

UNIVERSITY OF CINCINNATI

Date: 14-Aug-2008

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hereby submit this original work as part of the requirements for the degree of:

Master of Community Planning

in Community Planning

It is entitled:

An Assessment of Sphere Humanitarian Standards for Shelter and Settlement

Planning in Kenya's Dadaab Refugee Camps

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**An Assessment of Sphere Humanitarian Standards for Shelter and Settlement Planning
in Kenya's Dadaab Refugee Camps**

A thesis submitted to the

Graduate School
Of the University of Cincinnati

In partial fulfillment of the
requirements for the degree of

MASTER OF COMMUNITY PLANNING

in the School of Planning
of the College of Design, Art, Architecture and Planning

2010

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B.F.A. Art Academy of Cincinnati May 2005

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Abstract

This thesis examines the viability of Sphere Humanitarian Shelter Standards within the construction of Ifo II, a new refugee camp in the Dadaab refugee camps of northeastern Kenya in 2007. One of the largest refugee settlements in the world, the Dadaab camps contain over 300,000 refugees and have been in place since 1991. As the Sphere Standards have been designed for use within an emergency crisis, this thesis investigates their applicability in the protracted settlement of Dadaab by utilizing a recent shelter initiative as a case study.

In 2007, the Norwegian Refugee Council (NRC) initiated a new housing and camp expansion project in Dadaab to accommodate future population growth and to overcome many of the problems of the earlier camps. Committed to sustainable solutions for displaced populations, the agency relied upon the Sphere Standards as a means to provide culturally, environmentally, and economically appropriate housing and infrastructure planning. To determine if Sphere Standards meet the needs of the refugee populations, three months of qualitative research were undertaken within the Dadaab camps in 2007, with additional follow-up research in 2009. Field research focused on the socioeconomic roles of informal housing consolidation strategies in the camps, pre-Sphere agency-provided housing, and the new NRC camp expansion.

Field research revealed that Sphere does not provide the tools necessary to contend with the matured socioeconomic dynamics of a protracted settlement. By expanding the standards to include a stronger recognition of the conditions which frame the lives of those in protracted displacement such as national policies, regional conflict, and local market activity, Sphere will provide humanitarian agencies with the means to provide displaced populations with better shelter and settlement solutions.

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Acknowledgements

I would like to sincerely thank Dr. Johanna Looye for her constant guidance and dedication throughout the entire research and thesis development process. I also would like to thank Dr. Adrian Parr and Dr. David Edelman for their ongoing support during my graduate studies.

I want to extend special thanks to the administration and staff of the Norwegian Refugee Council, CARE, and UNHCR for providing the necessary resources to conduct this research. Additional gratitude goes to Ana Lubinkovic of Essex University for helping get this project in motion. Lastly I thank all the volunteers and participants in Dadaab who contributed to the research process.

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Chapter 1: Introduction

1.1 Refugee Camps

Refugee camps are not an ideal solution to managing large-scale refugee flows. Yet host governments frequently construct camps as a means to mitigate the perceived socioeconomic threats of large-scale migration. Additionally, camps are often constructed by humanitarian agencies to distribute aid efficiently and to minimize associated risks, such as communicable diseases or social tensions. Although refugee status is a product of the 20th century,¹ temporary camps are a longstanding technology for the management of displaced persons. The modern refugee camp has its origins within the mass displacement camps that immediately followed WWII, as a military solution to an international security crisis. While reconstructed states grappled with the aid and redistribution of millions of refugees, temporary settlements were converted from military prison camps (Malkki, 1995). Founded upon the same systems of physical planning and management as the WWII predecessors, modern refugee camps are also usually located within conflict zones, harsh environments, and adjacent to unstable international borders (Nyers, 2006).

Signatory states of the 1951 United Nations Convention on the Status of Refugees are bound by international law to protect refugees from persecution by the country of origin. Some host governments establish refugee camps as a mechanism to provide protection while others choose

¹ The 1951 United Convention on the Status of Refugees demands that a displaced person has protection from *nonrefoulement*, return to the country of persecution, upon legal recognition of refugee status. To acquire refugee status within the host country of asylum, the person must prove he has suffered individual persecution within his state due to religious belief, political affiliation, or as a member of a socially cognizable group. The 1951 Convention does not provide refugee protection due to general war or civil strife, although such protection can be acquired under the 1969 Refugee Convention by the Organization of the African Union.

to construct camps to enforce the reservations of their signature, such as denial to the right to employment or mobility.² In this manner, host governments reduce the incentives for permanent settlement and encourage widespread refugee repatriation.

With no legal means for personal or socioeconomic advancement, camps quickly transform into unnatural environments subject to social disarticulation, the rapid decay of longstanding social and community institutions necessary for socioeconomic production (Cernea, 1996; Crisp, 2000). Despite the temporary intentions of such camps, they are often in place for decades as a consequence of political impasse between the country of origin and the hosting state (Harrell-Bond, 2002; Loescher, 2005). Evolving into semi-permanent, large-scale human settlements, protracted camps can easily resemble a new urban phenomenon of city-camps (Agier, 2002). However, urban and community institutions within these camps cannot become vehicles for social development and change due to restrictive national policies. Although they contain complex social, cultural, and economic networks, camps remain forever constricted to a liminal identity, permanently suspended between two states of being, as these networks will never have the opportunity to fully mature (Malkki, 2002; Turner, 1970).

While refugee camps may act as mechanisms of restrictive government policy, camps are also important for aid distribution by humanitarian agencies. Their strict spatial organization promotes the quick analysis of logistical bottlenecks and provides the necessary physical infrastructure for the distribution of food rations, building materials, or other forms of assistance. Within camps, aid is freely distributed among populations based on need, yet the neutral distribution of humanitarian aid may unintentionally assist regional militant groups and

² Signatory states of UN Conventions may place reservations upon their signature, wherein aspects of the Convention considered outside state interest are no longer legally obligatory.

exacerbate the conflict (Lischer, 2005). Yet within the context of New War, wherein contemporary conflict takes place between the state and internal non-state actors who share equivalent logistical capacities, the neutrality of the humanitarian space is critical to maintain the security of the aid workers and resident refugees (Davis, 2003; Loescher and Milner, 2005).

Unfortunately humanitarian aid is often insufficient to satisfy the needs of populations who are denied the right to employment, movement, education, health care or services essential for a dignified life. Informal economies emerge as a natural result of competition between refugees and host communities over scarce natural and economic resources. The temporary nature of camp life facilitates the increased misallocation of limited environmental and economic resources among refugee populations, as the demands for immediate survival tend to outweigh long-term planning interests, and opportunities for long-term economic growth become hindered (Martin, 2005).

When camps become entrenched for decades, regional instability and limited resources determine the nature of economic opportunity. The intense competition for resources in close proximity to regional military conflict can compel refugees toward desperate measures for self-advancement and security, further destabilizing the camp and its environs. The commerce of illegal goods such as electronics, precious minerals, drugs, arms and money wiring services are central to a large class of refugee entrepreneurs (Juma and Kagwanja, 2003). This expanding network of monetary assets can further aid the expansion of militant and terrorist networks that exploit porous borders and hide beneath the neutrality of humanitarian aid, advancing the disintegration of regional stability. Yet if aid is reduced, the resource competition and lack of viable economic opportunities will quickly perpetuate the dilemma as youth are compelled toward militarization (Bookman 2000; Lischer, 2005).

The benefits of humanitarian aid and development initiatives within refugee camps far outweigh the potential risks. Humanitarian aid may reduce environmental degradation and can provide regional economic benefits. Food aid will frequently flow over into local markets, while aid agencies routinely rely upon individuals and businesses within the host community for logistical support (Jacobsen, 2002). Although it is a common fear within development programs that project successes will be abandoned by refugees when they repatriate to their homeland, the host community will become the natural recipient of housing, physical infrastructure and social programming (McDougal, 2007; Jacobsen, 2002). Yet to maximize the development benefits of humanitarian aid, refugee expert Roger Zetter argues that refugee and host communities must have shared access to secure conditions and viable economic opportunities (Zetter, 1995). In addition, Kaiser claims that successful aid and development programs for refugees need to address the inherent confines of refugee status and integrate the demands of refugee protection (Kaiser, 2005).

1.2 Refugee Shelter

Shelter is a primary need among refugee populations. Housing provides protection from the weather, as well as emotional and physical security. It likewise functions as a cultural asset and economic multiplier (Zetter, 1995). In the immediate state of crisis, when shelter assistance is often little more than the distribution of plastic tarpaulins to needy families, refugees will immediately set about consolidating and upgrading their makeshift shelters to improve living conditions and will continue to do so for many years. Although emergency conditions demand only basic shelter provision, protracted

settlements require plans for improved long-term housing within the limitations of government policy.

Shelter is arguably the most important form of humanitarian assistance yet many humanitarian agencies lack shelter specialists (Saunders, 2004). Governments frequently have defined sectors concerning planning, disaster coordination, housing, and resettlement; while many aid agencies at best have a project manager with a background in shelter. As a result, many housing assistance programs frequently fail to fully utilize the dynamic properties of housing. This is unsurprising, considering the distinct lack of research into coping strategies and capacities of disaster-affected populations (Shelterproject.org, 2003). While the processes of housing consolidation within refugee settlements is similar to those of other impoverished or marginalized populations, the primary focus of shelter and settlement planning has been limited to the addressing the role of in-country technologies and the local procurement of labor and materials (Zetter, 1995; Saunders, 2004). Thus far, the role of shelter as a “production platform” for livelihood opportunities has not been explored within refugee camps (Saunders, 2004).

In contrast, the use of self-help housing as a primary option for urban, low-income, and migrant populations throughout the developing world has remained an area of active research. The incremental construction of housing has been connected to the development of home-based enterprise and settlement consolidation (Gough and Kellet, 2001). To derive income for the investment and consolidation of housing, informal strategies are often pursued that have a domestic nature, such as day care services or auto repair. Other strategies such as selling goods at the market may begin in the home where items are

prepared for sale and distribution elsewhere. Naturally, the household structure is a significant factor within the operation of home-based enterprise (Gough and Kellet, 2001).

As refugee camps resemble many of the urban settlements and economies of developing nations, some critics argue that quality housing development schemes within refugee camps are not possible due to the constant threat of repatriation (McDougal, 2007). Yet this myopic argument fails to recognize the complex systems of economic interdependence that quickly develop throughout camps to offset the limitations of humanitarian aid (Bookman, 2002). Although politically marginalized, refugees can introduce important assets into the host country such as remittance flows, special skills or material goods (Horst, 2006). The remittance flows additionally facilitate the development of local markets and communication services, such as telephone and banking services (Jacobsen, 2002). The best practices advocate the inclusion of such activities within the camp planning process because the additional infrastructure will develop as a consequence of local enterprise (Chalinder, 1998). Since humanitarian planning has thus far been fractional and project driven, with a poor understanding of the economic role of housing, Sphere has been welcomed by shelter specialists as a comprehensive framework to begin addressing these problems (Saunders, 2004).

1.3 Chapter Summary

The construction of a refugee camp is not an ideal method for the management of large-scale human displacement. The challenges of camp life pose great harm to camp residents and to displaced communities by breaking down social, cultural, and economic

networks over time. Yet as camps remain a consistent strategy by host governments, these camps are often in place for decades and the role of humanitarian assistance assumes increased significance to offset the negative repercussions. While humanitarian assistance has proven effective to raise the quality of life for refugees, there remain many opportunities for improvement, in particular in the shelter sector.

Academic research has shown that household shelter consolidation is connected to the livelihood strategies available to families and to local market development. However among most humanitarian aid agencies, the study of shelter has been limited to an architectural and technical scope, with only a casual recognition of the broader socio-cultural and economic implications. Consequently there is a clear demand to explore the dynamics of shelter within refugee camps from the perspective of the humanitarian regime.

This demand proposes the necessity to reevaluate the tools presently available to humanitarian agencies that undertake refugee camp shelter initiatives, such as the Sphere Humanitarian Charter and Minimum Standards in Shelter and Settlement. By reviewing the current standards and strategies for shelter aid, and evaluating their implementation within a protracted refugee camp through the lens of socioeconomic and cultural accessibility, there is an opportunity to discern strategies to improve the tools available to humanitarian experts. This process of researching and analyzing the Sphere standards will ultimately contribute to the construction of locally appropriate shelter solutions by humanitarian agencies within protracted refugee camps in the future.

Chapter 2: The Sphere Humanitarian Charter

2.1 The Basis of Sphere

The Sphere Humanitarian Charter is not the first attempt by humanitarian agencies to formulate a body of guidelines for disaster relief and emergency assistance. The demand for standards has been a mainstay within the aid industry since the founding of the International Committee of the Red Cross in 1859 (Walker, 2004). While it was common for individual agencies to develop independent standards throughout the 1980s, such as the UNHCR Emergency Handbook (UNHCR, 1984), the atrocities of the 1994 Rwandan genocide exposed the shortcomings of the humanitarian regime. This downfall prompted an international collaborative effort to coordinate standards and best practices (Griekspoor, 2001).

The Sphere Charter contains technical standards for operations, such as food delivery and shelter construction as well as a Humanitarian Charter to frame these actions. The Charter's Minimum Standards contains three primary ideas: the human essentials to sustain life with dignity, the universality of these standards as conceived by universal human rights, and the absolute recognition that all individuals have a right to adequate humanitarian assistance. Although the entire Sphere project is founded on the relationship between the responsibility of universal human rights and direct implementation within the field, agencies are frequently criticized for relying on the technical guidelines without understanding the protection and rights principles identified within the Humanitarian Charter (Darcy, 2004). Nonetheless, while the aid process is fractional and frequently

project oriented, Sphere has at the very least provided an important comprehensive framework (Saunders, 2004).

2.2 The Sphere Minimum Standards in Shelter and Settlement

The Sphere Project recognizes that all people have the right to adequate housing. This includes the right to live in security, peace and dignity with the security of tenure. Key aspects of this right include the availability of services, facilities, materials, infrastructure, affordability, accessibility, and cultural appropriateness. Proper shelter planning is considered integral to the interests of human dignity and to “sustain family and community life as far as possible within difficult circumstances” (Sphere, 2004). It further advocates that shelter planning should attempt to reduce adverse environmental impacts, build upon the steps already taken by coping households, integrate women and community voices, and ensure the equitable access to necessary materials. To accomplish these priorities, Sphere advocates six bodies of focus: strategic planning, physical planning, covered living space, design, construction, and environmental impact (Sphere, 2004).

2.2.1 Minimum Shelter and Settlement Standard 1: Strategic Planning

The Sphere minimum standards for strategic planning instruct humanitarian actors to provide the opportunity for displaced populations to return to their place of origin. Repatriation presents the greatest social and economic advantage to the population and is

considered the ideal durable solution. This may require additional support such as through the provision of new housing or the repair of existing shelter and infrastructure.

