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Between the Market and the Commons: Ensuring the Right to Water in Rural Communities

Keywords

Water Law, Human Rights Law

BETWEEN THE MARKET AND THE COMMONS: ENSURING THE RIGHT TO WATER IN RURAL COMMUNITIES

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I. INTRODUCTION

More than one billion people in the developing world lack safe drinking water.¹ The U.S. government estimates that by the year 2015 it is possible that up to forty percent of the world's population will live in countries where water is in short supply.² An estimated fourteen to thirty thousand people die each *day* from water-related diseases.³ Of those who die everyday from water infected with disease, between 9,500 and 20,000 are children.⁴

While *access* to fresh water is not the only problem, limited supply is the primary dilemma. The total fresh water supply on Earth is being diminished through pollution, diversion, and depletion.⁵ Only 0.77 percent of the total water on Earth circulates as part of the water cycle, and even less circulates as rain water—the only source of *renewable* fresh water.⁶ Less than one half of one percent of the world's water is available for human consumption.⁷ Thus, the total amount of water available for human consumption and use is extremely limited. Population explosions, urbanization, industrialization, and agriculture have increased demand for water while pollution has decreased the already limited supply.⁸ Increased demand for a limited water supply exacerbates the human crisis worldwide.

The human right to water entitles everyone to an adequate amount of safe water and is necessary to prevent death from dehydration, to reduce the risk of water-related disease and to provide for consumption, cooking, personal, and

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1. PETER GLEICK, *THE HUMAN RIGHT TO WATER available at* http://www.pacinst.org/reports/basic_water_needs/human_right_to_water.pdf (last visited March 22, 2005) (hereinafter *THE HUMAN RIGHT*).

2. DOUGLAS JEHL, *Introduction to WHOSE WATER IS IT?*, at xvi (Bernadette McDonald & eds., Nat'l Geographic Society 2003).

3. *Id.*

4. *Id.* at x.

5. See MAUDE BARLOW & TONY CLARKE, *BLUE GOLD* 5 (2002).

6. *Id.*

7. JEHL, *supra* note 2, at xiv.

8. BARLOW & CLARKE, *supra* note 5, at 6-9

domestic hygienic requirements.⁹ Many of the efforts to meet this challenge by governments and non-governmental organizations (NGOs) have failed on many levels.¹⁰ This article advocates for the privatization of wells in rural areas as an incentive to maintain both the quantity and the quality of local water while improving access and availability. Rather than putting the wells into the hands of large corporations, this article suggests a middle path wherein the *owner* of the well would be a non-profit, non-governmental organization that leases the operation to a local business person, who is accountable to both the organization and the village. The large scale provision of water is a serious and growing problem everywhere, especially for urban areas, but is beyond the scope of the discussion here.¹¹

In the face of these alarming trends, governments are faced with the problem of ensuring that every one of their citizens has access to safe, fresh water. Part II asks the question what is water: a human need or a human right? Part III addresses whose water is it, by examining three typical models: (1) private control; (2) government ownership; and (3) the "development" model. Part IV narrows the focus to the more limited problem of access to water in rural areas of Africa, and concentrates on methods of delivery. The conclusion addresses the concerns of anti-privatization advocates and many of the problems the current system faces in ensuring that rural communities have access to enough safe water to meet their basic needs. Moreover, the conclusion will evaluate how privatized wells protect the right to water in a human rights framework.

II. WHAT IS WATER?

There are two basic ways of conceptualizing water: (1) as a need (commodity); or (2) as a right (entitlement). It is important to distinguish water as a right versus a need. A right is something that creates obligations; whereas a need carries with it no assurance of its provision.¹² Because water is essential to all aspects of life from the basic need for drinking water, to growing food, to industrial uses such as coolant in power plants, there is no consensus on the question of whether water is a need or a right.

Businesses and pro-market institutions such as the World Bank insist that water is a *need* or commodity better managed in free markets.¹³ They argue that

9. *Substantive Issues Arising in the Implementation of the International Covenant on Economic, Social and Cultural Rights: General Comment No. 15, The Right to Water*, U.N. ESCOR Committee on Economic, Social and Cultural Rights, 29th Sess., U.N. Doc. E/C.12 (2002) [hereinafter *Comment 15*].

10. For example, only 60 percent of a project to provide water to the Cameroonian capital of Yaounde was completed and the contracting company quit after several officials were accused of demanding payoffs. Sylvestre Tetchiada, *Little to Quench the Nation's Thirst*, INTER PRESS SERVICE, May 17, 2004 at <http://allafrica.com/stories/200405200689.html>.

11. Much has been written in the last five years after many experiments by cities around the world. Most of the sources used here draw on those examples and discussions. Few address the small village except as farmers or customers hooked up to a municipal system. The focus here is on villages that depend on surface and well water.

12. See JEFFREY ROTHFEDER, *EVERY DROP FOR SALE* 78 (2001).

13. WORLD BANK, *ECONOMICS OF WATER SANITATION*, at <http://www.worldbank.org/watsan/topics/economics.html> (last visited Jan. 29, 2005).

markets are efficient and reduce waste, ensuring that limited resources will be fully utilized. On the other side, environmentalists and local populations insist they have a right to water—that it cannot be denied to them.¹⁴ Kofi Annan, U.N. Secretary General, blended the logic of both arguments by stating that “[a]ccess to safe water is a fundamental human need and, therefore, a basic human right.”¹⁵ The right to water as a human right, though controversial, is well established in international legal theory as well as in traditional practice.¹⁶ This section addresses both arguments in turn.

A. *Water as a Human Need*

Water is clearly a need in the broad sense as a fundamental necessity of life, regardless of the label of *need* or *right*. Water as a commodity, a good that can be sold in the market, is the more narrow meaning of *need*. It is important to acknowledge from the start that water is in fact bought and sold, given a value, and paid for everyday, in all contexts. Water, like lunch, is never free. Even where no money is paid, opportunity costs are incurred when fetching and using water for whatever purpose. For example, water taken from a river has to be carried, that energy could be spent on other activities. Water could also be contaminated, which would involve additional costs in terms of time and money for medical care. Thus, even in circumstances where no money goes into developing the source, there is a cost for using that water. Those costs can be translated into *value*.¹⁷

Value as an economic term means the amount an individual is willing to pay for the good or service.¹⁸ This means that value is inherently subjective, not intrinsically connected to the water itself; it is a function of the buyer. Cost as an economic term is more complicated, but essentially it is the amount the seller has spent to make the water available. This can be broken down into two types of costs: (1) opportunity costs (described above, they can also include environmental damage and other intangible costs); and (2) use costs.¹⁹ Use costs are the traditional costs associated with developing, transporting, and managing water.²⁰

14. See generally LINKING HUMAN RIGHTS AND THE ENVIRONMENT (Romina Picolotti & Jorge D. Taillant eds. 2003) (discussing a wide range of issues linking human rights and environmental issues).

15. Press Release, U.N. Information Service, Access to Safe Water Fundamental Human Need, Basic Human Right, says Secretary-General in Message on World Water Day *available at* <http://www.unis.unvienna.org/unis/pressrels/2001/sgsm7738.html> (Mar. 13, 2001).

16. See THE HUMAN RIGHT TO WATER, *supra* note 1; *Comment 15, supra* note 9; SALMAN M.A. SALMAN & SIOBHÁN MCINERNEY-LANKFORD, THE HUMAN RIGHT TO WATER: LEGAL AND POLICY DIMENSIONS (2004).

17. See John Briscoe, *Water as an Economic Good: What it Means in Practice* (1996), (World Bank, A Paper Presented at the World Congress of the International Commission on Irrigation and Drainage, Cairo, 1996) *available at* <http://www.iph.ufrgs.br/posgrad/disciplinas/hidp04/Briscoe,%20Water%20as%20an%20economic%20good.pdf>.

