

Panel: Water Ethics in a Globalized World

Professor Kenneth Manaster, Moderator♦

DR. HELEN INGRAM*

My co-author, David Feldman,¹ and I have written a chapter, which is much like our presentation here, in a new book called *Water, Place, and Equity*, which is

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coming out of MIT Press, and we look forward to the paper we will write for the collection here.²

The central theme of the article *Ways of Knowing* is that we spend a lot of time in water resources meetings talking about how to integrate competing interests into one framework.³ Quite frankly though, we doubt that is really possible because water involves many different and diverse perspectives, there are many different values connected to water, and those values relate to fundamental conflicts that simply do not go away. The tensions are there to stay. That was the undergirding of a question I asked earlier about international water law and whether it meant anything.

Ken Conca says in his book *Governing Water* that there is little evidence of common normative structures in the form of interstate cooperation across the world's shared river basins, and there is no compelling evidence that international legal principles are taking on greater depth and meaning, or even moving in an identifiable direction.⁴ So a collection of tensions underlie the field of water. How can we make sense of those tensions?

This figure [referring to powerpoint] depicts multiple perspectives on water. Each of these perspectives is undergirded by a way of knowing. A way of knowing may come from a utilitarian calculus, as we have talked about markets today, but more likely, it comes from experience, moral reasoning, intuition, ethics, and many other considerations. In the left part of this figure, you find the ethics or human rights way of knowing. It is supported by moral reasoning and direct experience, and it reflects the experience of the many underprivileged in this era of water resource development. It represents the underserved in water.

Approximately one billion people worldwide do not have a decent drinking water supply, and about two-and-a-half times that many do not have drainage and sanitation. This way of thinking is given great consideration in international

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2. The fall 2008 publication of the Santa Clara Journal of International Law will include additional articles written by the panelists appearing at this symposium.
3. Anne Schneider & Helen Ingram, *Ways of Knowing: Implications for Public Policy* (Aug. 30, 2007) (unpublished manuscript), available at <http://www.allacademic.com/meta/p209171index.html>.
4. KEN CONCA, *GOVERNING WATER: CONTENTIOUS TRANSNATIONAL POLITICS AND GLOBAL INSTITUTION BUILDING* (2006).

organizations like the World Commission on Dams. For example, the UNESCO⁵ water principles talk about behavior which is consistent with ethics, human dignity, participation, solidarity, and human equality. These are all ideas that underlie this ethical perspective. But even it is not entirely consistent because at the bottom there you see stewardship moving towards sustainable ethic and finding a balance between using, changing, and preserving our land resources. Well, right there we have tension between the ethical and environmental ways of looking at things.

Now I will focus a little bit on an ecological “way of knowing.” We talked about the importance of environment earlier. The ecological way of knowing, in its classic form, treats humans as an invasive species. People are way out of balance with nature, and we talked earlier about the population growth in the West. From an ecological perspective, perhaps California and the entire West are way out of balance with the ecological, sustainable ideal. The ecological way of thinking about water is reinforced by global climate change, and it develops from multiple ways of thinking. The Endangered Species Act is one of the things that is important to the ecological way of thinking.⁶ Interestingly, it is one of those areas of overlap between ethics and ecology, but it is also an area of tension because often endangered species are part of native fishing rights and other things. So very often there is a tension between the ecological and the human rights and ethical way of thinking.

A third way of thinking about water resources and one which we heard very prominently in the discussion by Commissioner [Robert] Johnson is that water is a product. Water is a product of an engineered system and what we have are human needs. We had a discussion about needs and demands earlier. Whether we describe them as needs or demands it is the notion that all things are to be decided by what we value—that kind of utilitarianism in which we allocate things according to human values. And human rights are not high on the agenda here. They are just another one of the demands. They do not trump any other demands, nor does the environment. The environment is really just another set of demands on these processes, and if human rights are even considered, they are considered only incidentally.

I am reminded of the Navajo Indian Irrigation Project,⁷ which was mentioned this morning. The Navajo Indian Irrigation Project was an add-on to another big

5. United Nations Educational, Scientific and Cultural Organization.

6. Endangered Species Act of 1973, Pub. L. No. 93-205 (1973).

7. See <http://www.usbr.gov/dataweb/html/navajoiip.html>.

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bunch of projects, and it ended up being something that was a total failure for the Navajo Tribe. Very often, when we consider indigenous people, it is just an add-on to a number of other things that we also want to do.

Another way of thinking, and one which we have spent more time talking about today, is the economic way of thinking or the economic perspective on water. Here, water is simply a commodity like any other commodity—coal, gas, or any other natural resource—that you can put a price on. The way you deal with issues of scarcity is simply to price that commodity at a point at which the market will clear. We get away from scarcity if we price water high enough so that it comes close to its true value. This economic way of thinking about water has gotten a huge boost in the last twenty years by the World Bank and other organizations that have pushed the economic perspective on water. It also underlies the movement toward privatization of water companies in the United States with the notion that private industries are more likely to treat water efficiently and to price it appropriately. Also, there is a good deal of overlap between the economic way of thinking and the ecological way of thinking. Both economists and environmentalists have begun to talk about the environment as if it were an ecological service upon which you could put a price. The notion that, you can take a number and say these are the dollar values of the ecological services, is an advantage to using a common calculus, which knits these two ways of thinking together.