When conflict or fear of persecution prevents the return of displaced communities, the next objective is to provide housing with local families and communities who share cultural or religious ties. In the event that such hosting is unavailable, families may be resettled to other communities as long as areas of potential conflict are avoided wherever possible. Additional technical assistance may be required via the expansion of infrastructure, separate shelter facilities, or extended dwellings.

If it is not possible for the displaced population to acquire secure housing within the homes of a host community, a new collective settlement may be constructed to conserve limited resources and consolidate the population for improved security within hostile conditions. The provision of mass shelter in large buildings may provide rapid relief within cold regions or when insufficient materials exist for individual shelters. Additional care must be taken to ensure that the new settlement does not become a target for attack or pose a security risk to the surrounding populations.

To avoid further complications from targeted violence, natural disasters, or economic disparity, a risk and vulnerability assessment must be undertaken. This assessment examines the particular social and economic vulnerabilities of differing social groups within the affected and host communities. The assessment helps ensure dwellings and settlements are located a safe distance from external threats, natural disasters, flooding, and are minimally prone to disease. Within the assessment process, agencies should also identify and remove hazardous materials and assure that all shelters and

settlements have a structural analysis to prevent further community danger. Additionally, a review of land use and property ownership should be undertaken, to the extent possible, to respect local rights of ownership and inheritance.

The assessments are to be incorporated within the fundamental planning of the new settlement. New settlement planning and construction should likewise attempt to integrate traditional livelihood strategies as well as logistical corridors, such as roadways, airfields, and shipping harbors. Whenever possible, it is best to also integrate any pre-existing facilities and infrastructure.

2.2.2 Minimum Shelter and Settlement Standard 2: Physical Planning

Local physical planning practices are to be used wherever possible to enable the safe and secure access to housing and essential services or facilities. Existing social practices should guide the allocation of space within collective settlements and temporary camps. Integrated living areas are to be made accessible to vulnerable populations such as unaccompanied children. For dispersed settlements, the principles of cluster planning are best applied to groups living within close proximity or within a defined geographical area, as small dense settlements will have a reduced impact upon the natural environment and will minimize local competition for scarce resources.

Settlements require essential services such as clean water, health care, and community social spaces, and spaces designated for handling the dead. In addition, administrative facilities are imperative to smoothly manage and develop projects. These

facilities should include central offices, warehouses, quarantine areas and staff accommodation. Ample space ought to be provided for all planned facilities to support the evolutionary growth of the settlement in the form of roads, footpaths, sanitation, firebreaks, water storage, markets, and private gardens.

Proper physical planning will include a thorough analysis of the topography and ground conditions. The lowest areas in the settlement should not be less than three meters above the estimated water level in the rainy season, while drainage channels may be required in the event of flooding. The ground conditions will likewise inform the construction of sanitation and transportation infrastructure. The settlement should never be constructed near low-lying areas or still water that may support the breeding of pests.

2.2.3 Minimum Shelter and Settlement Standard 3: Covered Living Space

The provision of shelter provides an unparalleled degree of post-disaster psychosocial support. To enhance these support mechanisms, it is imperative constructed shelters provide sufficient space for dignified living by providing protection from the weather, security, and privacy, but they must also support livelihood and essential household activities. It should be appropriate for the local climate, with higher ceilings in hot climates and lower ceilings in cold regions. The shelter can also provide much needed shade in hot climates.

Existing local cultural practices for sleeping and gender use patterns must be incorporated within shelters. This will include specified space for cooking, dressing, storage, washing, and eating. This further includes designated space for the care of children and the elderly.

2.2.4 Minimum Shelter and Settlement Standard 4: Design

The design of the shelters and the settlement should provide thermal comfort, air circulation, physical protection, and ensure the dignity, health, and well-being of the population. To achieve this goal, the design process should integrate local initiatives and community members, and the use of local materials, while attempting to handle the demands of the climate, water supply, disease control, and management.

It is best if the design process involves the affected households to the maximum extent possible in determining the final form and materials used, with priority given to those who will be living within the shelters. Local practices and community input will further inform the orientation of the individual shelter or covered area, the sizing of the layout and space provided the positioning of the door and window openings, lighting and ventilation, and internal subdivisions. Pre-existing housing forms in the region will also inform aid workers of the respective needs of the community.

2.2.5 Minimum Shelter and Settlement Standard 5: Construction

The construction process should be in accordance with safe building practices and attempt to maximize local opportunities to take place within the shelter construction processes. Livelihood support ought to be promoted through the use of local materials and skills unless this will have an adverse impact upon the local economy or environment. The reuse of salvaged materials or secondary materials is always encouraged, although the ownership rights to such material should be identified and agreed upon before any action is taken.

The establishment of skills and training programs should help maximize the availability of opportunities for community participation. For those who are unable to undertake construction tasks, additional positions can be created to accommodate the process such as childcare, administrative support, and supervisory activities. The provision of volunteer community labor such as food-for-work initiatives may reduce opportunities for the exploitation of vulnerable populations who cannot pursue construction activities alone, including female-headed households.

The construction standards should be upheld in coordination with local authorities to ensure key safety and performance requirements are met. In locations where local or national building codes do not exist – or have not been enforced – incremental compliance should be determined and pursued. Most importantly, the new construction must be capable of withstanding local environmental conditions and future environmental risks. The form and construction of materials used ought to enable individual households to

adapt or upgrade the shelter to meet long-term needs with the available financial resources, tools, and materials.

2.2.6 Minimum Shelter and Settlement Standard 6: Environmental Impact

Within environments that contain a limited supply of the natural resources required to sustain human habitation, additional efforts must be exerted to contain the demands placed upon the environment. This may include the provision of external supplies such as fuel, managed options for livestock grazing, and agricultural production. In areas where the natural environment can meet the demand of increased population growth, the population should be dispersed into clustered settlements to minimize any threat of future damage. It is likewise important to identify ownership, access, and regeneration rates of resources within the early stages of the planning process.

A comprehensive environmental impact analysis will facilitate land use and shelter planning. Typical land usage, surface draining patterns, and the distribution of existing vegetation should be assessed to determine the impact of any required ground clearance. Shelter solutions, agricultural and grazing land are ideally planned to retain existing trees and maintain soil stabilization, while additionally providing opportunities for shade and protection from the climate. Roads and pathways should likewise take advantage of the natural land contours to minimize erosion and flooding. When this is not feasible, excavated drainage culvert, pipe drains under roadways, or planted earth banks may minimize unwanted water flow.

Ultimately, the natural regeneration of the landscape around the shelters and throughout the landscape should be enhanced through appropriate rehabilitation measures. The eventual discontinuation of the settlement must be handled in a manner to ensure the appropriate removal of any waste or material that may have an adverse affect on the environment.

2.3 Chapter Summary

The Sphere Charter for Humanitarian Standards provides humanitarian actors with a necessary framework for inter-agency coordination and technical operations. As the standards are rooted in international law, best practices, and human rights theory, the standards make a concerted effort to promote human rights values through a broad set of tools for humanitarian intervention. The standards streamline aid agency operations within the field, and in theory, provide a higher quality product to recipient populations. Unfortunately these tools also pose an innate risk that agencies may overly rely upon the minimum standards and provide only a minimum of quality of assistance rather than long-term solutions.

The strengths and weaknesses of the Sphere standards are imbedded within the organization of the standards according to sector interests. By dividing humanitarian assistance into categories such as health, sanitation, and shelter, agencies are able to focus their resources to maximize their own capacities. However there is an innate risk that sector-oriented programming does not build upon the linkages between sectors and therefore creates wide gaps in humanitarian assistance.

The Sphere Minimum Standards for Shelter and Settlement are organized into six specific categories: strategic planning, physical planning, covered living space, design, construction, and environmental impact. While the Sphere standards strive to provide flexibility to accommodate the unique realities of each crisis, these six categories do not address the relationship of shelter to the other capacities in which shelter and land use planning may impact populations, such as within local informal economies and as a tool for conflict mitigation. The Sphere shelter standards do, however, illuminate the array of concerns that require attention within a humanitarian crisis such as land ownership, access to transit and shipping corridors, the clearance of unexploded ordinance, the construction of socio-culturally appropriate housing and the creation of viable public spaces. The scale of issues discussed makes it unclear if these standards are specifically intended for individuals with technical training within shelter and settlement planning, or with the general practitioner in mind, however it is clear that these standards provide a foundation for communication between humanitarian agencies as they work to provide vulnerable populations with shelter assistance.

Chapter 3: The Dadaab Refugee Camps of Kenya

3.1 Kenya Refugee Policy

As a signatory to the *1951 United Convention on the Status of Refugees*, the Kenyan government is bound to protect asylum seekers from personal persecution. As a signatory to the *Organization of the African Union's (OAU) 1969 Refugee Convention*, Kenya is required to provide protection to refugees from persecution rooted in civil conflict.³ However Kenya has added multiple reservations to its signature of the 1951 Convention, allowing it to restrict refugee access to some of the rights outlined in the Convention such as citizenship pathways, mobility, employment, state education, state social security, and access to health care. Furthermore, as a sovereign state, Kenya is only required to implement the demands of the 1951 and 1969 Conventions according to its good will and capacity.

While UNHCR reports over 340,000 registered refugees living within Kenya, only rough estimations can describe total number of forced migrants (UNHCR, 2010). Estimates in Nairobi suggest that only one third of the resident forced migrant population has acquired official refugee status (Human Rights Watch, 2002). According to the 1973 Kenya *Aliens Restriction Act*, all registered refugees are required to live within zoned refugee camps. Registered refugees who choose to live outside of the camps remain protected from *refoulement*, the unlawful return to their origin country of persecution, yet they live in violation of state laws and may be incarcerated if discovered by the police.

³ Protection from persecution rooted in civil conflict is not the same as protection from general conflict, and the determination of refugee status under *OAU 1969 Refugee Convention* is open to interpretation by host governments. Consequently, not all Somalis seeking refugee protection in Kenya will acquire refugee protection under the conditions of either convention.

3.2 The Dadaab Camps

As a consequence of the 1973 *Aliens Restriction Act* and the later 2006 *Refugee Act*, which established the Minister of Refugee Affairs to reconstitute the authority of the state over UNHCR and NGO activities, the majority of refugees within Kenya are contained within the strictly defined encampments of Dadaab and Kakuma. These camps are located in threatening environments with extreme heat, poisonous snakes and scorpions, and fluctuating levels of security. The hostile environments further limit the capabilities of aid agencies.

The town of Dadaab is located in the Garissa District in Kenya's North Eastern Province (Figure 3-1). It is situated approximately 500 km from Nairobi and 80 km from the Kenyan-Somali border. Since 1991-1992 there have been three refugee camps located in Dadaab: Ifo, Hagadera, and Dagahaley (Figures 3-2, 3-3, and 3-4). The camps cover a total area of 50 square km and are within an 18 km radius of the Dadaab town. Providing asylum to nearly 300,000 refugees the population is 97.5% Somali (Human Rights Watch, 2009). Nearly 90% of the Somalis come from the Juba River valley and Gredo regions of Somalia, while 10% originate from Kismayo, Mogadishu and Bardera (Camiera, 2007). All of the camps suffer from poor planning, as the low elevation of the settlements has resulted in the re-displacement of hundreds of families from aggressive flooding. As the camps were established to only accommodate a maximum of 90,000 refugees (Human Rights Watch, 2009), the continual population growth and limited foresight has necessitated ongoing adjustments to camp infrastructure, management, and policy.