18. *Id.* at 5.

19. *Id.* at 9.

20. *Id.* at 2.

Making water sellable requires calculating its costs to sellers and its value to buyers, and where those two numbers meet is the price of water.²¹ In a simple supply and demand curve, water is not sold below its cost, and not paid for above its value. When traded at this point, water is used in the most efficient manner, not wasted or lost, and thus conserved.²² Markets also solve the problem of allocation by determining how water is used and who gets to use it.

Because there are many competing demands for water—consumption, agriculture, and industry, a finite resource like water has to be divided up. Markets do precisely that—divide and allocate the limited supply of water. Water is allocated to those who are willing to pay a price that allows the supplier to recover costs. This excludes those who charge too much or who pay too little. However, individuals act differently than corporations—value is also a function of the resources available to the buyer. In the Sahara, the opportunity cost to other users and the use costs to get the water will both be higher. Scarcity of water is also highly variable. For example, countries along the Nile should pay less than Saharan countries for the same amount of water. The problem is that life cannot be sustained long without water, so its value (in terms of what a person is willing to give up to have it) cannot be measured in any accurate manner.²³

The difficulties encountered in determining the price of water were summarized by John Briscoe in a World Bank paper entitled, *Water as an Economic Good: What it Means in Practice*, which was presented in 1996.²⁴ Briscoe outlined various methodologies and then concluded that “most certainly these ‘ballpark estimates’ can never, and should never, be used to make technocratic decisions on allocations and prices.”²⁵ That did not prevent him from declaring that “the hegemony of the market model of development, and the corresponding move to using market-like and market-friendly instruments for managing all elements of the economy (including water)” is part of a group of ideas that will shape society in the future.²⁶

Building on this work, the World Bank, the International Monetary Fund (IMF), and multi-national corporations have pushed (some would say forced) privatization of water on developing countries as a loan condition.²⁷ Any meaningful acknowledgement of the world’s water crisis (i.e. recognizing the fourteen to thirty thousand deaths every day from water-related disease) requires a

21. This is the traditional supply and demand curve, with quantity on the x axis, dollars on the y axis. A supply curve rises as both quantity and dollars go up. Demand starts at a high quantity and low price and falls as price goes up. *Id.* at 4.

22. The “optimal price” is the foundation of basic supply and demand driven market economics. *Id.*

23. See PETER H. GLEICK ET AL., THE NEW ECONOMY OF WATER: THE RISKS AND BENEFITS OF GLOBALIZATION AND PRIVITIZATION OF FRESH WATER 7 (2002) available at http://www.pacinst.org/reports/new_economy_of_water/new_economy_of_water_ES.pdf.

24. Briscoe, *supra* note 17.

25. *Id.* at 5.

26. *Id.* at 22.

27. THE CENTER FOR PUBLIC INTEGRITY, PROMOTING PRIVATIZATION (2003) at <http://www.icij.org/water/report.aspx?sID=ch&rID=44&aID=45> (last visited Mar. 22, 2005).

simultaneous recognition that water cannot be *wasted*. Waste is also an economic term describing a condition that occurs when the price is set below or above the optimal point where supply and demand meet.²⁸ In practical terms, this means that when water is treated as free, or is priced well below its cost and subsidized, water is *wasted*.²⁹ Additionally, corrupt governmental practices or use of water for political patronage also create waste by diverting water to users or uses that are inefficient.³⁰ Private corporations, on the other hand, bring market efficiencies, management experience, and most importantly—private investment capital.³¹

Not surprisingly, many corporations have taken advantage of this situation and have gone into the business of providing water. The annual revenue of the three biggest multinational water corporations in 2001 was almost 160 billion dollars.³² The most obvious example is the bottled water industry. Many countries, such as Cameroon, are also privatizing their municipal water supplies.³³ The Bolivian example described below is dramatic in terms of both the application of market theory and the reaction by the population to such a scheme.

In 1999, the city officials of Cochabamba, Bolivia put water services under the control of a for-profit corporation.³⁴ The corporation, Aguas del Tunmari (a subsidiary of Bechtel), seemed a sensible choice at the time because the government did not have the money or resources for new investments.³⁵ The current system was dilapidated, costly, and inefficient.³⁶ It was assumed that private capital would improve services and impose discipline.³⁷ To the contrary, the ultimate results were high prices and a popular rebellion.³⁸ When the vast majority of citizens could no longer afford the price of water, they took to the streets.³⁹ Hundreds of thousands of protestors eventually drove Bechtel's subsidiary from the country.⁴⁰ The same process occurred more recently in El

28. Briscoe, *supra* note 17, at 4.

29. *Id.*

30. See, e.g., E.A. Brett, *Participation and Accountability in Development Management*, 40 J. OF DEV. STUD. 1, 13 (2003) (describing cooperative systems in Uganda as having been captured by local elites and becoming mechanisms for personal enrichment and fraud).

31. See Jim Shultz, *The Right to Water*, at <http://www.fntg.org/news/index.php?op=read&articleid=814> (Mar. 1, 2004); Clay J. Landry & Terry L. Anderson, *The Rising Tide of Water Markets* at <http://www.itind.com/waterbook/tide.asp> (last visited Jan. 29, 2005); James Winpenny, *Financing Water for All*, 2003 REPORT OF THE WORLD PANEL ON FINANCING WATER INFRASTRUCTURE available at <http://www.worldwatercouncil.org/download/CamdessusSummary.pdf>.

32. Landry & Anderson, *supra* note 31 at 74.

33. Tetchaida, *supra* note 10; see also, WATER AND SANITATION PROGRAM, RURAL WATER SECTOR REFORM IN GHANA: A MAJOR CHANGE IN POLICY AND STRUCTURE (2002), available at <http://www.ruralwaterpsp.org/files/external/WSP%20Ghana%20RWS%20sector%20reform.pdf> (describing changes in rural water supply in Ghana, including privatization of some services).

34. JEHL, *supra* note 2, at 3.

35. *Id.*

36. *Id.*

37. *Id.*

38. *Id.* at 4.

39. *Id.*

40. *Id.*

Alto, Bolivia. In January of 2005, legions of angry residents rose up against Aguas del Illimani (a subsidiary of French giant Suez) forcing President Carlos Mesa to cancel their contract.⁴¹

There is no question that markets bring efficiencies to the allocation, provision, and delivery of water.⁴² In addition, markets bring economic incentives to those who profit from the sale of water. There is also no question that governments in developing countries have generally done a poor job of providing high quality water to their citizens.⁴³ For that reason, the privatization of water has been an increasingly attractive course.⁴⁴ At the end of the day, it is governments, no matter how they choose to do it, who are ultimately responsible for providing water, regardless of how it is used.

B. Water as a Human Right

The growing consensus around the world is that water is more than just an essential need—it is a human right. Since The U.N. Committee on Economic, Social and Cultural Rights (the “Committee”), issued General Comment 15, The Right to Water, in the International Covenant on Economic, Social and Cultural Rights (ICESCR), most of the world community has come to accept their conclusions.⁴⁵ Few international treaties or declarations explicitly establish a human right to water, but in much the same way that customary international law is established through objective acceptance of norms and a subjective sense of obligation to acknowledge the right, water has become a human right.⁴⁶ Examined in conjunction with the right to development, water becomes an immediately enforceable right, a right to be progressively realized, and part of a larger process of ensuring the full range of rights, including political and social rights.⁴⁷

Beyond international agreements, international actions such as three World Water Forums and a U.N. declaration establishing 2003 as the International Year of Freshwater have brought attention and focus on the right to water, generating scholarship and commentary from all quarters.⁴⁸ As previously noted, though far-reaching agreement exists, it cannot be said that a true consensus exists. Private

41. Juan Forero, *Even for Basics, Latin America Lacks Answers*, N. Y. TIMES, Feb. 22, 2005.

42. Landry & Anderson, *supra* note 31; Wimpenny, *supra* note 31.

43. GLEICK, ET AL., *supra* note 23, at 2.

44. See Landry & Anderson, *supra* note 31; GLEICK, ET AL., *supra* note 23, at iii-iv; Briscoe, *supra* note 17.

45. The majority of the sources cited here support the acceptance of water as a human right. See, e.g., SALMAN & MCINERNEY-LANKFORD, *supra* note 16 (outlining the legal and social basis for water as a human right).