Unfortunately, the economic way of thinking about water and thinking about water as a commodity or a good has not helped to alleviate the tension with the human rights and ethical way of thinking. This is because very often the underprivileged are not satisfied with simple money. They want water, and it is not acceptable to take money instead of water. I think we got the sense that water is an element of religion. Certainly it is an element of people believing in the future. Rural people all over this country who are in areas of the origin of water transfer say we are not just losing water, we are losing our chance at a reasonable future.

Well, what good is my chart up here [referring to powerpoint], other than to say we have a lot of conflict? I think it helps show the diverse ways of looking at the problem and allows us to admit that not all points of view are commensurate. Instead of pushing the competing interests together, ask where are the areas of overlap? Can we think of solutions that satisfy more than one way of knowing? Knowing there are not perfect solutions, can we find some areas of overlap?

Let me quickly give you one example out of the international arena. We had a very bad example with the lining of the All American Canal.⁸ A better example on the same border is the Nogales International Waste Treatment Plant. This plant treats sewage that comes from both Nogales, Arizona, and Nogales, Sonora. Also, because the U.S. side gets most of the advantage of the cleanup as well as the reuse of cleaned water, the U.S. pays more than its proportionate share of the cost both of constructing the treatment plant, enlarging it, and operating it. It has been interesting, the extent to which people have struggled with the notion that we must have some sovereignty there. The notion that there is a line, and we cannot allow Mexican sewage to cross that line, without being cleaned up first. This has been a long-standing example of something that satisfied several ways of knowing.

The second part of our paper, which is really David Feldman's part of the paper, addresses the ethical way of looking at things. As we indicated this morning, that ethical way of looking at things is very weak and needs bolstering. Are there things that we can do that help it? David's fine work suggests there are at least three areas where we can bolster, through action items, the ethical perspective. One is covenants, or promises. They come from a higher power, and I think the UNESCO rules we looked at earlier are examples of that. Much of the activity of UNESCO, the UN framework, and the EU Water Framework Directive⁹ are attempts at coming to covenantal language, which engages people in promises related to equity and water.

The next area is categorical imperatives. All of us read Kant, and understand the notion that there are rules that we must abide by. They do not sound like economic rules because they say we should treat others as we would like to be treated, as we should be treated. So, in the water world we do not act like the U.S. has acted because it has the power not to pay any attention to Mexican rights in the All American Canal. We instead look at our position and say: how would we wish to be treated if we were the downstream, weaker nation? Also, there is environmental stewardship, and earlier today we talked about Aldo Leopold and his notion that we should act in such a way that we support sustainability.¹⁰

8. *See supra* presentation of Paul Kibel pp. 42-50.

9. Council Directive 2000/60/EC, pmb1., 2000 O.J. (L327) 1 (EC).

10. Aldo Leopold, *The Land Ethic*, in ENVIRONMENTAL ETHICS 41 (Michael Boylan ed., 2001). *See supra* presentation of Amy Hardberger p. 34.

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DR. GEORGE OGENDI*

Good afternoon and welcome to my presentation. I will plow ahead with the discussion this afternoon on how we look at water in a globalized way. I would like to dwell on a few issues here. One is how do we look at water use and misuse, its relationship to human health, and how these things relate to ethics. Remember this: the goal of our discussion this afternoon, and especially for my part, is to determine how we can best get ethics to be embedded in legislation that deals with water use and management, especially legislation at the national and international levels. At the moment, there is legislation that governs the use and management of water resources. But does it really address the needs and the values of all the stakeholders, especially those who have the least power in society?

If you look at the world that we live in today, we have weak legislation and in some cases obsolete national and international water legislation. Where I come from in Kenya, we have the Nile Waters Agreement or Treaty,¹¹ which is a treaty that deals with the use and management of water resources in the Nile River Basin. This treaty was signed in 1929 between Sudan and Egypt, during a time when Kenya was under British colonial rule. Several years have passed, but it has not been revised to effectively address the rising needs and socio-economic and political landscape of the people that live within the Nile basin. Still, you find that international and national institutions of government are not really open to the idea that things are changing and that we need to look at some of the water laws and treaties and revise them appropriately.

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11. Exchange of Notes Regarding the Use of Waters of the Nile for Irrigation Purposes, May 7, 1929, Egypt-U.K., 93 L.N.T.S. 43.