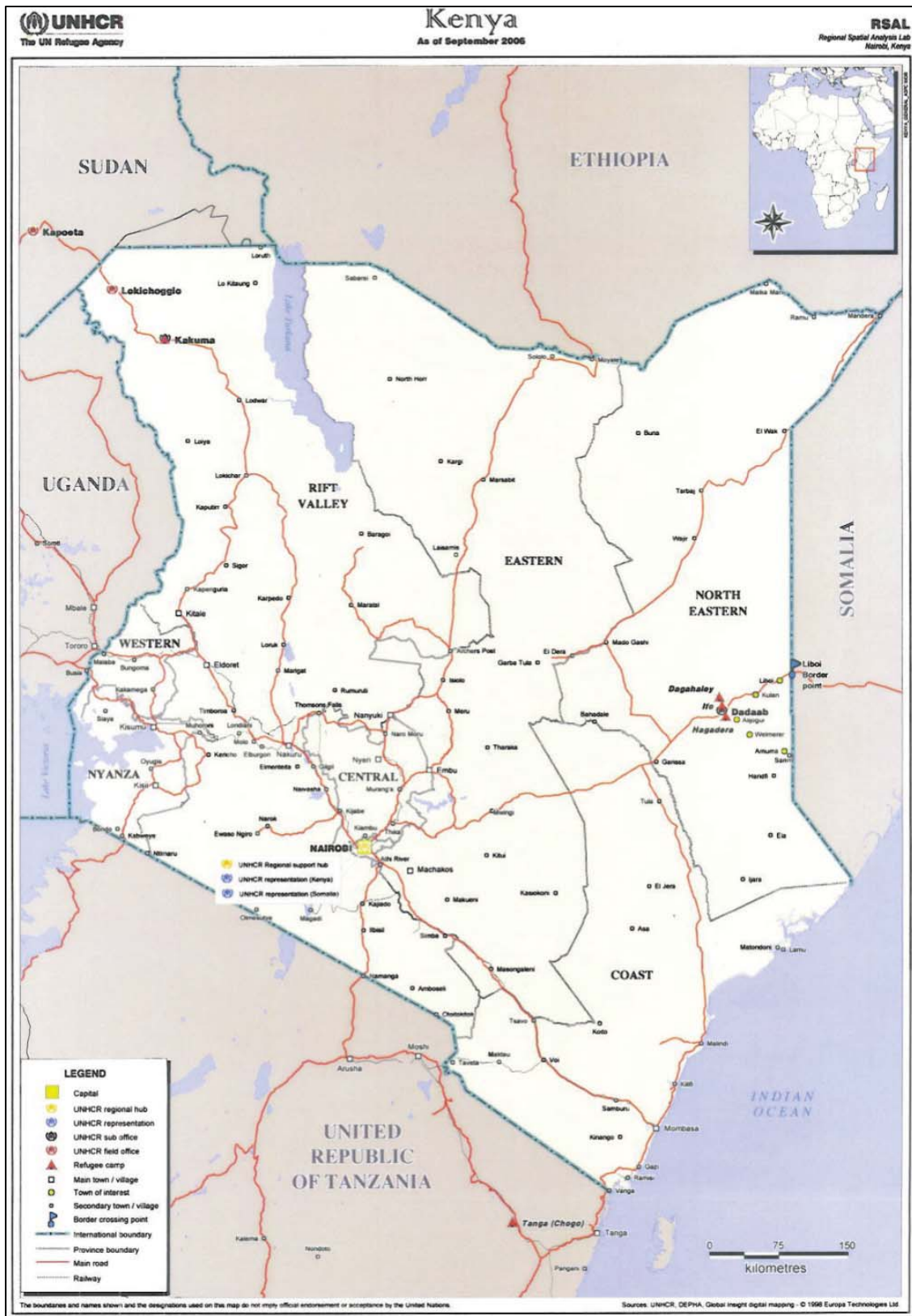


Figure 3-1 Location of Dadaab

Source: UNHCR, 2006

IFO 1& 2- CAMP OVERVIEW

As of December 2006

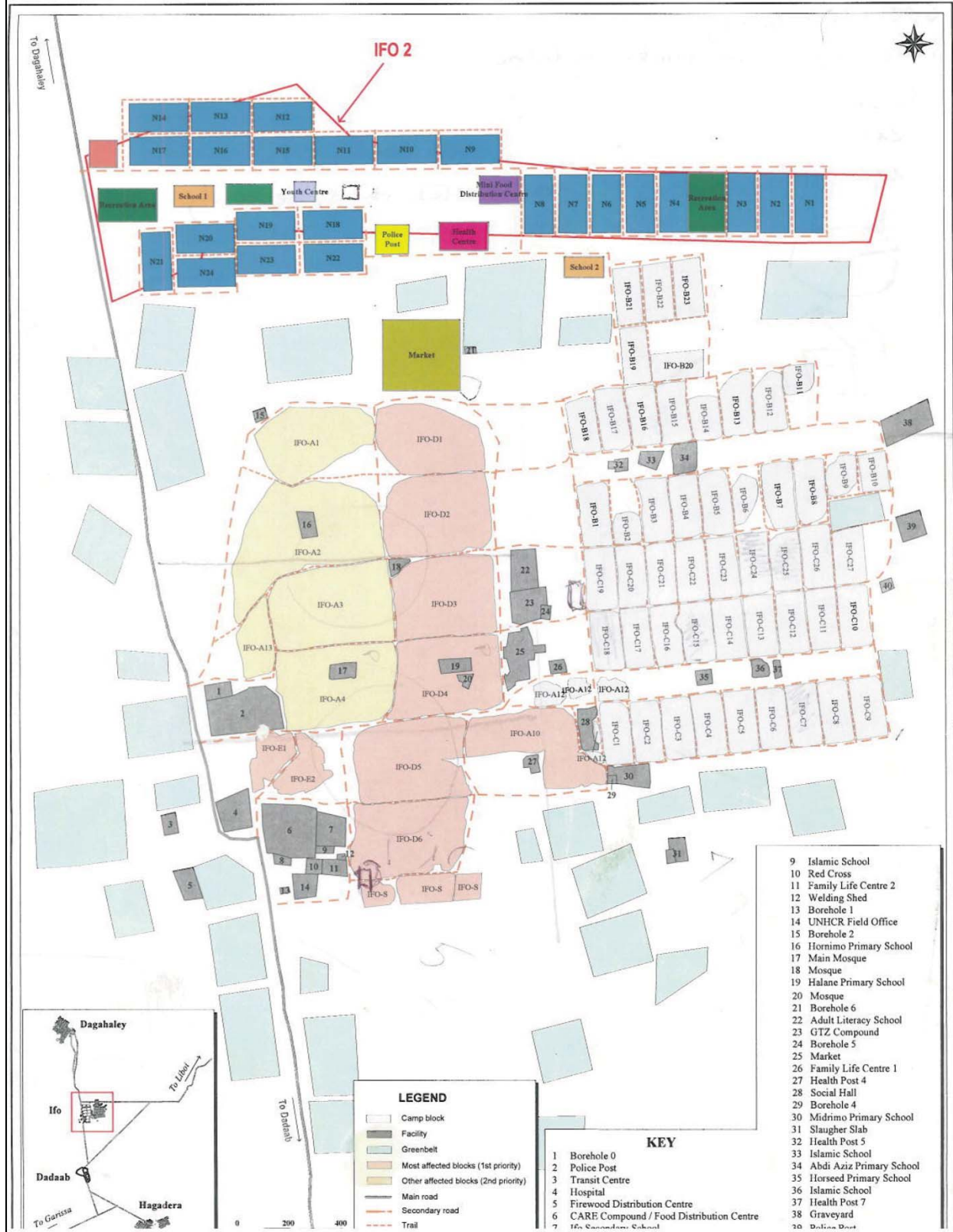


Figure 3-2 Ifo Camp

Source: UNHCR, 2007



Figure 3-3 Hagadera Camp

Source: UNHCR, 2007

DAGAHALEY REFUGEE CAMP OVERVIEW

As of November 2004



Figure 3-4 Location of Dadaab

Source: UNHCR, 2006

Extensive coordination efforts are required by aid agencies to sustain such large, dense and impoverished populations living within the harsh environment. In addition, Somalia's long-standing conflict is rooted within ethnic tensions; hence Dadaab is further plagued by the prejudices and insecurities of the homeland. Violent attacks have been known to proliferate both in and outside the camp perimeter. Attacks by local *shifto* (bandits), regional inter-ethnic conflict, and militant activities near the border continually destabilize camp security (Human Rights Watch, 2002). Consequently, refugees are often forced to live in a constant state of fear and persecution even within the protected boundaries of asylum.

The constant danger is most clearly evidenced by the risks associated with firewood collection. As several thousand refugees compete for scarce resources, women are required to travel farther into the outskirts and are often placed at immense risk of rape and sexual abuse (Loescher and Milner, 2005). While the incidents of rape and violence are considered to be exceedingly high within the camps, the exact frequency cannot be determined by UNHCR or other agencies because the social stigma and shame attached to gender-based violence silences many women (Horst, 2006). Although there have been campaigns to reduce such offences, there are no counseling services or legal assistance facilities within the camps for women afflicted by sexual abuse (Norwegian Refugee Council, 2006). Successful agency programs to manage firewood collection and distribution in coordination with community programs have managed to reduce the exposure of women to such dangerous conditions (Black, 1998).

Another threat within Dadaab has been the presence of the *shifita* bandits who frequently target refugees with small businesses, agency facilities, vehicles within the region, and dealers of *qaad* or *miraa*, an imported narcotic plant that is popular among Somalis (Horst 2006). As the bandits are comprised of a small group of refugees living with the camps, they have a daily knowledge of who receives an income and the movement of security patrols. Often community members know who among them is participating within violent and criminal activities, yet with limited legal representation, they feel threatened to speak out against it. As one Somali told me in December 2009, "Everybody knows who they are. But if you say something, you will become the next target. It is better to be quiet, but it is obvious. The *shifita* and the recruiters for *al Shabaab* are common. Sometimes you know them for a long time or are friends with their families." Yet with no access to viable employment or education opportunities, the participation within such militarized groups remains attractive to many of idle refugee youth.

The ongoing socioeconomic and geographic ties to militancy, terrorism, and piracy further undermine state and regional stability (Loesher and Milner, 2005). United States and Kenyan investigators have found connections between the camps and the 1998 bombing of the US Embassy in Nairobi as well as the suicide bombings within Mombassa in 2002. During my own field research in Kenya in 2007 and 2009, *al Qaeda* terrorists and coastal pirates were a known feature within the camps. Although terrorists are not clearly identifiable and are viewed with mixed emotions by the Somali residents, active coastal pirates and their recruiters maintain a high level of visibility. Everyday these young men haunt a café in the central market of Ifo camp, distinguished by their expensive clothing and jewels, and are a constant temptation to young men with no hope for future

opportunities to secure a livelihood or education. Home to such criminal operations, the camps have become a conduit for illegal arms trafficking and underground monetary networks. The influx of weapons has led to an increase in armed violence within Nairobi and the Kenyan financial system has been weakened (Juma and Kagwanja, 2003).

A single policy response cannot resolve the complex nexus of security, environmental, and socioeconomic conflicts; therefore UNHCR has approached these problems with a “ladder of options” (Nyers, 2006). The successes of these programs have relied on extensive regional government and agency coordination and the use of small-scale development initiatives. Projects such as the Kenya Firewood Project founded by GTZ were able to provide opportunities for improved relations between the refugees and the host community, reduce resource consumption, and increase security (Loesher and Milner, 2005). As evidenced by the success of such projects, it is clear that new development initiatives must comprehensively address the complex demands of the Dadaab refugees, the local host community and government interests.

3.3 Chapter Summary: Kenya’s Dadaab Refugee Camps

Longstanding hostilities toward refugees by the Kenyan government have resulted in aggressive strategies to marginalize the presence of Somalis within Kenya. Segregating all refugees to the Dadaab camps remains the primary strategy of the Kenyan government to manage the impact of large-scale refugee flows from Somalia, yet the continuation of violence within Somalia has led to greater displacement of populations who cross the boarder in search of basic security, food, and shelter. Consequently the containment of

Somalis within Dadaab has not stemmed the flow of refugees, but has further undermined Kenyan interests by concentrating the problems of militarization, smuggling, and crime within the Dadaab camps. The concentration of hostilities, abject poverty, and the failure to promote developmental programming has created a vicious cycle of increasing destabilization that poses particular risks to Somali youth who are drawn towards militarization.

While the Kenyan government has a legitimate interest in regional stability, it does not have the capacity to address the root causes of displacement within Somalia. It does, however, have the ability to address the problems in its own country, and it has attempted to acquire larger control of situation through legislation, specifically the *2006 Refugee Act*. As the Act created a Ministry of Refugee Affairs to work in coordination with UNHCR to manage the Dadaab camps, the Kenyan government has created a pathway to solve problems with the international community. Thus far however, the efforts by the Ministry have been more concerned with insuring the enforcement of Kenyan policy rather than the provision of durable solutions for displaced Somalis.

UNHCR and implementing partners have nonetheless made tremendous strides to provide improved security, housing, health and livelihood assistance for refugees in the Dadaab camps. By creating a “ladder of options,” UNHCR has designed and implemented multi-sector programming to accommodate the large scale of problems within the camps. However, all camp initiatives remain constrained to a framework of government policies designed to marginalize refugees rather than provide opportunities for development. Consequently aid agencies are

continually challenged to create programs that can improve the quality of life for refugees in Dadaab.

Chapter 4: Research Question and Methodology

4.1 Research Question

As the refugee population within Dadaab continued to rapidly expand in 2007, the NRC was contracted by UNHCR to develop an extension of Ifo, the largest refugee camp within Daddaab. Labeled as Ifo II, the new camp was to overcome many of the limitations of the original Ifo camp by utilizing the Sphere guidelines to provide improved access to services, sanitation, and housing. I arrived in June 2007 to research an overlooked but essential question: how well do Sphere shelter standards work within new housing initiatives in Dadaab?

Since Sphere was designed to address the critical needs of an immediate humanitarian emergency, I investigated the ability of these guidelines to facilitate the needs of a protracted crisis. Since protracted refugee settlements contain economic networks and hostile conditions more sophisticated than immediate crisis, it is unclear if Sphere is the appropriate tool. Although the specific actions of the NRC cannot conclusively answer my question, the NRC is one of the predominant humanitarian actors within projects of this nature and their work in Ifo II can be interpreted as a model example to agencies working in similar conditions.

4.2 Methodology

I utilized an array of research methods to evaluate the Sphere shelter standards within Dadaab. I utilized two control groups of refugee housing against which to compare and evaluate the success of the new Sphere programming. For the first control group, I studied the methods of self-help housing and settlement consolidation undertaken by the refugee populations, primarily within the oldest blocks of Ifo, because these housing strategies most accurately reflect the capacity of refugees to shelter themselves with minimal agency intervention. For the second control group, I studied the housing of a particular block within Ifo, wherein CARE and Oxfam implemented an agency-driven housing program in the 1990s, prior to utilization of Sphere within the Dadaab camps. Lastly I studied the Sphere-compliant NRC housing project. All three sites of research were studied and analyzed according to their capacity to meet the goals of the Sphere Minimum Shelter Standards with particular attention to the issues discussed within the literature review such as the demands for security, the role of the local informal economy, and environmental sustainability.

The utilization of Sphere Standards for research and analysis of refugee self-help housing provides several advantages. Foremost, the Sphere Standards are upheld by humanitarian actors as the minimum requirements for a dignified life; thus utilizing these standards to evaluate self-help housing strategies can isolate the specific needs of the refugee population that have been overlooked by coordinating agencies. Utilizing Sphere Standards to assess self-help strategies likewise leads to conclusions that immediately translate into the vocabulary and ideology of humanitarian actors for maximum utility.

Concurrently, the research provides a level ground to identify the strengths of self-help housing and local economic processes, which may allow future Sphere projects to better integrate local planning and housing strategies. Since the ultimate objective of this thesis is to improve the quality of humanitarian assistance, identifying the gaps in refugee shelter within the ideological framework of the humanitarian regime provides the most direct means toward implementation.

4.3 Research Process

My work began with an intensive literature review bridging the disciplines of architecture, urban planning, and refugee studies. I then conducted nine weeks of field research within the Dadaab camps from June through September of 2007. During that time, I lived within the central Dadaab CARE compound with other humanitarian staff and conducted research in the camps with the logistical support of the NRC. After the initial field research was conducted, I spent a year examining the role of International Refugee Law and Migration Studies within camp planning at the Center for Migration and Refugee Studies at the American University in Cairo.

I then returned to Kenya in November and December 2009, where I was to again visit the camps, yet these plans were undermined by a sudden surge in violent activity by the militant Somali group *al Shabaab* within in the region. Due to the sudden influx of kidnapping threats for foreign aid workers and outbursts of violence within camps, many NGOs (such as Oxfam) were withdrawing field staff while other agencies such as CARE had

a policy to only allow Kenyan nationals to work within the camps. Subsequently, I could not receive coordinating support from CARE, nor did the small agency I was representing, Samasource, have the logistical capacity to assure my own security. As a result, I conducted follow-up interviews with a small group of Dadaab refugees and UNHCR staff within Nairobi. I also obtained contact information for a group of refugees and aid workers living in Dadaab with whom I had telephone and email discussions, to better understand the current state of the NRC project.

