Developing Institutional Capacities of Public Administration for the Achievement of the Millennium Development Goals in Post-Conflict and Crisis Situations: Challenges, Best Practices, and Lessons Learned in Preparedness, Prevention, and Reconstruction

Report of the Expert Group Meeting

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Contents

Acknowledgments ........................................................................................................................................ v

Foreword .................................................................................................................................................. vi

Chapter One
Types of Crisis, Public Administration Responses and Effective Strategies ..................... 1

The nature of crisis situations ................................................................................................................ 1
Why difference in response ................................................................................................................ 3
The political quintessence of crises ................................................................................................... 5
The role of public service in crisis management .............................................................................. 6
Policies for crisis management .......................................................................................................... 10
Beyond the immediate crisis – the road to normality ................................................................. 16
Conclusions ....................................................................................................................................... 19
References ........................................................................................................................................... 20

Chapter Two
Rebuilding the Agricultural Economy in Post-Conflict Southern Sudan: A Student Perspective ................................................................................................................. 23

Basic Challenges that Were Considered in the AREP .............................................................. 23
Strategic Plan ........................................................................................................................................ 26
Core Concepts for the CUofS ........................................................................................................... 27
Academic Research Strategy/Methods .......................................................................................... 28
Results and Deliverables from the Consultant .............................................................................. 30
Cornell’s Commitment to CUofS .................................................................................................... 34
Benefits from Working with a University, the Consultant Perspective ....................................... 35

Chapter Three
Rebuilding Neighborhoods in Port-au-Prince, Haiti: A University Program

Manager Perspective .......................................................................................................................... 37

Cornell Global Solutions Team Make-Up and Its Approach ....................................................... 38
Looking to Pakistan to Inform Haiti’s Reconstruction Approach ................................................. 39
Redevelopment, not Relocation ....................................................................................................... 40
A Public-Private Foundation to Address Density and Land Tenure ............................................. 41
An Inclusive Public-Private Partnership ....................................................................................... 42
Implementation of the Foundation .................................................................................................. 43
Two Strategic Approaches ............................................................................................................... 43

Option A: Neighborhood Layout Design ....................................................................................... 44
Option B: Retrofitting an existing neighborhood ........................................................................ 44
Community and Household Designs ............................................................................................ 46
Infrastructure .................................................................................................................................... 47
Chapter Four
Rebuilding the Community in Post-Conflict Bosnia: A Consultant Perspective

- Bridging the Education Gap
- Cornell’s Role in the Program
- The Results of the Collaboration
- Going Forward
- Appendix A: TSI Faculty
- Appendix B: TSI Course Curriculum
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The Meeting was attended by 10 world-wide known experts in post-conflict reconstruction of public administration, including ministers in charge of reconstruction. This publication was prepared by the Division for Public Administration and Development Management of the United Nations Department of Economic and Social Affairs under the guidance of Haiyan Qian, Director, Division for Public Administration and Development Management (DPADM) and John-Mary Kauzya, Chief, Public Administration Branch (PACB), DPADM. Adriana Alberti (PACB) coordinated the publication. Nigeria Reaves, who served as an intern at the United Nations, provided support in the finalization of the publication. All the participants and speakers at the Meeting provided invaluable information, knowledge and ideas that are incorporated in this publication.

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Foreword

Public Administration is expected to deal with problems and challenges that civil society, private sector, and individuals cannot handle on their own. This means that Public Administration needs to have institutional, human, and material as well as financial capacities to address such challenges and problems. Yet, there have been occurrences that illustrate that many countries, even those considered as developed, often do not possess such capacities in sufficient magnitude to deal with some of the problems and challenges that they face. The recent cases of natural, as well as man-made disasters including tsunamis, earthquakes, hurricanes, and armed conflicts make this point clearly and remind us of the importance of public administration institutions as well as other stakeholders in the private sector and civil society at community, national, regional, and global levels being prepared to ensure the continuity of delivery of vital public services during crises and in post conflict/crisis periods.

This challenge is particularly daunting for developing countries and their capacity to achieve socio-economic prosperity, including the Millennium Development Goals (MDGs). In fact, it has been documented that people furthest down the economic ladder live disproportionately in the most drought prone areas, that the overwhelming majority of people affected by climate related disasters live in developing countries, and that disaster-related deaths occur disproportionately in low and medium human development countries (UNDG Guidelines for Crisis and the MDGS Policy Note). It is mostly the poor and the vulnerable that suffer from different types of crisis. After a disaster occurs – whether it is caused by violent conflict or by a natural hazard- resources are quickly deployed to re-instate basic infrastructure and means of transportation for emergency relief while essential services including; medical services water, shelter, food, as well as education are severely curtailed. When such a situation is prolonged, it erodes the trust people have in public administration (Government) and undermines its legitimacy thus further risking instability and/or violence.

Moreover, in situations where public administration capacities are lacking or weak, natural and man-made disasters drag the affected countries behind on the achievement of MDGs and development in general. Where gains have been made, the eruption of violence or the sudden occurrence of a natural disaster can represent a major set-back in a country’s road to development including the achievement of MDGs

The world is currently engaged in searching for effective ways through which countries can be (i) prepared to face occurrences of violent conflict, crisis, and/or disaster, (ii) prevent/manage them and/or mitigate their negative impact on human livelihood, and (iii) where they have occurred, reconstruct institutions and systems and other capacities of to sustain delivery of public services with minimum disruption.

In light of the above, and with a view to exploring some of the mentioned challenges, an Ad Hoc Expert Group Meeting on “Developing Institutional Capacities of Public Administration for
the Achievement of the Millennium Development Goals in Post Conflict and Crisis Situations: Challenges, Best Practices, and Lessons Learned in Preparedness, Prevention, and Reconstruction” was organized in June 2010 by the United Nations Department of Economic and Social Affairs (UNDESA) through its Division for Public Administration and Development Management, during the United Nations Public Service Day, Awards Ceremony and Forum held in Barcelona, Spain.

The overall objective of the Expert Group Meeting was to provide a platform for senior government officials and experts to present and discuss lessons learned and successful practices from recent experiences in strengthening public administration institutional capacities for preparedness, prevention, and reconstruction, especially in tragic crises since the United Nations World Summit in 2000 when the MDGs were launched. One of the immediate results of the Expert Group Meeting is this publication while a second output is the development of a “Guidance tool-kit on public administration post-conflict reconstruction”, which is currently being prepared under the overall guidance of DPADM and greatly benefited from the inputs and discussions that took place during the meeting.

The purpose of this publication is to provide an overview of the main issues addressed during the meeting and to outline key messages. Each of the authors, writing in their personal capacity, outlines particular aspects of public administration post-conflict reconstruction.

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Chapter One

Types of Crisis, Public Administration Responses and Effective Strategies

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This chapter contends that although each crisis is a singular event there are general policies and strategies that public administration institutions can follow in order to ensure better resolution to crises. In particular it highlights the importance of the synergies that result from public agencies partnering with civil society in managing such situations; and, suggests that the recovery and rehabilitation phase provides an opportunity to promote sustainable development and further the Millennium Development Goals (MDGs). Alternative institutional arrangements to enable government-civil society collaboration are mentioned. It concludes that the policies and strategies suggested are, in essence, the same that characterize good governance under any circumstance. But in times of intense difficulty, instability and danger that define crisis situations the practice of good governance is all the more important.

The nature of crisis situations

By definition crises are times of intense difficulty, instability and danger. In the case of nations, these are characterized by acute changes that produce major strains on the social and economic fabric of the country. These strains place extraordinary demands on the institutions that must confront many challenges in order to restore normality. In times of crisis, not only are public service institutions confronted by and must respond to unusual and extreme situations, but must do so under unfavourable conditions. Success in dealing with crises depends, to a large degree, on the ability of public service institutions to adapt to altered circumstances and discharge responsibilities often outside their usual realm of activity. Even in instances where countries have well-established and strong public service institutions that are capable of handling large-scale complex tasks of a routine nature, these same institutions may fall short when confronted with a particular catastrophic event.

Crises can be brought about by a number of factors. Some are of natural origin, such as seismic events, severe storms, and droughts; others are precipitated by human actions or activities, such as armed conflicts, environmental degradation, and technological failures. Any of these factors can precipitate a crisis when it impacts, in a major way, on the lives and wellbeing of the population. It is precisely because they impact on society that crises become

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the concern of government; and, consequently the management of the recovery process becomes the charge of public service institutions.

The subject of post-crisis management has been elaborated in a recently released publication on reconstructing public administration after conflict, prepared by the United Nations Department of Economic Affairs (UN-DESA, 2010). Since it covers the issues dealing with crises generated by civil disorders and armed conflict quite thoroughly, this paper will concentrate on the management of crises precipitated by natural and technological disasters.

There are general commonalities in the situations created by crises regardless of whether a particular crisis is the result of human or natural causes. To varying degrees, all crises result in substantial human suffering and hardship, leaving a legacy of damaged social and economic institutions as well as shattered physical infrastructure, including shelter, education and health facilities, and communication networks. For this reason, many of the issues concerning the restoration of normality are similar regardless of what precipitated the crisis. Regardless of the cause, government must address the immediate requirements of the affected population in terms of shelter, food and water supplies, security, and health services. At the same time, it must undertake the restoration of priority infrastructure and communication networks, as well as the reactivation of commerce and schooling activities and social services.

Although there are some commonalities between conflict-generated crises and those provoked by natural, technological and environmental disasters, there are also some important differences. Perhaps the most significant difference is that of the time span over which the crisis develops and evolves. Although the onset of hostilities in the case of armed conflict and civil disorders may be relatively abrupt, the negative effects accumulate in the course of the hostilities, which can span a considerable length of time. In such instances, public service institutions must deal with the situation as it evolves and managing the ongoing crisis becomes part of on-going operations.

Unlike crises generated by conflict, the onset of most natural and technological disasters is sudden and unexpected. Public service institutions are faced with the full dimensions of the crisis with little or no warning: search and rescue operations must be mobilized immediately and lifelines to tend to the casualties and the logistics for feeding and sheltering survivors must be made operational within hours. At the same time, social order and security must be re-established and maintained, the population must be protected from secondary dangers emanating from the devastation, and in some instances evacuated. In sudden onset crises time is compressed, as the situation must be stabilized as quickly as possible in order to save lives and protect property.

Another significant distinction is that in the case of crises generated by civil strife and armed conflict there always are antagonistic sides confronting each other over political, ethnic, religious or economic issues. More than likely, it was this animosity that provoked the discord in the first place,
and it can be reasonably expected that these animosities were further exacerbated during the course of the conflict. Resolving the antagonism that provoked the conflict is fundamental to bringing society out of the crisis. In some instances these issues may have deep historical roots, as was the case with the struggle against apartheid in South Africa, the long civil war in Sri Lanka, or the break-up of the former Yugoslavia. These are difficult and complex to disentangle, and yet, as is pointed out in the UN report “Reconstructing Public Administration After Conflict”, their resolution is requisite for the stabilization of society after the conflict (UN-DESA, 2010).

In the case of crises caused by natural or technological disasters social issues may, in some instances, surface during the relief and reconstruction period, particularly if they were already present. This appears to have been the case in the post-Katrina flooding of New Orleans in 2005. Such issues will complicate matters, and public institutions must address them if and when they surface in order to avert worsening of the already strained social situation. But since such issues were not the problem that precipitated the crisis, their resolution, although sometimes important, is not fundamental to the efforts of returning the society back to normality. In fact, unlike post-conflict situations, sudden on-set disasters often seem to bring people together—to increase solidarity—at least during the immediate rescue operations. If social and ethnic issues are to come up, it is more than likely that this will be later on as the crisis moves into the reconstruction phase.

It can be said that, by-and-large, in post-conflict situations social rehabilitation will be of greater concern while the emphasis on crises brought by natural or technological disasters the emphasis will probably be on physical reconstruction.

Although there are some commonalities to all crises in general, each situation is also quite unique. This singularity is the consequence of the broad range of circumstances that contribute to determining the nature, scope and complexion of a particular crisis. On the one hand we have the context, or theatre, in which an event occurs; countries differ as to their geography, history, culture, size and population distribution patterns, as well as levels of economic, social, and physical development. Understandably, repercussions of a particular event will differ depending on the particular context in which it takes place. On the other hand, we have the response capacity of governments since there are also wide variations in forms of governance, leadership capacities and structures, and the strength of public service institutions from one country to another. The particular permutation of these variables makes each crisis situation an event that must be addressed on its own particular terms. Consequently each becomes a special set of challenges to which the government must respond.

**Why difference in response**

The fact that every crisis is a unique event may explain in good part why there is such an uneven record in the effectiveness of response between countries and even within the same
country. In addition to the fact that each event is unique there are other factors that appear to contribute to the success or failure of emerging from crises. These have to do with the ability of public administration institutions to react and manage situations that is unusual. To the extent that crises situations are outside the “normal,” institutionalized norms and procedures, as well as their expertise, lose relevance in the changed environment. As a consequence, public service institutions have difficulty responding and delivering the required services. This point is supported by an extensive study by Saundra K. Schneider on government response to various disasters within the United States (Schneider, 1995). He argues that, beyond the differences in the nature and scope of a crisis, the key factor in determining the level of success of the response is the gap between administration norms and bureaucratic practices and how they fit with the needs and expectations of the affected population in the particular instance. In addition, if we look at crisis response in different countries, it is evident that the level of economic and social development is also a determining factor of how quickly and successfully the government will respond to the crisis and restore normality.

