

## *2.1 A Human Development Approach to Water Security*

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## Introduction

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The notion of water security has received an increasing level of interest from the international development community as well as research and academic groups. It appears to take vastly different meanings in different groups, audiences and contexts. It is also intertwined with the broader ongoing dialogue around the notions of human security versus national security. Not only does security relate to the more conventional concepts of protecting a country against external threats to its territorial integrity, but also includes non-conventional elements such as human security, economic security, social security, environmental security and protection of infrastructure (Liotta, 2002).

There are two broad interpretations of water security, as follows:

First, it is a matter that relates to the security of nations, their peoples and natural resources. A lack of such security can then be correlated to the potential for armed conflict, civil unrest and outright wars, with countries as the primary players. This territorial- and sovereignty-focused approach has received some credence due to the statements offered by some prominent politicians, statesmen and researchers. The most prominent amongst these is the former United Nations Secretary-General, Mr. Boutros-Boutros Ghali, who famously declared in the early 1990s that the next set of wars will be fought over water and not oil (Bencala and Debalko, 2008). Even a superficial analysis debunks this theory, particularly when one considers that the recent major wars in Afghanistan (2001- ), Iraq (2003 -), and Libya (2011) were not motivated by water security. Nonetheless, the notion of water security as one tied to armed conflict has persisted and is often considered as a valid approach in the political science arena.

A second approach has emerged more recently, which defines water security in a more anthropocentric context. It is argued that water security should be construed as a basic and fundamental element of 'human well-being'. Human well-being was defined more broadly in the Millennium Ecosystem Assessment (MA, 2005: v), as follows:

*"Human well-being is assumed to have multiple constituents, including the basic material for a good life, such as secure and adequate livelihoods, enough food at all times, shelter, clothing, and access to goods; health, including feeling well and having a healthy physical environment, such as clean air and access to clean water; good social relations, including social cohesion, mutual respect, and the ability to help others and provide for children; security, including secure access to natural and other resources, personal safety, and security from natural and human-made disasters; and freedom of choice and action, including the opportunity to achieve what an individual values doing and being."*

The declaration by the United Nations General Assembly in July 2010 of the access to drinking water and sanitation as a basic human right is an explicit manifestation of this latter approach. It recognizes that a lack of access to drinking water and sanitation services is a global human development challenge, and the numbers to support this are staggering: 780 million of those without access to improved sources of drinking water and 2.5 billion without adequate sanitation (UNICEF and WHO, 2012). The worldwide death toll associated with this problem is around 3.5 million each year, about half of whom are children under the age of five. Women and children are the primary victims; in particular, the lives and educations of girls are impacted the most.

It is interesting to note that if we start with the anthropocentric approach to water security and place value on the importance of human well-being, we still arrive at the former approach of securing water resources at the national and international (basin-wide) levels, and minimize the potential for armed conflict as a result. It provides a different lens through which conflicts amongst competitive water users, including nation-states, could be viewed. To take the argument a bit further, it may be argued that water security for the individual has to be one of the ultimate goals for economic and social development and efforts to reduce poverty.

## 1. The Human Development and Security Nexus

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The United Nations Development Programme (UNDP) provides a fundamental argument that human security in general can be achieved through an enhanced focus on human development (UNDP, 1994). This is a significant departure from the conventional and dogmatic thinking that security can only be built through strong military apparatus: development of armed forces, acquisition of arms and ammunition. This conventional paradigm further argues that a strong military

apparatus assists nation-states in achieving a strong negotiating position, and ultimately, favourable treaties and conventions. Emerging thinking in the development community increasingly argues that human well-being is tied to having politically viable and economically stable states, which eventually does more to ensure the security of nations as well as individuals in comparison to the more conventional approaches.

The question then emerges: what elements of the international development agenda need to be modified to achieve human security? UNDP (1994) indicates that success in such a development paradigm is contingent on revamping traditional development cooperation so that it encompasses all economic flows within a country. This approach would essentially create a strong link between poverty reduction, economic development and the focus of overseas development assistance. Development of the *Poverty Reduction Strategy Papers* by many developing countries in the late 1990s, with the assistance of the World Bank, International Monetary Fund and other development partners, were manifestations of this thinking (World Bank and IMF, 2005). The main idea remains that the 'development assistance envelope' should be cast wide enough to include national economic flows in addition to the foreign ones. Some have argued that this needs to be taken a step further, with certain fractions of the national budget, say 20% as an aspirational target, set aside in order to directly serve this development agenda. In other words, this 20% of national budgets as well as 20% of foreign aid should be allocated to serving the human security agenda.

Implementing this notion of human security through economic and human development, however, faces a number of roadblocks. In most democracies and almost all dictatorial governments, there are often a number of competing political interests. These political counter-interests typically operate on shorter cycles, whereas successful implementation of a development and human security agenda may require anywhere from 5 to 20 years to be achieved. Politicians, therefore, are inclined to invest more in what are perceived as short-term gains. Reversing this trend requires some detailed policy analysis and documenting evidence in support, as well as ensuring that some short-term benefits are also clearly available.

Another related challenge is the shortage of capital for investment in human development initiatives. Lack of prioritization by governments and insufficient allocation of budgets is typically echoed in the private sector as well as in foreign aid. Private capital investments are typically absent in situations where returns on investment are perceived to be insecure; ironically, this is the case for societies and communities where the need is most often the greatest. This shortage of capital is further exacerbated by the siphoning-off of national funds and foreign aid; corruption remains a major element of this adverse development environment.

