study is the existence of two fundamental and interconnected debates that have proved highly controversial and challenge, *prima facie*, the very possibility of an agreed ethical approach to climate change, or indeed to environmental issues in general. These two debates concern, on the one hand, the ethical status of human beings within the cosmos or the biosphere, and on the other hand the ethical significance of diversity or difference, understood in primarily cultural terms. At a general level, both debates are very familiar from the academic literature and from policy controversies. For present purposes, they will simply be summarized very briefly with specific reference to environmental issues, including in particular climate change.

Among general views of the origin of value in environmental ethics, one option emphasizes the central and privileged position of human beings who, as the only entities capable of ascribing value to others, necessarily give ethics its basis. Such a view is often summarized by the word “anthropocentrism”. However, it does not imply, logically, that human beings should necessarily be valued higher than non-human entities. It is perfectly consistent to argue that humans are the only source of value but that they should, for instance, give greater value to the Earth, or to the cosmos, or even to specific animals or plants, than to themselves. Indeed, many strictly anthropocentric statements of strong obligations incumbent on humans in their relations with non-human entities may be found in everyday practice from various spheres, as well as religious scriptures and academic literature. However, there does tend to be a connection between the ontological status granted to human beings and the practical priority given to their interests. A widely accepted statement of this position may be found in Principle 1 of the 1992 Rio Declaration on Environment and Development, which states that: “Human beings are at the centre of

concerns for sustainable development. They are entitled to a healthy and productive life in harmony with nature”.

While it is generally recognized that anthropocentrism, in this sense, does not necessarily imply practical indifference to the fate of non-human entities, it is nonetheless strongly rejected among many expert communities, particularly in Asia, the Pacific and Latin America, where it is criticized as culturally biased (effectively, as “Western”) and as philosophically indefensible in principle. From a conceptual point of view, these alternative perspectives, which are themselves quite diverse, argue that the moral status of human beings derives from their position within a cosmos that has independent ethical standing. According to this view, human perspectives cannot offer a “basis” for environmental ethics. In practical terms, opposition to anthropocentrism supports criticism of human rights and the rights of sovereign states as implying or authorizing neglect of the rights of non-human entities and of duties towards them. It can also lead to a rejection of economic approaches to environmental valuation and of market-based solutions, such as carbon trading, premised on pricing of “externalities”.

The criticism of anthropocentrism as “Western” points to the intersection with the parallel debate on diversity or difference. While different readings of the cosmos and of the position of human beings were offered by some experts in Africa and in Asia as alternatives for a potentially shared framework, the more common approach among participants in the workshops involved rejection of the search for any single, overarching framework that would establish a unique and potentially universal basis for environmental valuation. What is defended in the name of diversity is the entitlement of peoples, traditions, communities and others to have distinctive ethical perspectives, that cannot without loss – and therefore should not – be reconciled within a single universal framework. Such arguments obviously bear on the very possibility of developing a universally acceptable framework of ethical principles in relation to climate change, whatever its precise normative status.

COMEST, however, is of the opinion that there are two strong reasons to think that debates about anthropocentrism and diversity (i.e. debates about anthropocentrism and other world views) do not render ethical agreement impossible, although of course any attempt to develop a shared ethical framework must be very sensitive to the issues raised in the paragraphs above.

First, the challenge of universalism, from the perspective of an international organization such as UNESCO, is not to reconcile fundamental philosophical, cultural and religious differences but on the contrary, taking those differences as they are, to explore the possibility of practical consensus, both in those areas where background views actually intersect and in those areas where common conclusions can be drawn from contrasting premises. Given the strength of background disagreement, this approach to consensus-building is obviously demanding in procedural terms. With sustained efforts to promote dialogue between different cultural and religious frameworks, though, it is foreseeable that a shared framework can emerge to address the ethical issues related to climate change – with a broadly based support from different perspectives.

Secondly, and perhaps more importantly for present purposes, the specific features of climate change shift the terms of debate to a certain extent. On the one hand, there is no disagreement that the challenge is a shared one that establishes a common world and, thus, at least a minimal basis for solidarity. On the other hand, both the causal dynamics and the possible impacts of climate change give rise to new connections between people from different cultural and political backgrounds, as well as between humans and non-humans that cut across any crude distinction between anthropocentrism and its alternatives.

Whatever one may think, philosophically, about cultural differences or the place of humans in the cosmos, it is hard to deny at a practical level that human and non-human interests are intimately intertwined in the face of climate change. This does not guarantee that universal agreement could be reached on an ethical basis for thinking about and responding to the challenges of climate change. There is however no reason *a priori* to dismiss such a possibility.

Other findings from this study are more consensual. Indeed, they largely duplicate the conclusions drawn on conceptual grounds in COMEST's earlier work on *The Ethical Implications of Global Climate Change* (2010).

The first is the crucial importance of *equity* as an issue cutting across a number of the areas proposed for reflection, including in particular the position of vulnerable populations, access to vital resources, climate-related disasters, future generations and the position of women. In other words, each of those areas raises distinct technical issues, and certainly requires specific modes of action, but they also have shared ethical significance in terms of the distribution of burdens and benefits. There appears to be broad agreement that the tendency of climate change, in the absence of appropriate policy responses, will be to aggravate existing inequalities and thereby subject already poor and vulnerable populations to additional pressures that will severely impair their access to basic human needs. All policy responses should therefore have the key objectives of, minimally, not aggravating existing patterns of maldistribution and, in so far as possible, contributing to more equitable distribution.