The recent earthquakes in Haiti and Chile illustrate this point. Both countries suffered major earthquakes earlier this year that affected large areas of the country, including major cities. Yet, in large part because of the differences in the context in which each occurred and the strength of the pre-existing public administration institutions, the dimensions of the crisis and level of human suffering differed considerably. Haiti is one of the poorest countries in the world. The 2007 UNDP Human Development Index ranking places it in position 149 out of 182 countries (UNDP, 2009). Furthermore, weak and inefficient public service institutions characterized governance prior to the disaster. To make matters worst, although the country is subject to frequent hurricanes, it does not experience strong earth tremors often and was therefore not prepared for this type of event. By contrast, Chile ranks 44 in the same Human Development index and its GDP per capita is over twelve times that of Haiti; it has strong public service institutions and community organizations. Located in a highly seismic region, it also has considerable experience in managing these events. For these reason, although material losses were significant in both cases, the humanitarian crisis was much greater in Haiti’s case.

This example illustrates how differences in crisis management among different countries may be explained, at least in part, in terms of differences in the strength of the pre-existing public service apparatus, and level of development and wealth. But if we look at crisis response within the same country we can also see great variations in the effectiveness of response to different disasters. To illustrate this point, we can look at two natural disasters that struck within the same country a few years apart. A major earthquake shook the San Francisco Bay area in 1989. This event, known as the Loma Prieta earthquake, caused extensive damage. Within the affected area, thousands of structures suffered damage including collapse, and there was considerable damage to roads, bridges and other infrastructure. However, the humanitarian impact was not dramatic since the relief and
recovery operations, although at times contentious, were effective. By contrast, in August 2005 about 80% of the City of New Orleans was flooded when the levee system that protects the city catastrophically failed about 24 hours after Hurricane Katrina passed over the area. In this instance, the humanitarian crisis was of major proportions. Not only were there over 1,800 deaths, the attempts to evacuate the stranded population were chaotic, and conditions in shelters, such as the city’s stadium, were grim. Evacuation plans were either non-existent or simply failed and relief and recovery proceeded slowly and in a haphazard manner.

Analyzing the rather successful relief and recovery efforts of the Loma Prieta earthquake, Philip R. Berke and his co-authors conclude that previous disaster experiences had induced the local government to forge partnerships with citizen associations (Berke, et al, 1993).

The primary objective of the partnerships was to organize citizen self-help relief and recovery efforts in future disasters. These partnerships formed a network of small private voluntary community-based organizations in the area. As the crisis unfolded, the network was activated to assess needs and distribute assistance. The partnerships between government and civil society made for a more effective response. But lessons learned in one part of the country fifteen years earlier had not been heeded in another part of the same country. The response to the Katrina disaster demonstrated a total disconnect between the civil society and government institutions.

It should not be surprising that differences in responses to crises are in part a function of the strength of public service institutions and the level of socio-economic development of the country. However, when we look cases within the same country, it would appear that the ability of local-level institutions to measure up to the circumstances and to work with civil society is key to successfully restoring normality after a crisis.

The political quintessence of crises

It is a truism to say that crisis situations magnify the role of government thereby exposing any deficiencies in meeting its responsibilities. This phenomenon of increased exposure is why John W. Kingdon has referred to crises as “focusing events”. In his view, such events tend to converge public expectations and needs, transforming them into public discontent, political activism and agenda setting (Kingdon, 1984). Some researchers have found a positive relationship between the severity of a disaster and the extent of subsequent political turmoil (Olson and Drury, 1997). It has even been suggested that in some cases community activism born of a disaster can become a threat to the very legitimacy of the state in the precarious post disaster period (Robinson et al, 1986). Yet other studies have found correlations between regime type, quality of governance – accountability and transparency - and public response to disasters (Davis and Seitz, 1982).

Studies also suggest that political activism rises very quickly, as impacted communities organize to meet their own needs in the period immediately following the disaster and before outside assistance arrives. Consequently, the longer this period of time is the greater the level of political
activism that the government will likely encounter in their efforts to manage the emergency. As the society returns to normality, political activism may subside, but reverberations of a crisis may have longer-term effects reflected in later elections (Robinson, 1986). For this reason, crisis situations instantly become part of the national political process, and consequently fall in the ambit of the agenda of public institutions.

The experience after the 1985 earthquake in Mexico City is a case in point (Dynes et al, 1990). Immediately after the catastrophe, the population spontaneously formed search and rescue teams, while the government was slower to respond. Within a couple of weeks, these spontaneous groups had become sufficiently organized to mobilize and demand concrete government actions. As a World Bank report on this disaster noted, the victims, “made their presence felt and their plight visible” to the authorities through massive protest marches (World Bank, 1993, p.4). When the relief activities moved into the reconstruction phase the recently formed community groups remained vigilant and active, ensuring some success in the reconstruction of their dwellings.

The role of public service in crisis management

Although crisis management is very much a political and governance concern, by and large, public administration as a discipline has not generally considered crisis management as an integral part of its regular functions. At best, crisis management has been considered part of the work of emergency units and law enforcement, with support from public health and civil defence organizations, and in extreme cases the military. From this perspective, the approach of public agencies has generally been fragmented and reactive, instead of coordinated and proactive (Petak, 1985).

Fortunately, this is changing and crisis management is becoming more integrated into the regular functions of public administration at all levels of government. What is more there is a growing awareness that in order to be truly effective government agencies must work together; that a common approach is not only more successful, it is more cost-effective, avoids duplication of personnel and resources, and it facilitates the standardization of crisis oriented training and educational efforts.

Although the efforts of government are far more visible at the height of a crisis, the public administration apparatus of the state has a central role that spans the four stages of crisis management. These stages being: mitigation, pre-disaster preparedness, response, and recovery and rehabilitation. In each phase of this continuum it is essential that public service institutions collaborate and work closely with each other. They must also collaborate with civil society organizations, the private sector, and international agencies when appropriate. Crisis management must be in essence a government-civil society multi-phased effort, with the nature and scope of collaboration differing according to the character of each partner and varying from one phase to the next. We will briefly look at the role of public institutions through the four phases.
Mitigation

Reducing risk is a complex technical, political, and public administration issue. It is a technical issue because it is scientists, engineers, economists, and other professionals that can assess levels of risk and propose the ways of reducing those risks and provide estimates as to the costs associated with attaining different levels of protection (Armillas, 1996). It is a political issue because it is through the political process that a society should determine the levels of risk with which it is willing to live. From this process emanate the statutes, regulations and ordinances that are promulgated at different levels of government to protect the health, safety, and welfare of society. Finally, it is a public administration issue because the implementation and enforcement of risk reduction control mechanisms, public protection, and building of public awareness fall within the purview of the public services apparatus.

Pre-disaster preparedness

Prior to a crisis, the role of public agencies is to prepare civil protection and evacuation plans, raise public awareness and educate the population at large. It must also ensure that there are sufficient trained emergency personnel and stockpile emergency supplies and equipment for contingencies. It is the administrative apparatus that must implement such measures in an efficient manner in order for them to be effective when disaster strikes. Moreover, planning for emergencies must involve all levels of government and civil society, clearly delineating the areas of responsibility for each level and the specific vertical and horizontal coordination mechanisms among them. This is important since inevitably all levels of government and civil society will be, or should be, drawn into the emergency and recovery process after a disaster. Tangible benefits of multi-level pre-disaster planning include enhanced inter-organizational coordination, improved participation by civil society, better coordination and decision-making, and the more efficient distribution and utilization of disaster assistance (Smith and Wenger, 2006).

Response and relief

Without a doubt the most challenging stage in crisis management is the response phase. This phase invariably starts with search and rescue operations, tasks often initiated by the victims themselves since they are on-site. The government must mobilize resources in terms of personnel, equipment and emergency supplies to the affected areas without delay. Practically every entity within the public administration apparatus will be involved in the response to the emergency. The simultaneous mobilization of disparate agencies will require activating networks at the national level and coordination with local government, international aid agencies, and the affected communities. The establishment of an effective coordinating mechanism is a necessity in cases where such a mechanism does not already exist.
As critical as the search and rescue operations are, they quickly overlap with the need to attend to the basic humanitarian needs of the afflicted population. At the same time initial assessments of the extent and severity of damage must be undertaken in order to determine the type and volume of emergency assistance required. In addition, there may be extensive need for personnel to assist in rescue operations, transport, clearing debris, administering medical aid, and erecting tents or temporary shelters. Yet, information is partial at best and often conflicting. Moreover, the volume of demand or the diminished capacity of organizations involved to deliver due to the disaster itself often exceeds response capacity. Lifelines and communications networks are often damaged and emergency ones need to be set up. Meanwhile evacuations may interfere with those rushing in to lend assistance and deliver supplies. Invariably, the delivery systems become clogged with necessary and unnecessary supplies.

It is during this phase that the effectiveness of government is most visible. The time delay between the disaster and first government and humanitarian assistance response is not only critical in terms of saving lives, but in preventing the formation of a breach between the needs and expectations of the affected population and their government, as was discussed earlier. For this reason, the effective response of public service agencies in this phase is critical in stabilizing the emergency and making an early transition to recovery and rehabilitation.

An example of how a rapid and robust response by the government is essential in mitigating the impact and consequent complications after a disaster is the recent case of Chile. The destructive impact of the earthquake that struck last February was nothing short of catastrophic. The days following the tremors were particularly trying since the heavy damage to the transportation and communications networks made it difficult for aid to reach the affected areas. As a result, discontent started to brew. However, the government mobilized and quickly patched up roads and put the army in charge of the logistics of distributing aid. These makeshift repairs soon enabled aid convoys to make the eight-hour journey south from the capital to the most damaged areas; over 12,000 tons of relief supplies were delivered within the first ten days (www.cleaveland.com, 2010). As soon as the government and aid agencies were able to establish their presence and address the needs of the victims, matters calmed down. Despite the initial complaints that aid was not reaching the hungry and homeless, Chile's response to one of history's most powerful earthquakes turned into a model for crisis management. The period of uncertainty and misery was reduced and recovery activities could be initiated sooner.
Recovery and rehabilitation

The most urgent task in recovery efforts is to initiate clean-up operations in order to ensure a sanitary environment and reduce the potential of additional casualties due to secondary damage. Vital life support systems and communication networks must be restored to at least minimum operational levels. Equally important is the temporary replacement of essential facilities that may have been destroyed, such as schools and hospitals, as well as those necessary for aid storage and distribution. Field experience has shown that the restoration of school activities is a high priority for impacted communities. Reinitiating regular school activities helps to give children a sense of normality in the midst of the unsettled environment, making it a little easier for families to cope with the hardships they face. In most instances, communities tend to take the lead in starting some of these tasks and government should at least be supportive of such efforts if not proactive in leading them. Setting up government offices and community meeting halls within the affected areas that are easily accessible by the public will facilitate government-community interaction during this period.

The rebuilding of damaged and destroyed facilities should also be initiated as early as possible, although it may extend over some time. Such initiatives will reassure the communities of government’s commitment to reconstruction and also provide much needed economic inputs (Mitchell, 1996). Other measures that should be carried out during the early part of this phase include providing financial resources and technical assistance to individual families and small commercial establishments to start bringing back the economic life of the community.

Unfortunately, time and again, crises seem to hold the public interest for a relatively short time-span. That is, the public beyond those directly affected by the crisis. This is not only true of the public at large but it is also true of public service institutions. Once the immediate emergency fades government institutions return to business as usual, undermining recovery and rehabilitation efforts. This is nemesis to recovery and rehabilitation efforts.

An example of this “fifteen minutes of fame” phenomenon is last year’s earthquake near the small historical town of L’Aquila in central Italy. The 5.8 Richter tremors occurred on 6 April and caused major devastation. Over 300 people died, making it the deadliest earthquake in Italy since the Irpinia earthquake of 1980. The government and indeed the world community mobilized in sympathy. The venue for the July 2009 G-8 Summit, which had been scheduled to be held elsewhere in the country, was moved to L’Aquila as a show of support for the rehabilitation of the town. In early July of that year the journal Spiegel On Line under the headline: “Little Real Progress Expected in L’Aquila” gave the following assessment: “The summit is aimed at aiding the reconstruction of the town and the world
financial system -- but the prospect of progress on either is slim.” (www.spiegel.de, 2009). A year after the earthquake, news reports appeared to the effect that, in fact, little progress had been made in removing debris, while the central part of L’Aquila was still blocked off and for all practical purposes a ghost town. About one third of the displaced population was living in new houses outside of town, about a sixth was still living in hotels or temporary shelters and the balance had found their own housing solutions, including moving in with relatives (www.rtv.es, 2010). L’Aquila had had its “fifteen minutes of fame”.1

This example is typical of what follows almost every single crisis situation anywhere in the world. The focus on the recovery and rehabilitation efforts quickly fades as the attention of the world and the nation turn to other matters. The community is left alone to wrestle with the aftermath and the opportunities to transform relief into development are lost. Only in those cases where civil society has succeeded in developing strong local organizations will there be any chance of long-term follow-up. For this reason, it is incumbent upon public administration agencies to set favourable conditions for the continued progress towards rehabilitation and development once the spotlight has faded.

Policies for crisis management

As has been stated, each crisis situation is an idiosyncratic event and therefore there is no single formula that can be successfully replicated across-the-board. That said, some researchers in the field of post-disaster reconstruction have concluded that the lessons learned about the recovery process in those instances they have studied indicate that there are basic considerations that do cut across cultural, economic and geographical boundaries and can contribute to a more successful management response (Quarentelli et al, 1992 and Bolin and Bolton 1983 among others). These basic considerations relate to operational policies and objectives.

As the recently released United Nations Publication on post-conflict reconstruction has pointed out, the highest priority in post-conflict situations is that of rebuilding the shattered governance apparatus, or to build new institutions where earlier ones were decimated or did not exist—the objective being to build public service agencies that function in an efficient, fair and transparent manner (UN-DESA, 2010). This is particularly important in instances where the conflict was caused by poor or inequitable governance practices in the past, as was the case in apartheid South Africa; or, in cases were the basic government apparatus has been decimated by a long conflict, as is the case in Somalia today; or, government institutions were

1 After this paper was drafted a note appeared in the press reporting that three years after the Pisco Earthquake in Peru the city looks very much as it did in the days following the disaster. Rubble is still piled up everywhere and partially demolished structures line the streets. Although emergency aid poured in initially and the national government and international community promised assistance no clean up and reconstruction has taken place. Source: http://us.cnn.com/2010/WORLD/americas/05/12/peru.pisco.quake.aftermath/index.html
simply nonexistent prior to the crisis, as was the case at the time Timor-Leste finally gained its sovereignty in 2002.