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The other aspect that we are going to look at is the role of water in national or transnational corporations with regard to how they use water and what happens at the end of the pipe. Are the transnational corporations really doing their part very well or are they just using water and passing the costs to the poor people? Especially when you look at the case of rose flower farms in Kenya. Over 95 percent of the rose flowers are grown for export. So the country uses a lot of water to produce roses for export, and at the end of the day very little water is left for the people that live in the surrounding neighborhoods. These flowers are being shipped out, and of course a large profit it is being made, but at the expense of the locals. Can we do anything about this problem? Over the years, people have raised their concerns regarding the lack of access to water, but nothing tangible has happened yet. Again, echoing what has been said since this morning, we have had incidents where people in certain parts of Kenya have fought over water resources. It is time that we come together, sit down, chart the way forward, and best address the water issues that exist. We must face the unfair trade deals and look at water quality and water quantity issues.

In today's world, economic growth is seen and defined through the lens of IMF, World Bank and other economic giants. These world trade organizations are out for global economic growth that ignores the core issues affecting poor people like water scarcity. What has been emphasized is the desire for economic globalization. At the end of the day, people do not really look at how it is going to affect the people who are powerless. Especially in the case of water. What really happens to the poor person that cannot afford to pay for water? Or the person who is using water that is polluted by some of these multinational companies that are operating in developing countries? For instance, human health is negatively impacted by lack of and poor quality water. You look at how people are getting water, and in some areas you will find water taps are padlocked. People are dependent upon surface water for use, most of which is very poor quality water that is the source of many diseases. People walk or transport water over several kilometers away from their homes. If you look at this old lady in this picture [referring to presentation slides], she is wondering where she is going to get water because she has been walking for a long, long distance to get water for that particular day. These are some of the real issues that have been ignored. We need laws and legislation that will effectively deal with governance and use and management of water resources.

It is no surprise that because we have been so engaged in this aspect of economic globalization that we have forgotten about water ethics. That is

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something that we really need to change and address—the real issues that are coming out of the global economic developments. Professor Thomas Odhiambo of the African Academy of Sciences looks at water issues, especially ethical considerations, as being the real focus of all ethical issues that we deal with every day. Emphasis should be on how we can best and equitably share the available water resources, especially with those people who may not be able to afford its cost once it is commodified.

Most of us are very much aware of the facts about water-borne diseases from the World Health Organization that cause so many deaths among children. Most of the people that die are in developing nations where legislation is really poor, and sometimes they do not have the resources to develop their waters. How best can we address global economic development while at the same time address the ever-increasing water challenges that are facing our economies and our people.

According to Leopold's *Land Ethic*,¹² there is not yet an ethic dealing with man's relation with land and certainly not with the waters that we assume have no function except to turn turbines, float barges, and carry of sewage. In developing countries we are used to seeing environmental legislation regulating surface water that is never enforced by the local and national government agencies. Multinational corporations who operate in these countries also violate environmental laws. We need to have a culture change and certainly a change in legislation governing water use and management.

Population growth is also an issue that causes decreased water quality and quantity in places like Kenya. People are cutting down trees and causing deforestation to create room for cash crops. When you look at the tea and coffee we grow in our country, how much do we get for these products on the global market? We get very little. The people who are processing tea, coffee, or other goods, how much are these people paying attention to environmental laws? I frequently see discharge of raw sewage into the rivers and streams that people depend on for water. These are some of the things that we need to change. These examples show where things have gone wrong. This is true especially in this picture of a gentleman standing in this river. Upstream a bit there is a factory that discharges raw sewage into this stream. You find that poor people have been ignored completely. We need something to happen to address the problems of these people.

12. Aldo Leopold, *The Land Ethic*, in ENVIRONMENTAL ETHICS 41 (Michael Boylan ed., 2001).

It is no wonder you have these human rights implications that Helen Ingram has already talked about, but is it a human right? Nobody really cares about it—it is a second a thought. The right might be written down somewhere on paper, and has been there since 1977, but who cares about it? Nobody. It has to be us who will do something to reverse the cases of deaths that are caused by lack of and poor water quality. All of these are cases where people are dependent upon surface water that is polluted. It is particularly a daunting task for girls and women, especially in developing nations. There, women struggle daily to and from water sources that are already polluted, or have to walk long distances to get water that is a little cleaner.

It is not only the multinational companies who create these water supply problems. The individuals who have power and money use a lot of water to irrigate their lawns and golf courses. At the end of the day, that is exactly what Mahatma Gandhi was saying: there is enough for all of us to satisfy our needs but not for all our greed. We have to be considerate of those people who have nothing at all. Like the rose flower farms in Kenya, there is water scarcity around Lake Victoria, where transnational corporations are processing fish using the lake's water while at the same time dumping the effluents or sewage into the lake. All of these are examples of water problems that people are not addressing—not even with existing legal frameworks.

On a recent visit to Kenya with colleagues of mine from Canada and the U.S., they were really amazed to see people living in squalor and abject poverty around rose flower farms. Most of them lack access to clean water, and yet, the flower farms have unlimited access to the Lake Naivasha waters that is adjacent to these people. These farms have a constant and steady of supply of water, and the people around them have very little or no water at all. These are the same people who are fetching water from several kilometers away.