46. Customary International law is typically defined as conduct, or the deliberate absence of conduct, by states as a general practice followed by a sense of legal obligation. See HENRY J. STEINER & PHILIP ALSTON, *INTERNATIONAL HUMAN RIGHTS IN CONTEXT* 69-72 (2nd ed. 2000).

47. The Right to Development will be more fully examined in Part Two *infra*.

48. See Al Gore & Hillary Rodham Clinton, Remarks at U.N. World Summit for Social Development, Copenhagen, (Mar. 12, 1995), in 6 DEP'T ST. DISPATCH 235, available at <http://dosfan.lib.uic.edu/ERC/briefing/dispatch/1995/html/Dispatch6no13.html> (Mar. 27, 1995); Ruana Rajepakse, *Water as a Human Right: Legal Social and Economic Implications*, at <http://www.elaw.org/resources/printable.asp?id=2019> (July 29, 2005).

corporations and the World Bank have tenaciously continued to describe water as a need and a commodity without directly opposing the assertion of water as a right.⁴⁹

1. The Legal Basis for Water as a Human Right

The Committee, in General Comment No. 15, directly addresses the legal basis for the right to water.⁵⁰ Article 11, paragraph 1 of the ICESCR recognizes the “right of everyone to an adequate standard of living... including adequate food, clothing and housing, and the continuous improvement of living conditions.”⁵¹ The Committee explicitly stated: “The right to water clearly falls within the category of guarantees essential for securing an adequate standard of living, particularly since it is one of the most fundamental conditions for survival.”⁵² Other international treaties, declarations, and documents have also recognized the right to water.⁵³ Under humanitarian law, the right to water is protected under the Geneva Conventions and the United Nations Standard Minimum Rules for the Treatment of Prisoners.⁵⁴ The U.N. Convention on the Rights of a Child explicitly states in Article 24 that:

States parties recognize the right of the child to the enjoyment of the highest attainable standard of health... [and] shall pursue full implementation of this right and, in particular, shall take appropriate measures . . . [t]o combat disease and malnutrition... through the provision of adequate nutritious food and *clean drinking-water*, taking into consideration the dangers and risks of environmental pollution.⁵⁵

49. The main forum for this view is the World Water Council. The Council is criticized for consisting mainly of “an exclusive membership of international financial institutions, large multinational water corporations, and non-governmental organizations tied to these interests.” Hemantha Withanage, *Water, An Economic Good or a Public Good?*, at <http://www.elaw.org/assets/word/sri%20lanka.water%20a%20public%20good.doc> (last visited Mar. 20, 2005).

50. *Comment 15, supra* note 9.

51. International Covenant on Economic, Social and Cultural Rights, *entered into force* Jan. 3, 1976, art. 11 ¶ 1, 993 U.N.T.S. 3.

52. *Comment 15, supra* note 9, at ¶ 3.

53. *Id.* ¶ 4; *see also* ASIAN DEVELOPMENT BANK, HEIGHTENED AWARENESS OF WATER ISSUES at http://www.adb.org/Documents/Reports/Water/heightened_awareness.asp (last visited June 30, 2004) (listing major international conferences in the 1990’s dealing with water).

54. Protocol Additional to the Geneva Conventions of 12 August 1949, and Relating to the Protection of Victims of International Armed Conflicts (Protocol I), *entered into force* Dec. 7, 1978, 125 U.N.T.S. 3, art. 54 (emphasis added); Standard Minimum Rules for the Treatment of Prisoners, adopted Aug. 30, 1955 by the First United Nations Congress on the Prevention of Crime and the Treatment of Offenders, U.N. Doc. A/CONF/611, annex I, E.S.C. res. 663C, 24 U.N. ESCOR Supp. (No. 1) at 11, U.N. Doc. E/3048 (1957), amended E.S.C. res. 2076, 62 U.N. ESCOR Supp. (No. 1) at 35, U.N. Doc. E/5988 (1977), ¶¶ 13, 15, 21; *see also* Alvarez, *The Right to Water as a Human Right*, in Picolotti & Jorge D. Taillant, *supra* note 14, at 75.

55. Convention on the Rights of the Child, adopted nov. 20 1989, 1577 U.N.T.S. 44, art. 24.

National action to regulate water and domestic policies enacted to protect water quality and availability also recognize water as an entitlement.⁵⁶ The South African Constitution states: "Everyone has the right to have access to... sufficient food and to sufficient water."⁵⁷ The United States has enacted domestic laws such as the Safe Drinking Water Act of 1974 to ensure that water systems meet minimum standards for protecting public health.⁵⁸ Even the Vatican has declared water a human right.⁵⁹ Finally, international instruments negotiated to divvy up water across State boundaries recognize water as some form of entitlement.⁶⁰

The Committee, in General Comment 15, essentially inferred the right to water from the language of international instruments.⁶¹ Water is deemed a *human right* by linking such rights as the right to life, the right to food, and the right to health, and recognizing that water is essential to human existence as a precondition to all rights.⁶² Thus, water must be viewed in a larger context by looking at the right to development and the interaction between established rights, human needs, and domestic policies.

2. The Right to Development

The right to development was officially established in 1986 when the Declaration on the Right to Development was adopted by the United Nations.⁶³ By 1993, full international consensus was reached when the United States (the only dissenting vote) affirmed the right to development at the Vienna Second U.N. World Conference on Human Rights.⁶⁴ Arjun Sengupta, author of *The Human Right to Development*, has defined the right to development this way: "The right to development is the right to a process of development, consisting of a progressive and phased realization of all the recognized human rights... as well as a process of economic growth consistent with human rights standards."⁶⁵

This definition contains within it two important characteristics shared by the right to water. First, the right to development is a composite right where all rights are interdependent and realized together—and not simply aggregated or added up.⁶⁶ Second, the right to development can only be realized when other rights are advanced and no others are violated.⁶⁷ The effect of these characteristics is to

56. Alvarez, *supra* note 54.

57. S. AFRICAN CONST. chapter 2, § 27(b), available at <http://www.polity.org.za/html/govdocs/bills/sacon96.html?rebookmark=1> (last visited April 16, 2005).

58. Alvarez, *supra* note 54, at 76.

59. *Water Access is a Human Right, Vatican Document Says*, NAT'L CATHOLIC REP., Briefs, Apr. 18, 2003, at 9 (Gill Donovan ed.).

60. GLEICK ET. AL., *supra* note 23 at 11-20.

61. See generally SALMAN & MCINERNEY-LANKFORD, *supra* note 16 (detailing the human right to water and the legal basis for the Committee's Comment 15).

62. See THE HUMAN RIGHT TO WATER, *supra* note 1; Picolotti & Taillant, *supra* note 14; SALMAN & MCINERNEY-LANKFORD, *supra* note 16.

63. Arjun Sengupta, *The Human Right to Development* 32 OXFORD DEV. STUD. 179-203 (2004).

64. *Id.*

65. *Id.* at 182.

66. *Id.* 183.