In the case of most sudden onset crises, it is not a question of setting up new institutions, adopting new rules and procedures and training new staff to manage the crisis’ aftermath, but it is one of getting the government apparatus to respond adequately to the emergency. Although the efficacy of public service institutions will likely have been affected to some degree by the disaster, the apparatus, norms and procedures, and bureaucrats, remain. What is vital is for the governance apparatus to adapt, at least for the duration of the emergency, to the altered reality so that its institutions can assist the affected population under the prevailing conditions and guide the affected communities back to normality (Armillas et al, 1994). In order for the public service agencies accomplish this there are four policy aspects to consider:

I. Flexibility

Although the need for flexibility and innovation in crisis management has been discussed in the literature for some time, it is still quite elusive in practice (Kartez, 1984). Habitually, the initial response of public service agencies is to stick to their mandates, norms and procedures as they attempt to guide the society back to normality. However, needs and expectations change drastically during disasters. What may be appropriate during periods of normality typically becomes less relevant during a crisis. In crises, new behaviors and structures should emerge in order to cope with the multiplicity of contingencies that cannot be managed by routine service delivery. In fact, the greater the crisis, the more improvisation will be required. Public service agencies must be prepared to function in areas not normally under their purview and make their expertise and assets available when and where required; they must be prepared to do “business as un-usual”.

Flexibility is indeed the key to addressing what Saundra K. Schneider (1995) has called the “gap” which surfaces in times of crisis between needs and expectations and the bureaucratic norms and operations. He cites two examples that illustrate the consequences of the lack of flexibility. One is the earthquake that struck the city of Kobe in Japan January 1995; the other was the extensive flood that affected the Netherlands in the same year. In both instances the governments of these countries had well-formulated and comprehensive predisaster management plans and effective administrative mechanisms for managing the types of disasters that commonly affect their respective countries. Japan has a long history of dealing effectively with seismic events and the Netherlands routinely confronts flooding situations. Yet, on these two occasions citizens of the respective countries viewed the response by public service institutions as unsatisfactory, there was a “gap”. In the case of Japan, the public in general and even government officials were critical of the speed and effectiveness of the institutional response, at least in the initial periods of the crisis.
Similarly, the floods in the Netherlands were so massive and widespread that the
government’s response mechanisms simply could not cope and were subject to criticism by
the public and the press.

Ironically the fact that both countries had detailed disaster management plans and well
organized administrative apparatus for confronting such situations may have acted in
detriment of the purpose in this instance. In both of these cases the government activated the
pre-existing emergency plans and rigidly tried to follow them in detail without making
allowances for the idiosyncratic nature of the particular event. Put simply, the emergency
preparedness plans, as good as they may have been, lacked flexibility and when the events fell
outside the model the procedures they had established to deal with emergencies failed. In
terms of flexibility, the key is for institutions to be able to identify and understand the
limitations of bureaucratic arrangements in place and to be able to adapt procedures to the
evolving situation. Success in such endeavors comes from systems capable of recognizing
errors and shortcomings, learning the lessons, and adjusting institutional capacity and actions
(May, 1991). The basic challenge is to develop crisis management structures that foster real
time learning and capable of adapting to circumstances as events unfold.

2. Decentralize, delegate

In physical or geographical terms, natural and technological disasters are very much a
local phenomenon with national repercussions. In most instances even widespread floods,
hurricanes or cyclones and major earthquakes concentrate destruction in only a part or parts of
a country, although the economic and social repercussions are often felt nationwide. This was
the case with the large-scale and devastating 2004 Asian tsunami that affected countries
around the Indian Ocean. The damage was limited to coastal areas, leaving the interior
relatively untouched, but the social and economic impact was felt throughout the affected
countries. For this reason it is incumbent on central governments to act, moreover it is this
level of government that can more effectively mobilize the national and international financial
resources and expertise required.

Because central governments have the upper hand in terms of resources when there is a
crisis, there is a tendency to reinforce the centralized management structure. This is
particularly true in cases where there are strong central institutions and weak local ones, or the
vertical linkages between them are not well established. Yet, in a time of crisis the number of
actors multiplies rapidly leading to pluralistic decision-making in tasks ranging from rescue to
relief operations to the provision of emergency services and evacuation procedures
(Quarantelli, 1996). The linkages in this multifaceted management scenario must extend from
the government to civil society organizations; and from the national to the local levels. In such
a complex environment, institutional arrangements can become obstructive in responding to
local needs, identifying opportunities and utilizing local capacities in the recovery process.
This proliferation of actors requires vertical organizational coordination as well as horizontal collaboration between local authorities and community groups. This process can be incentivized through effective decentralization and the delegation of appropriate authority to the local level.

The benefits of decentralized management and delegation of authority to the local level is supported by the work of researchers and practitioners in this field (United Nations, 2005). An example of this is the work of researchers Mader and Blair-Tyler (1991) and Rubin et al (1985). Their work suggests that success in recovery is usually based on a bottom-up approach. They emphasize the importance of local government participation and initiative in the process by which viable policies and collaborative institutional arrangements are developed. They caution that this collaboration must go beyond seeking local compliance with, and subordination to, national level public administration institutions. In their view, such limited forms of collaboration not only do not produce the best results but may be dysfunctional as well.

International organizations and donors also share this view as reflected in the proceedings of the 2005 UN World Conference on Disaster Reduction (United Nations, 2005). This gathering of government officials, experts, practitioners, academics, and community leaders recognized the resilience of local communities and the necessity of adopting decentralized crisis management structures. Multilateral donors such as the World Bank have also accepted decentralization as a critical element in crisis management strategies. In a workshop on “The Role of Local Governments in Reducing the Risk of Disasters” sponsored by the World Bank, the importance of local government in this regard was fully recognized (Demeter, et. al, 2006). Similarly, the Asian Disaster Preparedness Center in Bangkok advocates strengthening local government as a means for better crisis management (ADPC, 2007)

3. **Cooperation with civil society**

As has been mentioned, crises tend to mobilize communities and coalesce groups to meet the urgent needs not being met by government and aid agencies. This activism can be of much benefit if public service institutions are willing to work with civil society and channel their energies towards meeting the challenges posed by the crisis. Unfortunately, the prevailing approach is to regard the local population as helpless victims and community organizations as a hindrance.

In reality, the local population represents human capital available and willing to undertake search and rescue activities, clean up, and relief operations. Local associations can assist with the distribution of food, water and other supplies, and set up and manage temporary camps. In short, civil society can perform a multiplicity of essential tasks in the
aftermath of a crisis. Moreover, community organizations can be effective intermediaries between public service agencies and the local population articulating the concerns of the victims and bringing critical issues to the attention of government and aid agencies. They can do this more effectively than outside organizations since they are accustomed to working in the area and are therefore better acquainted with local conditions and are closer to the people; indeed, they are the local people.

The collaboration between government agencies and civil society can bring about a synergetic effect, maximizing the utilization of resources and benefits to the communities.

Peter Evans argues for the desirability of “state - society synergy;” in his words: “Creative action by government organizations can foster social capital and linking mobilized citizens to public agencies can enhance the efficacy of government. The combination of strong public institutions and organized communities is a powerful tool for development.” (Evans, 1995).

What is required to bring about the cooperation between civil society and government is the willingness of central government to devolve resources and power to the local level as has been discussed earlier. What is more, government should take the care to develop linkages and strengthen civil society’s organizational capacity before a crisis strikes, as local institutions are not only essential during the response period but throughout the four stages of crisis management. Local organizations are indispensable in promoting pre-disaster preparedness and mitigation programs, and will also facilitate economic, social and physical recovery and rehabilitation efforts after outside agencies and donors are gone.

An illustration of how the tribulations and complexities of government-civil society relations during the response and relief phase can lead to missed opportunities in successive recovery efforts is provided by the events in the aftermath of the 1999 Marmara earthquake in Turkey. The 7.4 Richter temblors devastated a large area in the central part of the country and resulted in over 17,000 deaths. The event created a complex disaster management crisis, as confirmed by the World Bank’s Turkey Country Office (World Bank, 1999). In the process of managing this crisis, the relative importance of state institutions and those of civil society involved in the relief efforts underwent a dramatic turnaround (World Bank, 1999). In the initial weeks following the disaster, public service institutions proved to be totally unprepared and inept in handling the emergency. There were considerable delays in getting relief personnel to work on the search-and-rescue operations and there were major logjams in getting relief supplies and medical assistance to the affected areas.

For all practical purposes the state seems to have been paralyzed in the immediate period following the disaster. The search-and-rescue operations were undertaken by the victims themselves assisted by spontaneously formed volunteer groups from elsewhere in the
country as well as abroad. NGO’s, university students, and local political parties typically formed the volunteer teams. Not only were the public service institutions not able to cope, they were also incapable of coordinating the flood of assistance being provided. Gradually, in the weeks that followed, the performance of government institutions improved. The distribution of temporary shelters, food, health services, and money to the victims became a more efficient operation. But, ironically, as the performance of government agencies improved the attitude of the authorities towards civil society organizations became more adversarial. Consequently, as the recovery efforts progressed the government increasingly and systematically pushed NGO’s and other civil society organizations aside (Jalali, 2002).

As a result, any and all opportunities for civil society - government synergies that could be of benefit in reconstruction were lost.

4. **Promote sustainable recovery and the MDGs**

In the medium and long term, the objectives of post-conflict and post-disaster recovery are the restoration of the social and economic fabric of the communities, but in rebuilding after a conflict or a disaster there is also the potential for building a better future for the affected communities. This idea is embodied in the concept of “sustainable relief” whereby reconstruction initiatives are conceived in a manner as to enable economic, social and physical development to continue beyond the immediate crisis. This concept is advanced by international agencies such as UN-Habitat in the conviction that a development-oriented approach will bring multiple benefits beyond the recovery (UN-Habitat, 2010). Under this approach the influx of financial and other resources is directed as much as possible towards sustainable development initiatives with long-term economic and social benefits rather than simply replacing what has been lost.

Expanding on this concept, the recovery period offers not only the prospect to promote development objectives but equally important it offers the opportunity to strengthen the government’s commitment to furthering the United Nations Millennium Development Goals (MDGs). It can do this by ensuring that the sustainable relief initiatives are consistent with and in fact support the attainment of these goals. This should be the case whatever the nature of the crisis and whether the main challenges are the rebuilding of the social, economic or physical fabric of the country. Public service agencies must assess every recovery and rehabilitation program and project for its potential contribution to meeting the MDGs and look for opportunities for recovery efforts to contribute to these goals.
Beyond the immediate crisis – the road to normality

The road back after a crisis is usually a long process; in most cases it takes many years to restore normality. In moving beyond the immediate crisis period governments must make allowances for this fact and be prepared to develop medium and long-term rehabilitation programs and to make the institutional and financial arrangements to implement them. These programs will make additional and unusual demands of the public service agencies in terms of expertise, resources, and management personnel as well as the institutional structures required for their execution. These conditions may last for some time, but they will not be of a permanent nature; thus, public service institutions must find alternative, and in some instances innovative, ways and means to provisionally expand their capacities to implement the rehabilitation programs. In so doing agencies must be prepared to seek partners beyond government institutions. Fortunately there is no shortage of potential partners. Partnerships can be formed with private sector institutions, civil society organizations – local, national and international, bilateral and multilateral aid agencies, and universities among others.

Regardless of who the partners might be the formulation and implementation of rehabilitation programs must be based on an open and collaborative relationship with the community. The literature on crisis management as well as field experience confirms that such practices are more likely to result in long-term benefits to the society. This is because recovery and rehabilitation initiatives will have a better fit; they will be more relevant to the particular circumstances and needs of the particular communities. In order to achieve “good fit” the formulation of recovery and rehabilitation programs must take into consideration three broad dimensions:

- The needs of the communities;
- The operational context; and,
- The organizational capacity of both donor and recipient institutions and groups.

In addition to having a good fit, there are a number of fundamental characteristics that a well-designed reconstruction program must have. Most important among these are the following:

- A sharp focus on the problem being addressed;
- Unambiguous objectives and specific outputs that are verifiable and as far as possible quantifiable;
- A clearly stated time line and a firm completion date;
• A decision-making structure that fully integrates the beneficiary community into all phases of the program; and,

• Appropriate resources and funding mechanisms in place.

Equally important is the institutional framework for executing the rehabilitation programs. As was mentioned earlier, when faced with the task of developing and implementing crisis recovery programs public administration agencies often find that these programs place an additional, and perhaps unmanageable, overload on their regular operations. Recovery programs can also create interagency conflicts since they may overlap the mandate and expertise of several agencies. There are a variety of institutional mechanisms that can be used to avoid the problems of overload and conflicting mandates. One approach is the creation of a reconstruction authority entrusted with the oversight and coordination of rehabilitation activities. This was the case in Sri Lanka where an authority was set up under the direct supervision of the country’s president to manage all post-tsunami reconstruction and development programs.

A more focused approach may be the creation of “limited life” institutions to formulate and implement specific programs; these agencies are established for the sole purpose of delivering specific output in a predetermined period of time. These bodies can be totally independent, subordinate to an existing agency, or overseen by an interagency board. An example of a successful “limited life” institution set up to implement a post-crisis reconstruction effort was the Housing Rehabilitation Program (RHP) for it’s name in Spanish) put in place after the 1985 Mexico City earthquake. The tremor caused considerable damage in the historic central district of the urban area, where old buildings had been turned into overcrowded tenements and were now inhabited by low-income families. Community groups that formed in the midst of the rescue operations pressed the government to act quickly and decisively on the issue of the thousands left homeless in this particular district. The government listened and less than a month after the disaster, expropriated damaged and collapsed properties in this area and established the RHP program for the specific purpose of re-housing the affected families (Ducci, 1986).