The Masai people who live around Lake Naivasha in Kenya also have limited access to water resources from this lake. Ironically, they call themselves Kenya's indigenous communities and yet have no access to the lake's water resources!

There are water resource conflicts between the hotel industries, the Masai pastoralists, and small-scale vegetable growers in Lake Naivasha catchment. There is lack of a clear legal framework that defines who should get water first and who should get it second. Because of the limited water supplies in most parts of Kenya, people do not have adequate sanitation and resort to washing clothes by hand. People also have to use pit latrines and wash their dishes by hand. When will we reach a point where people can look at water from an ethical perspective?

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Finally, I would like to make a few proposals. First, governments must take a step to help their poor people, especially in getting reliable water and sanitation systems. There also has to be some cost sharing and beneficiary participation. Then, introduce simple and reliable technologies, especially to meet the water needs of the rural poor. For those who are still looking at consumption—especially by industrial users and people with high incomes—there has to be a rethinking and hard decisions made on how they use water. Finally, we also need to promote the conservation ethic that we reduce, reuse, and recycle water in our society. One thing that I look forward to is when we will see water ethics being embedded within our legislations that address water use and management. Thank you.

MR. RICHARD PAISLEY*

I am largely going to reinforce and expand upon what some of the previous speakers have said. I am the Director of a Global Environment Facility World Bank project looking at global transboundary international waters. In order to set the stage for my discussion of this project I am going to talk a little bit about the international water crisis. I will look at global transboundary international waters. Also, I will look at some challenges and opportunities because they are the flip side of the same thing. Then I will talk briefly about my partners UBC,¹³ Colmex,¹⁴ and a transboundary international waters initiative.

Let me give you a quote to set the stage for what I will discuss. The first one is “apart from air, fresh water is the only natural resource that the human species cannot do without.”¹⁵ Of course, it turns out that you can live without food for

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13. University of British Columbia.

14. El Colegio de México.

15. El-Hadji Guisse, Special Rapporteur on the Right to Water and Sanitation, Sub Commission of the UN Commission on Promotion and Protection of Human Rights.

quite a long time, but you can only live without water for a finite period. Also, unlike many other resources on the planet there is no substitute for water, so it is a very important thing.

With that prelude, and you have heard the statistic that over a billion people suffer from lack of fresh water, you wonder why it is that the planet generally has not come together to deal with some of these very important issues. It turns out that there is some history, starting as early as 1977, perhaps earlier. There has been a whole litany of international water conferences, international water meetings, and international meetings generally that have dealt with water, that began to recognize the enormity of the water crisis that is descending upon us now. This began with the Mar de Plata Declaration in 1977 and the Dublin Declaration in 1990. Those were followed by the United Nations Conference on Environment and Development in 1992, the World Water Forum in Marrakesh in 1997, the Petersburg Round Table in 1998, and the UCSB, that I actually attended, in 1998. Following those were the Millennium Summit of the United Nations; the Hague; Bonn, Germany; the Earth Summit in 2002; the Third-World Water Forum in Kyoto in 2003, the beginning of the Decade Of Education For Sustainable Development, and finally, and most recently, the Fourth World Water Forum in Mexico.

You might think that with all this activity, or seeming activity, at the international level something good might be emerging, or a water ethic might be appearing, or the solution to world problems might be on the horizon. However, as Michelle Layton very pithily put it, a legitimate question today is whether many of these new largely unenforceable proclamations by governments will make a difference. In the twenty-five years of declarations and international commitment since Mar de Plata, too few substantial gains in water management efficiency, distribution, and access by rural populations can be documented in the developing world. In some countries the level of access to water in both urban and rural areas has declined.¹⁶

She stops there, but it turns out the Canadian government did a bigger study a few years ago, where they looked at what the cost is in monetary terms, let alone ethical or any other terms, of all these international conferences. You take your

16. This section of the presentation draws heavily on a recent paper by Michelle Leighton entitled "The Human Right to Water: Exploring Public and Private Legal Obligations for the Equitable Distribution, Transfer and Use of Water" presented at the American Bar Association Section on Environment, Energy and Resources, 11th Section Fall Meeting in Washington, D.C., October 8-12, 2003.

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prototypical high-priced international expert and lawyer who bills out at \$500 an hour, and multiply that by their preparation time, their attendance time, and then you add in the cost of flying them to these conferences, and it turns out the cost of just a small number of these conferences was enormous. The dollar amount was in the billions of dollars. So then you ask yourself the question, what is the social cost? I am not saying that conferences are bad, or conferences are not useful, or good things do not come out of them occasionally. But, what is the social cost and the ultimate environmental sustainability cost of spending billions of dollars on having high-priced experts flown to conferences to come up with declarations that very often are unenforceable? That is an ethical question for you to ponder as I now move onto the subject of transboundary waters.