The second finding is that policies are generally viewed as being not just ethically more acceptable, but also practically more effective, when they are based on *empowerment* and *genuine participation* of those affected by them. Principles 10 and 20-22 of the Rio Declaration give a consensual expression of this basic idea in general terms and with respect to women, youth, and indigenous peoples respectively. The argument that derives from the expert workshops emphasizes and extends this agreed requirement by making it a key issue for climate change policy development in general.

The third finding is that the position of *indigenous peoples* is regarded as constituting a key policy issue. This view has been expressed with particular strength in Latin America and in the Pacific but it is undoubtedly of broader significance, consistently with the Declaration on the Rights of Indigenous Peoples. It should be emphasized that the concern in this regard is multi-faceted. Indigenous peoples are often specifically vulnerable to climate change, particularly because of the connection between their cultures and their landscapes. But they also have specific knowledge relevant to adaptation to

climate change that should be drawn on, and indeed shared when relevant. Furthermore, in line with the earlier comments on pluralism and diversity, indigenous peoples are often the bearers of distinctive worldviews that deserve recognition within the global conversation on responses to climate change – both uniform and differentiated. It follows that it is their status as legitimate participants rather than their status as potential victims that has been emphasized in the expert workshops. And participation refers here not just to a fairly narrow range of traditional “indigenous” issues, though many may be of enduring importance, but to all the policy areas that affect indigenous people – which, for the reasons given above, constitute a very wide spectrum.

Finally, it should be noted that while the issues of *human dignity*, *human security* and *cultural heritage* were not discussed directly by participants in the COMEST workshops, reference to these issues was nonetheless made in the analysis of other themes of the discussion framework of the workshops. Since arguments could be made with respect to the importance of all three of these issues, among others, in the elaboration of the ethical issues related to climate change, efforts will be made in the future work of COMEST on this topic.

IV. ETHICAL PRINCIPLES THAT ARE AVAILABLE, OR COULD BE DEVELOPED, TO ADDRESS THE CHALLENGES OF CLIMATE CHANGE

In the previous section of this report, an overview was given of the views expressed by participants in the workshops on a wide range of ethical issues, some of which are related to climate change as a practical challenge, while others are related to ethical issues embedded in the policies currently available to respond to them, but often not widely recognized. Therefore our report next discusses the views concerning the ethical basis for adequate response to those identified challenges. This will entail a review of the principles, mentioned by participants in the workshops, on which ethical response could be based and which could also, more broadly, serve to analyze real-world situations and policy options that are being planned.

With these objectives in mind, COMEST has proceeded along two complementary lines, first reviewing a list of currently agreed principles, largely drawn from the report on *The Ethical Implications of Global Climate Change* (2010), and secondly considering possible new principles proposed in international debate, but not yet formally recognized in agreed international instruments. In workshops, space was also given, naturally, for experts to propose entirely new or currently controversial principles that could not plausibly be adopted by the international community in the short term, but could nonetheless make a useful contribution to international debate.

Before summarizing the key elements drawn from analysis and discussion of principles, it is however necessary to take stock of objections raised by a significant number of participants in the study to the language of principles itself, and thus to the basic structure of COMEST's approach.

IV.1 Attempts to challenge the language of universal principles

Reluctance on the part of participants to accept the general structure of the COMEST workshops was a somewhat unexpected but nonetheless striking feature of the advisability study. The arguments put forward in several workshops concerned the nature and significance of ethical "principles" and the reasons for proposing them as the basis for possible agreement in due course. Two complementary arguments were put forward in this regard.

First, it was often judged that emphasis on "principles" as underlying practical commitments represents a bias towards a certain form of abstract, deductive reasoning that is culturally specific and therefore inappropriate for the purpose of seeking broad consensus. In many cultural settings, it was argued, the suggestion that ethical behaviour is inherently reflexive, and should thus involve a search for the abstract principles that underlie particular actions or orientations, is inimical to the form of embedded ethics by which individual integrity and social belonging are defined. Given that claims about the rational basis of ethics are, indeed, put forward strongly in the COMEST report on *The*

Ethical Implications of Global Climate Change, this is clearly an area that requires further reflection.

Secondly, it was argued that basing ethics on “principles” entails a bias towards universalism that conflicts with forms of diversity and pluralism that, as noted in section II, were regarded by many participants in the study not simply as facts about, but as desirable features of, the world. Far from the search for practical agreement on commitments to act being facilitated by the emphasis on principles, it was argued, it might actually be impeded by it. This, again, is an area that requires further reflection, although it should be noted that, with specific reference to climate change, international attempts to reach practical agreement on action *without* specifying underlying principles have not been conspicuously successful in the past.

While it is clearly not the task of COMEST to try to resolve this issue in this report, it is noted that the objections to a language of principles convey a subtle message to COMEST to think in different terms than principles. However, no clear alternatives to a language of shared principles were articulated in the workshops. Since there are far reaching implications in letting go of a language of shared principles, or even of a shared discourse about principles, a number of specific questions will have to be answered in the future work of COMEST in this regard: To what extent are objections to a language of principles based on a rejection of the content of certain principles? For example: does a rejection of a language of principles actually entail a rejection of principles based on human rights? Or is a rejection of a language of principles rather a rejection of the assumption that it is possible to universalize certain principles? What alternatives are available for a language of principles? And what are the alternatives to consider in the place of a human rights framework?