The RHP program had several features that are worth noting. First, it was focused having a single clearly defined objective: to re-house 40,000 families that had lost their homes in this district and on the same sites as their former tenements. Furthermore the new buildings had to be constructed on the same sites as the former dwellings. Second, the program was to be managed by an independent institution that was given a specific time period in which to do its work. Third, the institution was to be staffed by personnel seconded from other government departments. The staff was guaranteed return to their previous agency at the conclusion of the program.
The families in each tenement were organized into civil organizations. These organizations selected the architects and engineers that would design and build their new dwellings and worked with them from beginning to end. At the completion of construction ownership of the dwellings was transferred to the families who were given long-term mortgages at low interest rates to enable them to become homeowners. RHP was dismantled on schedule after reaching its goals. This is one illustration of a successful administrative mechanism to manage the post crisis overload on public service institutions. Another approach is for public service institutions to partner with community organizations whereby the government provides funding and technical advisors while the community organization manages the program and in most cases also provides the manpower under some form of self or mutual aid arrangement. In the absence of appropriate community organizations, community and self-help groups can be formed to carry out specific projects. This model is widely utilized and often leads to positive results, since it embodies the principles of government-civil society synergies. However, success with this model is subject to sustained funding and technical inputs and the continued resolve of government agencies, elements which tend to diminish with time. Consequently, the success of these partnerships is determined, in good part, by the ability of civil society to ensure the continued support of government agencies. A variation of the above model is a tripartite arrangement between government, community, and donor. Under such arrangements the government’s role is usually limited to vetting programs to ensure that they meet national standards and development criteria, and providing general oversight during the implementation. In this instance the donor – a national or international NGO or aid agency - provides the funding and technical know how while the community provides labor and other in-kind inputs. This model is commonly employed throughout the world and was extensively utilized in reconstruction efforts across the eleven countries affected by the 2004 Asian tsunami. In this instance achieving the objectives of the program is more a function of the commitment of the donor and its relations with the community and its sustainability depends on the active involvement of the community.

Another partner, beyond government, the community and donors that can play a significant role in crisis management are universities and technical institutes. Of course, such institutions are already making a significant and essential contribution to this field in terms of theory through their research and publications. In fact, most crises management theory emanates from academic institutions. The publications cited in this paper are evidence of this fact; another is the number of participants from academia participating in this workshop. What is more, university students are typically among the many volunteers that mobilize and provide assistance immediately after a disaster and during the recovery period.

Usually they join search and rescue operations and in some cases they get involved in community reconstruction efforts afterwards. But universities are also breaking out of their
traditional mold of engaging mostly in academic and research pursuits and are increasingly getting more directly involved in public service.

The growing emphasis on getting involved directly in public service activities is opening up new modalities for working with both civil society organizations and government, not only in their home countries but abroad. These modalities make it possible to form faculty student teams that bring together know how, experience, enthusiasm and creativity, and to involve them in the formulation and implementation of post-crisis rehabilitation programs.

As partners in crisis management activities universities and technical institutes can potentially make significant contributions beyond the traditional areas of theory and research, particularly in the pre-disaster preparedness and the recovery and rehabilitation phases.

Conclusions

In summary, crises represent acute changes in the usual state of affairs of a country, a situation that strains the social and economic fabric of the nation and often has devastating consequences on the physical and natural environment. Regardless of whether the events that provoked the particular crisis situation were brought about by human actions or the forces of nature the result is extensive human suffering, economic hardship, and physical destruction. How such events impact on a particular situation is very much the function of a complex of factors that include geography, level of socio-economic development, and governance practices. All of these various factors combine into making each crisis a singular event. Thus, Public administration agencies must adapt the response to the nature and scope of the particular crisis they are confronting.

Although each crisis is a singular event there are general policies and strategies that public administration institutions should follow in order to ensure a better resolution to a particular crisis. Policies and strategies that make for more successful crisis management include flexibility in operational norms, decentralization of authority, close collaboration with the affected communities, and the promotion of sustainable relief and the MDGs. In implementing recovery programs maximum advantage should be taken of the synergies that result from partnering with civil society including NGO’s, local organizations, donors and academic institutions; and, consideration should be given to the institutional arrangements necessary to carry out the work.

In essence, these policies and strategies are those that characterize good governance under any circumstances, but in times of intense difficulty, instability and danger that define crisis situations the practice of good governance is all the more important.
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Chapter Two

Rebuilding the Agricultural Economy in Post-Conflict Southern Sudan: A Student Perspective

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Cornell University, July 2010

After decades of conflict and displacement, many Southern Sudanese people are returning to their homeland with the hopes of a better life. Although there are many constraints, the Faculty of Agricultural and Environmental Sciences (FAES) at the Catholic University of Sudan (CUoS) is the establishing the Agricultural Research and Extension Program (AREP) to better address the areas food security and livelihoods needs. The AREP is designed to give farmers living in the Wau region of Southern Sudan opportunities to improve their lives through agriculture, and ensure that students gain the sensitivity, knowledge and skills to help facilitate this momentous task.

The core values of the AREP provide a solid foundation for broad-based, sustainable development. Drawing from the local context, these values include: gender equality; sustainability and regeneration; participatory, integrative, holistic and inclusive learner-centered education; cultural integrity; local knowledge and community wisdom; pro-poor, small-holder focus; community building; conflict transformation; and future leader empowerment.

As a graduate student I had the opportunity to work with the CUoS through a partnership that was established between the Vice Chancellor of the university and the Vice Provost for International Relations office here at Cornell University. The program was designed through the auspices of an international planning and development workshop which was a class consisting of graduating students from over ten different countries and representing academic disciplines as city and regional planning, public administration and food science. To further add professionalism to our consulting experience we established a pro-bono consulting firm called “Cornell Global Solutions”. Through the collaboration with CUoS and Cornell University an adaptable and comprehensive agriculture, research and extension program was designed in the Fall of 2009.

Basic Challenges that Were Considered in the AREP Design

Some basic considerations need to be understood within the design of the AREP. Due to the constraints that are already in Southern Sudan, the program is designed in such a way to be able to adapt over time once resources become available.
**Poverty**

Poverty is widespread in Sudan, with the 2006 Human Development Report of the UNDP ranking it 141st among 177 countries. According to a joint World Bank-UNDP mission, about 90% of the population in the South is estimated to be living below the poverty line of less than $1 USD a day. The hardest hit by poverty are people living in rural areas, in particular women and internally displaced people (IDPs) who make up about 12% of the country’s population.3

**Low Literacy Rates**

The literacy rate of Southern Sudan is only 24%. Gender discrepancies in this area are prominent, with the literacy rates being 37% and 12% for males and females respectively.5 Over 93% of all women in Southern Sudan are illiterate. Sudan has the lowest access to primary education in the world, with only 5% of all high school aged children going to secondary school in Southern Sudan. The average student-teacher ratio in the region is 50:1.4,5

**Rain-fed Agriculture**

The majority of farms in Southern Sudan are almost exclusively rain-fed. This system is by and large a low input/low yield system composed of small farms that range from two to thirty hectares in size and depend on labor intensive cultivation with hand tools. Despite being the central form of agriculture, this system has undergone negligible technical development due to low social and economic investment.

However, there is heavy dependence on food crops produced by traditional rain-fed agriculture, making it critical for maintaining food security in the region.6

**Traditional Crops and Foods**

Cereal production accounts for a significant portion of total agricultural production in Southern Sudan. Sorghum, millet, and maize comprise a large portion of the cereal harvest. Grains are used in most meals as the staple ingredient. The state of Western Equatoria has a high production of cereal along with the Upper Nile State, which is also important for livestock. In the Upper Nile and Jonglei States, cereals provide one-quarter or less of the food

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sustenance; however in Western Equatoria state they fulfill 85% of the food needs. Meat, milk, fish, and wild food comprise the remainder of the food consumption. Cassava is a staple food in areas of Western Equatoria, while groundnuts are an important crop in both Western and Eastern Equatoria.7

Female Farmers

Representing 49% of the farmers in the irrigated sector and 57% in the rain-fed traditional sector, women play a crucial role in agriculture contributing to both the GDP and household food security. Women working in the rain-fed sector are mainly subsistence farmers but they also work as seasonal wage laborers in the rain-fed mechanized sector. Women are responsible for a majority of the agricultural activities, participating in land clearing and in the preparation, harvesting, transporting and marketing of crops and carrying out most of the planting, weeding and food processing. In the livestock sector, women participate in milking and processing milk products and are involved in raising goats and poultry. In fisheries, women are involved in processing and marketing. In the agroforestry sector, women participate in all aspects of the sector and have the responsibility for seedling preparation and weeding. Women are often the primary decision-makers regarding agricultural activities, even when men are present.8

Smallholders

Eighty percent of farmers in Southern Sudan rely on small scale agriculture. Technology and information flow from research institutions to smallholder farms is crucial for effective farming of the land and consequently a way to earn decent money for Southern Sudanese smallholders.9

Market System

Along with agricultural input, product markets in Southern Sudan are underdeveloped or nonexistent. Civil unrest has destroyed the traditional market linkages and channels used by farmers in the Southern States to both produce and sell their products. Sustainable market organization and regulation will be vital for the effective and efficient development of

Southern Sudan’s economy and a way for farmers to earn a decent livelihood from their crops and livestock.  

**Students**

Many if not most of students in Southern Sudan have had their earlier education interrupted or have studied in schools with limited resources in terms of qualified teachers, textbooks, and educational supplies/materials. In recognition of this situation, the CUofS will require all introductory students in the first year to take a propedeutic or introductory year with a program of courses that review the secondary school disciplines that are essential for university studies—how to study, logic, language and communication skills, general mathematics, and the use of computers. During the first year, students will also take courses in social analysis, social ethics and accounting, thus laying the foundation for an ongoing evaluation of the complex realities facing Sudan and Africa today. Students must have an average grade point of C for all courses in the preparatory year before they will be admitted to matriculate in the FAES.  

Challenges to the educational development of the CUofS and their AREP need to be addressed when devising a comprehensive strategic plan that meets the needs of the local community and university as a whole.

**Strategic Plan**

The CUofS has been established to prepare the Sudanese people to address the needs to building/rebuilding the social, political and economic infrastructure that is essential to the integration of communities and the nation. To create future Sudanese leaders, both Male and Female who are committed to an ethical society, the CUofS seeks to:

- Offer greater access to university education for Sudanese who do not gain entry to other tertiary institutions, especially young persons from poorer areas, with an emphasis on gender and regional equality; and
- Develop an institutional presence with a capacity and a commitment to undertake research on national and regional issues and questions of social concern.

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11 The Catholic University of Sudan. 2007. The Propedeutic/Introductory Year.
Core Concepts for the CUofS

The CUofS and FAES addresses issues of food security with a focus on stabilizing rural communities, improving the productivity of traditional crops, and strengthening rural-urban linkages in Southern Sudan. Included in the CUofS the FAES Master Plan are the objectives to:

- Provide students with an understanding of the role of rural communities and environmental sustainability. In meeting basic needs/food security and improving livelihoods,
- Enrich students with the skills needed to improve agricultural productivity and to develop rural communities, and
- Engage students in the critical environmental issues facing Sudan and sub-Saharan Africa, for example, desertification (and conflict over scarce resources); climate change; and the protection and strengthening of fragile ecological systems.

The challenge was to develop the new AREP program as a complex mechanism that could be adaptable overtime as things became more apparent on the ground in Southern Sudan. The focus was not only on the actual physical structure and operation of the program, but also the development of the students and ultimately, the improvement of the lives of the people in Southern Sudan. Working in multi-ethnic communities is challenging, and a professional and student body that reflects the diversity of those communities would need to be required.

Central to this project is the need to give farmers living in the villages in the Wau region of Southern Sudan opportunities to improve their lives through agriculture, and ensure that students gain sensitivity, knowledge, and skills to help facilitate their task. The core values that inform the overall strategy, education, and program-building are outlined below. These core values apply to all operations at the AREP regardless of whether they are geared toward students, faculty, farmers, or communities.

- Gender equality
- Participatory; inclusive; empowerment; non-partisan; apolitical
- Learner-centered education and research (with problem solving); use of local knowledge and community wisdom; integrative and holistic; learning by doing; problem-based learning focused
- Pro-poor, preference for small farmers
- Sustainable including practice, program, natural resources, and environment
• Community building, conflict transformation, generating peace
• Cultural integrity
• Future leader-building (especially youth)
• Regenerative

**Academic Research Strategy/Methods**

The development of the curriculum will be cyclical. This allows for students to participate in the field and bring new information to the resident professors, curriculum will be reviewed and adapted to suit the needs of the community. The curriculum involves many facets, all of which help to produce a well-rounded individual as well as a strong community that support the students’ education. Figure 1 below details the interplay between the university, student development and community development.

![Figure 1: Interplay between AREP and Student and Community Integration](image)

Fieldwork is essential element of the coursework design because it is based around the concept of problem-based learning. Students follow the principle of “learning by doing” and establish mutual trust and collaborative relationships with local communities, which provide a dynamic interplay between theoretical and practical components.

Research plays an important role in students’ education. The research projects are community-based and pro-poor oriented, with local farmers’ participation and onsite experiments. It focuses on improving the productivity of traditional crops, promoting sustainable rural development and ecological conservation.
Research and extension services are a critical component of the AREP design to help address the issues of food security, with a focus on stabilizing rural communities, improving crop productivity and strengthening rural-urban linkages in Southern Sudan. As shown in Figure 2 the AREP is physical and virtual in its linkages to the community. It connects professors and students with community members, and links the community with services outside of the university (i.e. veterinarian services, micro-credit, nutritional information, etc.).