While conducting field research in 2007, I utilized multiple methods to understand the socioeconomic dimensions of housing within Dadaab. I spent a great deal of time undertaking an ethnographic study of the various ethnic groups living within the camps. Although I initially began to collect a great deal of information for quantitative analysis, it became clear from my literature review and discussions with various Dadaab researchers that qualitative methodologies would provide the best insight into the impact of Sphere housing initiatives on the lives of the resident refugees. Therefore I utilized qualitative methods in a series of phases. To execute the research, I invested the greatest quantity of time within Ifo Camp, as it is the oldest and least planned, although I made it a point to spend nearly equal time in Hagadera and Dagahaley. I also visited Ifo II in the very beginning, middle, and end phases of my research to inform the direction of the research process.

For the first phase, I acquired the approval of the NRC Project Manager, an architect who has worked on similar projects in Sri Lanka and in Somaliland, to conduct a one-week community planning workshop with 25 volunteer refugees from the Ifo and Ifo II camps. I

entrusted the CARE Community Development Sector to select the participants. However, when it became clear that the majority of my volunteers were from the same tribe as the CARE recruiter, I expanded the class size to integrate minority Ethiopians, Gambellans, Sudanese and other Somali tribes. It was also difficult to acquire female volunteers, although three young women did participate.

Hoping to utilize a participatory action research methodology (PAR), I attempted to utilize a learning/teaching research process wherein I provided two weeks of classroom instruction, discussion, and educational activities to the volunteers in hope that the participants would be able to direct the research process so that any research was based on their values and concerns, rather than mine. I suspect that with additional time, the PAR process I had intended would have been achieved, yet given the time constraints for the total research project, I felt it was necessary to change the research strategy and guide the process myself.

The seminar did provide invaluable tools for the remaining phases of research as the seminar participants shaped the foundation of my ongoing research. They helped me to develop questionnaires, explained their views on the constant visits of outside researchers to Dadaab, provided informal tours and translation, and served as key middlemen to help me interact with community gatekeepers. Furthermore, after the community planning seminar, they were better equipped with an understanding of the issues I sought to explore and would frequently volunteer important information for additional research. Some of these volunteers even went on to conduct their own independent research on camp planning issues.

With guidance from the PAR participants, I was able to conduct field research within the camps. I spent time in each camp among the Somali and minority populations. Within each camp I conducted several weeks of ethnography, individual semi-structured interviews, focus groups within the camps, in addition to participatory and non-participatory observation. Throughout the process I had informal and semi-structured discussions with other humanitarian aid staff, and in the final week I followed up with interviews with managerial staff from UNHCR, CARE, and NRC. Throughout the entire process I utilized a comprehensive approach to acquire a multifaceted understanding of refugee shelter, with a primary focus on building strategies, the organization and use of living space, access to goods and services, and the economic and socio-cultural role of housing for the individual, the family unit, and the community.

4.4. Chapter Summary

Research conducted within Dadaab took place over the course of two years utilized a combination of qualitative methodologies. Field research in Dadaab was conducted in 2007 and follow-up research was conducted within Kenya 2009. The research was focused on understanding and documenting the self-help housing strategies pursued by the refugee population in contrast to the Sphere shelter project implemented by the NRC. Research methods consisted of ethnography, participatory action research techniques, participatory and non-participatory observation, and interview strategies among refugee populations.

The primary challenges to the research process included outbreaks of violence and cross-cultural communication. These challenges were overcome by ongoing coordination with agencies, refugee participants, and the flexibility to explore alternative research strategies.

Chapter 5: Research Findings

To determine if the NRC Sphere housing project could accommodate the refugee populations better than existing refugee housing solutions, the research primarily focused on discerning the existing settlement strategies of the refugee population. This organic process of settlement consolidation is distinct from the previous top-down planning strategies utilized by CARE and Oxfam, which I analyze within a study of a protected block for vulnerable populations. In the final phase, I address the concerns and practices of the refugees participating within the NRC project.

5.1. Refugee Housing Strategies

To study the informal housing and land use strategies of the refugee community, I conducted daily site visits to the camps, conducted informal and semi-structured interviews with refugees, focus groups, and utilized a participatory action research process. The research resulted in understanding the identification of four refugee shelter typologies, shelter construction procedures, the use of housing and social space, and the relationship between the local informal economies and housing strategies.

5.1.1 Somali Urqaal

The *urqaal* is the most common shelter strategy within the Dadaab camps (Figure 5-1). When refugees from Somalia enter Dadaab, they are provided a plastic tarp at registration from the UNHCR and directed toward a particular plot in one of the camps. The refugee must then construct her own shelter utilizing the tarp and any found or purchased materials. The *urqaal* style of construction is a variation of the traditional hut utilized by nomadic Somalis for centuries, using the plastic tarp in place of animal skins. The tarp is stretched over a dome of bent sticks, tied together with rope, and further insulated with local vegetation, animal hides, fabric, and non-organic rubbish.

Figure 5-1 Somali Urqaal



Source: Author, 2007

The *urqaal* provides the least degree of personal security and requires constant upkeep, although it is easy to construct and requires minimal effort or special skills. As the structures are quite small, many families will construct multiple shelters on their plot of land for different uses, such as one for use by the boys and one for the girls. Given the obvious limitations of this shelter type, many families prefer to construct more sophisticated housing later, yet the *urqaal* remains the most common shelter strategy due to its low demand for resources.

5.1.2 Stick Frame

Stick frame housing (Figure 5-2) requires extensive access to resources for construction, yet is one of the most durable housing solutions available within Dadaab. Constructed from wood collected outside of the camp perimeter, construction of a stick frame house demands several days of scavenging in the dangerous areas surrounding the camps. The housing also requires the financial resources to purchase metal wire, nails, and tools at the local market. Since the roof is the greatest weakness of this otherwise durable structure, the resident family will often employ local carpenters for this final stage to thatch the roof with *komoroos*, a locally grown plant material.

Figure 5-2 Stick Frame Housing



Source: Author, 2007

Aside from the obvious fire hazard posed by this shelter, the greatest inherent weakness in this structure is the aggressive demand it places upon the natural environment. If all refugee families attempt to collect wood from the surrounding areas for housing, the landscape will be quickly stripped bare. Combined with the obvious danger posed for individuals collecting such materials, the longevity and security provided by this shelter is generally offset by the aggressive risks taken for its construction.

5.1.3 Wattle and Daub

The wattle and daub housing (Figure 5-3) provides a highly durable shelter for families, with the space and privacy provided by stick frame housing, but with additional protection from the climate. Constructed in the same manner as stick frame buildings, the walls of this shelter are additionally reinforced with mud daub on both sides of the frame. Some households may apply a thin skin of concrete or fire ashes to the outer later for increased protection from the rain, snakes, and insects. Some households cover the floors with linoleum or vinyl sheathing, and many families cover the internal walls with the WFP ration sacks for aesthetic purposes.

Like the stick frame houses, the wattle and daub structures are highly flammable, resource intensive, prone to insects and pests, and may require skilled labor. They also place a high demand upon the limited natural resources of the surrounding environment. Yet the longevity, cleanliness, and flexibility of these structures often make them highly desirable among the refugee population.

Figure 5-3 Wattle and Daub Housing



Source: Author, 2007

5.1.4 Mud Brick

The mud brick style of housing (Figure 5-4) was introduced to the Dadaab camps by the refugees from Sudan and Gambella, who have constructed buildings in this manner in their own homelands for centuries and who have a reputation throughout the camps for their carpentry skills. Upon Introduction, the wealthier Somali families quickly appropriated the structure, but have become less confident in the benefits of mud brick housing in recent years. Since 2006, Dadaab has been faced with severe flooding during the rainy season, leading to the deaths of several families as these buildings have collapsed on their occupants. As the NRC Sphere housing scheme expands upon the design of the mud brick buildings within the camps, I devoted additional attention to understanding the construction methodology, strengths, and weaknesses of this shelter type.



Figure 5-4 Sudanese Mud Brick House

Source: Author, 2007

Mud brick buildings are labor-intensive and frequently expensive to construct. A single house will require the fabrication of 2000 to 3000 mud bricks, of which at least 400 will be unusable from poor structural integrity. The foundation, walls, and pillar supports must be constructed with several layers of bricks (Figure 5-5), yet a house that is properly constructed can last as long as 7 or 8 years with only minor upkeep. These buildings will commonly feature a metal roof, a metal door with a lock, and provide the greatest degree of personal security and privacy from outsiders.

Figure 5-5 Mud Brick Housing Foundations

Source: Author, 2007



The mud brick houses in Dadaab also have a reduced impact upon the natural environment. With no demand for vegetation, there is no necessity for refugees to wander

far from Dadaab to collect materials. However, there is an aggressive demand upon the finite water supply, and construction of these homes can lead to lower water pressure. After the houses are complete the water pressure problem is alleviated and related problems are generally resolved. Dirt required for the construction of bricks may be also collected from specific locations to create drainage ditches or latrines. Gambellan builders, however, advocate that the soil collected on the top three inches of the surface is strongly preferred, as the higher sand content within the soil will create increased cohesion and strength within the bricks.

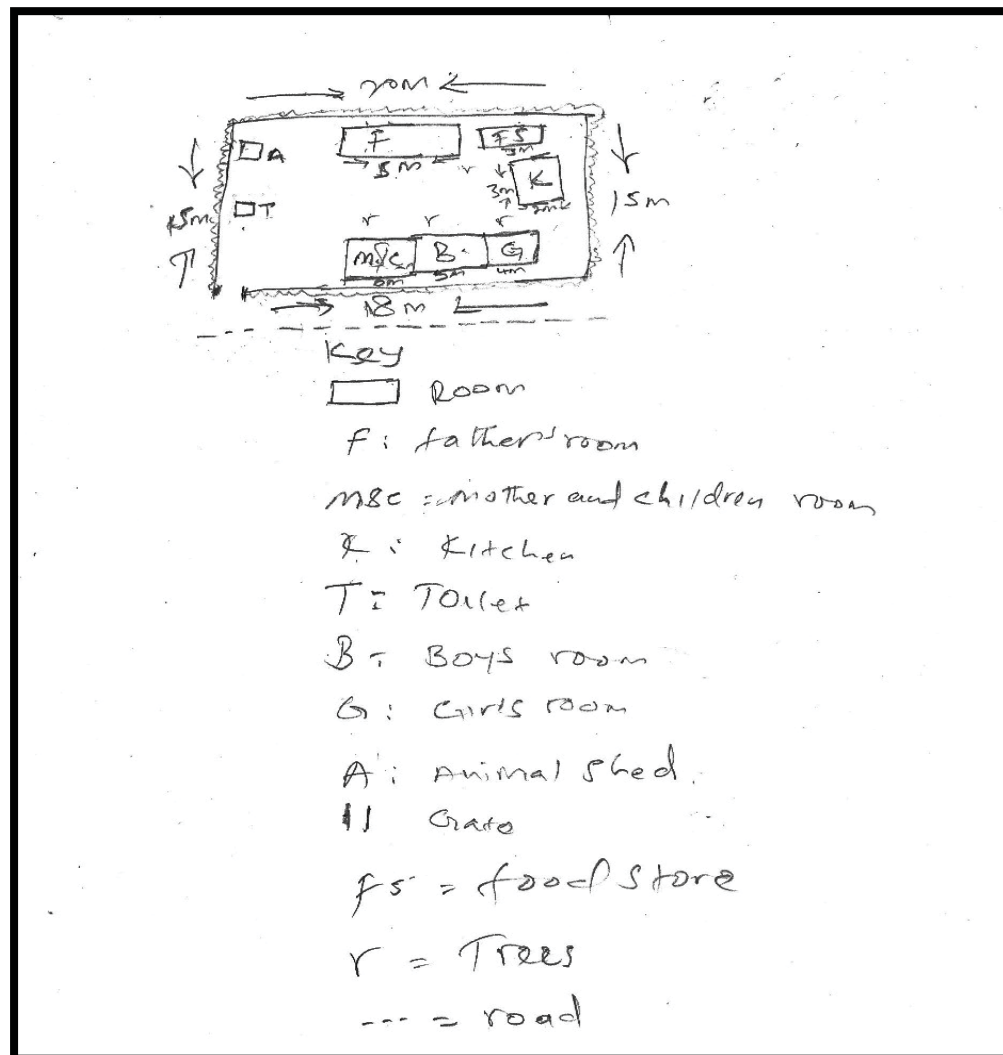
5.2 Refugee Property Use and Community Spaces

5.2.1 Private Property Use

When walking through Ifo from the agency compounds toward the central market, one is confronted with a massively overgrown labyrinth of fencing that lines the meandering pathways between family plots. Constructed from local plant material, the fencing presents a formidable opponent to any intruder, as the dense layers of briars and sharp wooden spikes are piled far above the head of local pedestrians, and access is only available by means of a small gate, usually toward the rear. As refugees settle within the blocks according to tribal, clan, and family association, there is a distinct insider/outsider dynamic and anyone walking along the pathways will be well aware that he or she does not belong there. Although I eventually became comfortable walking between properties, the limited access to the family plots required an alternative strategy for analysis.

During the NRC community planning workshop in Ifo, volunteers drew maps of their family plots (Figure 5-6). These maps included all resident structures, fencing, latrines, and any areas that are specially designated for animals, washing, cooking, and religious use. Although some of the refugees lived within the geographical grid of Ifo II, the majority of volunteers lived within Ifo; a settlement organically formed as refugees settled in any available spaces and adapted them to their needs over time. The Ifo plots vary in shape and size, according to the particular needs of the family.

Figure 5-6 Map of Refugee Housing Plot

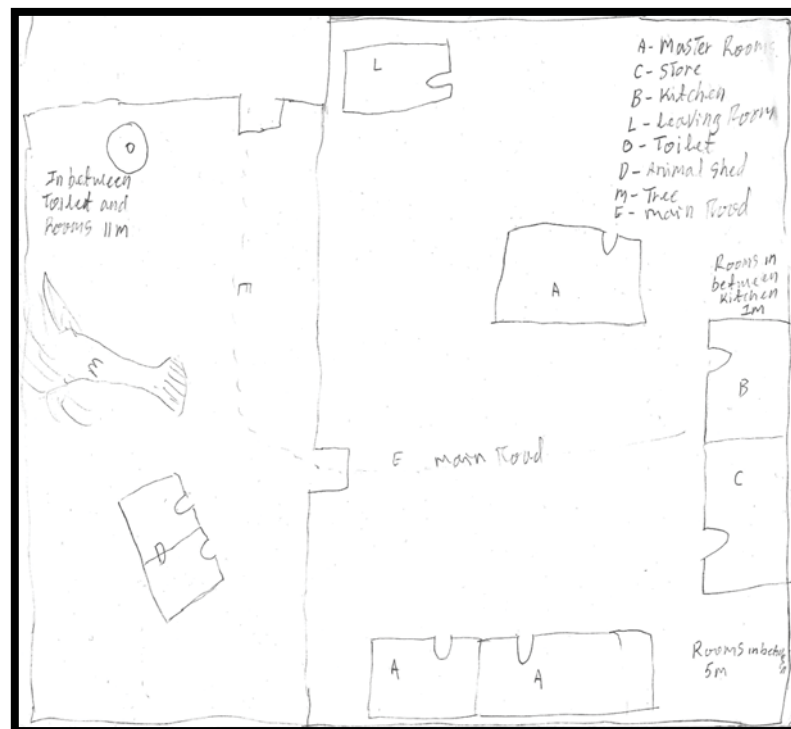


Source: Author, 2007

All of the Ifo plots include multiple houses, animal shades, and a private family latrine (Figure 5-7). Many of the houses feature descriptions such as “Brother’s House, Guest Room, Girl’s Room, Parlor, and Kitchen.” These multiple buildings meet the cultural demand for separation between sexes, while reducing temperatures and increase cleanliness with a separate kitchen and sleeping areas. The daughters’ rooms are consistently located farthest from the gate, and often adjacent to the kitchen, while the father and sons’ quarters are located closest to the entry.