IV.2 Relevance of currently recognized international principles

In order to assess the relevance to the ethical challenges of climate change of currently recognized international principles, the workshops started from a list of thirteen principles, along with reference to some of their sources, in order to explore whether they are relevant to the challenges of climate change (as identified in section II) and, if so, whether they require specific elaboration or development.

The list of principles studied, along with indicative sources, was as follows:

- Protecting human rights [*Source*: Universal Declaration of Human Rights (UDHR), with related Covenants]
- The right to a standard of living adequate for health and well-being, including food, clothing, housing and medical care [*Sources*: UDHR (Article 25); International Covenant on Economic, Social and Economic Rights; United Nations Declaration on the Rights of Persons Belonging to National or Ethnic, Religious and Linguistic Minorities; United Nations Declaration on the Rights of Indigenous Peoples; Durban Declaration; Universal Declaration on Cultural Diversity]

- A social and international order in which the rights and freedoms set forth in the UDHR can be fully realized [*Source*: UDHR (Article 28)]
- The universal right to share the benefits of scientific progress (which may imply a correlative duty to share scientific capacity, resources and/or data) [*Sources*: UDHR (Article 27); United Nations Framework Convention on Climate Change (Article 4); Convention on Biological Diversity (Article 12); Universal Declaration on Bioethics and Human Rights]
- The principle of equitable access to medical, scientific and technological developments (which may imply a correlative duty to share scientific capacity, resources and/or data) [*Source*: Universal Declaration on Bioethics and Human Rights]
- The precautionary principle [*Sources*: United Nations Framework Convention on Climate Change (Article 3); Rio Declaration on the Environment and Development (Principle 15); Cartagena Protocol on Biosafety]
- The principle of sustainable development (i.e. development that meets the needs of the present generation without compromising the ability of future generations to meet their own needs) [*Sources*: 1987 Brundtland Report; Rio Declaration on the Environment and Development (Principle 1); Johannesburg Declaration on Sustainable Development; Universal Declaration on Bioethics and Human Rights]
- The principle of safeguarding the interests of future generations [*Sources*: UN Framework Convention on Climate Change; Convention on Biological Diversity; UNESCO Declaration on the Responsibilities of the Present Generations Towards Future Generations]
- The principle of common but differentiated responsibilities [*Sources*: United Nations Framework Convention on Climate Change (Article 3); Rio Declaration on the Environment and Development (Principle 7)]
- The responsibility of States to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or of areas beyond the limits of national jurisdiction [*Source*: United Nations Framework Convention on Climate Change (Preamble)]
- The principle that the polluter should pay [*Sources*: International common law since the *Trail Smelter* case (US v. Canada, 1931-1941); Rio Declaration on the Environment and Development (Principle 16)]
- The principle of sustainability (in so far as it is broader than or distinct from the principle of sustainable development) [*Sources*: 1972 Stockholm Declaration; 1980 World Conservation Strategy; 1983 World Charter for Nature; 1987 Brundtland Report]
- The principle of the common heritage of humankind [*Sources*: Convention Concerning the Protection of the World Cultural and Natural Heritage; United Nations Convention on the Law of the Sea]

IV.2.i Comments on a human rights framework

A first important finding is the lack of strong consensus on a human rights framework (based inter alia on the first five principles in the list provided by COMEST for discussion) to address climate change in ethical terms. Even though it was explicitly stressed in the “framework for discussion” circulated in advance of all workshops that the numbering of principles was arbitrary and should not be interpreted as implying any kind of priority or hierarchy among them, the fact that human rights were mentioned first was taken as an implicit

claim of priority and attracted widespread, although not uniform, adverse comment. As such, these objections to the prioritization of human rights constitute an important finding of the study and therefore require detailed discussion.

First of all, while the discussion may often have been provoked by the misperception that human rights were being placed in a privileged position, the objection to a human rights framework was not eliminated by clarification of the presentational issue. What are objected to are two rather different things, which operate differently in different contexts.

- A significant body of opinion rejects the basis of human rights, i.e. the assumed philosophical privileging of rights over responsibilities that is represented, for these purposes, as being powerfully anthropocentric. Effectively, emphasis on human rights is regarded, for these purposes, as enshrining the rights of humans over nature.
- A second body of opinion, connected with the first but not identical to it, challenges the universality of the human rights framework, even as it concerns only relations among humans. According to this argument, which was presented powerfully in many of the COMEST workshops, the human rights framework enshrines an individualistic conception of humanity that neglects in principle and tends to undermine in practice community attachments and the essentially collective nature of ethical life as conceived by many peoples and cultures. A truly inclusive ethical approach to climate change would, on these terms, need to start from entirely different premises, and would include human rights only as derivative from more basic concepts (e.g. of responsibility) – if at all.

Secondly, while these arguments are very generic and do not bear specifically on climate change, workshop participants claimed on a number of occasions that the specific issues of climate change make the human rights framework particularly inappropriate. The argument is, in essence, that climate change is one symptom of an instrumental and ultimately predatory approach to nature that derives philosophically from an individualistic and materialistic ontology of which human rights are one expression. On the other hand, clearly, this criticism clashes with the prevailing policy framework of the UN system and would be regarded as profoundly objectionable in other cultural settings.