First of all, what are transboundary international water resources? For the uninitiated, they are international water resources shared by two or more sovereign states. They include, in the broadest scope, international freshwater, international groundwater, and international marine water. When I say “international freshwater” I am talking about international rivers, or international drainage basins as they are sometimes known, and that includes successive rivers, where a river flows from one country into another. It also includes boundary rivers where the river forms the boundary between two countries. As I have alluded to here, it also includes international groundwater basins. There are a number of interesting situations along the Mexico–U.S. border and an equal number of interesting situations on the Canada–U.S. border.

In any event, these situations are prevalent and they are important. To illustrate how prevalent, there are as many as 263 international rivers or international drainage basins in the world and more poignantly, by 2050, because of demographic shifts in the world and climate change, over half of the world’s population will live in international freshwater drainage basins.¹⁷ That does not even include international groundwater basins or the international marine areas. So it is a big issue becoming bigger all the time because of the way demography is working.

So why are transboundary international water resources important? Well, there are all kinds of reasons why they are important. The demographics are one thing, but these two other points are important also. They are important because international agreements governing their utilization—in those limited number of occasions where we actually have international agreements—serve not only to

17. *Id.*

protect and support sustainable development but also to effect security throughout entire basins. So there is a big security issue.

We have talked a lot about global warming already today, and we are going to talk about it more. One of the biggest tragedies of global warming is that it was originally marketed to the world as an environmental issue. Global warming definitely has an environmental component, but it is not just an environmental issue. It is more importantly an economic issue, a sustainability issue, and, even more importantly, a security issue. If global warming comes in with the full force and effect that everyone anticipates, security is going to be the issue that really decides the day.

Another reason why transboundary freshwater basins are important is because by the year 2050 nearly half of the world's population will be located in one or more of those over 260 international drainage basins shared by two or more states. More poignantly, at least 145 nations have territory within international drainage basins. At least twenty-one of those countries are located entirely within international drainage basins, and an additional thirty-three countries have greater than ninety-five percent of their territory within these basins.¹⁸ So this is a big, big issue.

This next slide shows a water stress map of the planet earth. The red areas are looking pretty bad right now, and the preponderance of those red areas are in developing countries. That sums it up. What would be interesting to do is to superimpose the world's international drainage basins over top of this water scarcity map, and you will find that there is a stunning coincidence of interest in that situation.

According to James Kraska, the role of transboundary river agreements and proponents to sustainable development extends beyond simple economic and environmental factors.¹⁹ For example, in South Asia, agreements have helped to strengthen political ties, and these agreements have value as vehicles to ameliorate tension and reduce the likelihood of war. Especially international waters agreements, which are frequently understood to contribute to international conflict, the process and results of concluding agreements has had positive ripple effects on the regional security environment. So I am a contrarian. People earlier today have said that just getting everyone in a room and trying to get them to agree, has its

18. James Kraska, *Sustainable Development is Security: The Role of Transboundary River Agreements as Confidence Building Measure (CBM) in South Asia*, 28 YALE J. INT'L L. 465 (2003).

19. *Id.*

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limitations. Well, I am not arguing that, but I am saying that there are a number of very poignant examples in the world where on transboundary situations people have actually managed to forge lasting agreements. But not everywhere.

There are two ways of measuring how big a river is. You can measure its length, or the volume of water. By either measure, the Nile River Basin is the largest, and there is no agreement there. They have been negotiating one for, what, 3,000 years perhaps, and certainly the last twenty years intensively. But they are coming closer, and closer to an agreement, and it is important to try to move forward where you can.

The project that I am now quarterbacking—challenges to sustainable governance of global transboundary international water resources—is looking at a number of key issues related to transboundary basins. It is not just transboundary fresh water that we are examining. For the first time that I know of, we are looking at transboundary fresh water where they have agreements and where they do not have agreements; where they have implementation and where they do not have implementation. We are comparing and contrasting that with transboundary groundwater. There are a limited number of examples where we have transboundary groundwater agreements and a greater number of examples where we do not. Also, we are comparing and contrasting that with international marine. All of this is a very daunting and enormous task.

Here are some of the issues we are looking at, some of which have been alluded to already today. One is incentives. What kinds of incentives are there or could there be that lead to success in the management of transboundary resources? Another issue is how to define success? Do you define it in biophysical terms? Do you define it in ethical terms? Do you define it in social–political terms? How do you define a successful transboundary agreement? Is a successful agreement just one that prevents war or is it one that equitably distributes resources between people? What kind of incentives are there out there? What kind of incentives work in a particular situation or place? What kind of incentives are likely to transcend social–political–economic systems and work in a number of different situations or places?

What about dispute resolution? Why is it that some agreements have no dispute resolution factors and are seemingly successful, or at least have not led to conflict, and others do not? What kind of dispute resolution mechanisms lead to success in agreements? Arguably, simply having a dispute resolution mechanism in an agreement is an incentive for the parties to agree and prevents them from getting in disputes. Why is it that in Central Asia when I was working for the World Bank, I

tried to put in a dispute resolution mechanism, and that was the first thing they crossed out of the agreement?

What about communication and learning? What kinds of communication are important in transboundary agreements, and what kind of active–adaptive learning can we do? That is back to the project itself. What kind of best practices or experiences, and what kind of lessons learned are there that can be transferred from one group or situation to another?