One of the maps includes the area around the family home (Figure 5-8), and includes two churches and a school operated by a local member of the community. Most of the maps further illustrate the presences of trees within the family plot, highlighting the value of shade in the hot climate.

Figure 5-7 Map of Refugee Housing Plot in Ifo Camp



Source: Author. 2007

The map shows a rectangular compound with a main road (X) running horizontally across the top. A cross road (O) runs vertically through the center. The compound is divided into several sections. On the left side, there are two churches (M₁ and M₂) and a tap (Q₁). On the right side, there is a tap (Q₂) and a main gate (A). The compound is surrounded by a wall (B) with a main gate (A) on the right side. The map is labeled 'Left side map' and 'Right side map'. A legend is provided below the map:

- X = Main Road
- O = Cross Road
- M₁ = Church
- M₂ = Church
- Q₁ = Tap
- Q₂ = Tap
- A = Main Gate
- Z = houses
- B = Boundary main Road

All of the maps contain a specified structure for housing goats. After asking the refugee participants about the necessity of this building, they explained that it is essential to somehow contain their animals or else the creatures will likely eat the natural materials used to build their homes. As one man said with great embarrassment “I used to constantly wake up in the middle of the night because the goats would be eating the roof. It caused a great problem because it takes a great deal of work to collect these materials and fix the holes.”

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occasions such as weddings. It was common for refugees to conduct home-based businesses from their primary or secondary dwelling, or offer tuition or *dugsi* (religious classes). Yet even with the internal divisions and alterations, frequently in the form of a single partition wall, many refugees complained of the lack of privacy.

5.2.2 Community Spaces

The nature of community spaces varied tremendously among the three camps. As Dagahaley and Hagadera were created after Ifo, these camps had the advantage of improved planning compared to Ifo, which struggled with the largest, most permanent, and most diverse population. Yet in Ifo, non-Somali groups such as the Ethiopians maintained their own small-scale public spaces including markets, restaurants, schools, and even a small pool hall. These spaces varied in size and were used only by the immediate population, with rare use by aid workers or the host community. Resident shops often specialized in goods unique to that population as well, such as imported coffee or incense. Other minority groups that were not large enough to support a market maintained a common community space as well, most commonly beneath a large tree or adjacent to the house of a highly respected community member. However, the least respected minority, the Somali Bantu, no longer had a community space of their own because so many Somali Bantu were resettled abroad that only a few members remained. Minorities such as this, whose numbers were too small to form a cognizable community within Dadaab, would generally integrate with another larger group for protection.

5.2.3 Water Pumps

After visiting many household plots, I found that the highest concentration of structures were near water taps, which were also a common site for children at play. Although all of the camps included space and goal posts for playing soccer, these were generally large dusty swaths of desert with no shade or vegetation and held little appeal as a viable space for children. With no other playgrounds or public space for children, the water pump provided a location for ongoing parental and community supervision while the water runoff provided a source of amusement for the children.

5.2.4 Religious Structures

Households also preferred not to be located immediately adjacent to neighborhood mosques due to the loud call to prayer and increased traffic. Many Muslim refugees I interviewed preferred religious structures be located in more public areas, such as within or near the market center, although this sentiment was not shared by the fundamentalists. Christian groups, however, were satisfied to have their churches closely embedded within the blocks, immediately adjacent to their personal property. The mosques were nonetheless distributed in a haphazard manner, often to the private frustration of the neighbors.

5.2.5 Protected Blocks

Although most individuals were satisfied by the location of their household in relation to agency service centers, UNHCR offices, and the local market, it became clear that the attitude varied according to the length of time the refugee had been located within the camp. Agency facilities were centrally located within all of the camps and the refugees who first settled enjoyed the closest proximity to goods and services such as ration distribution, health clinics, and firewood distribution. Refugees who were more recently settled were located on the camp outskirts frequently had less access to the local economy and an increased reliance upon humanitarian aid. Requiring as much as 30 minutes to walk from the outer edge of the camp to the ration collection point, families would need to hire a donkey cart or rent a wheel barrow to transport goods and thus had to undertake additional hardship.

To my great surprise, the section of Ifo Camp allocated for the special protection of vulnerable populations such as orphans, widows, the handicapped, and the elderly, was located at the furthestmost point away from agency assistance (Figure 5-9). Already marginalized and persecuted within their own society, this population was likewise marginalized by CARE and UNHCR in an effort to protect them by providing social isolation. Yet it only increased the burden by necessitating excess difficulty to receive assistance and living in substandard agency-provided housing.

Figure 5-9 Distance between Protected Block to Agency Services



Source: Author, 2007

5.2.6 Markets

The central market provided the greatest degree of economic opportunity and physical access to the refugees within all three camps. Ifo market contains a vibrant center, active with the purchase and selling of *kat*, a stimulant narcotic popular among Somali men and imported everyday from Yemen. Adjacent are a collection of hotels where refugees could eat a meal or pay to watch satellite television. These hotels are also popular spaces for Somali pirates and militant groups to recruit local youth.

As Dagahaley and Hagadera camps were constructed later, the markets and agency facilities were centrally planned so as to provide equitable access to refugees throughout

the camps. For several years, Hagadera has enjoyed great economic success with a healthy exchange of goods smuggled from Somalia. Dagahaley has likewise begun to grow since 2005 when a private Kenyan company constructed a cell phone tower within the camp. Since then, Dagahaley has encountered a booming expansion in its local market as cell phone vendors and internet café's have risen to prominence (Figure 5-10). The market growth in communications technology has spilled over into the central town of Dadaab as well, leading to the establishment of money exchange and remittance centers. Throughout the history of Dadaab, it is clear that wherein humanitarian aid is unable to meet the needs of the population, the informal sector seizes any economic opportunity to fill this gap and changes in land use adapts to reflect market demands.

Figure 5-10 Dagahaley Market



Source: Author, 2007

5.3 The Informal Economy for Self Help Housing

As the Dadaab camps have remained in place for 20 years, the demand on refugees to improve their housing has facilitated the growth of a dynamic informal economy based on the fabrication, trade, and construction of housing and housing components (Figure 5-11). In addition to the trade of surplus rations and the sale of vegetables and basic goods in the local markets, the exchange of housing components and the hiring of skilled labor form a cornerstone within local economy. The economic activity related to housing is not strong enough to provide viable livelihood or future opportunities for the youth, thus opening the door for illicit activities, but the economy remains vibrant enough to subsidize household income and visibly enhance housing throughout the camps.

Figure 5-11 Somali Refugee Women Hired to Repair Wattle and Daub Shelter



Source: Author, 2007

The informal housing economy primarily relies on the collection of natural construction materials, the fabrication or import and sale of manmade materials, and the

sale of skilled labor services. While conducting research, I repeatedly encountered individuals who also rented their homes (often mud brick or wattle and daub housing) from other refugees. Although I found this to be a common practice within the camps, UNHCR staff vehemently denied the practice or considered it an unacceptable, and unusual, practice.

5.3.1 Natural Materials

The collection and sale of building materials is an important economic process throughout all of the refugee camps. An individual with a donkey cart will establish a fund of 5,000 – 7,000 Ksh (between 60 and 100 USD) from the investments of local refugees, or refugees may accumulate this investment capital and then hire a donkey cart (between 60 and 80 Ksh per day). This investment is then utilized to pay and equip the cart owner to travel for approximately one week into the surrounding wilderness and collect all requested materials. Upon return to the camp, these materials are then sold at the market and the original investors may receive a return on their investment.

Market prices vary for the materials (Table 5-1), yet as the area surrounding the camps become increasingly picked over by camp occupants, material collectors must travel farther distances from the camp and consequently prices have continued to increase over the years. Natural materials are sold per bundle, with the exception of *washagaar*, a local grass sold per cartload. Prices may also increase if the collector encountered excess dangers within the wilderness, such as bandits, militant groups, or dangerous animals.

Consequently goods may cost more in one camp than another, and sightings and rumors of lion attacks near Dagahaley increased the local market prices, while prices remained stable in Hagadera camp. Goods could be transported from one camp to another, but this would increase costs as well for fuel and police bribes.

Table 1 Building Materials and Costs

<i>Kamooras</i> * - Small tree, approximately 2 meters tall, used for wall construction	16 - 20 Ksh
<i>Rakiis</i> * - a short, very hard wooden post cut from local trees used to reinforce Koomoras posts	40 - 50 Ksh
<i>Paw</i> * - light and strong wooden sticks used for roof construction	60 - 70 Ksh
<i>Tiir</i> * - strong wooden posts utilized as primary supports within housing construction	100 - 120 Ksh
<i>Mando</i> - – long flexible sticks used to bind Koomoras and Rakis for wall construction	40 Ksh
<i>Washagaar</i> (per cartload) - Local grass uses as wall filler, or to scatter over tarpaulin roofs to increase building lifespan and reduce internal temperatures.	300 – 400 Ksh

*Prices listed per bundle

Source: Author, 2010

5.3.2 Man made materials

Man-made materials are fabricated from available materials, such as the metal canisters distributed with cooking oil rations, or are imported from Somalia or Nairobi. Man-made materials tend to cost more in Dadaab than elsewhere in Kenya due to the additional hardships required for transport. The value of goods often increases as a

consequence of rising fuel prices, police bribes at check points, the danger of transporting goods across Somalia, and the risk of illegally smuggling goods across the border. However, it is common knowledge throughout the camps that the Kenyan police, who secure the closed border along Somalia, are often withdrawn during the night, and there is little difficulty to drive trucks back and forth between Dadaab and Somalia. Cars and trucks within the camps are to register with the local Kenyan police station, however unregistered and foreign vehicles are common. Police also are easily bribed to leave gates open or temporarily abandon their posts, which I frequently witnessed while riding in a pickup truck with nearly 30 refugees from Hagadera Camp to Dagahaley. UNHCR and CARE officials have also informed me the illegal transport business has increased between 2007 and 2009, and the number of unregistered vehicles witnessed in the camps has risen alongside increasing militant activity near the Somali border.

The most commonly imported building materials are metal sheeting, iron nails, and steel wire. Local craftsman will also utilize these materials to fabricate additional items, such as metal doors, which are highly desirable throughout the camps. These doors are made from flattening oil tins and nailing them to wooden frames. Additional costs may be incurred for hinges or custom orders, or for the installation of doors, windows, and roofing materials.

5.3.3 Skilled Labor and Housing Construction

Carpenters and contractors can be found within all the major social groups of the Dadaab camps. Many of the carpenters specialize in only one or two types of housing, as the primary division between carpenters is those who worked with mud brick housing and those who work with the stick built forms. Although many carpenters can construct *urqaal* housing as well, this traditional housing strategy was generally pursued by household women and paid outside assistance was unnecessary. Carpenters who constructed stick built housing were often the same men who collected materials in the field for sale. A frequent household strategy, however, was to only hire local carpenters for the construction of the roof, as this roof is always the most technical part of these buildings, and yet the most important during times of adverse weather for mud brick buildings, all refugees preferred to hire Sudanese or Gambellan refugees for the entire household

Figure 5-12 Gambellan Laborers Hired to Construct a Mud Brick House in Ifo II



Source: Author, 2007

construction process (Figure 5-12). Consequently, only the wealthiest Somali households had a mud brick house. After 2006, when extreme flooding resulted in the collapse of many NGO built mud buildings and the deaths of several families, Gambellan and Sudanese builders became more desirable as their houses remained steadfast throughout the floods while most other structures collapsed. The builders I interviewed explained that it is because their buildings have wider foundations, are more strongly reinforced, and better maintained. They insisted that after any rainfall, the patching and repair of the surface is immediately critical to maintain the maximum degree of strength.

5.3.4 Housing Cost

For the construction of a one-room house for a single family, it will frequently cost between 1,500 Ksh (20 USD) and 8,500 Ksh, (105 USD). This cost is reduced if the family personally collects building materials, utilizes the absolute minimum of purchased materials and avoids hired labor. As most families construct their own houses to the best of their abilities, a fully purchased house remains a luxury for only the wealthiest households. However, as the upkeep and consolidation of housing is an ongoing process within the camps, it continues to fuel an active market and is a mainstay of the local economy.

5.4. Previous Housing Initiatives at Dadaab

When I first arrived in Dadaab, I was informed that CARE had previously provided housing to vulnerable populations within the camps, although all shelter responsibilities were to be transferred to the NRC. It was difficult to track such structures as poor records were maintained of where these structures were built or how much money was spent on shelter activities. I was informed by UNHCR administration that 10% of the budget for social development was allotted to shelter assistance for vulnerable populations, although specific details regarding how this money was spent on shelter could not be determined.

After speaking with many of the refugees within the camps, I learned that many of the mud brick houses occupied by Somalis were part of agency shelter assistance programs. UNHCR and CARE entrusted community leaders to delegate housing assistance within their blocks, trusting that the block leaders could best determine who was most in need. However many refugees complained that block leaders would frequently use this opportunity to provide improved housing to family members, or use it as a means to exploit money or services from other refugees. UNHCR insisted that such incidents do happen within the camps, however they must relay upon community and block leaders to pinpoint populations in need and in the meanwhile do their best to monitor the process.

After several weeks within Dadaab, I was brought to an isolated block at the rear of Ifo camp. This block was designed to protect vulnerable populations and was constructed by a partnership between CARE and Oxfam in the late 1990s. Examination of the protected

block provided the opportunity to study a fully planned settlement prior to the inception of Sphere Standards.

5.4.1 The Protected Block at Ifo

At the rear of Ifo camp is a block surrounded by barbed wire with a single entry and an adjacent guard post. This block contains agency constructed shelters for vulnerable populations, including orphans, widows, single mothers, and elderly. The housing within this block was constructed in the 1990s by Oxfam and was maintained by CARE.