These preliminary indications point to two sets of questions. First, in the subsequent work of COMEST, it will be necessary to explore how significant in practice is the clash between a human-rights-based approach and responsibility-based alternatives. It could be argued at a theoretical level that exactly the same consequences follow – in terms of policies or in terms of individual obligations – whether one derives responsibilities from supposedly basic rights or rights from supposedly basic responsibilities. In the spirit of overlapping consensus, it should be explored whether the fundamental philosophical disagreements summarized here can be circumvented rather than resolved. The second challenge, at a more conceptual level, will be to examine the extent to which human rights principles can be restated without distortion or erosion in terms that make them immune to the dual charge of anthropocentrism and

ethnocentrism. This is obviously a long-term challenge for COMEST in necessary association with other expert bodies and agencies within the UN system.

One indication that the clash between human rights and alternative frameworks might be less severe than sometimes claimed is that, among the human rights principles proposed for discussion, the least controversial proved to be those relating to access and benefit sharing in respect of science. In fact, some of the objections to a human rights framework were linked to serious concerns about intellectual property right regimes and their consequences. Given that access and benefit sharing in respect of science are clearly principles of equity, designed to regulate relations between humans, and which if mobilized would serve primarily, in practice, to protect developing countries, indigenous communities and other non-hegemonic groups, they are more or less immune from the charge of ethnocentric and/or anthropocentric bias.

IV.2.ii Comments on development

The second important finding from the discussions on principles is that “development” needs to be problematized as one dimension of the worldview and social structure that has produced the problems of climate change. The principle of “sustainable development”, from this perspective, has generally been subjected to critical scrutiny rather than endorsed. The reasons advanced for the scepticism about development are directly related to considerations about the “carrying capacity” of the planet which entail, minimally, that any formulation of a “right” to development requires the elaboration of a development model that does not simply replicate the destructive potential of its historical antecedents. More ambitiously, but also more controversially, the view was expressed on numerous occasions during the study process that any notion of “development” is deeply problematic. In some cases, this concern was explicitly related to demographic issues. However, claims about the need for population control, and even managed population decline over the medium term, were endorsed by only a small number of experts and were explicitly rejected in most workshops.

It hardly needs to be emphasized that the most radical expert views on this issue clash sharply with what is politically acceptable within the international system. In addition many of these views relate to areas that are not related to science and technology. Nonetheless, such concerns about development do point to the connections between science and technology and issues of globalization, and therefore deserve to be noted, and taken further in appropriate forums. It is furthermore important to note that this radical critique of development points to the need expressed by some participants in the workshops for a whole new world to respond to the challenges of climate change. While it is not appropriate for COMEST to either endorse or reject this radical critique of development, further study and reflection on the ethical significance of this radical critique in the context of responding to the challenges of climate change, and more generally environmental issues, do seem to fall within the ambit of COMEST’s future work.

IV.2.iii Comments on sustainability

The third major finding is that sustainability, even without reference to development, requires further critical thinking in terms of its underlying ethical thrust. Assuming the standard formulation, derived from the Brundtland Report (1987), that something is “sustainable” if it entails meeting the needs of the current generation without impairing the capacity of future generations to meet their needs, it becomes apparent that, conceptually, specification of sustainability depends entirely on specification of “needs”. Several workshops discussed this problem in detail, with rather different conclusions, but a consensus did emerge that critical reflection on the category of needs would be a key area for future work within COMEST and would, furthermore, have important and direct policy implications. The main direction suggested by the discussions was that, beyond a bare physiological minimum, needs should be regarded as primarily socially constructed and therefore open to social critique.⁶ A specific implication in this regard, put forward notably in workshops in Asia, is that needs satisfaction should be made conditional on “frugality” (a notion that obviously requires more precise definition).

IV.2.iv Comments on the precautionary principle

The fourth major finding is that the precautionary principle – which is in fact among the more weakly institutionalized of the principles proposed for discussion – is deeply problematic even when circumscribed by the specifications proposed in the COMEST report on the subject. The difficulty is not at the intuitive level, where it is widely accepted that a precautionary attitude or approach is required in the face of scientific uncertainties involving the potential for serious and irreversible harm. Rather, the difficulty is to derive from this approach a practically applicable decision-making criterion. In so far as the requirement to take “proportionate” measures to prevent potential harm is indeterminate on the assumption that the likelihood of the harm cannot be specified, something akin to a vicious circle arises. This is of particular significance with regard to the ethical position of future generations, since the precautionary approach is often the only one available to deal with possible harm over very long timeframes. The requirement of proportionality reintroduces the familiar difficulties of cost-benefit analysis (e.g. the problems of discounting, as discussed in the COMEST report on *The Ethical Implications of Global Climate Change (2010)*), but in the absence of some criterion of proportionality (or of something playing the same role), the precautionary approach cannot specify any unique course of action – although it can, of course, point to the procedures required to make reasonable collective decisions on such matters.

⁶ For the avoidance of misunderstanding, it should be strongly emphasized in this connection that reference to a “bare physiological minimum” is not a trivial qualification. Hundreds of millions of people in the developing world currently lack access to that bare physiological minimum, where measured in terms of nutrition, clean water or sanitation. Furthermore, if the bare physiological minimum is defined in terms of the requirements for *healthy* living, it constitutes a fairly demanding standard. Nonetheless, it remains true that a significant proportion of the world’s population commands resources far in excess of any conceivable “minimum”.