It is important to highlight that the “top down” approach of traditional university extension\textsuperscript{12} has not succeeded in similar African communities. According to Terry Tucker, Cornell University’s International Agriculture and Rural Development Program Director, there are many shortcomings of the top down approach.\textsuperscript{13} For instance, the idea of a station-based research location with good land, plentiful labor, and complex technology cannot compare to the reality in local farmer communities. This unsuccessful brand of extension service might include face-to-face workshops where discussion and interaction lack, and language barriers are a major shortcoming. Bias towards commercially-minded, literate, male landowners tends to occur. Women and drought-prone land are ignored.


\textsuperscript{13} Tucker, Terry. In person presentation to International Development and Planning Workshop class at Cornell University. September 2009.
The AREP pursues an alternative approach to traditional extension services. It is of realistic scale and includes a flexible and participatory approach,\textsuperscript{14} while relying on local input throughout the process. This participatory approach needs to extend to the research, which includes respect for local people—a departure from the “I’m the expert” mentality.

Setting sights on fostering and supporting robust systems that include partnerships with farmers, member organizations, NGOs, and other academic institutions produce favorable results.

The university is a community asset. A participatory and experiential approach to learning will be instilled in the education. This model will transform students into extension agents. Part of their education includes visits to neighboring villages, allowing students to learn about communities by living in them. With community buy-in, local people adopt students to live and learn together. It is a time when extension agents organizing people and connecting them. At the early stage of this Program, participants, facilitators, students and professors engage in building trust and establishing a foundation for community linkages.

\textbf{Results and Deliverables from the Consultant}

\textbf{Core Program}

As a consultant we devised a Core Program consisting of three main elements: Extension Training, Subject Areas and Focused Topics, and Research and Extension Initiatives. The aim of the Core Program is to develop students’ ability to identify problems and explore practical ways to improve the situation through field learning and a participatory approach. This experiential and service-based component of the curriculum will take place in the field and help to narrow the gap between theory and practice. It is intended to immerse students in valuable farmer-focused, experience-based learning activities, as well as to reduce the discrepancy between academic training and the practical tasks students will need to take on in

\textsuperscript{14}Green, Whyte and Harkavy (1993) laid out the following as the key features of Participatory Action Research (PAR): (1) Collaborative – collaboration between the professional researcher and the members of the organization being studied in the entire research process, (2) Incorporating Local Knowledge—incorporates knowledge and analysis of the organization being studied, (3) Eclecticism and Diversity—multidisciplinary and mobilizes theories, methods and information from all sources, (4) Case Orientation – attempts to learn lessons from specific areas, (5) Emergent Process – an intensifying process, and (6) Linking Scientific Knowledge to Social Action – research results reflect the organization under study’s better understanding of their own system. PAR constrains, if not eliminates, the hierarchical perceptions and power imbalance between universities and communities and thus, creates positive developments that are important for trusting relationships between communities and universities (Kassam and Tettey, 2003). Findings of the Participatory Action Research with the local communities of the Ottotomo forest reserve showed that PAR “approaches can yield useful information about and for communities. It has also been demonstrated that PAR is a relevant tool in negotiation, and can help in strengthening the process of collaboration, information exchange, and communication among stakeholders and seeking out opportunities to learn collectively about the impacts of their actions.” (Jum)
their post-graduation employment. As shown in Figure X the program components would last over a period of 5 years where by the students would be immersed in both subject based studying, field based research and participatory extension training. This will allow for the curriculum integration while being practical in nature and involving the community in the Universities research projects.

<table>
<thead>
<tr>
<th>Programme Components</th>
<th>Year 1 Prep.</th>
<th>Year 2 Fresh.</th>
<th>Year 3 Soph.</th>
<th>Year 4 Jr.</th>
<th>Year 5 Sr.</th>
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<tr>
<td>Participatory Extension Training</td>
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<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
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<td>Extension</td>
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<tr>
<td>Water Management</td>
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<td>Crop Storage</td>
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<td>Pest Management</td>
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<tr>
<td>Nutrition and Community Health</td>
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<tr>
<td>Crop Selection</td>
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<td>Seed Saving</td>
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<td>Livestock</td>
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<td>Agroforestry</td>
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**Figure 3: Program Component and Curriculum Integration**

*Participatory Extension Training*

The consultant designed a first-year course to train students in participatory extension methods such as participant observation, surveying, focus groups, interviews, social and gender needs analysis, and fostering the participation of disempowered groups, etc. This course will train students to do problem-based research—where they will work with farmers or on research plots to solve problem. A major contribution of farmer-centered research and extension is its potential to legitimize farmers’ knowledge by enhancing their capacity to critically analyze their own problems, conduct their own research and empower farmers to take direct action to solve those problems. This participatory course for the AREP first year students will “train the trainer” in participatory extension methods. Topics will include an introduction to participatory traditions in farming systems research and extension, evaluation of rural development, technology generation, gender analysis, participatory rural appraisal, and documentation of local and indigenous knowledge of community-based development. Case studies of farmer-centered research and extension will provide a focus for analysis. Appropriate roles of researchers and extension agents as partners with farmers will be examined.
Interactive Budget Model

We designed an interactive budget model that could easily be changed overtime. The Budget Model for AREP is based on a five-year timeline and is calculated according to the needs of the Core Program within the basic working framework. It was designed to provide financial information necessary for operation of the AREP at Wau and does not address expenses related to the Optional Modules or operations of the Bussere Research center. We provided the client with an explanation of the budget and what it consisted of four parts: an explanation of the budget methodology; an overview of the assumptions; instructions for the budget model; and the budget model on a compact disc. Like many budgets, this one was created using Microsoft Excel spreadsheets to convey financial information.

![Expenditure Budget](chart.png)

**Figure 4: Budget Model for AREP’s First Five Years**

According to the Budget Model as shown in Figure X, the total cost for the first full academic year of the program is estimated to be $87,285 USD. This projected cost is expected to rise to $140,712 USD by the fifth year, when the FAES has full enrollment in all five years of classes.

Modular Learning

We provided the client with a set of modular learning activities that would require funding from outside the University to support these programs. As the program progresses and increased funding is obtained, the Modules (such as a shadehouse or micro-credit programs) will be phased in accordingly. Recognizing that flexibility and the ability to adapt to changing conditions are integral to the long-term success and sustainability of any program, ongoing
program development opportunities are built-in to the structure of the AREP. Some examples of module courses are the following:

- **Market Development**: Market development involves improving access to markets, strengthening the linkages between participants on the supply chain, and making those linkages efficient. The main focus is to link farmers to input-output markets, in order to ensure their products are bought and sold at fair prices.

- **Greenhouse and Shadehouse**: Greenhouses are structures that trap heat from the sun; shadehouses protect plants from excessive heat, light or dryness. The size of the actual greenhouse or shadehouse may vary, depending on the needs of the professors, amount of available funding, number of students interested, and available land.

- **Aquaculture**: A freshwater aquaculture pond containing fish provides nutrient-rich water for crops through trickle irrigation and fish can be harvested to sustain a target pond population. The harvested fish will provide meals, or generate income for the Program.

**Complementary Initiatives**

We designed a set of complementary initiatives that the AREP could partner with other organizations to help implement and support their projects. The design of the AREP allows for partnerships and collaborations with other organizations and NGOs within the region of Wau. Such partnerships will serve as a guide to the AREP, by duplicating the successes of others whilst and avoid their failures. It was stressed that it was essential that the University takes advantage of possible collaborative opportunities and work with other institutions to bolster the efforts of the program.

**Funding Database**

A funding database was provided by the client which consisted of a set of funding resources for the design and implementation of the AREP in a Handbook that he could bring to meetings with potential donors. This handbook has descriptions of optional modules that need to be funded for the future development of the program, as well as some possible funding sources in Southern Sudan and abroad that could be utilized. This funding handbook has the names of the organizations, contact information and what projects these organizations have funded in the past. It was stressed that the director of the AREP will need to find additional funding for the optional modules to be implemented to support the development of the program.
Cornell’s Commitment to CUofS

Since the inception of the project with the Catholic University of Sudan, Cornell University and the both the students and faculty remain committed to the development of the university. Through the support of Cornell University the consultant was able to acquire about two dozen used computers from Cornell University that will be shipped to Sudan by freight. These computers will come equipped with new software that will allow the students to be able to learn such skills as word processing, database management, and other technical skills. With this computer donation the consultant is pursuing a proposal to develop a Geospatial Information Systems Laboratory at the Catholic University of Sudan. GIS integrates hardware, software, and data for capturing, managing, analyzing, and displaying all forms of geographically referenced information. GIS allows us to view, understand, question, interpret, and visualize data in many ways that reveal relationships, patterns, and trends in the form of maps, globes, reports, and charts. GIS helps you answer questions and solve problems by looking at your data in a way that is quickly understood and easily shared.

The consultant has provided the client with a Terms of Reference for Bussere Research Center. The Bussere Research Center The Bussere Agricultural Research and Extension Centre (BAREC) will provide the land and environmental resources unavailable to the Wau campus. The goals of BAREC are to:

- Offer an extension centre that will serve farmers by providing a hands-on teaching experience. The extension centre will also provide accommodation and other amenities to ensure that the subsistence farmers have the opportunity to participate.

- Develop a research centre with the commitment and capacity to undertake research on national and regional agricultural issues of social concern.

- Develop experimental plots to model important agricultural activities such as minimum and no tillage crop systems; agroforestry examples; green manure and cover crop rotations to build and maintain soil fertility and tilth as compared to conventional agriculture rotations; minimum water use irrigation systems for crops and vegetable gardening; non-chemical weed and pest control examples; and carbon sequestration in the soil.

- Establish an agricultural animal research and extension programme designed to improve the health and productivity of livestock bred for human consumption, such as cattle, goats, sheep, and chickens.
This is especially relevant in Sudan where eighty percent of the workforce is occupied with agricultural activities and where several social indicators reflect severe lags on the health and educational state of the population. In the United Nations Development Programme’s *Human Development Report – 2007/2008*, Sudan ranked 147 in the human development index, with a life expectancy of only 57.4 years and an adult literacy rate of 60.9%. The situation is exacerbated in Southern Sudan. Overall adult literacy is less than 30% and among women only 9%.

Some other future areas of collaboration for Cornell University and the CUofS are faculty and student exchanges. This program hinges on the ability of both universities to acquire enough resources that allows for student and faculty exchange to occur.

**Benefits from Working with a University, the Consultant Perspective**

There are definite benefits that developed from the relationship that was formed between the CUofS and Cornell University. From the consultant perspective not enough relationships are being developed between public service institutions and universities to help meet the needs of the MDGs. Some examples of the benefits that occurred as a result of the collaboration are the following.

- Integrates multiple perspectives on theories of agricultural research and extension. Students bring new theories on agriculture research and extension that people in the field might not have heard of in the past.

- Provides for a university to university collaboration. This relationship allows for the curriculum to be developed by students for students.

- Utilizes the material resources at Cornell. Cornell has a vast amount of resources both physically and mentally that allow for the consultant to gain vast amounts of information within only a short period of time. Working in the field does not allow for this quick response.

- Stimulates creative thinking. Being at a university this allows for creative thinking and new methodologies to be harnessed in the development of a research and extension program.

- Approaches development through youthful enthusiasm and focused idealism. Students are always enthusiastic about working on new projects and this is
shown through the passion they have on working with the client no matter the scale of the actual project.

- Embodies low investment costs for a quality project. The consultant does not require a fee for the client to work with. However, the client needs to be engaged throughout the process for the project to be beneficial in the end.

By working with universities the client has the ability to develop projects in quickly and effectively that benefit both parties. On one side it is an educational experience for the consultant and on the other side the client receives a project that is rich in creative thinking, new ideas and utilizes a wide range of new technology.
Chapter Three:

Rebuilding Neighborhoods in Port-au-Prince, Haiti: A University Program Manager Perspective

Christine Potter
George Stirrett-Wood
Cornell University

The January 12 2010 earthquake in Haiti left already resource-poor neighborhoods of Port-au-Prince in a deplorable situation, with core health indicators such as safe drinking water and sanitation in a worse state than before the earthquake. This case exhibits the way in which a university can partner with governmental and non-governmental agencies beyond an immediate crisis in the recovery stages of a natural disaster.

Cornell University in Ithaca, New York, is a strong advocate and long-term supporter of GHESKIO (Groupe Haïtien d’Étude du Sarcome de Kaposi et des Infectieuses Opportunistes), a highly-regarded research and treatment center for HIV, malaria, and tuberculosis in Port-au-Prince, Haiti. When a soccer field next door to GHESKIO quickly transformed into a tent camp for 7,000 earthquake-affected individuals, GHESKIO responded by providing food, clean water, and primary healthcare such as immunizations. Understanding the need to rebuild the clinic, programs, and neighborhoods—this camp would not be a long-term solution for the future of these individuals, so Cornell looked for ways to assist GHESKIO and its recently adopted community. A visit to Haiti by Cornell’s Vice Provost for International Relations enabled the University to evaluate the immediate and longer-term needs. Cornell predicted that the treatment of illness would be addressed by GHESKIO and a number of other aid agencies on the ground, but that the future of the actual neighborhoods surrounding the GHESKIO clinic was an uncertainty. Furthermore, treating individuals for illnesses and then returning them to the overcrowded conditions in the camps that created illness in the first place was not a sustainable approach.

Working closely with GHESKIO, Cornell sought to develop a unified response that would target the maximum number of internally displaced persons (IDPs), aiming to address basic human needs. The University appointed Cornell Global Solutions (CGS), a pro-bono consulting team comprising 15 graduate students and led by an expert faculty member in the field of international development. Of the Millennium Development Goals, several were to be addressed, including Goal 1 (Poverty Reduction), Goal 3 (Gender Equality), and Goal 6

(Prevention of HIV/AIDS, Malaria and other Infectious Diseases).

The Vice Provost for International Affairs served as the project lead, consulting with GHESKIO officials on the ground in Haiti for guidance and feedback. The situation in Port-au-Prince seemed to change on a weekly (sometimes daily) basis immediately following the earthquake, as the situation was precarious and uncertain. Ultimately, the project brief directed the student group to address the situation in marginalized neighborhoods closest to GHESKIO, yet the deliverable was designed to be comprehensive in nature so that it might serve other neighborhoods of Port-au-Prince. It provided a replicable strategy for citizen driven, coordinated neighborhood development.