The housing within the protected block (Figure 5-13) is organized into a rigid grid plan. Water taps are evenly distributed and it contains no community or social spaces, no specified areas for schools, and no designated space for religious institutions. The protected block is also located on the in the north western corner of the camp, a diagonal opposite from all agency compounds, legal services, health care, ration and firewood distribution centers. It is approximately 40 minutes walking distance through the camp for residents of the protected block to reach agency services, and approximately 15-20 minutes of walking through the camp to reach the central market area.

Figure 5-13 Fenced Perimeter of Ifo Protected Block



Source: Author, 2007

The only physical security in place was a consequence of the surrounding fencing and 24-hour guards. Although no refugee informed me of any dangers from the guards, the corruption and abuses of the Kenyan police is well known throughout the region and it is possible that isolating vulnerable refugees from all protection and resources aside from a police presence may actually incur a greater, although unreported, threat. The protected block is distant from agency compounds, and CARE generally neglects it due to its other – and often closer – concerns.

5.4.2 Housing Vulnerable Populations

The protected block contains mud brick housing, constructed by Oxfam with the use of hired workers in a completely top down fashion. According to the Dadaab Camp Manager for CARE, Oxfam did little preliminary study but arrived with a ready-made plan for shelter assistance. Housing within the protected block failed to provide security or any economic advantage. Although the construction of mud brick buildings avoided causing environmental damage, the lack of planning only advanced the marginalization of already vulnerable people. The most obvious failure within the Ifo protected block was the atrocious disrepair of the mud brick houses (Figure 5-14).

Figure 5-14 Pre-Sphere Agency Housing in Ifo Protected Block



Source: Author, 2007

Many of these houses had to be abandoned, as the walls were prone to collapse. The block contained no school space and as it is too dangerous for marginalized children to attend the schools operated by UNHCR, a house with two collapsed walls was utilized as a classroom for children – potentially at great risk to their lives. The block leader of the camp, a Somali male from a minority tribe, provided me with an extensive tour of the camp and displayed multiple houses that all suffered from the same state of structural instability. As many houses already featured one collapsed, or partially collapsed wall, the occupants had attempted to repair the holes with plastic tarps and collected wood scraps and vegetation. With discussion, I learned that none of the occupants knew how to construct mud brick or how to make the mud coating necessary for plastering the building facades. Although some of the men in the camp had attempted to make such repairs, their unguided efforts failed to resolve the problem.

While studying the structures, I found that they all lacked support pillars; the foundations of the buildings – only one brick on either side of the wall – sat on top of the surface and much of the mortar had been washed away from years of rain and abrasive winds (Figure 5-15). When discussing these problems with the occupants, a young girl, approximately 12 years old, complained of a snake living in her home.

It is possible the agency constructed housing and the site planning of the protected block did more harm to its occupants by confining them to a small fenced in perimeter, than if they sought protection by integrating within the refugee communities. With each oncoming rain, lives are put at risk, while every day is a struggle to survive because these

people are marginalized from humanitarian services and isolated from economic opportunities.

Figure 5-15 Damaged Walls and Foundations in Ifo Protected Block



Source: Author, 2007

5.5 The Norwegian Refugee Council Sphere Shelter Project

The work of Norwegian Refugee Council is guided by the *1951 UN Convention relating to the Status of Refugees*, the additional 1967 Protocol, and the 1998 *UN Guiding Principles on Internal Displacement*. The agency is dedicated to the protection and humanitarian assistance of refugees and to promote the principles within the UN Declaration of Human Rights (NRC Policy Paper, 2007). The provision of temporary shelters, buildings, and the rehabilitation of houses and schools is one of the four core activities of the Norwegian Refugee Council. All projects “are implemented in compliance with applicable Sphere Standards” (NRC Shelter, 2007).

5.5.1 Overview of NRC Construction of Ifo II

The NRC arrived in Dadaab in January 2007 and began site planning for Ifo II in February of the same year. The agency hired approximately 300 men and 300 women per week to demarcate household plots and dig a small grid of trenches for flood control and irrigation purposes. Refugee placement within the blocks is determined by UHNCR, with the majority of blocks assigned to Somali refugees. The NRC hired 30 cash-for-work laborers to construct fenced compounds to aid in the construction of a warehouse depot. The agency also initiated construction of two schools and one police post within the camp by employing local contractors from the nearby town of Garissa. The NRC also constructed sanitary facilities for communal service and launched a shelter project.

The NRC cites their shelter development program as collaboration between the NRC and the refugee community (Cameira, 2007). The agency constructed ten prototype buildings in Ifo II for vulnerable populations living within the ten occupied blocks. Hoping to encourage refugees to build their own homes in a similar manner, they offer families the necessary tools, roofing materials, special assistance for roof construction using carpenters from the camps, and the concrete slab and superstructure for a latrine. In exchange, refugee families agree to build their home in a manner identical to the NRC design, dig the family latrine pit, and install the superstructure. All materials used by NRC for the schools, police post, roofing, slabs, and latrine superstructure materials are procured from UNHCR. The NRC delivered dirt from the trenches and surface clearance to participating families for housing construction.

The agency further installed 250 communal latrines throughout the inhabited blocks, providing approximately 10 latrines per block. Local carpenters were paid for casual labor at 300 Ksh (3 USD) to make one slab, 1500 Ksh (19 USD) for digging a 5-meter deep pit, and 400 Ksh (4 USD) to put up the superstructure made from gum poles and metal sheeting. An internal agency report claims that the NRC attempted to educate the refugee community on the basic principles of security related to ongoing activities with continuous awareness campaigns, so that refugees might understand, for example, the importance of firebreaks and irrigation channels to improve security and keep flood water away from the plots (Cameira, 2007).

5.5.2 NRC Shelter Project Field Assessment

I conducted an intensive assessment of Ifo II and the NRC shelter project at the beginning and the end of my field research in 2007. In addition, I made numerous small visits to observe the construction process and speak with refugees and carpenters. I concluded the research process with interviews with administration from NRC, UNHCR, and CARE.

The NRC relied upon the technical skills of its project manager, an architect, to design a shelter project rooted within the Sphere Humanitarian Standards. The result was a mud brick construction scheme that utilized outside technical knowledge to improve upon the existing mud brick shelter strategies found within the camp. An Australian engineer calculated the size and composition of the bricks, while the buildings were

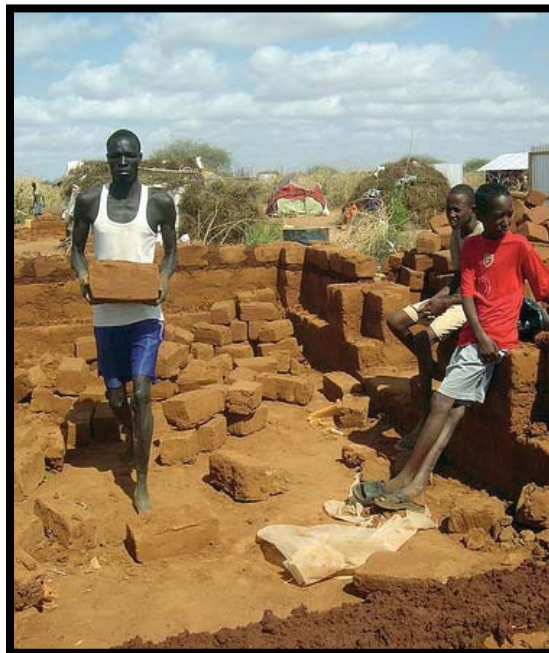
designed with larger foundations and thicker walls. While many refugees were willing to undertake the paid labor opportunities to build prototype shelters for widows and elderly persons within the blocks of Ifo II, it was clear from general observation that a minority of refugees within Ifo II were participating within the NRC shelter project at the time of initial research. Since then, more refugees have participated in the process, yet it has developed more slowly than project planners had hoped.

Shortly after I first arrived in Dadaab, it became immediately clear that the bulk of the Somali community did not trust the stability of mud brick buildings. As several families had died in recent years from the collapse of these buildings during the winter floods, the utility of these structures was of tremendous debate within the camps. After raising this issue with the NRC project manager, I was told that she “long ago stopped trying to work with communities from the ground up,” and instead prefers to design a top down strategy and leave it to others to advocate its utility. Refugees hired by NRC to advocate the housing scheme organized community meetings and would often throw the mud bricks high into the air, so that when the brick crashed to the ground without breaking, the community could understand the durability of the bricks. In spite of this and similar demonstrations, many refugees simply pointed out that their fear was founded on the threats posed by flash floods and sudden rain and they generally preferred to pursue one of the other shelter options such as the *urqaal* or stick frame shelters. Refugees who did participate in the project could be divided into two primary groups: the exhausted refugees who built their own homes, and the wealthier refugees who simply hired minority laborers to do all the hard work.

5.5.3 Hired Labor

At the time of initial field research in 2007, many of the Sphere shelters constructed within Ifo II were not constructed by individual households but by hired labor. These workers were frequently from minority groups, most often Gambellan Ethiopians, who were considered expert builders yet generally had the least access to economic opportunities within the camps (Figure 5-16). During follow-up interviews conducted in late 2009, it became evident that more households had begun constructing their own homes as part of the NRC project. However, the project continued to receive mixed interest among households that cannot afford hired assistance.

Figure 5-16 Hired Gambellan Workers in Ifo II



Source: Author, 2007

Hired laborers were generally from low social classes and minority groups. Paid 2 or 3 Ksh per brick, they were hired to fabricate the necessary 2,500 bricks to build one house. They were then paid a negotiated price to dig the foundation and construct all the walls. This task demanded constant trips to the water tap to collect water, mixing the mud mortar from water and sand, and afterward coating the constructed building with a ½-inch thick coating of mud daub. Families that did not have the resources to hire laborers for this process would commonly set their children to the task. After investigation, it did not appear that any children were exploited within this process, as families continued to send their children to school and treated them fairly.

The hiring of minority groups accelerated longstanding tensions over limited water resources among refugees within Ifo II. The constant demand for water to construct mud brick housing reduced water pressure throughout the camps, increasing time required to obtain water. When minority groups, who were employed by wealthier Somali families for housing construction, would need to share water pumps with Somali refugees, tensions would frequently increase between ethnic groups. Long lines for water were obviously the fault of insufficient water pressure yet it was common for Somali refugees to hold minority workers accountable. As families participating in the housing project only had two containers for water, it became necessary to make frequent trips to the water pump, increasing the opportunity for conflict (Figure 5-17).

Figure 5-17 Refugees Carrying Water from Pumps to Housing Site



Source: Author, 2007

5.5.4 Self Help Construction

Those who constructed their own homes expressed frustration of limited material support from the agencies and felt the construction process was far slower and more laborious necessary. A constant complaint was that tools each family received to fabricate bricks, one mold for fabricating bricks, one shovel or trowel, and one or two containers for water, were not enough for more than one person in the family to use at a time. Consequently a large family could not properly divide the labor to fabricate the 2,500 bricks necessary to begin construction. When I asked NRC staff about this problem, I was told that there was general encouragement for refugee families to help each other build the houses, so that it would take on a broader community dynamic. Many Somali refugees

informed me that there is not enough community solidarity within the camps beyond immediate family ties for such an ideal to become a reality.

Although the water pumps are equitably distributed throughout Ifo II, small families with limited manpower and funds to hire laborers were greatly challenged by the physical demands of transporting water from the pumps to their housing site. This was a particular issue for woman-headed households, or when the man of the house was too old to undertake such activity. Such households were thus required to hire a donkey cart or a wheelbarrow to transport water to and from the water pump. At 60 Ksh per day, the cumulative cost made it nearly impossible for families to obtain non-rationed goods such as tea, sugar, milk, salt, pasta, or rice.

Families were also frustrated with their limited understanding of programming changes or imposed limitations. Although the NRC delivered dirt to each family for brick making with dirt obtained from irrigation trenches and road clearance, some refugees began to take dirt from a nearby anthill and were made to stop by NRC managers. As the anthill was composed of finer sediment and had a higher sand content than much of the soil delivered by the NRC, many refugees claimed that it created a tighter bond for bricks than the delivered soil. The NRC disallowed the collection of soil from anthills but failed to provide any particular reason, resulting in aggravation among refugees who felt they were being unfairly targeted by agencies. Unfortunately the prominence of poor communication between agencies and refugees often resulted in such feeling among the refugees, who felt that the agencies were more interested in controlling their lives rather than helping them.

A similar situation highlights the general problem of ineffective communication between agencies and the population. Somali families have not traditionally occupied mud brick houses, undermining the ability of the refugees to properly maintain their homes. Simply put, they were unfamiliar with the maintenance techniques required to keep up the structures. During an analysis of mud brick buildings already inhabited by Somalis, I found that the lack of repair to the outside of these structures following brief rains eventually destabilized the structures. Within the protected blocks of Ifo camp, mud brick housing constructed by Oxfam in the late 1990's was in such disrepair that many of the buildings were collapsing on their occupants or were abandoned. Although the Sphere-compliant buildings were structurally superior because of the wider foundations and reinforced walls, the lack of universal understanding among the inhabitants regarding the care and maintenance of these buildings undermined the potential for long-term durability.

5.6 Chapter Summary

The strategies of housing construction by the refugee population, the organization and use of community spaces, and the NRC housing scheme were studied using site visits, ethnography, interviews, and participatory workshops. Particular attention was given toward the role of the local market and livelihood strategies that contributed to the housing consolidation process. Additional attention was directed toward pre-Sphere housing initiatives and the ongoing NRC shelter project within Ifo II.

I have organized refugee self-constructed housing at Dadaab into four primary typologies, each typology being based on the availability of resources to the household and

the length of time the family has been settled within Dadaab. Many refugees subdivide household and property space to meet an array of cultural, social, and domestic uses such as sleeping, cooking, bathing, and business strategies. While ethnic and religious associations informed these systems of spatial organization, the most dominant factors were the size of the family and their diversified strategies for income generation.

Community spaces included markets, water pumps, and religious structures. The activity within these spaces varied in response to the ethnic composition of the immediate community; however all market spaces included food services, religious structures, dry goods and entertainment. Notably, aside from soccer fields, there were no specific spaces for children to play within any community.

Research conducted within a secured block at the rear of Ifo provided information on the long-term impact of pre-Sphere shelter and settlement planning. The block was constructed for the protection of vulnerable populations, including single mothers, orphans and handicapped persons. The block was located far from any agency services or camp markets, and guarded by Kenyan police. Housing in the protected block failed to provide security or any economic advantage, and as the mud brick housing was constructed without the provision of support services to the occupants, such as maintenance education, many of the structures were prone to collapse. Although attempts had been made by some of the residents to reinforce the structures, these improvements made little impact and the housing remained a constant threat to those who dwelt within.