IV.2.v Comments on the polluter pays principle

The fifth major finding is that the *polluter pays* principle is widely regarded as being non-ethical or even unethical and as leading to conclusions on issues relating to climate change that are problematic or even clearly unacceptable. The point is not that polluters should not be required to cover the costs of cleaning up their pollution. On the contrary, the strongest critics of the principle in the workshops were often the most ardent proponents of compensation to be paid (in one form or another) by those who have historically contributed most to greenhouse gas emissions. The claim is rather that payment, especially when defined by market-based mechanisms, should not be regarded as legitimizing pollution. It appears from the discussions in the various workshops that there is considerable lack of clarity about what “polluter pays” actually means, and in particular confusion between regulatory, tax, and incentive-based schemes that have different practical and ethical features. Conceptual clarification in this area is likely to be a useful direction for the future work of COMEST. In particular, one of the questions that should be addressed in this regard is whether it is appropriate to shift a clean-up principle to a prevention principle.

IV.2.vi Comments on other principles

Finally, certain principles gave rise to less discussion and produced much less clear outcomes. This was the case in particular of the principle of *common but differentiated responsibilities*, which was challenged by no one but was on the other hand generally regarded as ethically incomplete or even vacuous in the absence of specification of the basis for differentiation. No objections were registered to the basic principle of *historical responsibility* as one ground for differentiation, but it was nonetheless emphasized that other grounds were relevant (e.g. the general obligation to help those in need regardless of one’s contribution to their plight) and furthermore that historical responsibility does not give unambiguous answers to all the conceptual or practical problems raised by international response to climate change.

For different reasons, the principles of *cross-border state responsibility* and of the *common heritage of humankind* were also the subject of limited discussion. In these cases, it seems that lack of engagement was mainly due to a reluctance to engage in technical issues of international law with which the experts participating in the workshops were perhaps not familiar.

A complementary question discussed in the course of the study was whether there were other important ethical principles relevant to climate change enshrined in the international agreements referred to above, but not specifically mentioned in the list of COMEST. There were few specific responses, but one does deserve mention since it overlaps with certain important issues raised in section III, viz. the need to emphasize the *principles of participation* as enshrined in the Rio Declaration (Principles 10 and 20-22). There is some debate, as yet unresolved, whether such principles, which are primarily political, deserve to be regarded as “ethical” in nature. However, it is clear enough that outcomes compatible with general ethical principles of equity or justice are more likely to be attained when interested parties are fully involved in their

development and implementation. In that minimal, instrumental sense, the connection between ethics and participation is unquestionable.

IV.3 Possible new ethical principles to respond to the challenges of climate change

Notwithstanding the scepticism noted in section IV.1 about principles as a basis for ethics, considerable discussion was devoted in the various workshops to the principles, values or ethical orientations that could or should supplement internationally recognized principles as reviewed in section IV.2.

The most important broadly shared conclusion from these discussions is that, in order to underpin coherent and ambitious action to address the challenges of climate change, a clear statement would need to be developed about the interconnectedness of the global socio-ecosystem and the responsibilities that are incumbent upon humans as a consequence of their position within it. In practical terms, this could be regarded as a critical reassessment of the Rio Declaration, with a view in particular to reconsidering the anthropocentric orientation of Principle 1. Such a statement, for the reasons already discussed in previous sections, should not necessarily take the form of an overarching “principle”: indeed, ensuring its sensitivity to the diversity of worldviews would precisely be an ethical priority in this regard. It should be noted that the diversity of worldviews was clearly in evidence in the study. Neither the nature of the “interconnectedness”, nor the position of humans within the ecosystem, biosphere or cosmos so understood, can be regarded as consensual across regions, or even necessarily across philosophical and ideological divides within each region. Therefore, while the Earth Charter has been proposed as one source for such a statement – especially in view of its recognition by the UNESCO General Conference as a relevant source of ethical principles –, it has also been subjected to criticism on the grounds that its language and frame of reference, although subjected to wide-ranging consultation, are culturally specific in so far as they are, supposedly, bound up with a secularized Christian perspective.

Other indications from the expert workshops correspond not to a broad consensus but rather to specific contributions of interest, often shared by a subgroup of experts, and that deserve to be further explored at the conceptual level. They have largely been anticipated in previous sections and it therefore suffices at this stage to note them:

- the need for an adequate conceptual and practical basis for diversity,
- the need to rethink the basis of international solidarity in the face of new international challenges, beyond the conventional framework of “development” and “aid”,
- the need to provide a much more precise specification of the issues relating to forbearance, frugality or “enoughness”, as it was specifically phrased by one group of experts, in order to lay the foundations for a systematic ethical analysis of consumption and production, and finally
- the need to think beyond a rights framework about the ethical duties of guardianship or trusteeship with respect to non-human entities or the distant

V. REVIEW OF OPTIONS FOR POLICY-RELEVANT ETHICAL ACTION

The last of the three steps of the COMEST study is to draw conclusions with regard to the practical policies that could respond ethically, on the basis of shared principles or of some other agreed framework, to the challenges of climate change. To this extent, section V of the present report builds naturally on sections III and IV, and indeed overlaps with them in part, since the distinction between issues, principles and policies is primarily analytical. Nonetheless, as will be shown below, the outcome of the first stage of the study justifies the assumption that analysis of policies does not simply duplicate consideration of issues and principles. Indeed, the discussions in the various workshops provide useful indications about possible future action by COMEST itself, in terms of intellectual work and follow-up studies; by UNESCO, in its areas of competence; and by other entities that might find the preliminary conclusions of this report persuasive.