Subsequently, he spent three years at The Economist Group where, among other things, he was a co-editor for the Economist Intelligence Unit’s (EIU) e-readiness reports, written in co-operation with the IBM Institute for Business Value, in 2008, 2009 and 2010.

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**Cornell Global Solutions Team Make-Up and Its Approach**

Comprising 15 graduate-level students, representing ten different nationalities (including one Haitian), CGS brought a considerable degree of institutional capacity to the table. The majority of the students are pursuing a Master of Public Administration (M.P.A.), but there are also Master and PhD students from other disciplines such as Food Science and City and Regional Planning. Although professional practitioner programs such as Public Administration are ideal for such a project, it is essential to bring together an academically diverse group with a variety of professional and cultural backgrounds, and expertise across several pertinent fields.

It was important to allow the group ample—yet directed—freedom when approaching the problem. Working together, CGS amassed substantial information. Drawing from knowledge in subjects such as food security, neighborhood development, health, engineering, the group was encouraged to go off in unexpected, but productive, directions. The creativity and innovation that can emerge from diverse groups such as these is invaluable.

Capitalizing on the depth and breadth of the group’s expertise, the team quickly and simultaneously analyzed multiple dimensions of the project. From the perspective of an educational institution, this is precisely the type of critical and multi-disciplinary thinking that is desired, and subsequently promotes comprehensive, multi-dimensional results. This is an advantage of working with an educational institution, both for the clients and the students. Generally, the actual team make-up may vary depending on the project; one core reoccurring attribute is that the students exhibit a sense of focused idealism and passion that is
refreshing — and ultimately the basis for innovation.

In addition to the professional and academic backgrounds of the individuals, the consulting group was able to take advantage of a variety of resources within Cornell’s community. For example, technical assistance was provided by a former administrator of the planning, coordinating, monitoring and regulating reconstruction and rehabilitation authority for Pakistan: the Earthquake Reconstruction and Rehabilitation Authority (ERRA). Landscape Architecture and Architecture students, water and sanitation engineers, and business entrepreneurs were all tapped for their expertise. As Cornell University attracts a varied audience and has numerous organizational alliances, the CGS team was also able to consult with the former Prime Minister of Haiti (and current director of La Fondation Connaissance et Liberté) Michelle Pierre-Louis, as well as the private investors and leaders of other non-governmental organizations.

While working within the university setting has unique advantages and resources, there are inevitable gaps. In this case, due to the miles between Ithaca, New York, and Port-au-Prince, Haiti, working with partners on the ground was paramount to capture the situation, cultural context, and voice of the local people. It is these partnerships that helped to steer the project. Nevertheless, in post-disaster situations, professionals on location tend to be overloaded with the daily obligations. So as not to burden those partners, some details remain unknown, which is why select components of the strategy framework are loosely outlined, relying on the cultural context, and the voice of the local people, to contribute to the final project once enacted on the ground.

**Looking to Pakistan to Inform Haiti’s Reconstruction Approach**

Following the earthquake in Pakistan, the country’s government coordinated reconstruction efforts to “build back better” through the establishment of ERRA. This swiftly implemented comprehensive and coordinated plan was centralized through one agency granted with the authority needed to approach the overall situation with cohesion and legal backing. The structure required that all aid agencies channel funds through ERRA, and expenditures were made according to the needs of the people, rather than the specific agendas of the individual aid agency. Some may argue that taking away the direct spending power from aid agencies is a risky practice that could have lead to reluctance to donate. In fact, this was sometimes the case. However, in reviewing the results with a program manager from ERRA it appears that—despite some backlash—the approach was highly successful.

Reflecting upon Pakistan’s experience, CGS consulted with experts in Haiti and determined that the post-earthquake Haitian Government would struggle to comprehensively oversee coordinated efforts required to implement the NRS infrastructure plan. Because a number of stakeholders are involved in the redevelopment, legal authority must be granted to a single agency capable of overseeing neighborhood redevelopment projects. Further, as
Ignacio Armillos concludes, “Once the immediate emergency fades government institutions return to business as usual, undermining recovery and rehabilitation efforts” (Armillos, 2010). This was a concern because due to the already limited capacity of the Haitian government, CGS determined that designating an alternative coordinating body would take pressure off the government, and allow for the work to be spearheaded by an authority with vision far beyond the first “fifteen minutes” (Armillos, 2010). Further, this coordinating body would be responsible for implementing the replicable strategy for the redevelopment of neighborhoods throughout Port-au-Prince

**Redevelopment, not Relocation**

Though a variety of strategies exist for rebuilding after a disaster, CGS developed a Concept Note for a Neighborhood Redevelopment Strategy (NRS) that is based on a replicable model of redevelopment and retrofitting, not relocation. While some parties operating in Port-au-Prince are implementing relocation plans, CGS opted for a model that would allow residents to return to, or remain in, their original neighborhoods, causing minimal disruption to economic and social networks, thus allowing continued access to other important and established resources. Disruption caused by relocation could result in additional loss of employment, adverse psychological affects, and greatly reduced access to services. Additionally, though decentralizing the population may be a long-term goal for Port-au-Prince’s city planners, such practices need to be carefully planned. Capitalizing on post-disaster circumstances as a way to implement agendas that deserve longer-range planning is strongly discouraged. Thus, CGS concluded that any redevelopment plan using the NRS would take place within Port-au-Prince, and some key parameters prevailed.

- Land tenure in Port-au-Prince is not clear cut;
- The land tenure situation would steer the direction of development, therefore a single overall plan would not suffice; and
- Aid efforts on the ground in Haiti are not coordinated by a central agency, and as such, there is a need for a coherent development authority to oversee redevelopment projects.

The intent of the NRS is to facilitate neighborhood viability for:

- Earthquake-affected internally displaced persons; and/or
- Residents of informal areas looking to integrate basic infrastructure.

What follows are details of the plan the CGS team developed.
A Public-Private Foundation to Address Density and Land Tenure

The NRS infrastructure plan is driven by two key elements: density and land tenure. Both are essential factors in deciding how to best attain this project’s primary goal: to assist displaced low-income residents in dire need of safe housing.

To this end, the NRS elucidates two critical components:

- **The need to install basic infrastructure to address issues of human dignity as well as public health — a proactive approach to the well-being of resource-poor residents.** It is envisioned that the infrastructure will be funded by international donors, while neighborhood residents will contribute volunteer labor for projects.

- **The need for the entire effort to be managed by a new public/private Foundation.** The infrastructure implementation framework outlined in the concept note uses, as examples, two neighborhoods located immediately adjacent to GHESKIO. These illustrate how rebuilding or retrofitting could be designed and implemented in such neighborhoods. While one Foundation can oversee all of the various neighborhood projects, the NRS uses a framework of replicable local initiatives.

The Foundation would:

- Ensure residents are central to the decision-making process.

- Be granted with legal authority for development throughout the entire city, it will be more than just a coordinating organization.

- Have the vision and initiative needed to address the big picture, while having the capacity to coordinate projects in more than one neighborhood at a time.

- Have the capacity to provide infrastructure in the specified neighborhoods, transfer technical skills to the local residents of the neighborhoods, and manage supply chains for home construction materials.

- Coordinate with other agencies for social services, financial assistance, and the procurement of resources with the objective to provide neighborhood redevelopment in formal and informal settlements.

- Be organized with a Stakeholder Board as the anchor, while there will be neighborhood-specific groups formed for each neighborhood with which the Foundation works.

- Evolve as the needs of the community change. Once the infrastructure needs of the neighborhoods are met, the Foundation will focus on the maintenance and improvement of the engaged neighborhoods.
An Inclusive Public-Private Partnership

The Foundation will assist GHESKIO and help ease its burden as the primary coordinator for the new camp and community reconstruction/retrofitting efforts in partnership with community groups, businesses, non-governmental organizations, and the Haitian government. The involvement of all stakeholders will be crucial in ensuring appropriate service delivery and efficient resource allocation to spearhead rebuilding efforts.

**Government.** Various ministries, municipalities, and specialized agencies representing the interests of the Haitian government will be involved in the program. These governmental bodies will contribute with material resources, technical expertise, and administrative coordination.

**Financial Institutions.** Represented by local and international banks, financial institutions will be vital for ensuring funding to enable the growth of the Foundation and to facilitate the development of microcredit programs.

**Citizen-Centric.** Community needs and priorities must be solicited and addressed as grassroots citizen-driven support will be critical. The Foundation will rely on the neighborhoods in identifying issues that are of the most pressing need. The Foundation will be responsible for broad decision making, such as the technical logistics of where to establish the primary sewer lines, the depth and capacity of the lines, and other engineering-related planning.

Residents will be enlisted to participate in decision-making, nurturing the emergence of community-managed neighborhoods. They will also contribute through providing both labor and some of their land to allow projects to take place. Areas for neighborhood and local stakeholder involvement include:

- Education
- Employment
- Health and sanitation
- Housing improvement
- Security
- Water supply
- Electric supply
- Social services
In addition, a reciprocal relationship between the Foundation and local leaders will build political capital for the Foundation and strengthen its relationship with city officials.

**Service-providing** NGOs. Service-providing NGOs will complement Foundation initiatives by providing technical assistance and access to resources.

**Donors and Sponsors.** Donors and sponsors will provide financial support for the implementation of the program and participate in the design of the program.

### Implementation of the Foundation

The first two phases of the NRS relate to the development and implementation of the Foundation:

- **The Planning Phase (June 2010 to March 2011)** is a nine-month period during which the Foundation will be established, target neighborhoods will be identified, and fundraising for Phase I will take place. To initiate the process, a grant will be sought for the planning phase. This planning process would be a GHESKIO-led initiative, with significant support from Cornell.

- **Phase I (January 2011 to December 2015)** will overlap with the Planning Phase by three months, and is a five-year period during which the Foundation will implement redevelopment plans in selected neighborhoods.

- **Near the end of Phase I,** there will be a reassessment and evaluation of the Foundation’s role and mandate to determine whether it should continue service provision in the selected neighborhoods, or if it should transfer its responsibilities to an affiliate organization.

### Two Strategic Approaches

For the effective implementation of services and infrastructure, the availability of land is critical. However, in many area of Port-au-Prince land tenure is unclear and this complicates any plans for owner-occupied opportunities. Thus, CGS provided two different options the Foundation could proceed with redevelopment based on the status of land.

**Option A** redevelops a parcel of land from the ground up with modern infrastructure and design principles. Ideally, a sizable open, piece of land with clear land title rights would be available. The land would be cleared, leveled and prepared for systematic installation of basic underground infrastructure such as water, sewage, and electricity. Subsequently, the site would be developed with housing units and facilities for social services such as health care, education, and garbage removal.
Option B retrofits an existing community with basic, but important, infrastructure (sanitation, water, electricity) and then allows the community leadership to organize further expansion of infrastructure and housing in incremental stages.

Option A: Neighborhood Layout Design. The illustrative layout design (below) represents the maximum density single-story for a neighborhood. As shown in the figure below, design of the neighborhood would incorporate 1,400 parcels providing for 16 m² per household. In addition, plots have been allocated for commercial services, a school, a medical clinic, and open space—all critical for improving living conditions.

Option B: Retrofitting an existing neighborhood when site cannot be cleared for new layout. If the Foundation is unable to secure land for new development, Option B retrofits an existing neighborhood with sanitation, water, and electric services. In this document, the...
neighborhood known as *Cite de Dieu*, serves as an illustrative example of how such a project might be realized.

Approximately 85 percent of those currently living in the GHESKIO camp cited *Cite de Dieu* as the location of their pre-earthquake residences. Retrofitting this neighborhood would allow residents to return home to a safer neighborhood. In addition to infrastructure, drainage, tidal surge protection, canal maintenance, and new construction standards should be pursued.

Although *Cite de Dieu* is the example here, the intention of this concept note is that this plan can be replicable in similar neighborhoods across Port-au-Prince.

- **Development Authorization.** As with *Option A*, a Foundation needs to be established to bring transparency and legitimacy to the operations. Its structure and mission would be very similar to *Option A*, yet the Foundation would be adjusted as needed to fit local needs and constraints. It is imperative that the Foundation work with the government to limit the likelihood of the government using eminent domain to take the land away from its current (title-less) tenants after neighborhood improvements have been made.

- **Design Parameters.** Retrofitting the Cite de Dieu neighborhood would begin with the installation of primary electric, sanitation, and water infrastructure. The pipe will be laid in trenches dug into the existing roads, in the double-horseshoe pattern illustrated in thick yellow lines in the figure below. These pipes will have the capacity to serve the entire neighborhood. The next step will be the installation of smaller pipes, as green thin lines, to extend the reach of the infrastructure beyond the major roads.

- **Neighborhood Layout Design.** This layout design represents the given neighborhood density and design. As noted by UN studies, several structures on the fringe have been heavily damaged or collapsed, but most of the structures are intact and continue to
function as family housing. For retrofitting purposes, the existing physical environment will be altered as little as possible as shown in the figure above.

Community and Household Designs.

CGS worked closely with the Cornell Design and Planning Club to design affordable and effective designs of core housing units, and a Community Site Plan to provide an illustrative example of how a community might be organized. Although, the detailed explanation of these plans is beyond the scope of this paper, the illustrations are demonstrative of the professional capacity available within universities. As well, it illustrates the initiative of CGS to first design a Foundation and then provide the Foundation with tools for achieving its objective.

At the center junction of every four housing units is the core unit. Within each household the core unit will provide three (3) square meters of the 16 total square meters allocated for a house unit.

Core units:

- In the same housing cluster will share walls as well as water and plumbing connections to take advantage of infrastructure hookups, and saving resources and space.