The NRC shelter project was designed to comply with applicable Sphere standards. A new camp, Ifo II, was planned as a northern extension to Ifo with a grid plan, centralized

agency services, a mud-brick housing scheme, and an education campaign to inform refugees of the necessity of firebreaks and other safety measures. Individual plots with shared latrines were distributed amongst refugees while tools and water cans were provided to families to participate in the housing program. The NRC constructed model houses to educate participants on construction techniques and supplied necessary materials to construct and finish the housing in addition to the provision of local carpenters to attach the roofs.

Paid laborers, however, constructed the majority of housing within the NRC project. Families with access to remittances or a stable income were the first to take advantage of the NRC project, paying others to form the required 2,000 bricks and construct the houses. In addition, the families that attempted to construct their own homes complained that they lacked the necessary quantity of tools and were confronted by long lines at the water pump due to reduced water pressure as a consequence of the project. Most importantly, the majority of refugees did not trust the NRC housing scheme because of past experiences with mud brick houses when individuals died or were injured from the collapse of such structures during floods.

Chapter 6: Analysis

To determine whether the Sphere Shelter Standards accommodate the needs of the refugee population at Dadaab, I have analyzed the NRC Sphere shelter project according to its ability to meet the six Sphere minimum standards criteria, as compared to the self-help strategies of the refugee population to meet the same goals. I also use these criteria to compare the NRC Sphere shelter project to the housing created within the protected block in Ifo. Afterward, I discuss the viability of Sphere, in its relationship to these projects, as a tool for housing assistance within Dadaab and protracted refugee settlements.

6.1 Refugee Self-help Housing

It is not possible to expect the self-help strategies of the refugee community to satisfy all the goals of the Sphere minimum standards. As the standards are designed for use by humanitarian actors, it is obvious that agencies enjoy the benefits of centralized planning and particular tools unavailable to refugees. In the context of a refugee camp, refugees must settle and construct their homes on property determined by agency officials. Any poor decisions in at the early stages of settlement, such as many refugees living at low elevation points where they are at risk of flooding, is the fault of poor agency planning. As the refugees have the most power toward improving their own personal plot and household, their actions are can only be evaluated in relation to the criteria for Sphere

standards concerned with covered living space, design, construction, and environment. This excludes the criteria for strategic and physical planning.

6.1.1 Minimum Shelter and Settlement Standard 3: Covered Living Space

When many refugees first arrive within Dadaab, they struggle to build effective shelter. With only plastic tarps, refugees from urban centers frequently construct ineffective shelters and require the assistance of other refugees with greater experience. Nonetheless, shelters are quickly constructed and are adapted to the needs of the family with prolonged settlement. New construction and alterations include specified space for cooking, dressing, storage, washing, and eating.

As time goes by, shelters become more sophisticated and household plots commonly feature multiple dwellings. It is common for households to have separate dwellings for cooking, sleeping, and entertainment. Refugees with access to an income frequently invest in roofing materials and attempt to make their home more secure from perpetrators.

6.1.2 Minimum Shelter and Settlement Standard 4: Design

The majority of refugees in Dadaab live within traditional *uqaal* structures. Although these houses offer only limited protection, the simple design maximizes the utility of the protective tarpaulins distributed by the UNHCR. Furthermore, it builds upon the

traditional housing typology found within Somalia and is readily accessible as a viable housing structure by new arrivals. All of the housing strategies within Dadaab provide thermal comfort and air circulation. Unfortunately, the houses pose additional risks as they provide poor physical security and are easily penetrated by dangerous snakes, scorpions, and insects. While the mud brick buildings provide the greatest physical security from outsiders, they also pose the greatest threat to the occupants if not properly constructed.

6.1.3 Minimum Shelter and Settlement Standard 5: Construction

By fully integrating local skills, knowledge, and social capital, the informal housing construction process fully maximizes local opportunities and livelihood support systems. Salvaged and secondary materials are aggressively utilized while the transference of skills and knowledge within the community advances community participation and social mobility. For those unable to undertake construction tasks, support positions exist such as the provision of childcare or the exchange of services and goods in kind. As individuals and families are free to pursue the best quality of housing within the construction process, the building process remains ongoing during the course of settlement.

6.1.4 Minimum Shelter and Settlement Standard 6: Environmental Impact

The informal and self-help strategies of settlement and housing consolidation undertaken by the Dadaab refugees have done great harm to the local environment. The Dadaab population and the demand for local resources continue to grow faster than the

regeneration rate of any local vegetation, forcing refugees to travel increasing distances away from the camps. Subsequently refugees are exposed to increased insecurity to collect materials while the natural environment is continually destabilized.

The reliance on vegetation for housing does not, however, affect the local water usage. The ongoing population growth is quickly depleting access to minimum daily water requirements. The stripping of local vegetation has increased tensions between the refugees and the Dadaab host community because the local Kenyan population is dependent upon the same vegetation for housing and animal grazing.

The organic refugee settlement patterns conform to the natural landscape. Household plots integrate trees and natural contours of the land while households are also established in high-density clusters to maximize security and the shared use of resources. Some refugees attempt to grow trees or private gardens to subsidize rations although any attempts at food production are frequently oppressed by the police force. According to many refugees and aid workers, the Kenyan government did not permit the harvesting of crops as it was considered an incentive for permanent settlement. The government did its utmost to remove such incentives, in hope that refugees would seek repatriation at the soonest opportunity.

6.2 Pre-Sphere Agency Housing Assistance within Ifo Protected Block

The housing within the protected block did little to accommodate the needs of the inhabitants. Beyond basic protection from the elements, the location, planning, design, and lack of socioeconomic integration greatly undermined the health and well-being of the

resident population. The settlement does not meet local housing expectations let alone the goals of Sphere. Future attempts to upgrade conditions for vulnerable populations should promote socioeconomic integration, as little opportunity for improvement exists within this block.

6.2.1 Minimum Shelter and Settlement Standard 1: Strategic Planning

The agency-constructed housing within the protected block of Ifo camp fails properly to implement strategic planning in a manner conducive to the protection of the inhabitants. Although the protected block, at the time of its construction, was located a safe distance away from the urban center of the camp, the imposed isolation created new threats and hardships for the inhabitants. Certainly the site planning of the protected block properly accommodated land ownership issues, and prevented the most immediate threats. However it was not designed with any relationship to the existing humanitarian infrastructure nor did it facilitate the reduction of social tensions.

6.2.2 Minimum Shelter and Settlement Standard 2: Physical Planning

The protected block does not enable safe and secure access to housing or essential services. It has no relationship to existing social practices, nor does the vulnerable population living there have the means to integrate within society. Although it has access to clean water and security from the adjacent guard post (or potentially increased danger), the protected block has no access to community social spaces, health care, or agency

services. Although the protected block is located on a point of high elevation, and has not been affected by local flooding, this is perhaps the only benefit of its location.

6.2.3 Minimum Shelter and Settlement Standard 3: Covered Living Space

At the time of initial construction, the agency-constructed housing within the protected block may have been highly appreciated by its occupants. With mud brick walls and metal roofing, the houses were sturdy and climate-appropriate while the surrounding barbed wire fence provided needed protection. However, because the shelters were inconsistent with existing cultural practices and were constructed in a top-down manner by aid agencies, there was no social connection to these buildings and over time the housing became a source of danger.

The inhabitants of these buildings do not know how to care for them properly or how to repair them. In addition, the buildings were constructed by western agencies as an imitation of Sudanese and Gambellan structures, and consequently the occupants lacked the technical sufficiency necessary for long-term use. As the housing was not constructed in collaboration with the local population, they quickly transformed from an asset into a threat. There is likewise no designated space for the orphaned children and elderly, who are forced to live within this compound. Notably, there is not even a designated school building.

6.2.4 Minimum Shelter and Settlement Standard 4: Design

The protected block was constructed as a single unit of space, with individual shelters distributed in a grid manner. There are no individual or family plots of land within the protected block, no designated roads or paths, no designated community space, and no specified use for any buildings. Compared to the organic settlements of Ifo, the protected block was constructed with no discourse between the aid agency and the future occupants of the space. Although it does utilize local materials, it does not facilitate any local community practices. While local Sudanese and Gambellan housing informed the design of the shelters, the population residing in these shelters is Somali, and their lack of familiarity with mud brick housing has only furthered the deterioration of the buildings and the general well-being of the immediate community.

6.2.5 Minimum Shelter and Settlement Standard 5: Construction

The construction process for housing within the protected block utilized local materials, but failure to perceive the linkages between the local economy and housing construction failed to encourage increased market activity. Consequently the resident community is disconnected from the construction process and lacks access to the necessary tools and skills required for upkeep or improvement. Although the housing would never meet the quality standards of any national or local building codes, if these even exist, at the time of construction the housing would have been considered of superior quality within the local context. Unfortunately, as time passes, the housing has become sub-standard to local expectations.

6.2.6 Minimum Shelter and Settlement Standard 6: Environmental Impact

The agency-constructed housing and planned settlement within the protected block of Ifo camp was environmentally intensive at the time of construction, as it required large quantities of water. These structures are composed of local soil, making the environmental impact of these structures negligible over the long term. However, the isolated location and shelter scheme have had no positive impact upon the local environment either. There are no trees to facilitate soil stabilization and no evidence of environmental rehabilitation measures.

6.3 Sphere Housing Program by Norwegian Refugee Council

The Sphere housing program by the NRC attempted to integrate the local economy, build upon local practices, and provide living conditions that meet local standards. However it generally failed to integrate the linkages between local housing and livelihood strategies among refugees. As a consequence many new complications were created where they could have been avoided. Furthermore, it missed an opportunity to promote the integration of local Kenyans with the refugees, but relied upon short-term paid refugee labor for refugee housing. It did nonetheless provide the foundation for a community equipped with equitable access to services in addition to a durable housing form, if additional social programming is pursued to instruct program participants in methods of maintenance.

6.3.1 Minimum Shelter and Settlement Standard 1: Strategic Planning

As the objective of Ifo II is to provide an expansion to an existing refugee settlement, there is no need for the project planners to consider issues such as the repatriation or alternative forms of settlement. During the planning stages of the new settlement, the NRC cleared an available plot of land of appropriate elevation to avoid the annual flood risk. Hazardous materials were removed and irrigation channels were dug. The NRC conducted a six-week comprehensive assessment of the new settlement and integrated the findings of this assessment into the planning process. This assessment guided the planning progress and allowed for the partial integration of traditional livelihood strategies and local pre-existing infrastructure.

6.3.2 Minimum Shelter and Settlement Standard 2: Physical Planning

The NRC properly implemented the bulk of Sphere Standards within the physical planning of Ifo II. They provided an appropriate infrastructure for clean water, health care, and administrative facilities. Ample space was provided for the evolutionary growth of the settlement and has worked to promote the role of firebreaks, irrigation canals, and proper sanitation. Ifo II is located at a point of high elevation and is not subject to the same flood risk as Ifo I. The site planning of Ifo II even includes an open recreational area.

The physical planning of Ifo II works against the natural topography. In the initial phase of construction, Ifo II was razed, leveled and subdivided into a geometric grid for the construction of schools, warehouses, and refugee plots. Consequently it has no natural

vegetation, and has been stripped of all shade trees. There is space provided for a market, but no attempt to better manage the vegetation in the surrounding hinterland. The public recreation area has no particular features or structures of interest, but is simply a big flat space with no obvious utility. There are otherwise no community spaces, plazas, or planned spaces for churches or mosques.

6.3.3 Minimum Shelter and Settlement Standard 3: Covered Living Space

The NRC housing program provides dignified living space for families, relative to local standards and resources. The shelters provide protection from weather, improved security, and improved privacy. The structures are climate appropriate and households are free to build outlying structures within their plot for additional uses.

Although the shelters are a structural improvement to the mud brick housing constructed by the Sudanese and Gambellan populations, the housing program does not integrate well with refugee livelihood strategies. As a result of the excessive labor required to construct one brick house, it is difficult for many families to participate in the project. Only wealthy families can afford hired assistance, or can acquire additional tools to advance the construction schedule. Thus the NRC housing program has not provided an equitably accessible housing solution. As the families with the best financial and familial resources are likely to pursue mixed livelihood and settlement strategies, such as sending their children away to school or utilizing their connections to live in Nairobi, the Sphere housing program produced by NRC does not provide a viable housing strategy for the general population which does not have such options. The housing program may even

reinforce existing power structures by further demarcating social classes and marginalizing vulnerable populations.

6.3.4 Minimum Shelter and Settlement Standard 4: Design

As the mud brick housing is based upon a pre-existing housing solution within the camps, its design is well rooted within the regional demands for thermal comfort and security. Local practices have guided the design and construction of the housing, and have informed details such as roofing materials and foundation size. However, the mud brick is based on a housing strategy primarily understood by only a small fraction of the overall population. As the Dadaab camps and the residents of Ifo II are over 90% Somali, and very few residents of Ifo II are familiar with the processes necessary to maintain and repair their housing over time. The mud brick housing in the protected camp of Ifo I, wherein maintenance and repair of these structures has resulted in inevitable failure evidences the significance of this risk.

In comparison to the organic mixed land use patterns of Ifo I, the land use plan of Ifo II does not provide the same degree of spatial flexibility. Many of the plots feature an *urqaal* home and a perimeter fence with effective access to roadways, latrines, and water taps, yet there are no trees, no gardens and a distinct lack of flexible public space. As the NRC cleared the land to construct Ifo II on a large, flat grid, individual plots lack any natural advantage to families. Within Ifo camp, many land plots contain features such as minor variations in elevation, natural shade, or are spatially oriented to increase security. According to a discussion with a CARE administrator, physical conflicts have been known

to take place within the camp as refugees compete for the cooling shade provided by trees within the harsh climate of the Somali desert. While agency programs have reduced internal conflicts within the camps by focusing on traditional issues of tribalism or religious tension, the NRC land use could support further conflict mitigation within the urban design of the camp. Also, Ifo II presents only limited opportunity for the future growth of viable public spaces and community institutions. Animal husbandry, churches, mosques, or informal *madradas* have not been included within plans for camp expansion and design although these are important aspect of the local economic and cultural landscape. Likewise, public space and street space do not take into account opportunities for youth or children. As the NRC has pursued youth programming in the last two years, it seems that their efforts could be better supported if imbedded in the design of the settlement.

6.3.5 Minimum Shelter and Settlement Standard 5: Construction

The NRC project integrates self-building practices and provides economic opportunities to the local population. Local carpenters have the opportunity to acquire work, and jobs are available to refugee and local Kenyan populations. Although building codes do not exist, the structures meet or exceed local expectations and integrate local techniques and materials with a managed impact upon local resources.