The approach to climate change policies in the COMEST study, and in this interim report in particular, is consistent with, but much broader than the UNESCO study on the desirability of preparing a declaration of ethical principles in relation to climate change. One task for COMEST is to provide input to the latter study, but there is also a broader agenda, derived directly from the conclusions of the report on *The Ethical Implications of Global Climate Change* (2010) and from the mapping of issues summarized in section III above. Precisely because of the cross-cutting nature both of climate change and of ethics, which necessarily challenge existing frameworks for action and engage potential actors at a wide range of levels, no simple mode of action can be expected to exhaust the ethical agenda. It is in this sense that consideration by UNESCO of ethics in relation to climate change should not focus exclusively on the (important) question whether or not to proceed with the drafting of a declaration of ethical principles in relation to climate change.

In order to solicit input on policy options to respond ethically to climate change, the COMEST study identified a number of possible modes of action, deliberately covering a wide range of levels and modalities. Participants were given the opportunity to indicate whether each might be a priority, a useful option, of limited relevance, or excluded from consideration. The proposed list was as follows:

- Education for sustainable development
- Media campaigns and other awareness-raising programmes to promote social consciousness of ethical responsibilities
- Adoption of national action plans to promote ethical responses to climate change
- Development of coordinated international action plans to promote ethical responses to climate change within relevant intergovernmental fora
- Adoption of codes of conduct or charters by the private sector and civil society
- Enhanced international scientific cooperation to clarify key ethical issues and potential responses

- Adoption of a universal declaration of ethical principles in relation to climate change

The first conclusion is that the general approach to ethical policies adopted in the study has broadly been validated, not just by experts participating in COMEST workshops but also, on the basis of the information available, by many Member States. This is shown by the fact that, while not all participants necessarily supported all (or even many) options, no objections were registered to the principle of envisaging a range of options⁷ and no claims were made that the various hypothetical policies were mutually exclusive. Indeed, the point was often made that various levels of action, e.g. through education, policy support and civil society mobilization, can not simply be compatible with but actually complement each other in terms of ensuring a comprehensive response to the ethical challenges of climate change.

However, it is one thing to agree that, in principle, various modes and levels of policy action might be relevant; it is another thing to identify those policies that should be implemented on a priority basis, especially with specific reference to the competence and programmes of UNESCO. On the latter point, the findings of the expert workshops are quite diverse and must be regarded as in many respects inconclusive. Nonetheless, as noted, they provide some very useful pointers for the future work of COMEST and, it is to be hoped, for UNESCO programmes as well.

V.1 Education and awareness-raising

The second tentative finding at the policy level, in light of these general comments, is the value that participants in the meetings generally attached to education and awareness-raising activities. This key role of UNESCO they largely took for granted. The point is not simply that policy-makers and the general public should be better informed about climate change, which would potentially simply duplicate existing UNESCO activities in education for sustainable development and in media communication about climate change. The claim that appears to be supported by the participants in the workshops is, rather, that *ethics* has a specific role to play in education and awareness-raising.

The issue is not, primarily, the teaching of ethics as a specialized discipline, although there does seem to be broad agreement that graduate-level training in a range of courses with environmental relevance (including engineering and economics in particular) would be enhanced by the inclusion of ethics modules, and that this would in turn enhance capacities to deal with climate change at the required comprehensive and cross-cutting level. Rather, the objective supported by participants in the study appears to be that key ethical considerations should

⁷ Objections have been made by certain Member States to the scope of the COMEST study. However, these bear on the organization of the UNESCO process to assess the desirability of preparing a declaration of ethical principles in relation to climate change and reflect conflicting interpretations of the resolution of the 35th session of the General Conference on this subject. The objections are not, it seems, to the suggestion that a diverse range of policy options may be relevant to an ethical response to climate change.

be built into education about environmental issues, including climate change, at all levels. Needless to say, this is a major challenge, which calls *inter alia* for critical thinking about the teaching of a range of disciplines including history, geography, biology, chemistry, physics and economics.

The connection with education is, however, not only pedagogical, as indicated by the parallel and complementary emphasis on awareness-raising. Participants in the meetings laid considerable stress on individual responsibility for one's environmental "footprint". In this respect, it is of considerable importance that individuals, especially considered as consumers, are often unaware of the implications of their choices for the broader socio-ecosystem of which they are part and therefore cannot be expected to take full and informed responsibility for their actions. A number of participants in workshops put forward radical positions calling for the rejection of consumerism, which is undoubtedly too controversial to be generally accepted, while it is at the same time an important area of concern to explore in further study. Nonetheless, the more modest proposition that climate change cannot be adequately addressed at the required comprehensive level without a much broader approach to responsibilities, including those of individuals in particular, remains persuasive.

A final point about awareness-raising, raised in some workshops although not systematically explored, is that it itself has ethical requirements. The issue, for the reasons discussed above, is to improve understanding of science, including the uncertainties of climate change and other sciences, and of ethical issues raised by climate change and the interaction of humans with their environments, and thereby to promote what might be called in general terms responsible environmental citizenship. It is reasonable to assume that these objectives might be undermined by poorly designed educational or awareness-raising campaigns, however well intentioned. More detailed consideration of ethical specifications for education and awareness-raising will be a matter for further work at a later stage, in conjunction with existing UNESCO programmes in the relevant areas.