- Includes a bathroom, but will also be constructed with reinforced concrete to provide shelter during a hurricane or an earthquake. The bathroom will double as a shower room, and include a toilet in the innermost corner, a showerhead and sink on the inside, as well as a kitchen sink and countertop space on the outside wall. The bathroom will have a central drain in the floor for shower water to save space and simplify using and cleaning the bathroom.
Infrastructure

For the NRS to help improve living conditions and improve livelihoods there has to be some basic infrastructure added to the land. The Foundation would construct or retrofit a neighborhood with critical infrastructure improvements that are not found in many residential neighborhoods throughout Port-au-Prince. Approaches to installing and/or coordinating basic infrastructure include: water supply, sanitary sewage, storm drainage, electrical service, and waste collection.

Option A Versus Option B

*Option A and B* each have distinct benefits and drawbacks.

- **Option A** allows for:
  - Faster implementation
  - An efficient use of infrastructure design and installation.
  - Dramatic results since the entire site will be developed at once, and after the community is built, there will be a systematic and rational layout of the entire site.

Regardless of the benefits, the project requires residents to offer collateral in order to fund their units. This will prove challenging to many households. For the individuals who are able to secure funding, and become owners of their unit, "pride of ownership" will come into play:

- **Option B:**
  - Will take much longer than A to implement.
  - Install infrastructure incrementally, thus it will not be as cost-efficient as *Option A*.
  - Relies on the ability and motivation of residents to become fully implemented.
  - Utilize existing houses/structures, which some may argue is an efficient approach.

Although, without title, the residents do not have security of ownership. And without legal ownership, there will always be uncertainty about the future of the homes, and the residents' future living arrangements.

Micro-credit

Many members of the these neighborhoods are considered to have no legal basis for
traditional creditworthiness and may not be able to offer common forms of collateral, making them unable to seek credit individually. A more practical way to access credit may be to use joint liability loan contracts or social contract, where they have to form appropriately sized groups, all members holding mutual responsible for credits of the group until the last group member has fully repaid the loan.

The Foundation will play a critical role here in not only in coordinating the establishment of micro-credit initiatives for community members, but also providing protection from abusive labor practices.

Social Services: Coordination with Public and Private Suppliers

In order to ensure adequate provision of social service facilities, coordination with the private sector and government agencies will be necessary. Private sources of food and water, diapers, clothing and other necessities for neighborhoods; along with building material and construction equipment should be pursued. The private sector can also provide transportation in collaboration with the public sector. Importantly, the restoration or development of basic infrastructure and facilities will require close collaboration between public organizations and private companies. Schools, health clinics, and childcare facilities can best be provided if there is coordination between the Foundation and the public and private sectors in Haiti.

Employment

Creating jobs is essential to restore people’s livelihoods and foster economic growth. The Foundation will stimulate employment opportunities in the short-term in areas such as infrastructure installation and housing development, but given the housing density situation, significant employment opportunities are needed off site. The Foundation, although not an employment agency, must strive to bring together and foster collaboration with business, non-profit, governmental, and community interests to stimulate entrepreneurship and commerce related activities. It will act as a bridge to create long-term and sustainable employment opportunities. Job creation must take place simultaneously with reconstruction efforts; the two cannot be mutually exclusive. At this time, there are plans by the Haitian government to create an expanded manufacturing-based job market for Haiti. Should these plans come to fruition, some gaps would be filled—although not entirely.

Going forward

While the concept note includes relevant components that address Haiti’s context with inputs from post-disaster experts and Haitian’s feedback, it is important for the ideas and principles to be tested through a “groundtruthing” mission in Port-au-Prince. At the time of preparing this paper, the groundtruthing mission by a CGS consultant is planned for the
summer of 2010. Through consultations with relevant stakeholders and the displaced population, this initiative will enable Cornell to gauge the reaction, interest, and relevance to the objectives of the project and the challenges, and more importantly, the opportunities to deliver on its intentions.

Following the groundtruthing, the document will be improved by recalibrating the strategies or redefining the scope of the involvement in Haiti’s development in the aftermath of this disaster.
Chapter Four

Rebuilding the Community in Post-Conflict Bosnia: 
A Consultant Perspective

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Since the end of the Bosnian War (1992-1995), the country of Bosnia and Herzegovina (commonly referred to as Bosnia) has struggled with poverty, unemployment, and political stagnation. Currently, this former Yugoslav republic is seeking membership in the European Union (EU). However, Bosnia’s matriculation into the European Union is dependent on its ability to bring its economy and public institutions – including its education system – up to EU standards.

The current education system does not meet EU standards due to its limited capacity to provide students with the necessary skills and capabilities to enhance domestic civic engagement and compete globally, both professionally and academically. Furthermore, in many areas of Bosnia, the education system is fractured and divisive, thereby perpetuating ethnic conflict rather than promoting the values of a multi-ethnic society where each citizen enjoys equal rights. Thus, it is critical to invest in the Bosnian education system in order to stimulate social development, economic growth, and reconciliation.

Challenges in Bosnian Education System

As part of the socialist former Yugoslavia, Bosnia’s economic structure was a command, or planned, economy with an education system that prepared students to work primarily in vocational fields. However, the vocational jobs of the Yugoslavian era are being replaced by positions that require a different set of skills, including English language competency, computer literacy, and critical thinking. The shift to a global, liberalized economy has created a gap between the education system and the professional opportunities that presently exist in Bosnia.15 According to a World Bank report:

“More than 40 percent of secondary students in [Bosnia] continue to study programs in hundreds of occupational specializations, for most of which there are few

jobs. The 2003 Poverty Assessment (Report No.: 25343-BIH) documented that people with specific occupational training have a higher tendency than those with more general education to be both poor and unemployed.” 16

While there are a number of educational institutions embracing modern techniques, the majority of educational institutions in Bosnia employ a didactic approach to teaching. Emphasis is placed on rote memorization and repetition. Lecturing is the most widely used method of teaching. This has facilitated passive learning, resulting in a lack of critical thinking and personal initiative amongst students. 17 Hence there is a need to introduce participatory teaching methods defined as follows by the United Nations Educational, Scientific and Cultural Organization:

“Interactive or participatory teaching and learning methods replicate the natural processes by which children learn behavior. These include observation, modeling and social interaction. Listening to a teacher describe skills or read or lecture about them does not necessarily enable young people to master them. Skills are learned best when students have the opportunity to observe the skills being practiced and then use the skills themselves. Researchers argue that if young people can practice the skills in the safety of a classroom environment, it is much more likely that they will be prepared to use them in and outside of school. Participatory teaching methods for building skills and influencing attitudes include the following: class discussions, brainstorming, demonstration and guided practice, role play, small groups, educational games and simulations, case studies, storytelling, debates, practicing life skills specific to a particular context with others, audio and visual activities, decision mapping or problem trees.” 18

According to the OSCE (Organization for Security and Co-operation in Europe), an organization that has had a leading role in implementing the Dayton Peace Accords governing post-war Bosnia, the current education system is fraught with fractured and divisive practices which are detrimental to helping Bosnia evolve into a democratic, stable and secure state upholding fundamental human rights. 19 The Education Department of the OSCE in Bosnia describes the importance of educational practices that promote reconciliation:

“It is not an exaggeration to note that the country will only be as successful, stable and

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united as its schools. If the voters of tomorrow are educated according to the norms of nationalist division and exclusionary ethnic principles, BiH will remain at constant risk of further fragmentation or dissolution. If future citizens receive an education that promotes tolerance, an appreciation of complex European identities and civic participation in social and public life, post-Dayton BiH will have a much greater chance at democratic consolidation.20

One aspect of the current divisiveness in Bosnia's education system is the practice of “two schools under one roof,” which separates students along ethnic lines. This practice remains prevalent in many areas of the country. Students who study under the same roof receive different curricula and different versions of history based on their ethnicity. In many of these schools, Bosniak, Croat, and Serb children have no mutual contact.21 This institutionalized separation puts Bosnian society at risk of future conflict, as it denies a key opportunity to foster understanding and mutual-respect.

**Bridging the Education Gap**

To address the needs of contemporary Bosnian society, BILD (Bosnia Initiatives for Local Development) and the Tuzla Muftiante have established the Tuzla Summer Institute (TSI). The Tuzla Summer Institute is the result of a collaboration between BILD, the Tuzla Muftiante, the Cornell Institute for Public Affairs (CIPA – Cornell University), and the Ithaca, New York-based non-profit organization, SEEDS – South East Europe Development Solutions.

The idea of establishing such an institute was conceived when Mufti Husein Kavazović of the Tuzla Muftiante and Christopher Bragdon, the Executive Director of BILD, came to Cornell University in March 2008. CIPA and SEEDS hosted Mufti Kavazović as a colloquium speaker where he asked members of the Cornell community to consider ways of helping Bosnians rebuild their country. Professor David B. Lewis, the Director of CIPA, suggested that CIPA help establish an educational institute in Bosnia, with the hope of fostering mutual understanding and respect amongst the country’s future leaders through the teaching of practical skills in a secular, multi-ethnic environment.22 Several important steps were taken to make this dream a reality, including a feasibility study23 and background

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research,\textsuperscript{24} which were conducted at Cornell University and in Tuzla leading to the inaugural session of the Tuzla Summer Institute in July, 2009.

**Cornell’s Role in the Program**

*Empirical Studies*

In the summer of 2008, a CIPA Fellow (graduate student) traveled to Tuzla to conduct a feasibility study to determine whether a summer institute of the kind suggested by Professor Lewis would be possible, and if so, whether it could provide a meaningful service to the community. A group of pro-bono consulting group of students at CIPA (hereafter referred to as Partners for Progress or P4P) were tasked with creating a project proposal for BILD/SEEDS from which the Tuzla Summer Institute was born. P4P presented empirical data to the client that supported that client’s anecdotal evidence of a need for more practical, participatory and inclusive education.

Augmenting the empirical findings were recommendations for teaching tools and methodologies for the program, as well as sources of potential funding for the program. The recommendations focused on addressing specific gaps in Bosnia’s current education system, such as: computer skills, entrepreneurial development, and English language. CIPA students found that the presence of nationalistic and ideological rhetoric is ever present in the Bosnian educational system, as education is used to serve political and nationalistic purposes. This reality fueled the need for an inclusive, multi-ethnic educational institution. The Tuzla Summer Institute was created to fulfill that need. A CIPA fellow helped implement the first iteration of the TSI in the summer of 2009, contributing to curriculum development, teaching classes, and organizing TSI events.

*The University Community/Network*

Academic communities bring together students and faculty with diverse backgrounds, experiences and skill sets, and foster an environment that encourages innovation and knowledge sharing. Premier higher education institutions are knowledge hubs that attract bright and creative minds from all over the world, who are able to contribute different perspectives and a wide range of subject matter expertise. This includes not only full-time students and faculty, but visiting scholars and speakers as well. Distinguished speaker events, such as the one that brought Mufti Kavazovic to Cornell University in 2008, can catalyze project ideas and serve to garner university-wide support for specific endeavors.

\textsuperscript{24} “CIPA Student Consultants Win Approval for Summer Institute in Bosnia” Reviewed on: July 1, 2009, \textless http://www.cipa.cornell.edu/doc/CIPA_winter09.pdf \textgreater
Universities have abundant research resources, placing them in an advantaged position to conduct the background theoretical and empirical studies that lend credibility and clarity to a project. Their physical and electronic library collections and resident subject matter experts are valuable resources for a wide range of projects. For example, Cornell University boasts one of the 10 largest research libraries in the United States, giving its students and faculty access to nearly limitless published material. Furthermore, the inter-university library network allows students and faculty in one university to access the holdings of other institutions if they are unable to find what they are looking for at their own institution. These physical resources, combined with institutionalized knowledge networks and overall professional clout, situate universities in a unique position compared to the professional world with regard to serving as a partner in nonprofit initiatives.

The Results of the Collaboration

Partners and Funding

The research done by Cornell’s Partners for Progress served to substantiate the client organization’s anecdotal findings. Empirical evidence of Bosnia’s fractured education system accorded the project a greater degree of credibility in the eyes of donors and potential partners. In the case of the Tuzla Summer Institute, this form of third-party validation was crucial in obtaining the sponsorship and support of several key players in the project – such as the United States Embassy in Sarajevo and the Soros Foundation.

TSI 2009: The Inaugural Session of the Tuzla Summer Institute

The inaugural session of the Tuzla Summer Institute ran from July 6 to July 28, 2009, at the Behram-begova Medresa in Tuzla, Bosnia and Herzegovina. TSI 2009 had 151 participants: 61 high school students, 55 university students, 7 business professionals, and 28 teachers. TSI 2009 courses taught information technology, business skills, English as a Second Language, and English teaching methodology. The courses were taught by 9 teachers from the United States, Canada, Switzerland, and Great Britain. The average student-teacher ratio in the classroom was 12 students per teacher. The teachers were provided by Cornell University, the non-profit organization SEEDS, the software development company Mythicsoft, and the U.S. Embassy in Sarajevo. Further information on TSI’s faculty can be found in Appendix A.

In addition to courses, TSI 2009 included daily luncheons, guest speakers, and field trips. TSI 2009 was managed by two co-directors appointed by the Tuzla Muftiate and BILD. The courses, activities, field trips, lunches, all part of the Tuzla Summer Institute, were offered free of charge to all participants. Throughout the implementation of TSI 2009, there was on-
going monitoring and evaluation, including daily attendance records, surveys, interviews, and focus group discussions. The following presents the content and results of TSI 2009.

TSI 2009 participants

TSI 2009 participants were selected from two local universities, 4 high schools, local businesses, and cantonal public schools. TSI was promoted through speaking engagements at the above mentioned schools, posters, meetings with community leaders, and meetings with religious leaders from the Serbian Orthodox Church, the Catholic Church, and Tuzla’s Islamic Community. TSI 2009’s 151 participants, 9 teachers, management and staff formed a multiethnic community including different national, religious, and civic identities.