What about climate change? What is the effect of climate change in all this? How can we make agreements between nations robust enough to deal with the wild card of climate change? I am working on a project right now in Canada on the Columbia River that is shared between Canada and the U.S. In 2014 the agreement relating to the Columbia River, which has been in place for forty years, comes up for renegotiation. Now it is a whole different ballpark because we now know that in the next decade up to sixty percent of the flow in the Columbia River is going to come from Canada, whereas previously it was something like thirty percent. How is that going to shake down in the future? Or how are we going to negotiate an enforceable efficacious agreement that takes into account that climate change could throw all our assumptions about hydrology and everything else right out the window?

TEK stands for traditional ecological knowledge. In Vernon [Masayesva]'s very excellent presentation this morning we talked about traditional ecological knowledge, and how you incorporate that into agreements.²⁰ Who has done that successfully, and who has not done it successfully, and why did it work, or why did it not work? Four other issues, just off the top of my head. The first is environmental flows. Why have some agreements like the Mekong Agreement, that I had the privilege of working on, been able to incorporate environmental flows into the agreement, where other people treat them like death, like anathema, they don't even want to hear about it?

The next issue is public participation. One of the hallmarks of the Nile Agreement, is that it was done largely behind closed doors. The question is what kind of an agreement is likely to be sustainable if a large portion of the constituency that is going to have to implement it was not made to feel that they were part of the agreement? How has that worked elsewhere in the world, and how can you find the balance between involving people to the extent they need to be involved, so that you have some sustainability and some implementation, but

20. See *supra* presentation of Vernon Masayesva pp. 29-32.

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not involving them so much that anybody who wants to be a special interest can shut down the whole process or hold the rest of the process hostage?

Finally, what about data and information sharing and exchange? I subscribe to the mantra that if you cannot measure, it you cannot manage it. So one of the prerequisites, often, for getting any kind of an efficacious agreement between countries is some kind of lowest common denominator of data and information sharing and exchange agreement. That is where we are on the Nile right now. I am working on a project right now that is attempting to forge a data and information sharing and exchange agreement between ten different countries. Making such an agreement is a very challenging, particularly when you deal with Ethiopia, Sudan, and Egypt. What George [Ogendi] did not tell you about that 1929 Nile Agreement is that there are ten countries in the Nile Basin. The 1929 agreement, which was engineered by England, gave 100% of the water—100%—to Sudan and Egypt alone. What about the other seven or eight countries in the Nile Basin? They did not get any of the water out of the agreement. So you can imagine how sustainable an agreement like that is in the year 2008.

As international law is not a panacea to all that ails the world, this project is unlikely to be a panacea to all that ails the world. But, it does have three key objectives: good governance and more effective decision-making, strengthening and promoting international multi-country cooperation, and enhancing regime development and sustainability. It further consists of three defined components. The first one is to identify and analyze legal and institutional practices—what we euphemistically call beneficial practices—in international freshwater, international groundwater, and international marine. This includes the establishment of what will be called South Peer Review Groups and Regional Learning Networks. So the first thing that we are doing in this project is sitting down and trying to identify what the best practices are. What are the lessons learned, and what kind of things can we carry from one situation to another that actually might be useful?

One of the ways this got started was when I was working in Central Asia with Dinara [Zignashina] and others. I had just come from the Mekong Region, and many of the questions being asked in Central Asia could perhaps have been answered by the people in the Mekong Region. Rather than have me try to carry the message, wouldn't it be great if the people from the Mekong Region and the Nile Basin could have come to Central Asia and cooperated in some kind of facilitated way? I wondered how often that had happened before, and it turns out it had happened very little. For example, when I sat down to study how data and information sharing and exchange agreements have been negotiated, it turns out

there was no dummies guide to negotiating data and information sharing and exchange agreements. What a surprise. Everybody did it on their own from scratch every time they came up with the problem. The idea was, without getting too carried away, to try to develop—in at least two, or three, or four key areas—some best practices that we could use. Then, when it came time to negotiate a data and information exchange, we could say that there actually are many agreements. There is one in the Mekong, one in Central Asia, one in South America, one here, one there, and we could use these as models for developing the next one.

The second component of the project is to develop and validate what we call “innovative experiential and teaching tools,” including case studies, negotiations, role-play simulations, and interactive CD/DVD-ROMs. It was not enough for us simply to do the academic research. We really wanted to try to see this stuff applied in a thoughtful way, and we thought the best way to do that was to make it user-friendly, media savvy, and hands-on. One way we know how to do that is by doing case studies and negotiation simulations, which I have had the privilege of developing, and also by doing role-plays. I have been developing, with my colleagues at UBC who specialize in this, interactive CD-ROMs and DVD-ROMs. So we would have a toolkit but a really hands on, interactive, and user-friendly toolkit that we could carry around the world. I have had the privilege over the last few years of developing such a toolkit with my colleagues at FAO in Rome,²¹ and I have carried it around the world. It has been fascinating to watch the cross-cultural communication dimension.