V.2 Policy support

The third tentative finding is that the ability of ethics to contribute directly to policy formulation is viewed very differently in different contexts. In some developing countries, and particularly in Africa, there is clear interest in the development of guidelines that can assist in the elaboration of national policies, especially with respect to adaptation, that take due account of key ethical objectives such as prioritizing the needs of the most vulnerable, safeguarding the interests of future generations, and reflecting the interconnectedness between human and non-human requirements. The possible role of UNESCO in contributing to such guidelines, within the terms of existing cooperation and policy support programmes, seems also to be recognized. In other regions, on the other hand, the need appears not to be perceived in the same way, possibly because national capacities are felt to be adequate, and possibly because there is resistance, on the "diversity" grounds discussed in previous sections, to the idea of any uniform framework, even expressed in the form of indicative guidelines. As for the more specific idea of ethical "action plans" to ensure

cross-cutting incorporation of ethical concerns into all relevant policy sectors, it was received with some scepticism, not because the objective was felt to be inappropriate, but because the mechanism was judged excessively bureaucratic in a context where many countries' policy capacities are already overloaded by the proliferation of (often internationally mandated) "plans".

Similar scepticism was expressed in many workshops about ethical coordination of international action. Again, the issue is not that a stronger role for ethics in international climate change policy is rejected. On the contrary, most participants in the workshops have expressed dissatisfaction in various forms with the current direction of international response to climate change, including the dynamic of UNFCCC negotiations. This dissatisfaction is indeed the main driver of support for the prospect of a declaration of ethical principles in relation to climate change, which will be discussed in more detail below. However, there does not seem to be general support for the idea of a specifically ethical approach to *coordination* within the international climate change regime. Rather, the challenge as perceived by most participants in the study appears to be the incorporation of appropriate ethical perspectives within the coordination mechanism – which, depending on assessments, might be compatible with the existing framework or require a new architecture taking account more specifically of the requirements of coordination, especially with respect to the contribution of the specialized agencies.

V.3 Scientific cooperation

Views expressed on scientific cooperation, which was not typically discussed in detail at most workshops, have a paradoxical character. On the one hand, there is unanimous agreement that it is valuable and that it is UNESCO's role to enhance it. Indeed, several workshops have led to specific proposals for new mechanisms of scientific cooperation at regional level, often explicitly connected to COMEST. The objectives of such mechanisms (networks or study groups, depending on the circumstances) are generally formulated in terms of conceptual clarification and of enhancement of regional capacities to contribute to and to influence international intellectual debate. Academic objectives relating to the teaching of environmental ethics, including exchanges of staff, students and curriculum-relevant resources, are generally also put forward.

On the other hand, such initiatives, while judged to be valuable in their own right, are not regarded as having a policy dimension. This is understandable in one sense, in so far as ethics is in the first instance the subject matter of a proposed set of activities. However, it is also somewhat misleading to disconnect the strengthening of academic capacities in the area of environmental ethics from the reinforcement of public awareness and policy capacities in the area of ethical response to climate change. In principle, scientific cooperation could be regarded as a key upstream contribution to the other policy objectives that are generally supported and, on that basis, can be granted valuable dual legitimacy. It is likely that these minor problems can be resolved in the process of implementing specific ideas for scientific cooperation at regional level.

V.4 Voluntary commitments

Ethical objectives do not necessarily need to be pursued by “policies” in the strict sense – still less by regulation that gives legal form to specific principles. Ethics can also be embedded in concrete social practices, and thereby have real effects on behaviour and social structures, by means of voluntary commitment, the essence of which is that those actors who subscribe to certain principles or values act unilaterally, without waiting for any requirement or incentive to do so. Both the power and the limitations of voluntary commitment are well attested from numerous examples at local, national and international level. It is a matter of judgement in particular cases whether voluntary commitments, on the part of individuals, business or civil society groups, are likely to produce significant outcomes or not. With respect to climate change, one can certainly make a *prima facie* case that sharp disagreements about the issues within and between societies, and major barriers to comprehensive and consensual regulatory frameworks, create the conditions in which voluntary commitments might be relevant, for those subscribing to a certain view of the urgency of action. How UNESCO or other international bodies might contribute to such voluntary frameworks is, at this stage, an open question.

On the other hand, the view was expressed in many workshops that the key challenge is to give a binding character to ethical principles. This position was defended, in particular, by those participants most critical of the current (supposedly unethical) state of international discussion on climate change. While the emphasis on developing binding instruments is not *ipso facto* incompatible with promotion of voluntary commitments, it does nonetheless direct attention in a very different direction. This is no doubt one explanation of the somewhat paradoxical outcome of the workshops. The principle that the potential of voluntary commitments deserves careful study, and perhaps practical attention, has been quite widely supported. However, there has been little specific discussion of what exactly might be done, how and by whom to further such an objective. It appears therefore that further work is needed to reach practically relevant conclusions in this area.

V.5 Desirability of preparing a declaration of ethical principles in relation to climate change

While the desirability of preparing a declaration of ethical principles in relation to climate change was placed in a fairly peripheral position within the agenda of the workshops, it inevitably received considerable attention in so far as participants were aware of the broader UNESCO context and often more strongly interested in this policy development than in others proposed for their consideration.