67. *Id.*

create a right that reconciles any conflict between the civil and political rights and the economic, social, and cultural rights.⁶⁸ Development as a right is both a process and an outcome. As a process, the right must be realized in a legal structure containing five principles: (1) equity, (2) non-discrimination, (3) participation, (4) accountability, and (5) transparency (the “Five Basic Principles”).⁶⁹ The right to development as an outcome creates duties on duty-bearers.⁷⁰ Sengupta explains the relationship between duty-bearers and right-holders as follows:

Human rights are universally regarded as moral entitlements of individuals. When they are translated into legal rights, the right-holders can legitimately demand that the duty-bearers, once they are identified, be accountable for carrying out their obligations and be subjected to a mechanism to monitor and adjudicate their performance, prescribing remedies in case of failures.⁷¹

The right to water, viewed through this lens must include the economic nature of water as a good to be provided and as a right that cannot be withheld. In this way, the right to water is also part of the right to development.⁷² This approach eliminates the problem of trying to determine which rights come first because the right to water is part of rights such as the right to life and health. If all rights must be realized to secure the right to development, then the provision of water is all that is required of governments (the duty-bearer) in a rights-based system adhering to the basic principles. Governments must also provide for the economic development of water.⁷³

3. Governmental Obligations

Every government has an obligation to ensure that all citizens have access to enough water to meet their basic needs without discrimination.⁷⁴ This obligation comes in the context of the broad obligations all governments face with regard to human rights—the obligations to respect, protect, and fulfill.⁷⁵ The Committee also recognized that the ICESCR provides for “progressive realization” of the rights contained within it.⁷⁶ This is the acknowledgment that the availability of resources constrains the ability of governments to provide the full range of rights contained within the Covenant.⁷⁷ These constraints do not in any way relieve State Parties (signatory governments) from their obligations or duties such as the

68. For a good description of this conflict, see Malcom Malone & Deryke Belshaw, *The Human Rights-Based Approach to Development: Overview, Context and Critical Issues*, 20 Transformation 76, 78 (2003).

69. Sengupta, *supra* note 63, at 181.

70. *Id.* at 186.

71. *Id.*

72. For a good discussion of a rights based approach to development, see WORLD HEALTH ORG., 9-11 RIGHT TO WATER (2003).

73. Sengupta, *supra* note 63, at 193, 194.

74. *Comment 15*, *supra* note 9, at ¶ 13.

75. *Id.*, ¶ 20 (stating: “The right to water, like any human right, imposes three types of obligations on States parties: obligations to *respect*, obligations to *protect* and obligations to *fulfill*.”)

76. *Id.*, ¶ 17.

77. *Id.*

requirement of forward progress and strict limitation on any regressive measures.⁷⁸ These general obligations were distilled into nine "Core Obligations" specific to the right to water:

1. To ensure access to the minimum essential amount of water that is sufficient and safe for personal and domestic uses to prevent disease;

2. To ensure the right of access to water and water facilities and services on a non-discriminatory basis, especially for disadvantaged or marginalized groups;

3. To ensure physical access to water facilities or services that provide sufficient, safe and regular water that have a sufficient number of water outlets to avoid prohibitive waiting times; and that are at a reasonable distance from the household;

4. To ensure personal security is not threatened when having to physically access water;

5. To ensure equitable distribution of all available water facilities and services;

6. To adopt and implement a national water strategy and plan of action addressing the whole population. The strategy and plan of action should be devised, and periodically reviewed, on the basis of a participatory and transparent process. It should include methods, such as right to water indicators and benchmarks, by which progress can be closely monitored. The process by which the strategy and plan of action are devised, as well as their content, shall give particular attention to all disadvantaged or marginalized groups;

7. To monitor the extent of the realization, or the non-realization, of the right to water;

8. To adopt relatively low-cost targeted water programmes to protect vulnerable and marginalized groups;

9. To take measures to prevent, treat and control diseases linked to water, in particular ensuring access to adequate sanitation.⁷⁹

The Committee also discussed violations of the right to water, including acts of omission such as failures to take steps to provide water for everyone, failure to create national policies on water, and the failure to enforce the laws.⁸⁰ Acts of omission would include regressive actions that contradict any of the Core Obligations such as the repeal of measures that provide for the realization of the right to water. Finally, the Committee listed typical examples of violations of the obligations to respect, protect, or fulfill the right to water.⁸¹

The obligation to respect the right to water prevents governments from interfering with the right to water.⁸² Such interference would include *inter alia*:

78. *See id.*, ¶¶ 18-19.

79. *Id.*, ¶ 38.

80. *Id.*, ¶ 43.

81. *Id.*, ¶ 44.

82. *Id.*

the arbitrary exclusion from water facilities, discriminatory increases in the price of water, and the pollution of water sources.⁸³ A violation of the obligation to protect the right to water includes *inter alia*: a failure to protect against the inequitable extraction of water, the failure to control water service providers, and the failure to protect water distribution systems.⁸⁴ The obligation to fulfill the right to water requires that governments “take all necessary steps to ensure the realization of the right to water.”⁸⁵ Violations include: the failure to implement a national water policy, the misallocation of public resources that harms vulnerable or marginalized populations, and a failure to ensure a minimal essential level is enjoyed by everyone.⁸⁶

Drawing on the discussion of the right to development above, the progressive realization of the right to water must also include adherence to the basic principles (equity, non-discrimination, participation, accountability, and transparency). For example, the obligation to implement a national water policy must come in a context that ensures other rights, such as civil and political rights, are not violated.⁸⁷ This implies that a basic democratic structure is required to ensure the full realization of the right to water in a national context.⁸⁸ Thus, a national or a local water policy must be developed in accordance with human rights standards as well as produce an outcome that ensures everyone has access to adequate amounts of safe water.⁸⁹ If they do not, the result is what happened in Bolivia—protests in the streets forcing governmental action. Such a result leaves governments suddenly saddled with the responsibility of managing a water system that was privatized because it was too costly for them to manage in the first place.⁹⁰

III. WHOSE WATER IS IT?

Sylvestre Tetchiada, in *Little to Quench the Nation's Thirst*, declares: “If you knew how many plans and resolutions there have been about [Cameroon’s] water problems, you would be hard put to understand why (people are) still without potable water.”⁹¹ There are three basic ways that water is actually provided to the people: private companies, government entities, and community based development projects. Each of these methods contains strengths and weaknesses. This section briefly looks at all three methods relative to both how well they provide safe, adequate water, and how well they comply with human rights standards.

83. *Id.*, ¶ 44(a).

84. *Id.*, ¶ 44(b).

85. *Id.*, ¶ 44(c).

86. *Id.*

87. For a more detailed discussion of the relation between Economic, Social and Cultural Rights and Civil and Political Rights, see STEINER & ALSTON, *supra* 46 at 268-275.

88. This debate is beyond the scope of the discussion here. See *id.* However, it is important to the discussion in Section III to see the relationship between these five legal principles and the differences between private, government, and development approaches.

89. See generally Sengupta, *supra* note 63 (discussing the relationship between the means and the ends of the realization of the right to development).

90. See Forero, *supra* note 41.

91. Tetchiada, *supra* note 10.

A. Privatization

In a World Bank technical paper entitled, *Evaluating Water Institutions and Water Sector Performance*, authors R. Maria Saleth and Ariel Dinar succinctly state the goals of a privatization approach to institutional reform. These goals are to “address water as an economic good, strengthen allocation capabilities, increase the reliance on market forces, revive the payment culture, ensure financial self-sufficiency, promote decentralized decision structure, and encourage the adoption of modern technology and information inputs.”⁹² It is with these goals in mind (and, of course, turning a profit) that corporations get into the business of providing water. As the name implies, privatization starts from the premise that the government is the first owner/manager of water systems.