Yet another major challenge in effective implementation of the development agenda is the lack of institutional capacity. The gaps in human and technological capacity are further amplified by the absence of institutional structures. In the context of governance, capacity entails the ability of governance institutions – including the legislature, executive, judiciary, civil society and the private sector – to undertake and perform their mandated functions efficiently and effectively. In the context of scientific and knowledge institutions, this capacity entails the ability to understand, analyze and recommend corrective actions based on scientific evidence. In the absence of these institutional elements, best-designed programmes for economic and social development can and have gone astray. Therefore, institutional capacity development must also be a central element of a successful human security, and development, agenda.

## ***2. Water as a Building Block for Human Security***

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Access to safe drinking water and sanitation lies at the heart of human well-being and it is central to developing an international development agenda based on human security. Most prominently, it is now documented that provisioning of safe drinking water and adequate sanitation services can form the basis for reducing poverty – by improving livelihoods, creating jobs for local communities in developing countries engaged in the initiative, removing the cycle of disease that reduces productivity of those without access to these services, and by re-directing the savings in the health sector to other imperatives (UNDP, 2006). Ensuring access to water for human consumption often requires balancing off against other consumptive uses – the most critical being water for agriculture and food production, which presently consumes 70% of global water resources and relates to the Millennium Development Goals around hunger (UN-Water, 2012). Water, thus, gains the center stage in the development agenda.

It is argued in this paper that the following four components must be put in place for water to effectively transform the international and national development agendas.

First, there has to be tangible short-term gains. Such gains are essential to purchase political viability on the one hand, and to create a positive momentum on the other. Political viability can usually be described in the form of economic benefits. Increased economic activity, particularly for the so-called ‘base of the pyramid’ poorest segment of population, can lead to the creation of new jobs and opportunities for local entrepreneurs. This job growth and enhanced economic activity could be viewed in the context of the emerging ‘Green economy’, and more generally as a part of the economic recovery from the financial crisis of 2008 and 2009. Most political and policy players would readily accept creation of jobs alone as a positive and significant public relations element.

Second, there should be mobilization of financial capital and resources for on-the-ground implementation and deployment of services. Presently, the majority of capital emanates in the public sector and is provided as either overseas development assistance or as part of national budgets (UN-Water, 2010). Given the fact that 780 million people are without access to an improved drinking water source and 2.5 billion are without access to adequate sanitation services, the current *modus operandi* of depending on public sector financing is clearly insufficient (UNICEF and WHO, 2012). Additional capital needs to be mobilized through effective engagement of the private sector, while providing adequate and effective oversight for it through the public sector. Such capital mobilization requires a policy environment that is conducive to protecting investments from the private sector; political stability itself plays a key role in providing assurance to investors. While there are many models and examples of public-private partnerships, the rate of successes and failures are likely comparable, pointing to the need for a careful analysis of private sector engagement and involvement of all stakeholders in designing initiatives around public service provisioning.

Third, there must be a mechanism in place that can minimize corruption and graft, which lead to the loss of a significant amount of resources. Systematic statistics on corruption are difficult to come by; Transparency International estimates that about 20 to 40% of official development assistance gets siphoned off due to corruption (Transparency International, 2009). This leads not only to the loss of critical financial resources, but also in overall ineffectiveness of solutions and services that are eventually provided; many donor agencies and development banks now impose constraints around ‘good governance’ as a counter-measure. Overcoming corruption is a great challenge for most developing countries, but a number of broad approaches have led to significant improvement. Wide stakeholder engagement, particularly of the communities that are to be recipients of a development initiative, can lead to greater transparency and public pressure – both critical in minimizing corruption. Greater transparency in information flow on the one hand and enabling watchdog organizations on the other can also significantly reduce the impacts of corruption.

Fourth, institutional capacity development must be centralized into all development initiatives. These institutions range from enabling and strengthening community-based organizations to national legislations to those involved in undertaking applied research, analysis and development. Enabling institutional development presently receives scant attention from the international development community; that needs to change drastically if truly sustainable and long-term development solutions are to be successful. Such change requires a major re-prioritization of overseas development assistance. We can argue that the United Nations system can play a central role in such capacity development efforts. Through its various organizations and agencies, the UN system collectively possesses the technical resources, the human resources, and the linkages with national and sub-national governments that are needed for institutional capacity development. Coordination mechanisms like UN-Water, including the United Nations Water Decade Programme on Capacity Development (UNW-DPC), must play a central role in bringing together the resources for assisting UN country teams and the responsible government agencies.

## Conclusions

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A broader perspective around water security is essential for bringing about a positive change – and such change has to relate to economic and social development, and must eventually lead to improvements in human well-being. Water security is also closely tied to other elements of security: national security, human security and security against calamities caused by a multitude of factors including terrorism, climate-related extreme events and natural disasters, among others. The UN Security Council already considers climate change to be an issue that falls under its purview, and even those climate change issues are manifest as extreme water-related events: floods, cyclones, hurricanes and droughts. Similar and augmenting arguments can be made that water also relates to all dimensions of security, and recognizing and addressing it as such can help to achieve international and national security overall.

By ensuring that the international and national development agenda is addressing the fundamental issues around water – not just drinking water and sanitation services, but also including issues pertaining to competitive uses of water by various sectors – we can ensure that human security is achieved. This holistic view also helps to address other pressing concerns around human development: the creation of green sustainable jobs and reducing poverty, including in the agricultural sector; reducing impacts on human health and the burden on the public health sector; improving maternal and child health; increasing sustainability of ecosystems; helping to increase the education level in developing countries, particularly for girls; and, ensuring that proper institutions are in place for effective governance and development.

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