One of the most striking findings from these workshops is almost unanimous agreement among expert participants that such a declaration is desirable, that it is timely and indeed urgent, and that UNESCO is ideally placed to develop it. Furthermore, the factors that detracted from full unanimity were not connected to disagreement with the judgement in principle, but rather to scepticism about feasibility, given the political constraints. As stated independently by a number of experts in different workshops, “better no declaration than one that is too watered down”. Such practical scepticism clearly corresponds to an expression

of support in principle. The reasons for this view were very straightforward: the current international climate change regime, it is claimed, is broken, is failing to respect even minimally its own recognized principles of precaution, responsibility and solidarity, and cannot be fixed without being given a new basis, of which an ethical declaration could in principle be one component. These concerns explain why, in considering the possible orientation of a hypothetical declaration, experts have almost unanimously emphasized the need for such a document, in order to be useful, to be action-oriented and to be equipped with implementation and follow-up capacities. Support for a declaration, in other words, is support for making ethics matter.

Enthusiasm on the part of expert participants is all the more striking in that it coexists with sharply divided opinions among UNESCO Member States, a number of which have strongly expressed the view that the drafting of a declaration would be an entirely inappropriate step. It is not the task of COMEST to analyze this discrepancy. It is, however, for COMEST to give its opinion to the Director-General as to the desirability of preparing a declaration, taking account of the study reported on here. From that perspective, it is important at least to understand how different stakeholders can approach in such different ways the prospect of a declaration of ethical principles in relation to climate change.

It is clear that negative views about the possibility of a declaration correlate with positive views about the current state of international climate change negotiations, and vice versa. It is hardly surprising that Member States participating in such negotiations should view them differently from experts considering them from the outside. Indeed, information relevant to the assessment may be fully available only within the negotiating forum. Secondly, the criteria of assessment are entirely different: Member States have objectives within a negotiating framework; independent experts have opinions based on their worldviews and political affiliations. Thirdly, and in some ways most importantly, Member States are highly sensitive to the appropriate limits of UNESCO's action, given the competence of the Organization, whereas independent experts are generally indifferent to, and often ignorant about, such matters.

To this extent, it is largely meaningless to compare or to contrast the views expressed by the various categories of stakeholders, which are not part of one decision calculus. On the other hand, the views of experts, precisely because they operate at a different level, can usefully inform consideration by Member States of the desirability of preparing a declaration of ethical principles in relation to climate change. Furthermore, COMEST needs to reflect on expert views in considering what the issue of a hypothetical declaration – whether or not it is actually followed up – indicates about the broader question of an ethical framework for climate change policies. In particular, it will need to be considered whether certain objectives associated by experts with a hypothetical declaration – assuming such objectives to be deserving of support – cannot be more effectively pursued by other, more flexible and perhaps more pluralistic means.

In this respect, the most important conclusion from the workshops is that experts' views are not fully consistent. While strongly supportive of the prospect of a declaration, their contributions to reflections on available principles have

undermined the consensual basis for such an outcome, and thereby given strong reasons to be sceptical about its feasibility in the short term. If questions about human rights, responsibility, the basis of environmental valuation, diversity of worldviews, the precautionary principle, etc., are as controversial as expert discussions in the COMEST workshops have suggested, then what is urgent is to clarify such matters in order to achieve the reasonable degree of practical consensus necessary for the drafting of an instrument even to be considered. This, inevitably, will take time.

VI. PROVISIONAL CONCLUSIONS AND DIRECTIONS FOR FUTURE WORK

The main conclusions from the study on an ethical framework for climate change policies can be summarized as follows:

1. Climate change discourse and climate change policies would be enhanced and fruitfully developed by a careful explication of their value and ethical aspects. An ethical approach promotes policies in response to climate change relevant to the well-being of humans, broadly, all living creatures and ultimately the Earth's ecosphere as a whole; policies, which would secure sustainable development for the sake of future generations and the survival of the planet.
2. An ethical approach to climate change requires a comprehensive, cross-cutting policy framework that ensures connections between traditionally separate sectors and issues. In particular, a comprehensive ethical approach cannot be limited to the competence of any one institution or agency. Policy effectiveness on non-ethical grounds make essentially the same demands: in that respect ethics and effectiveness are complementary and mutually reinforcing.
3. A range of ethical principles are available in authoritative international documents that bear on the issues of climate change. However, principles not developed specifically to apply to climate change (e.g. human rights principles) may require significant additional elaboration to be directly relevant. Furthermore, the available principles are not necessarily entirely consistent with each other and some of them are more controversial than might be thought (e.g. the precautionary principle, certain aspects of human rights, development issues). In certain relevant areas (e.g. diversity), new principles may need to be developed. For the purpose of further elaborating on existing ethical principles relevant to climate change, or developing new principles, it is essential to also consider the broad range of values and normative ideas discussed in the specialized literature on environmental ethics.
4. Ethical policies to address climate change need to be developed in coordinated fashion at several different levels, including in particular education and awareness-raising; support for policies, especially at national level; and enhanced scientific cooperation. The study does not, at this stage, provide unambiguous support for the development of a normative instrument in this area.

Follow-up work by COMEST in further study should focus on clarification of the key issues that remain unclear, with particular reference to controversies relating to principles and to the content of possible policies. Further conceptual work on human rights, universality and difference, needs, and interests in the context of the challenges of climate change are examples in this regard.

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NOTE: Summaries of the expert workshops are being prepared for placement on the website of UNESCO, the link will be provided as soon as available.