The manner in which governments turn water over to corporations can take many different forms. Accompanying the transfer, governments may impose some regulatory oversight or basically relinquish all control and responsibility.⁹³ Some governments will simply sell off their water assets.⁹⁴ Another method is to lease assets.⁹⁵ Finally, countries may create a contractual relationship wherein a corporation is guaranteed profits in exchange for investments.⁹⁶ Regardless of how privatization occurs the result is a market driven pricing structure, usually with subsidized pricing to protect the poor.⁹⁷ Typically this is found in urban areas where piped water is delivered to homes or communal spigots.⁹⁸ From the point of view of the consumer, privatized water means paying a bill to a company who can both raise prices and turn off the water based on cost and profit considerations.⁹⁹ From the point of view of the government, privatization means investment in upgrading, expanding, and improving existing infrastructure.¹⁰⁰

The criticisms of privatization are strong. Jim Shultz, in an article entitled *The Right to Water* criticizes: “Far from being an effective strategy for advancing rights, privatization and subjecting water access to the inequalities of the private market has too often turned out to be a blunt instrument for violating human rights.”¹⁰¹ The overwhelming concern is giving the power of excluding people from water to unaccountable private organizations a lá Cochabamba or El Alto,

92. R. Maria Saleth & Ariel Dinar, *Evaluating Water Institutions and Water Sector Performance*, 9, WORLD BANK TECHNICAL PAPER 447 (1999) available at <http://www.worldbank.org/watsan/topics/economics.html>.

93. GLEICK, ET AL., *supra* note 23, at 26-28.

94. *Id.*; See also AFRICA-EUROPE FAITH AND JUSTICE NETWORK, WATER A RIGHT FOR ALL! PRIVATIZATION OF WATER AND SANITATION SERVICES IN AFRICA 4 (2003), at <http://www.aefjn.org/Documents/water.pdf> (last visited January 29, 2005) (describing various models of water management).

95. GLEICK, ET AL., *supra* note 23, at 26-28.

96. *Id.*

97. *Id.* But see the Bolivian example in JEHL, *supra* note 2 and Forero, *supra* note 41.

98. *Id.*

99. For example, in El Alto, Bolivia, Aguas' profits were not as high as they would have liked, so they raised the hookup fees from \$300 to \$450 in a country where the monthly wage is about \$55. Forero, *supra* note 41.

100. Landry & Anderson, *supra* note 31; Winpenny, *supra* note 31.

101. Shultz, *supra* note 31.

Boliva, discussed *supra*. When privatization policies are linked to larger economic reforms required by the IMF and the World Bank, desperate countries relinquish control and the poor suffer the consequences.¹⁰²

The World Bank declares on its website: “Effective water resource management requires that water be treated as an economic good.”¹⁰³ This has alarmed many who fear commodification as an erosion of water as a traditional social good.¹⁰⁴ Commodification undermines the status of water as a human right and shifts it back toward being a need that can be sold for profit. This conflict is summarized by Peter Gleick et. al. in the article, *The New Economy of Water: The Risks and Benefits of Globalization and Privatization of Fresh Water*:

However, there is little doubt that the headlong rush toward private markets has failed to address some of the most important issues and concerns about water. In particular, water has vital social, cultural, and ecological roles to play that cannot be protected by purely market forces. In addition, certain management goals and social values require direct and strong government support and protection.¹⁰⁵

The privatization model is fraught with problems. Among them are: usurping the responsibility of government; worsening economic inequities; failure to include public participation; lessening the protection of water quality; and transferring assets out of local control.¹⁰⁶ Water as a commodity requires the exclusion of others to its use and enjoyment when owned as a private property right.¹⁰⁷ If every person has a right to a minimum amount of water each day, the ability to exclude people and charge money for access to their water seems to stand in direct opposition to that right.

Critics like Vandana Shiva, author of *World Bank, WTO, and Corporate Control Over Water*, also contend that privatization fails to provide the benefits promised. Vandana Shiva asserts: “Just as the economic reform policies guided by the World Bank logic of privatization of food distribution create hunger, the privatization of water services will create thirst and water scarcity.”¹⁰⁸ For proof

102. See Sara Grusky, *Privatization Tidal Wave: IMF/World Bank Water Policies and the Price Paid by the Poor*, 2001 at http://www.thirdworldtraveler.com/Water/Privitization_Tidalwave.html. (last visited January 29, 2005).

103. WORLD BANK, *supra* note 13.

104. See Rothfeder, *supra* note 12 (examining the world’s water crisis); see also Barlow & Clark, *supra* note 5 (examining the corporate “assault” on water).

105. See GLEICK, ET AL., *supra* note 23, at 1.

106. *Id.*

107. This is a basic principle of the ownership of property and market economics. See Briscoe, *supra* note 17.

108. Vandana Shiva, *World Bank, WTO, and Corporate Control Over Water*, 2001, at http://www.thirdworldtraveler.com/Water/Corp_Control_Water_Vshiva.html (last visited Jan. 29, 2005).

of this position, critics point to Bolivia, Ghana, South Africa, Australia, and even Atlanta, Georgia.¹⁰⁹ Finally, critics point to the disproportionate burden privatization imposes on women.¹¹⁰

These critiques are grounded in a concern for both the process of privatization, via imposition of policies by the World Bank and others, and the outcomes (e.g. high prices mean less access to water). The question remains whether these are inevitable problems inherent to privatization. If privatization were to be implemented within a structure that follows the Five Basic Principles of human rights, many of these concerns may dissipate.

B. Government Control

The model of government control over water is the most familiar. In this model, the government owns and develops water resources then provides it to the public.¹¹¹ Costs are off-set by taxes and other revenue including subsidized bills to consumers.¹¹² Governments manage water resources through different methods such as out-right ownership, operation, and control through government agencies.¹¹³ Quasi-governmental agencies with a monopoly on water may be regulated by a board that has the power to determine water quality and pricing.¹¹⁴ These boards can be appointed or elected.¹¹⁵

The water crisis that faces the world today is the most powerful indictment of government control of water.¹¹⁶ The failure of government to provide water-related services underlies its desire to turn to private corporations to provide these services.¹¹⁷ Governments, especially in the developing world, lack the financial resources to meet the rising demand for water.¹¹⁸ For example, “[in Malawi] limited financial resources, poor institutional structures and implementation of environmental regulations, insufficient and unaffordable electricity supply, high unemployment and insufficient public education and awareness have great

109. Maude Barlow, *The World's Water: a Human Right or Corporate Good?*, in JEHL, *supra* note 2, at 25-39.

110. See Ana Obando, *Women and Water Privatization*, 2003, at <http://www.whrnet.org/docs/issue-water.html> (last visited Jan. 29, 2005).

111. See Guillermo Yepes, *Do Cross-Subsidies Help the Poor to Benefit from Water and Wastewater Services? Lessons from Guayaquil*, 3, at http://www.wsp.org/pdfs/working_subsidy.pdf (last visited January 29, 2005).

112. *Id.*

113. See, e.g., AFRICA-EUROPE FAITH AND JUSTICE NETWORK, *supra* 94 (describing various models of water management).

114. *Id.*

115. GLEICK, ET AL., *supra* note 23.

116. See *id.*

117. See, e.g., Jamal Saghir, Debate on current trends in water sector reform and pro-poor partnerships, 4 (David Jones rapporteur, Sept. 2, 2002) (commenting: “However, in the last few decades the result of funding the public sector to provide water and sanitation services has been quite disappointing – the poor have not been reached and many resort to informal service provision as a result.”).