Hiring local contractors and carpenters, however, does not develop a sustainable linkage between refugee housing consolidation and the local economy. As the project fails to engage the preexisting informal economy that supports mass settlement and housing

consolidation, it does not truly integrate livelihood opportunities. Instead, the NRC project provides limited and artificial support to a small group of refugees and community members who already maintain distinct economic advantages within their community as skilled craftsman. This could potentially lead to the inflation of traditional building materials, such as *kamooras* sticks, in local markets as skilled craftsman can acquire higher wages participating within the NRC project and have less time to dedicate toward materials collection or small local projects.

Although the NRC program was designed to allow refugee families to help themselves, the distrust of mud brick buildings throughout the camps marginalizes the majority of families who could not invest several weeks of labor in constructing a new home. Many families are already preoccupied with the necessity of acquiring paid labor jobs, the sale of goods in the market, attending school, collecting rations, seeking legal assistance, or seeking out and pursuing additional livelihood strategies. As a result, only the families with a surplus of household resources could afford to take the time and the risk to participate in the NRC housing program.

6.3.6 Minimum Shelter and Settlement Standard 6: Environmental Impact

In 2007, staff members of the NRC were surprised by how much the construction process had affected local water availability. Water access had to be limited to certain hours of the day and social tensions increased as more families began to participate in the project. The situation has worsened dramatically since 2007, as in 2009, there were only four boreholes per 91,000 people that are working at 20 to 22 hours per day and UNHCR

official recently confirmed that it remains a problem at this time (Médecins Sans Frontières, 2009). Now that water is such a limited resource, the problem extends beyond issues of low pressure and long lines and now affects the basic survival of the population. While mud brick housing may reduce impact upon the local woodlands, it is now a threat to the water availability of the entire Dadaab population.

6.6 Chapter Summary

To determine if the Sphere Minimum Standards in Shelter and Settlement effectively meet the needs of refugees within a protracted settlement, I applied these standards to the informal shelter strategies pursued by the Dadaab refugee population, the shelter project implemented by Oxfam in the late 1990s within the protected block of Ifo camp, and the NRC shelter project of Ifo II. As Sphere standards are founded upon the Sphere Humanitarian Charter, a framework designed for the to implementation of human rights values, the application of Sphere standards to these three housing strategies is an appropriate tool to identify the strengths and weaknesses of each strategy. Within instances that the self-help or pre-Sphere strategy provides benefits outside the Sphere standards, one can identify opportunities for improvement within the guidelines. Within circumstances that the NRC project utilizes the Sphere standards to improve the quality of life for the refugee population in a manner equal to or beyond their own efforts, one can identify the strengths of the Sphere standards within Dadaab camp.

The capacity of refugee housing to conform to the criteria of the Sphere standards was entirely dependent upon the economic assets of the individual household and the

amount of time the family had been within Dadaab. Those families with the longest residence and the most diversified income strategy, including access to remittances from resettled family abroad, were able to construct the most sophisticated housing. A constant challenge, however, was access to information, as many housing strategies led to adverse environmental impact or the shelters were constructed in a manner that posed later dangers, as exemplified by the collapse of mud-brick housing. At other times, viable strategies were hindered by government policy, such as the Kenyan government's denial of agricultural production. Had refugees been permitted to pursue agricultural activities, many of the building materials could have been continually replenished. Under the current circumstances the high demand of building materials has stripped the land bare, creating new dangers for those who must wander into the wilderness to collect building supplies.

Within the protected block, the agency-constructed housing failed in many ways to meet the needs of the resident population in comparison to the self-help strategies and the NRC program. The protected block failed to provide access to services, severed economic activity, was socially marginalizing, and did not provide any form of social or communal space. While the housing may have surpassed local standards at the outset and likely provided much needed protection to its residents who lacked sufficient resources to house themselves safely, over time these structures have degenerated and now pose a great threat to inhabitants. The lack of knowledge among residents to maintain and repair these structures, in addition to their inability to access resources for such measures, has provided negligible benefit over the long term.

The NRC project has made an effort to integrate the local economy, provide living conditions that meet or exceed local standards, build upon local practices, and provide access to goods and services. However, they also missed opportunities to better integrate the refugee population with the local host community and pursued a housing scheme that encounters resistance and distrust among refugees. Failure to recognize the preexisting linkages between housing and the local economy has also reduced the acceptance and support of the program, as many refugees believe they do not have the resources to participate. Consequently refugee families that already benefit from some degree of improved living have more immediately embraced the program, at the potential risk of further marginalizing vulnerable populations

Chapter 7: Conclusion

7.1 Sphere Standards for Housing Assistance within Dadaab

Although it is evident that Sphere Standards do have an important utility within housing assistance, there remain many opportunities for improvement. Accordingly the feasibility of implementing Sphere Standards for shelter within Dadaab must be addressed on multiple fronts. As Sphere Standards provide concrete goals in conjunction with general guidelines for implementation, the initiatives of the NRC must be weighed both in combination with and separately from Sphere Standards.

7.2 NRC's Use of Sphere Standards

While the NRC worked to uphold the goals of the Sphere Standards, the specific planning decisions embraced by the agency often only met Sphere criteria in spirit, therefore failing to address particular issues in a manner that could promote significant change. The NRC specifically did little to ingrate the perspectives of the refugee community within the planning process, but analyzed the internal dynamics of the community through the lens of an outside, humanitarian expert. For example, while the advantages of local mud brick housing were properly identified and then merged with technical expertise to create an improved housing technology, the failure to spend time with the refugees who lived in these homes also failed to recognize important nuances. Such oversights eventually led to eruptions of tension and conflict between members of the refugee

community, and among the refugees and the NRC. These oversights are also evidenced by the failure to integrate community spaces, religious institutions, and informal economic processes into the planning of Ifo II.

In a similar manner, by approaching the construction of Ifo II and the housing of refugees as a technical problem, many of the guidelines followed by the NRC were followed to a limited extent and are not sustainable. It is absolutely beneficial to the local economy to inject capital through programs that pay skilled refugees; yet how does this monetary injection facilitate the overall economic housing and economic linkages for over 240,000 refugees? By failing to diagnose an economy of scale, the NRC is only providing band-aid assistance to a small group of refugees and does not actually contribute to the overall well-being of the camp residents. While the employment of 600 men and women is an impressive and expensive undertaking for an NGO, it does not build upon the housing and economic strategies utilized by the majority of 240,000 residents. This problem has become exacerbated since initial field research in 2007, as the NRC initiated Ifo II with the intention to relocate 30,000 refugees from the flood zones of Ifo, yet the surge of violence in Somalia has introduced over 60,000 additional refugees into the camps, undermining much of the NRC project (Cameira, 2007; Human Rights Watch, 2009).

Many of these disadvantages could have been avoided while working more tightly within the Sphere guidelines. An attempt to build upon the longstanding linkages between housing and economic activity may have enhanced existing housing practices and supported the improved housing of all refugees, including new asylum seekers. Likewise, instead of attempting to reduce environmental degradation by using mud bricks, and thus

altogether avoiding the role of the natural environment within the lives of the refugee population, concerted efforts may have been made to encourage vegetative growth and refurbish the landscape. By highlighting the mutual interdependency upon the environment by Kenyan and refugee populations, the NRC might have received programming support by working in coordination with the Kenyan 2006 *Refugee Act*.⁴ In this manner, shelter planning could have coordinated with government and refugee interests as mutual stakeholders. Ultimately the NRC followed the Sphere guidelines, yet the agency did not recognize or address how the all the standards, guidelines, and underlying ideologies of the Sphere charter are interconnected.

It is important nonetheless, to recognize the significant role Sphere has had in improving humanitarian housing assistance. Had the NRC not utilized this set of universal guidelines, the shelter program may have easily resembled the housing constructed by Oxfam within the protected block of Ifo camp. Such housing and settlement planning was certainly constructed by the good will of the humanitarian agency, and reflects an attempt by Oxfam to integrate local building practices, available land, and the protection needs of the refugee population into the project. However, the Oxfam project did not provide a sustainable settlement solution to the resident population. Instead, it furthered refugee security problems, and according to Sphere Standards, failed to provide the minimum Standards necessary for a dignified life.

⁴ Article 7, sections *m,n,o.* and *p* of the 2006 *Kenya Refugee Act* advocates programs that support the “sustainable use of resources in designated refugee hosting areas” while promoting the “peaceful and harmonious co-existence between the host communities and refugees” even to the degree that it advises “the Minister on the soliciting funds for refugee assistance programmes which have a positive impact on host communities.”

By equipping agencies such as the NRC with Sphere Standards, the ongoing expansion of the Dadaab camps by multiple actors will provide a coherent and measurable improvement in the quality of life for refugees. If the funding is available, agencies are now better equipped to work toward bringing the aged infrastructure, housing, and design of the camps up to an equitable standard. Sphere is still in its infancy within humanitarian aid, yet as an organizational framework it has done much to improve agencies and agency coordination. As Sphere becomes more integrated within organizational structures, it is evident that it will likewise facilitate an improvement in emergency assistance for recipient populations.

7.3 Sphere Standards within Dadaab and Protracted Settlements

Regardless of the particular decisions and initiatives engaged by the NRC, all activity was contextualized by the reliance upon Sphere Standards. While the Sphere Standards provide ample flexibility for implementation, as a composite of lessons learned by an array of international agencies, the standards maintain enough specificity to become subject to independent analysis. As Sphere was established to accommodate emergency situations, its use within the protracted Dadaab settlement provides ample opportunity for review.

Sphere did not exist when Dadaab was founded. While UNHCR maintained general standards for its own agency, humanitarian aid provided by any coordinating partner did not necessarily comply with these standards. The evolution of the Dadaab camps has consisted of sequential attempts to manage an existing crisis, with little integration of long term planning. Where improved planning has come into place, it has always taken place in

reaction to a preceding problem in hope to avoid the same problem in the future. Such planning practice has lacked imagination to predict and address future complications. Yet repeatedly, camp planners have underestimated future population flows and demands.

Although the refugees of Dadaab rely upon rations, legal aid, and socioeconomic programs from the UN, CARE, and other assorted actors, the refugees ultimately rely upon their own initiative to survive and improve their lives. Consequently, elaborate socioeconomic networks have evolved in the camps over 20 years of settlement that cannot be found in an immediate crisis. These systems connect the local to the global, as cellular communications and money transfers integrate the residents of Dadaab into the international economy. Constrained by government policy, the refugees have no access to the mechanisms necessary for economic growth, such as transportation, or the resources to produce an export product. Nonetheless, the concentrated social interdependence identifies Dadaab as a legitimate community, embedded with complex relationships and economic linkages.

As a tool for immediate disaster relief and critical humanitarian emergencies, Sphere has the potential to facilitate the needs of refugees living within protracted encampment, but lacks the means to fully equip the humanitarian actor for the task, as technical standards are not enough. Within a protracted settlement, agencies must work to address the structural frameworks that dominate the daily decision-making of refugees and underlay the basis for the settlement. Within Dadaab, this means agencies such as the NRC must work to engage the provincial and national government in order to enhance the refugee housing strategies by involving the government and the Kenyan community within

the planning process. Furthermore, it requires that the planning process place greater focus upon the conflict that is prompting the persecution and displacement of the Somali people.

Another way of investing this concern is to recognize that the greatest weakness of using Sphere guidelines within Dadaab is the failure to physically connect the needs of the resident population to the basis of their refugee status. Tribal, religious, and governmental conflict within Somalia is the underlying factor for the need for asylum and aid within Dadaab, yet Sphere does not provide a means to utilize an understanding of this conflict in camp planning. Planning efforts in Dadaab have always failed to estimate the influx of future refugees and future demands, yet even with the aid of Sphere guidelines, the NRC failed to do the same. By integrating an understanding of the conflict that drives the demand for Dadaab into the planning framework, planners may take a proactive approach toward conflict mitigation and improved security.

Although Sphere makes casual reference toward working with local laws and governments, it does not highlight the capacity of planners to creatively work with state and international law. As long as planners continue to conceive of national policies as constrictive to their processes, the resulting program design will reflect these constraints. It was own my experience within Dadaab that prompted the decision to pursue a year of study concerning Refugee and Migration Law as I left the camps thinking nothing could be done to provide sustainable initiatives for refugees in Kenya. Unfortunately, I suspect many planners feel the same, but rather than stepping outside the training of their profession, they attempt to work within a limited technical framework. Consequently,

problems such as Dadaab are approached as a technical problem, wherein technical standards are utilized to provide technical solutions to socio-cultural and economic problems.

In a similar manner, I have found that organization of the Sphere Standards does not promote the holistic approach toward humanitarian aid that is advocated within the Sphere Charter. By dividing technical Standards into multiple areas of expertise such as shelter, water, protection and health, humanitarian professionals within Dadaab would work within their area of expertise and fail to address the relationships between sectors. Social events and inter-agency meetings would coordinate various projects and resources, but by using a divisive sector approach, new problems were easily created such as the NRC housing program reducing water access.

7.4 Final Thoughts

The Sphere Humanitarian Charter and Minimum Standards for Disaster Relief represent(s) a critical asset to the role of humanitarian actors. It has facilitated improved coordination among agencies and has improved the quality of aid to recipient populations. This is evident within the Dadaab refugee camps of north eastern Kenya, wherein the Norwegian Refugee Council (NRC) utilized the Sphere Standards for shelter assistance. Initiated in 2007, the NRC constructed a new refugee camp, Ifo II, to expand upon a preceding camp for new arrivals and to relocate households afflicted by floods within Ifo camp. Within Ifo II, the NRC implemented a quality housing program to improve the local living standard and hired local laborers to assist in this project.

Unfortunately, as the complex socioeconomic linkages formed within a protracted settlement are outside the sector-based and technical focus of the Sphere Standards, the NRC was not equipped to provide a long-term, and sustainable solution to the refugee population. The NRC housing scheme represents an excellent improvement over previous agency-based housing initiatives, and much of this improvement can be attributed to the utilization of Sphere Standards. By working outside of the technical parameters of camp planning, and building upon connections between the local camp economy and the shelter strategies of the refugee population, the NRC may have a means to enhance its program.

Yet to provide sustainable assistance within a protracted settlement such as Dadaab, the Sphere Standards must expand beyond technical concerns and integrate structural parameters of the settlement. Within Dadaab, this includes the underlying conflict in Somalia, the demands of Kenyan refugee policy, and the mutual environmental and economic interests of the local Kenyan and refugee populations. By integrating the political, legal, and socioeconomic framework of the settlement within the Sphere Standards, humanitarian actors will be better equipped to produce viable solutions to complex humanitarian problems by building on the capacities of the refugee population.

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