Sixty-one high school students were selected from two faith-based high schools: Catholic School Center “Sv. Franjo” and the Islamic Community’s high school Behram-begova Medresa in Tuzla – and two top-ranking secular public high schools: Gymnasium "Meša Selimović" and Gymnasium "Ismet Mujezinović." Fifty-five university students were selected from the two universities in the Tuzla Canton: Tuzla University and the American University in BiH. High school and university candidates submitted an application, a writing sample, and attended an individual interview conducted by TSI’s co-directors and lead project coordinator. Final selection was based upon three criteria: grades, writing ability, and the results of the interview.

Seven business professionals were selected from Tuzla Canton businesses and from Tuzla’s BIT Center.25 Candidates submitted a description of an existing business or a business proposal and attended an interview conducted by the co-directors and lead project coordinator. Final selection was based upon two criteria: the quality of the business proposal and the results of the interview. 18 teachers participating in the methodology courses were selected by the Pedagogical Institute of Tuzla Canton. 10 teachers participating in the ESL program were selected by the Behram-begova Medresa.

TSI 2009 curriculum

TSI 2009 offered six English as a Second Language courses, three information technology courses, one business course, and two pedagogy courses. In order to successfully complete a course and receive a certificate, a participant had to attend at least 80% of the classes and complete all assignments in a satisfactory manner according to the instructor’s discretion. Attendance rates are discussed in the monitoring and evaluation section of this report. Further information on the TSI 2009 curriculum, including brief course descriptions, can be found in Appendix B.

25 “Business Innovation and Technology Center” Reviewed on: January 17, 2010
< http://www.bit.ba/BITCenterTuzla/ENG/Home/index.htm >
**TSI extra-curricular activities**

TSI brought together participants for a number of extracurricular activities, including a daily luncheon and field trips. TSI’s CIPA faculty member was involved in the implementation of the program’s extra-curricular events, through handling logistical requirements and encouraging participants to attend. During luncheons, guest speakers spoke on a wide range of topics, such as: how to apply for scholarships to U.S. universities, overcoming adversity, and adjusting to new surroundings. The field trips were attended by faculty members, giving TSI participants an opportunity to practice speaking English in an informal environment. All extracurricular activities were designed such that they were appropriate for all participants of all cultural and/or religious backgrounds. TSI’s extracurricular activities gave participants an opportunity to interact, gain mutual understanding, and build friendships. Further information on TSI extra-curricular activities can be found in Appendix C.

**TSI monitoring and evaluation**

Monitoring and evaluation were ongoing throughout the duration of TSI 2009, including: daily attendance records, surveys, interviews, and focus group discussions. Feedback from participants indicate that the Tuzla Summer Institute achieved the goal of providing quality education and creating an environment that inspired participants and promoted mutual respect and friendship amongst people of different cultural backgrounds. TSI’s CIPA faculty member was actively involved in several aspects of the monitoring and evaluation, including: taking classroom attendance, administering surveys, recruiting student focus group members, and participating in faculty focus groups.

Surveys composed by the TSI faculty revealed that 97% of respondents would recommend TSI to a friend, 98% expressed a desire to attend TSI in 2010, 94% asserted that TSI enabled them to speak English more clearly, 93% were confident that they learned something new during their course, 97% noted that TSI representatives and teachers were respectful, 96% would recommend their teacher to their peers, and 100% asserted their teacher explained things clearly.

Attendance rates at TSI 2009 were extremely impressive. While the minimum attendance requirement for receiving a certificate was 80%, the institute-wide average attendance rate was 96.3%. The attendance rate for courses ranged from 87.9% (ESL Teachers of Other Subjects) to 99.5% (Internet Research Techniques). In focus groups and written comments, TSI participants indicated they would welcome TSI classes being longer.

There were two surveys of participants, one evaluating courses and the other the overall TSI program. Each survey was an anonymous questionnaire consisting of modified Likert-scale items that asked respondents the degree to which they agreed or disagreed with a given
Participants were asked to fill out a questionnaire for each course they took as well as one regarding their overall satisfaction with the TSI program. With both questionnaires, respondents were invited to write comments regarding either their course or TSI.

The highest degree of disagreement in both surveys regarded the length of classes (13%) and the length of TSI (6%). From interviews, written comments, and focus group discussions, there were no complaints that TSI or TSI courses were too long. Rather, the complaints regarding duration all indicated a wish for TSI and TSI classes to be longer. When preparing for the inaugural session of TSI, the organizers were concerned that participants would lose interest in TSI as the hot days of their summer vacation passed. However, the inaugural session showed that there is ample enduring interest in a summer educational program such as TSI and that participants are willing and eager to attend an academic program as long as participants feel they are benefiting from the courses and they feel welcome and respected. Accordingly, the preparations for the 2010 implementation of TSI include longer classes and more challenging academic content.

Along with increased academic content teaching practical skills, TSI 2010 will have additional extra-curricular activities. The feedback from participants showed that TSI became a community unto itself with mutual understanding, mutual appreciation, and new friendships among people of different cultural backgrounds. After TSI 2009, participants continued meeting in a number of ways. TSI teachers and participants established a Facebook page to stay in contact with each other, which is co-managed by a CIPA fellow. TSI volunteers who helped implement TSI 2009 meet for coffee at least once per month to enjoy their friendships and offer their time if needed in preparation for TSI 2010. The entrepreneurs from the business and entrepreneurship course have established an online, monthly newsletter, and continue to meet in-person each month. To build upon the goodwill generated by TSI’s daily academic and luncheon program, TSI 2010 will have more evening gatherings and field trips each week, and after TSI 2010, there will be a continuing monthly format for participants to build upon the professional and personal relationships created through TSI.

**Going Forward**

Cornell University continues to demonstrate its commitment to the Tuzla Summer Institute. From September 2009 to May 2010, CIPA fellows and Cornell undergrads met weekly with TSI Director Christopher Bragdon to plan course content for TSI 2010. Cornell continues to provide TSI valuable exposure to potential interns, partners and funding through articles in the CIPA newsletter, roundtable discussions and various promotional activities. Furthermore, CIPA is sending a fellow to Tuzla this summer to teach a workshop on Microsoft Excel and assist in day-to-day operational tasks.
This continuing relationship is consistent with Cornell President David Skorton’s vision to make Cornell the “land-grant university to the world.” An integral component of that vision is outreach and service work, as Cornell strives not only to be a premier location for the world’s best and brightest students and faculty, but also a reliable partner in initiatives that improve lives. Cornell’s involvement with the Tuzla Summer Institute, an initiative that focuses on local-level engagement, empowerment and mutual understanding, is a clear demonstration of its commitment to fulfilling this ambitious international role.

**Appendix A: TSI Faculty**

TSI 2009’s instructors were provided by:

- The Cornell Institute for Public Affairs (CIPA) - Cornell University (USA)
- The US Embassy in Sarajevo, BiH
- The non-profit organization SEEDS – South East Europe Development Solutions (USA)
- The software development company Mythicsoft (Great Britain)

The United States Embassy provided three ESL instructors. SEEDS provided 4 instructors in ESL, information technology, and business. Cornell University provided an ESL instructor. Mythicsoft provided a software programming instructor.

**Appendix B: TSI Course Curriculum**

*English as a Second Language*

The TSI 2009 curriculum included four intermediate level thematic ESL courses that improved speaking, listening, reading, and writing skills while engaging students in meaningful discourse addressing a specific topic. The thematic ESL courses were taught by certified ESL teachers provided by the US Embassy. A total of 60 high school students attended these four courses (15 students per course). Each course consisted of 16 one hour classes. The four courses were:

- ESL College Preparation

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26 Franklin Crawford, “‘We Benefit from the Concept of Being Good Neighbors and Partners all Over the World’: President Skorton Discusses Cornell’s International Role.” *Chronicle Online*, 14 Feb 2007.
• ESL Critical Thinking

• ESL Comparative Study of Cultures

• ESL American Culture

All 60 students successfully completed the course. The average attendance rate of participants attending the thematic ESL courses was 96.4%.

**ESL – Practice with English Idioms.** This intermediate level conversational ESL course taught commonly used and effective idioms. The course was attended by 15 university students. The course was taught by two instructors provided by Cornell University and the US-based non-profit organization SEEDS. The course consisted of twelve 90 minute classes. All 15 students successfully completed the course. The average attendance rate of participants attending the course was 90%

**ESL – Teachers of Other Subjects.** This beginner level ESL course was attended by high school teachers as part of a long term project by the Behram-begova Medresa (BBM) to have an entire faculty capable of teaching all courses in English. The course had 10 participants, all teachers at BBM. The course was taught by certified ESL instructors provided by the US Embassy and an instructor from Cornell University. The course consisted of fifteen 90 minute classes. All 10 participants successfully completed the course. The average attendance rate of participants attending the course was 87.9%.

**Business**

**Business – Introduction to Entrepreneurship.** Along with marketable skills such as English and information technology, the TSI curriculum included a business course designed to equip entrepreneurs with the necessary tools and skills to start and run a business. The course covered some essentials in management, strategy, and marketing while helping participants develop their business plan. The seminar format included the wide use of group work, case studies, exercises, and classroom discussion. The course was taught by Sebastian Huber, a lecturer at the University of Applied Science Northwestern Switzerland in the International Business Management graduate program and a lecturer at the Private Business University Zurich in the Management and Executive MBA post-graduate program. The course was attended by 7 business professionals from the Tuzla Canton. The course consisted of 22.5 hours of instruction. All 7 participants successfully completed the course. The average attendance rate of participants attending the course was 96.8%. Participants have continued to build upon the lessons and relationships from the course through monthly meetings and a newsletter.
**Information Technology**

**Computer - C# and ASP.NET.** This software programming course was taught by David Vest, the CEO of the British software development company Mythicsoft. The course had the following description: “a hands-on course for programmers wanting to build web sites using C# and ASP.NET. ASP.NET is a proven platform for delivering secure scalable web sites and is used to run some of the world’s most highly trafficked web sites, including Microsoft’s own. The ‘out-of-the-box’ functionality provides an easy way to quickly build a web site and the power of .NET provides the foundation to add powerful features as your web site grows.” The course consisted of 12.5 hours of instruction at the Behram-begova Medresa’s computer lab. The course was attended by 8 university students. All eight participants successfully completed the course. The average attendance rate of participants attending the course was 92.5%.

**Computer – Internet-based Research Techniques.** This course was taught by retired Communications professor Dr. John Rosenbaum from Ithaca College. The course had the following description: “In this course, you will learn how to search the Internet, determine the credibility of websites, participate in online communities, and conduct interviews. The classes will be in the seminar format so you can ask questions, participate in discussions, and practice your English language skills. You also will have opportunities to complete practical hands-on assignments.” The course consisted of four 90 minutes classes. There were four sections of the course. The class sizes ranged from 9 to 15 students with a total of 50 high school and university students attending the course. 49 students successfully completed the course. The average attendance rate of participants attending the course was 99.5%.

**Computer – Microsoft Word.** This basic IT course was taught by Antonia Rosenbaum from the non-profit organization SEEDS. The course had the following description: “Expand your knowledge of Microsoft Word. Can you create and format a table in Microsoft Word? Do you know how to add toolbars to your desktop? Can you add picture bullets to your Word library? Insert clip art or word art? Use shortcuts? Type an outline automatically? Create columns? Attend this workshop and get a certificate from the Tuzla Summer Institute that will show you are proficient in Microsoft Word.” The course consisted of four 90 minute classes. There were four sections of the course. The class sizes ranged from 6 to 13 students with a total of 37 high school and university students attending the course. 36 students successfully completed the course. The average attendance rate of participants attending the course was 99.3%.

**English teaching methodology**

**Pedagogy – Teaching Methodology Workshop.** This course introduced western approaches to language teaching such as the Communicative approach with the goal of
improved language fluency and accuracy among learners. The course offered English teachers ideas, activities, and strategies for developing learners’ English communication skills in the classroom. The course gave each participant the opportunity to practice incorporating the diverse teaching methods, techniques, and strategies available into their own classrooms. The course was taught by Dr. Lisa Harshbarger provided by the US Embassy. 18 English teachers from Tuzla Canton public schools attended the course. The course consisted of fifteen 90 minute classes. All 18 participants successfully completed the course. The average attendance rate of participants attending the course was 97.4%.

**Pedagogy – Teaching Methodology Seminar.** This course was designed for university students who planned to become English language teachers. The seminar offered future teachers an understanding of the diverse teaching methods, techniques, and strategies available. During the seminar, each participant created a small portfolio of materials, activities, and ideas to be used in their own language classrooms. The course was taught by two certified ESL teachers provided by the US Embassy. 22 university students attended the course. The course consisted of eight 90 minute classes. All 22 participants successfully completed the course. The average attendance rate of participants attending the course was 93.5%.

**Appendix C: Extra-Curricular Activities**

**Daily luncheons**

All TSI participants were welcome to attend lunch at the Behram-begova Medresa’s dining facility. On average, approximately 75 participants and 10 teachers/management staff attended the luncheons each day. The luncheons provided approximately 45 minutes for participants and teachers to converse. At the end of the luncheon, there was a guest speaker who spoke for about 15 minutes followed by Q&A. Each faculty member was a guest speaker. Representatives from the local university and the US Embassy were guest speakers. The topics were designed to inform participants about opportunities available to them to further their studies or careers, to build understanding and appreciation between people of different cultures, and/or tell personal stories that would help build optimism and determination among participants to pursue their life goals.

**Field trips**

TSI offered field trips for high school and university student participants. The field trips visited historic landmarks and scenic areas of northeastern Bosnia. The field trips gave participants the opportunity to interact with each other, teachers, and TSI staff, practice English in an informal setting and learn about their country’s history. For example, on July
11, TSI provided a 70 seat bus for taking TSI participants to the Srebrenica Memorial service commemorating the 1995 massacre of approximately 8000 Bosnian Muslim men and boys. The last field trip was to a village on the Drina river during which participants took part in a photography contest lead by the Tuzla Photo Club.