118. See, Winipenny, *supra* note 31; see also Forero, *supra* note 41 (reporting “governments like Bolivia’s tried the task themselves before, abandoned it as too costly, and turned to private companies in the 1990’s.”).

influence on the scarcity of water resources.”¹¹⁹ Inefficient bureaucracies waste water from both an economic standpoint and in a literal sense when water is allowed to be polluted or leaky pipes drain water away.¹²⁰

The main problem with governmental operation of water resources is underpriced water.¹²¹ Governments set the price of water at below cost.¹²² Without enough money to cover existing services, there is little opportunity to generate more revenue and expand services to meet rising demand.¹²³ When water becomes unavailable, unreliable, or unsafe, the poor look for water from unsafe sources.¹²⁴

The great advantage of governmental control is that governments are accountable to the people. In democratic, or even pseudo-democratic states, the people have some ability to express displeasure and hold decision-makers accountable—again the Bolivian example is instructive. Right-holders (the people) can legitimately demand that duty-bearers (governments) respect their right to water.¹²⁵ Governments or States Parties can also be held accountable in international institutions and organizations.¹²⁶ Because water is a public good, centralized democratic control by the government means greater adherence to those Five Basic Principles underlying all human rights.

C. Participatory Development Projects

When government policies fail, NGOs often step in to fill the gaps.¹²⁷ Elionor Ostrom, author of *Governing the Commons: The Evolution of Institutions for Collective Action*, observed that “neither the state nor the market is uniformly successful in enabling individuals to sustain long-term, productive use of natural resource systems.”¹²⁸ Where neither government nor markets are dominant, communities manage common resources over long periods of time with some success.¹²⁹ The Achilles heel of common control of a common resource is “the tragedy of the commons.”¹³⁰ This is the name Garrett Hardin, author of the influential essay titled *The Tragedy of the Commons*, gave to the problem of individually rational strategies that lead to collectively irrational outcomes.¹³¹ The basic problem is that each individual acts in his or her own interest, but

119. Wanja Njuguna-Githinji, *Africa*, at <http://www.ittind.com/waterbook/afica.asp> (last visited Jan. 29, 2005).

120. *Id.*

121. Landry & Anderson, *supra* note 31.

122. *Id.*

123. *Id.*

124. See Margaret Catley-Carlson, *Working for Water*, in JEHL, *supra* note 2, at 65, 69

125. See Sengupta *supra* note 62.

126. See STEINER & ALSTON, *supra* note 46 at 305-316.

127. Jon Lane, *Non-Governmental Organizations (NGO's): New Players in Water Policy*, at <http://www.ittind.com/waterbook/NGOs.asp> (last visited Jan. 29, 2005).

128. ELIONOR OSTROM, *GOVERNING THE COMMONS: THE EVOLUTION OF INSTITUTIONS FOR COLLECTIVE ACTION*, 1 (1990).

129. *Id.*

130. *Id.* at 2-4.

131. Garrett Hardin, *The Tragedy of the Commons*, 162 *SCIENCE* 1243-1248 (1968); see also *id.* at 2-7 (explaining Hardin's article in the context of a prisoners dilemma game).

collectively use a common resource (i.e. the commons). If each individual maximizes their profit by using the commons to the fullest extent possible, the commons are destroyed and everyone loses. A solution is collective agreement.¹³²

At the center of the *tragedy* is the free-rider problem.¹³³ Ostrom described the free-rider problem this way: "Whenever one person cannot be excluded from the benefits that others provide, each person is motivated... to free-ride on the efforts of others."¹³⁴ Thus, even if collective action is established in the short-run, force of the temptation to free-ride may eventually overwhelm any agreement over the long term.¹³⁵ It is this problem that the participatory approach hopes to overcome through education and community contributions to their projects.¹³⁶

A development project looks essentially like this: the NGO identifies a community, conducts a needs assessment, identifies an appropriate project, identifies local and other resources, acquires funding, implements the project, and follows up with evaluation.¹³⁷ Participation at each step along the way is crucial to achieve education of the community and to create a sense of local empowerment.¹³⁸ Thus, participation is both a means and an end.¹³⁹ It expands people's capabilities and improves performance by involving users in the decision-making process.¹⁴⁰ This has two important benefits: transparency and independence. Promoting transparency within the project increases the participation of women and creates a greater consensus within the community. Independence can be particularly important when working in countries with more oppressive regimes because it allows communities to improve their situation without needing to rely on slow, under-funded or corrupt bureaucratic government agencies.

Criticisms of participatory development cover a wide spectrum.¹⁴¹ Here the focus is on three important drawbacks of the participatory approach: (1) the short-

132. *Id.*

133. OSTROM, *supra* note 128, at 5.

134. *Id.*

135. *Id.*

136. These two principles, education and community contribution, were at the heart every development model this author studied as a Peace Corps volunteer. See generally WORLD BANK, RURAL WATER SUPPLY AND SANITATION TOOLKIT 33-39 (2004) (outlining the project cycle). See also Brett, *supra* note 30, at 1 (exploring participatory theory in development).

137. *Id.* The exact process, and the way in which these steps are implemented, can vary greatly depending on a huge number of factors. See also, Karen Fisher & Peter Urich, *Information and Communication in Stakeholder Participation: the Bohol-Cebu Water Supply Project*, 40 ASIA PACIFIC VIEWPOINT 251 (describing a step-by-step approach using an "instrumental participation" model).

138. E.A. Brett defines "participation" this way, "a process by which people, especially disadvantaged people, influence decisions that affect them." Brett, *supra* note 30, at 5 (citing a World Bank document). See also Trevor Parfitt, *The Ambiguity of Participation: a Qualified Defense of Participatory Development*, 25 THIRD WORLD Q. 537, 538 (2004) (listing four alternative definitions of participation).

139. Brett, *supra* note 30, at 6; but see Parfitt, *supra* note 138, at 539 (describing participation as either a means or and end, not necessarily both).

140. Brett, *supra* note 30, at 6.

141. See Mary Anderson, *Aid: A Mixed Blessing*, 10 DEV. IN PRACTICE 495 (2000); Sebastian Mallaby, *NGO's Fighting Poverty, Hurting the Poor*, FOREIGN POL'Y, Sept-Oct 2004, at 51.

termist problem; (2) ignoring power differentials within communities; and (3) dependence.¹⁴² Short-termism describes a scenario wherein a local population is mobilized for the project, but once the task is completed, participation evaporates.¹⁴³ Ignoring power differentials can result in projects where the intended beneficiary is the populace at large, but the more powerful members of the community actually capture that benefit.¹⁴⁴ Finally, the inherent problems of dependence on outside help or aid, despite the empowering effects of a participatory approach, can be real.¹⁴⁵ These are the problems that ultimately doomed well intentioned projects in Cameroon and elsewhere.¹⁴⁶

IV. HOW CAN WATER BE DELIVERED?

In Ghana, in the 1990's, as few as forty percent of the 8,600 hand-pumps constructed by the Ghana Water and Sewerage Corporation (GWSC) and NGOs were working at any given time.¹⁴⁷ As a Peace Corps volunteer in Cameroon this author saw first-hand the problem of broken pumps.

In Cameroon, hundreds of wells had been built by an international NGO with the help of the villagers. They were lined with cement and covered with a hand pump. Yet women and children were getting their water from streams running under roads because the pumps were broken. In one village, a technician estimated that it would cost about eighteen U.S. dollars to repair their pump. What about the water committee that had been formed to manage the pump? They had collected a fee from everyone who used the well on a monthly basis—where was that money? The chief's brother had *borrowed* the money and was going to pay it back as soon as he could. The loan was two years past due. Raising the money was equally problematic because the chief's brother, head of the water committee, would be organizing the effort. Although a donation of one dollar per month by each family head for a period of three months would have raised enough money to fix the well, when it came to making the *required* donation no one contributed.

A. Broken Pumps

On its face, the program that created these wells was a model of *good* development practices. The villagers had to *contribute* by doing all the manual labor and providing materials such as gravel and sand to mix with the cement. Two villagers were trained on how to keep the pump working, to repair it, and to keep the water clean. The whole village was given lessons on the importance of clean water, proper hygiene, and sanitation. The water committee was comprised

142. Parfitt, *supra* note 138; NGO's, Gina Porter, *Poverty Reduction in a Globalizing World: Perspectives from Ghana*, 3 PROGRESS IN DEV. STUD. 131, 141 (2003).