Last but not least, we are delivering and consistently refining tools through capacity building and trial programs involving GEF IW practitioners.²² This is a fancy way of saying that we will actually go into the field, and we assume that whatever we develop is probably going to have some flaws in it. So it will be a living exercise in active-adaptive learning. We are going to take them into the field, we are going to work with people in the field, and we are going to have people in the basins where we actually deal with these things. At the end of the day, implementation is the name of the game, and it is only people who are directly affected that are going to be interested in applying these changes.

So I close on that note with one of my favorite quotes. It is by Machiavelli in 1532, and it is a reminder to those of us who think that maybe we have all the answers. “There is nothing more difficult to take in hand, or perilous to conduct, or uncertain in its success, than to take the lead in the introduction of a new order

21. United Nations Food and Agriculture Organization.

22. Global Environmental Facility International Waters.

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of things. The reformer has enemies in all who profit by the old order and only lukewarm defenders in all those who would profit by the new order. The lukewarmness arises partly from fear of their adversaries who have law in their favor and partly from the incredulity of mankind, who do not truly believe anything new until they have actual experience at it."²³ I guess that is my answer to the question, what is international law really there for? The answer is, that despite all its shortcomings, most people observe international law most of the time, and as someone else put it, it's the only game in town. Thank you very much.

MS. DINARA ZIGANSHINA*

PROFESSOR JAMES HUFFMAN*

As I listened, it seemed to me that your perspective on water ethics relates largely to the poor and access of water to the poor as opposed to nature-based ethics claims on water. Whether that is true or not, it seems to me you have suggested a mix of two kinds of solutions, or at least maybe I am reading between the lines in the case of one. One is that the wealthy ought to do something about it, sort of the foreign aid model, or maybe Bill Gates could do it all by himself, or we could have volunteer ways of providing water to the poor. And the other model is

23. NICCOLO MACHIAVELLI, *THE PRINCE* (1515).

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the rights model. Let's declare it rights, and Richard [Paisley] describes twenty-five years of international declarations of various kinds to make that happen. It seems to me both those models have demonstrably failed. The foreign aid model has never worked anywhere in the world. The most vivid image I have is of a road in Guatemala that goes from Guatemala City to Puerto Barrios. I was there in the late 1960s, and it was a beautiful road. I returned in the 1990s, and not a nickel had been put into its maintenance. You might as well have been driving through volcanic craters. That is what happens with most foreign aid.

And the rights model it seems to me is very noble. It is great to state these aspirations, but how has it worked? The countries pressing it are mostly countries who have constitutions filled with all kinds of rights that they do not deliver. It seems to me the better solution is economic development, both for environmental protection and for provision of sustainable water to the poor. Am I off the mark?

DR. HELEN INGRAM

Let me just talk about the first part. Ethics is always the refuge of the poor and left behind because if you have power on your side, you do not need to mention the ethics. Ethics are a part of everything. First in right, first in time has an ethical dimension. It means that if we have taken the water out and put it to productive use then somebody cannot come in upstream. I think it would be too bad to limit human rights to water simply to the poor. I think that there is an ethical dimension and that notion that we recognize that ethical dimension is part of human right-ethics. It is not just for the poor; that would be too bad.

DR. DAVID FELDMAN

I will just add a couple of things to that. One of the things that is embedded in the notion of stewardship, and also covenants, is that rights language has limitations. Another dimension of this is that the ethics of water consist of duties, obligations, and responsibilities, not just to other people but to nature and to future generations, which is also something that we try to enshrine within most legal systems. The failings, as many have pointed out on this panel, is the fact that those admonishments are not always enforceable given the differentials of power. So, we have to be reminded that there is a normative dimension that ultimately falls upon the fact that we are creatures of intentionality and cognition, and we do have choices that can be made. Oftentimes, it comes down to applying those choices to ourselves. Would we want to live under such a regime if we knew that we might end up being the disadvantaged?

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MR. RICHARD PAISLEY

You raise a good point. There seems to be this schism between those who have sort of a human rights perspective and those who have a market-based perspective. Never the twain shall meet. That is unfortunate because it will take a combination of approaches. It is not a good thing for those who are yellow-bellied limousine liberals like myself to blow off the market-based approach, and it is not a good idea for the market-based, hard core Milton Friedman types to blow off the ethical side. At the end of the day, one size does not fit all. We are going to have to be adaptive, we are going to have to be thoughtful, we are going to have to think outside of the box, and we are going to have to have a combination of approaches. Also, what works in one place is not necessarily going to work anywhere else.

DR. HELEN INGRAM

It is important as we try to come to things that fit more than one way of thinking that it is important not to get swept into some idea that there is some universal, and that is why you are getting so much resistance on this economic thing. There are things that are not well captured from that perspective. God forbid that we should expand human rights to the point where we said economics did not matter, but that is not very likely to happen.