143. Parfitt, *supra* note 138, at 539.

144. *Id.* at 539-540.

145. There is much debate as to whether aid creates dependency. Cf. Mark Bradury, *Normalizing the Crisis in Africa*, 22 DISASTERS 328, 332 (2000) (describing the "myth of dependency" and "dependency syndrome" and then arguing against them).

146. The author spent two years as a Peace Corps volunteer in Cameroon as a Health and Water Sanitation Volunteer. He draws on this experience throughout the remaining sections. Many observations are the author's opinion, the verification of which is beyond the scope of this paper.

147. WATER AND SANITATION PROGRAM, *supra* note 33, at 2.

of both women and men. This model is followed by almost every international development agency in the world, including the Peace Corps.¹⁴⁸ Yet, it failed.

There were two fundamental problems: (1) there was no accountability for those in charge of the wells; and (2) there was no incentive to maintain the wells. Once a well broke, the villagers would go back to getting water from whatever source they used before the well was built. Then the villagers would wait for the government or a development agency to come and fix their well. The water committee was designed to prevent these problems from occurring. As part of ensuring a *sustainable* project, the village was organized to participate in the building and maintenance of the well. This participation was designed to create a sense of ownership and a lasting ability to keep the well working. Unfortunately, the development model described above did not take into account the deep and troubling effect that corruption has on rural communities. In many of these communities, there is no accountability and no faith that laws will be enforced fairly because the powerful are protected. Add to this a perception of time that encourages short-term benefits over long-term plans and the chances of this model succeeding decrease dramatically.

The lack of accountability stems from the very nature of village life—hierarchical structures that protect the men in charge from their misdeeds. *Chief* is not an elected position. Lack of accountability also stems from the pervasive nature of corruption that plagues all levels of society. No consequences flow from a broken pump to those responsible for repairs. There are consequences however—disease and death from unclean water. The severity of the consequences should be incentive enough to fix the well, but sadly it is not. Life is lived in the short-term. The realities of village life dictate that it does not make sense to give up money you need now, particularly in light of the high risk that the donation will achieve nothing—even though a baby may die from dehydration brought on by diarrhea caused by polluted water. Malaria or AIDS is just as likely to kill and there are crops to tend to and mouths to feed. The communal model, designed on principles of empowerment and self-reliance, fail because the model does not address the deeper cultural obstacles inherent in village life or the impact that corruption has on the basic trust required to maintain a community resource.

B. Private Wells

Elinor Ostrom proposed what she termed a “fifth game” in the prisoner’s dilemma.¹⁴⁹ In this scenario, the community makes a “binding contract” to commit themselves to a cooperative strategy before they use the resource and share equally

148. See Parifft, *supra* note 138.

149. Ostrom, *supra* note 128, at 15. The Prisoners Dilemma a non-cooperative (no communication between players) “game” in which players must choose one of two paths. The first is a “defect” path in which players maximize their personal use of the commons; unless the other player picks the same strategy. If that happens, both players get zero. The second path is a “cooperative” choice to reduce their maximum by half risking either zero or half the maximum, depending on what the other person does (the player’s choices are unknown by others until after they have been made). The dilemma is that the individually rational strategy (maximize) leads to a collectively irrational outcome (zero). *Id.* at 4-5.

in the cost of enforcement.¹⁵⁰ She then adds a private party to take on the role of an external enforcer to arbitrate decisions, but not make or impose them. This article advocates a similar proposal combining certain aspects of both the common ownership and private ownership models and uses basic market incentives to ensure both quality and access to water without sacrificing local control. The scenario used to demonstrate how such a system would work is modeled on the village described above, one with a well, broken pumps, and a corrupt water committee.¹⁵¹

Under the model proposed here, the NGO would go into villages and offer to fix their well in exchange for the exclusive right to manage the well.¹⁵² The process of explaining the implications of this transfer of control would conform to well-established methods using participative discussions that include women and occur over a period of time. This would enable villages to make an educated decision. The process would have to be transparent to ensure consensus within the village. Next, the NGO would find a villager (the "Manager") to lease the well to after it had been refurbished. Both the village and the NGO must approve the Manager. The Manager would receive extensive training on the technical aspects of maintaining the well and would be personally responsible for completing all repairs and ensuring water quality. The Manager would also receive extensive training on running a small business, pricing models, and accounting. The Manager would then sell the water to the village. Pricing schemes would include monthly fees for unlimited access and charges on a per unit basis or other methods offered as a menu. The Manager would be competing with the free (unsafe) water source so prices would have to be reasonable and at the same time make him enough money to pay the NGO each month for his lease. Any money the Manager makes above his monthly rent would profit to him.¹⁵³

To compete, the water must be cleaner, safer, and closer than the free water. This provides the manager with the incentive to both keep the prices low but the quality of the water high. The NGO will oversee all of this, providing guidance and accountability by periodic testing of the water. Creative managers may offer services as well, such as having water delivered (employing locals to haul the water) or by selling bottled water. Finally, managers that abuse their position, charge high prices, or otherwise extort the community would be removed by the NGO at the request of the community. Evaluations and surveys of the manager's performance would be conducted to provide both an ongoing source of information for improving the program and to ensure accountability. Because the manager has to pay a monthly fee as well as all maintenance and repair costs, they would have

150. *Id.* at 15, 16.

151. In Cameroon the government has proposed the provision of a well or borehole (deep well) equipped with a hand-powered pump for every 300 to 500 people. Tetchaida, *supra* note 10.

152. The legal implications of enforcing such a deal would require conformity with local laws and usually the agreement of a government official to actually enforce the agreement should a dispute arise. Similar agreements were used in the Ghana. See WATER AND SANITATION PROGRAM, *supra* note 33, at 3.

153. The masculine pronoun is used here to represent both potential male and female managers.

an incentive to use the water efficiently and avoid waste.¹⁵⁴ The NGO would use the money from the monthly lease payments to cover its own costs and as capital to repair more wells and expand the program.¹⁵⁵

V. A RECOMMENDATION: DO PRIVATIZED WELLS PROTECT THE RIGHT TO WATER?

According to Ostrom: "What is missing from... well developed theories of human organization... is an adequately specified theory of collective action whereby a group of principals can organize themselves voluntarily to retain the residuals of their own efforts."¹⁵⁶ The concerns that have been raised about the privatization of water are very real. Putting such a valuable resource in the hands of unaccountable corporations driven by profit motives rather than humanitarian concerns is troublesome. With global water shortages looming in the future, world peace will depend on an equitable and secure system of meeting the demand for water.¹⁵⁷ The possibility of actual war over water is serious enough that U.S. intelligence services have identified a number of potential areas where water wars could erupt.¹⁵⁸ Thus, control over water resources will be critical to meeting human needs and maintaining peace in the future.

In a privatized system, those who have water provide it to those who do not—but only to those who can pay. In a purely market driven system the poor will always be excluded based on an inability to pay, which violates their human right to water. However, turning water over to governments or communities that are unable to manage it effectively produces the same effect. Though it is self-inflicted, the obligation to provide water does not end just because a community itself is responsible for any failure to provide for its own needs.¹⁵⁹ The plan set forth here meets the obligations outlined by the Committee and the practical concerns of the villagers on the ground who deserve clean water.

A. *Evaluating Compliance with Human Rights Standards*

Evaluating compliance with the human right to water begins with the three basic obligations under human rights standards: to respect, to protect, and to fulfill. The duty to respect requires a government to ensure the activities of its institutions

154. See generally Ostrom, *supra* note 128, at 41 (using the theory of the firm and the theory of the state to explain collective action can be maintained when the burden of that action falls on an individual whose returns are directly related to the surplus generated).

155. The most fundamental question is: will villagers ever pay for water if they are used to it being free? The answer is beyond the scope of this paper, but suffice it to say, given the evidence of how many villagers have been willing to pay for water at some point, it follows that they would pay for safe, high quality water. See e.g., GLEICK ET. AL., *supra* note 23, at vi (stating: "Experience has shown that water users are often willing to pay for improvements in service when such improvements are designed with their participation and when improvements are actually delivered.")

156. Ostrom, *supra* note 128, at 25.

157. PETER ALLISON, WATER WARS-THE GLOBAL VIEWPOINT, at <http://www.ittind.com/waterbook/world.asp> (last visited Jan. 29, 2005) (outlining the real possibility of water shortages and advocating for privatization).

158. *Id.*

159. See *Comment 15, supra* note 9, at ¶ 38 "[T]he Committee wishes to emphasize that it is particularly incumbent on States parties, and other actors in a position to assist, to provide international assistance and cooperation . . ." (emphasis added).

and agencies do not interfere with a person's access to water.¹⁶⁰ The proposed plan requires that governments have laws in place that would permit the NGO to own and lease wells. It would require the NGO to work with the government to share information and to ensure that the government's interests are being protected. The proposed plan would also require that the NGO be free from interference by those who would use it for political patronage. These requirements would have to be conditions precedent to implementation of this plan. By supporting this plan, the government would also fulfill the obligation to not go back—the duty of non-retrogression.¹⁶¹

The obligation to respect the right to water means that people cannot be unfairly or arbitrarily disconnected or refused water by laws, government regulations, or pricing policies. This plan is designed to have the flexibility to respond to each individual situation and to price water in such a way that, when disaster strikes, no one is left without water. Rather than dealing with a faceless bureaucrat, the villagers would be working with a Manager they participated in choosing, and if that Manager abuses his position he can be removed.

The obligation to protect requires that governments do not allow others to endanger the right to water.¹⁶² It also means that the quality of water provided is protected.¹⁶³ This plan empowers the NGO to remove the water concession from an abusive or ineffective Manager. By monitoring water quality, the NGO holds the Manager accountable while also supporting his enterprise by showing villagers that his water is higher quality. Other conditions such as the distance between the well and latrines or graves can also be monitored so that pollution can be avoided. Finally, because the Manager is personally responsible for ensuring water quality, there is an incentive to protect the well as a source of revenue. The work required to keep the well covered, chlorinated, and clear of animals is compensated by the profit the Manager makes.

The obligation to fulfill is a forward-looking obligation to facilitate, promote, and provide for the full realization of the right to water.¹⁶⁴ This means that programs such as this should be encouraged and promoted, but not imposed. Solutions must be tailor-made to the individual situation of each population. One of the most enduring efforts is to educate communities about the hygienic use of water and its protection.¹⁶⁵ Beyond this, a rights based approach to development includes educating people about their rights and empowering them to take control of their lives.¹⁶⁶ The education process that precedes the purchase of the well and the lease to the Manager meets these obligations. Even if a village decides not to

160. *Id.* ¶ 21.

161. *Id.* ¶ 19.

162. *Id.* ¶ 23.

163. *Id.*

164. *Id.* ¶¶ 25, 26.

165. Paragraph 25 reads: "The obligation to promote obliges the State party to take steps to ensure that there is appropriate education concerning the hygienic use of water, protection of water sources and methods to minimize water wastage." *Id.* ¶ 25.

166. See WORLD HEALTH ORG., *supra* note 72, at 9.

go through with the program, they will have learned a great deal, enough to provide hope that they will protect and manage their water source better than before.

Finally, this plan should be evaluated against the Five Legal Principles discussed as part of the right to development: equity, non-discrimination, participation, accountability, and transparency. The process of educating the village, including women and children, is essential to meeting the first three principles. The on-going oversight of the NGO provides the accountability and transparency needed not only to comply with human rights principles, but also to overcome the problems typically faced by programs created through participatory development projects. Finally, providing a conflict-resolution mechanism helps reinforce all these principles as well as discourage the free-rider problem.¹⁶⁷

B. Evaluating Compliance with the Nine Core Obligations

The nine core obligations are to: (1) ensure access to sufficient and safe water; (2) ensure non-discriminatory access; (3) ensure physical access; (4) ensure secure access; (5) ensure equitable distribution; (6) ensure adoption of a national water strategy and plan of action; (7) monitor the realization of the right to water; (8) implement low-cost programs targeted at marginalized groups; and (9) prevent, treat, and control diseases linked to water.¹⁶⁸ The proposed plan, if implemented with governmental support, directly meets the first five and the last two core obligations. A well located in the village that is available to everyone within a system that differentiates between differing ability to pay through creative pricing meets those seven obligations.

This program also indirectly addresses obligation six and seven by implicating the government in its creation and implementation.¹⁶⁹ Monitoring is part of every NGO's grant funding requirements, and by drawing on development models, NGOs can effectively report their progress to governmental and international organizations. Further, the incentive to have accurate information is strengthened as regular feedback from the evaluations and surveys are built into the program's success. Because future funding comes from the manager's lease payments, success is tied directly to funding in much the same way a profit incentive motivates private companies.

The fear that people will not pay and therefore be denied access to high quality water is the principle objection to this plan. Aside from creative pricing schemes that can be adopted to avoid denial of access, an additional reality of village life should be taken into account—communal existence. Nothing prevents a manager from extending credit, or giving away water in times of need. Additionally, a family that pays a fee for unlimited access can provide water to those who may not have the same level of resources. The potential for abuse is undeniably high but the problem can be confronted directly during the educational

167. See Ostrom, *supra* note 128, at 101.

168. *Comment 15, supra* note 9.

169. *Id.*

discussions with the village at the programs inception.¹⁷⁰ Villages are never as poor as outsiders perceive them to be. Alternative forms of payment or barter schemes are possible as well. The Committee directly addressed the question of failure to pay in paragraph 56 of General Comment 15: “Where such action is based on a person’s failure to pay for water their capacity to pay must be taken into account. *Under no circumstances shall an individual be deprived of the minimum essential level of water.*”¹⁷¹

C. Final Considerations

Two final qualifications regarding implementation of the proposed plan must be considered. First, this program is designed for relatively small rural villages not likely to be connected to municipal systems—exactly the people contemplated in obligation eight. A program such as this implemented on a larger scale in urban areas begins to resemble government-private sector partnership schemes that already exist in many places.¹⁷² Second, the proposed plan would have to be implemented in several phases. This paper is not intended as a description of how to actually implement such a program and real questions remain about its feasibility.

CONCLUSION

The purpose of this paper was to offer a solution to the failures of programs advanced by both the proponents of privatization, who view water as a need and commodity on the one hand, and the proponents of water as a human right and communal resource on the other. Water is a human right, and governments have real obligations in realizing those rights. The challenges faced by governments and the global community to meet those obligations will only grow in the coming decades. There is no one-size-fits-all solution to these problems, but the program offered here addresses both the challenges and realities on the ground. Market incentives are powerful and by harnessing those forces, safe, clean water can be available to everyone. The key to any program will be accountability. Larger forces such as the spread of democracy and the rule of law will have to be part of long-term solutions to resource scarcity. By working with existing development models and learning from past failures, problems can be addressed in small ways, village-by-village, and well-by-well. Experimentation by rectifying the failures of existing development models on an *ad hoc* basis may be the only way to ensure the right to water in marginalized and poor rural communities.

170. As Elinor Ostrom points out, “when appropriators design at least some of their own rules . . . they can learn from experience to craft enforceable rather than unenforceable rules.” Ostrom, *supra* note 128, at 96.

171. *Comment 15, supra* note 9, at ¶ 56 (emphasis added).

172. *See generally* GLEICK ET AL., *supra* note 23 (discussing different public/private partnerships).