MR. RICHARD PAISLEY

There is enormous resistance to the idea of human rights and water. In the Canadian Foreign Affairs Bureau they have instructions not to go there, right? They just freak out whenever anybody mentions it, and you can guess why. There are all kinds of ramifications for them. So I agree with you. I think we have to go with this. These are desperate times, and even if they were not, we have to explore every alternative and try to address this.

MS. DINARA ZIGANSHINA

I do not believe that if we put a human right to water in the constitution, or just approve some convention, that it helps. It just puts the question on the agenda that all governments have to look at it. Of course, you need economic incentives to implement this and legal instruments for enforcement. From my point of view, it can be some kind of protection of basic water needs that the government has to protect, especially when we are talking about water privatization. It has to be some protection of a human right to water. I do not believe that governments have to

resolve this problem without the private sector, but they need to provide some guarantees for people.

DR. GEORGE OGENDI

In Kenya we have seen that economic development is really good, and it does help to some degree. However, I remember some ramifications of the medicine that we swallowed from the World Bank where we were being told to privatize national corporations. We let the corporations from outside take control of whatever companies we have within a country, and in the end those corporations—most of them—came in with the promise of economic development and also improving the welfare of the people. But they took advantage of us and our weak environmental law system. Whenever they take advantage of that, who is it that really pays? It is the poor person. What I think came out strong from our panel this afternoon is that it could be really good if we prioritize needs and then embed the water needs of the people within the legislation so that when people come they do not take advantage of the weak environmental legislation or water legislation. We need to have something that is legally binding and that we can rely on in prosecuting the polluters. Whereas many multinationals are doing economic development that is really good, the flip side of it is that people are paying with their lives and with their health. That is why we want a discussion that is truly all-inclusive and is going to let all the stakeholders be answerable to one another. I mean some kind of checks and balances.

MS. DINARA ZIGANSHINA

It is a basic question about transnational corporations, that they must have ethical norms of behavior in developing countries.

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DR. LARRY SWATUK*

Just a couple of responses to George [Ogendi] and Richard [Paisley]'s discussion of the treaty on the Nile Basin. From my own view, it is better than nothing. At least it gives states that are generally unwilling to talk to each other a reason to talk. That is why they do not renounce the treaty and act unilaterally.

On information sharing, Richard [Paisley], it is interesting that in the Okavango River Basin, OKACOM²⁴ has an information sharing mechanism. Where I was for the last three years, the Harry Oppenheimer Okavango Research Center (HOORC), the deal struck there among the riparian states is that HOORC would be the repository for all information on hydrological and other related information and for the spread of that information. The fact is though, that when we ask for basic information that you can get from GIS, your own GIS photos, if we ask for it, even from the government of Botswana, we do not get it. Our own government and we are the repository by law, and they just say we are not giving you that information. So even among cooperative riparians that are held up as parties to an admirable model of inter-basin cooperation, information is only shared grudgingly.

My last observation is about the poor in all of these kinds of regional approaches to transboundary water management. Transboundary water management is overly state-centric, which means empowered actors making deals among each other. I agree with Jim Huffman that in many cases it is about economic development. For example, in the Nile Basin Initiative²⁵ members are party to a fast-track plan that focuses on hydropower so giving state makers a

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24. Okavango River Basin Water Commission.

25. The Nile Basin Initiative, <http://www.nilebasin.org/>.

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reason to cooperate, but where are the poor people? The poor actually only have a voice because external actors are funding the Nile Basin Initiative. If the World Bank, and USAID,²⁶ and everybody else was not saying all stakeholders must be represented in the process, they would not be there. So economic development generally privileges the privileged, but the voice of the poor is only there because there are foreign actors who are asking why we cannot broaden the benefits and broaden the beneficiaries within the basin? If you took the funding away, the incentives and inducements for broadening stakeholder participation to civil society would not be there. The poor would just have to make do while the hydropower would go up, and all the rest of it would go up, and the ethics would go out the window.

MR. RICHARD PAISLEY

I agree. But also that may be the way that corporations get involved in it. Maybe that is the rule ultimately for organizations like the World Bank, and GEF, and others because they can provide incentives. My guess is on transboundary rivers, the World Bank operational procedures 7.50²⁷ has gone a long way because before people can play the game, they have to learn the rules, and the rules are fairly dispassionately written. They are certainly a great advance over the no-rules system we had previously.

DR. HELEN INGRAM

I do not think that is really fair though because the World Bank had to make all those mistakes before you put in the rules. You have to have the development in order to have the people who lose. I do not think we ought to let ourselves off the hook here. If we are going to have a globalized economic system, along with it has to be global ethics and global rights. We do not have to commit injustices in order to develop that system. I think we are letting ourselves off the hook here.

26. United States Agency for International Development.

27. The World Bank, *The World Bank Operational Manual: Operational Policies 7.50: Projects on International Waterways*, OP 7.50 (June 2001), available at <http://wbIn0018.worldbank.org/Institutional/Manuals/OpManual.nsf/OPolw/5F511C57E7F3A3DD8525672C007D07A2?OpenDocument>.

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