



**KREYOL LIVING WISDOM
& HAITI REGENERATION**

A PATTERN LANGUAGE APPROACH

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Haitian Vernacular Ingenuity



Grand Boulage

A VISION FOR THE REGENERATION OF HAITI

In the critical deliberations about how best to rebuild, the incredible vitality with which Haiti has traditionally fashioned a sustainable, durable, healthy, and perhaps most remarkably, a beautiful environment, must be acknowledged and harnessed.

Rebuilding Haiti must connect landscape stewardship with living off the land, it must renew the physical and economic infrastructure that links the farms to the cities, and it must provide for the construction of durable homes in safe communities.

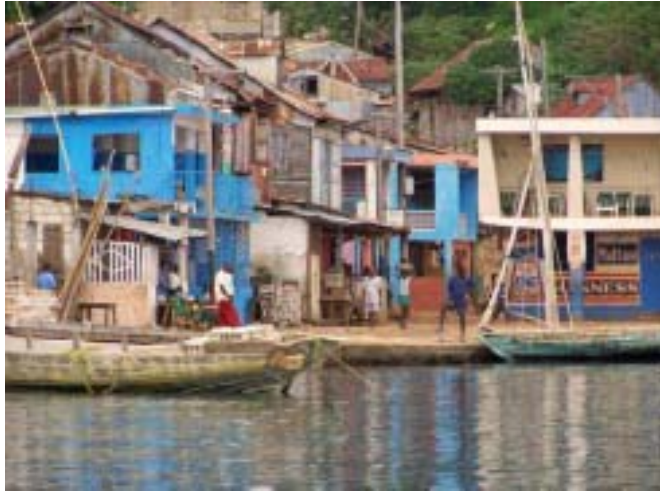
Although these rebuilding elements are all interconnected--and must be coordinated with an overall, global vision--they will be actually implemented on the ground, brick on brick, seed by seed.

Thus, in order to really stick, this rebuilding must have, at its foundation, an understanding of Haiti's dynamic and innovative Kreyol culture, and its unique blend of African, European and American traditions.

Herein we propose one method, out of the many possible, by which reconstruction of Haiti can emerge from the healthy and vital parts of its Kreyol legacy.

This vision takes two forms, the first a tentative outline of the patterns of this legacy, and the second is a series of case studies that demonstrate how this approach might be applied to real projects.

Of course, as this work will continue, over the next decade or so, this document is really just a fleeting snapshot of a dynamic and living process.



Pestel



Jacmel

KREYOL LIVING WISDOM

We have termed the Haitian environmental legacy “Kreyol Living Wisdom”. It is a touchstone and inspiration for rebuilding, a magnet for investment, and a priceless stake in establishing Haiti’s full partnership on the world stage.

Kreyol Living Wisdom is the means by which culturally connected reconstruction and development can actually happen. It is the way that ordinary Haitian citizens can shape the truly sustainable regeneration of their country, through empowering and leveraging the legacy of their native experience and intelligence.

Kreyol Living Wisdom must be thoroughly documented, archived and disseminated, in order to bset fulfill its full potential. The initiation of this effort is our intention with this work herein.

TEN ESSENTIAL PATTERNS

What can Haiti teach us? This question has guided the development of this vision. It is based on really looking at how Haitians have actually best lived in and crafted their environment, as well as their dreams and aspirations to a healthier society. Herein we have focused on ten essential patterns that represent the full spectrum of this wisdom.

These patterns include:

1. Landscape Stewardship
2. Living Off the Land
3. Kreyol Settlement Structure
4. The Lakou
5. The Galri
6. The Jaden
7. Rural Building Models
8. Urban Building Models
9. Color, Pattern & Ornament
10. Kreyol Architecture



Rural Lakou



Market

1. LANDSCAPE STEWARDSHIP

The richness and variety of Haiti's landscape, from the coastline and mountains to the river valleys forms a dynamic ecological system. The rebalancing, integration and stewardship of this system must form the basis of Haiti's regeneration.

By replanting its forests, replenishing fertile soil, and providing clean water for every citizen, by thus renewing the life and beauty of its natural landscape, Haiti can become a model of environmental restoration and recovery for the world.

Every single increment of Haiti's regeneration must include this pattern of Landscape Stewardship, and it must encompass Haiti's cities, towns, and villages, as well as its wilderness and agricultural regions.

2. LIVING OFF THE LAND

Restoration of Haiti's natural landscape must be connected to renewing and nurturing a bountiful agriculture base, to provide food and work. The land itself is not the only agricultural resource, farming wisdom is critically embodied in the Haitian people as well.

Agriculture renewal projects will range in size and type of operation, including from kitchen gardens to large-scale ranches, from family farms to the commercial manufacture of gourmet food and farm products.

Although this process must have a coordinated, global vision, it must be actually put into action piece by piece, on the ground. We must continuously observe what works best and build on it, observe what works best and build on it.



Cap Hatien



Rural Village



Bidonville



Village Lakou with. Voudon Peristyle

3. KREYOL SETTLEMENT STRUCTURE

From the rural farming compounds to the bustling metropoli of Port Au Prince and Cap Hatien, Haiti's human settlements incorporate a range of large grain economic, social, and architectural patterns, from the French & Spanish Colonial gridiron city plan, to the more topographically determined landscape and layouts of the agricultural villages and urban bidonvilles (informal settlements).

Colonial planning is centered on natural and human resource exploitation. Conversely, a program of refurbishing the bidonvilles could provide a prospect for the emergence of intense urban as well as rural landscape restoration, an opportunity to humanely harness and leverage the social genius and energy of Haitians in the cities.

4. THE LAKOU

In Kreyol, the shared yard or courtyard is called a Lakou. Traditionally this includes the sharing of material items, chores, food, space and child care.

It has been said that the Lakou, even more than the buildings around it, is the real home of those who live there.

In rural settings the Lakou is the yard of the family or extended family, the communal work space of the farm compound.

In towns and cities the Lakou can occur at the interior of the block. In both contexts a more public Lakou can emerge as the center of a neighborhood, connected to, or emerging from intimately scaled streets spaces.



Hotel Florita, Jacmel



Leogane

5. THE GALRI

A major contribution to the life of public spaces is made by the Galri (porch) arguably the actual “living room” of Haitian buildings.

For climatic and cultural reasons, Haitians perform many of their living and social activities functions outside, in the Galri, sheltered from the sun and the rain. The interior of the house mainly serves as a place to rest and to store possessions.

In denser urban areas the Galri can be two stories or more tall, wrapping around buildings, and even linking separate buildings. Their intricately detailed ornament manifests the character and identity of their builders, owners and residents, as well as that of the cities and towns themselves.

6. THE JADEN

Haiti’s gardens possess immense potential, including for a secondary food production source and as a component of an integrated water resource management system. Food production at even the smallest scales is vital in a country of chronic shortage. Storm water, grey water and even night soil can be fruitfully leveraged. And even ornamental plant systems serve as symbiotic wildlife habitat for birds and insects as well as elements of personal and civic identity and pride.

This garden network, from the scale of urban window boxes, rural backyard kitchen and herbal plots, to community gardens on undeveloped parcels, provides incremental support for the Landscape Stewardship and Living Off The Land patterns.



Ti Kay

7. RURAL BUILDING MODELS

The simple two room buildings with Galri, The Ti Kay & the Kreyol Cottage are the essential Haitian rural house models, starting as transitional shelters, over time transformed into long-life homes. Conventionally built with light frames, they are easily adapted to a variety of construction systems.

Whatever the construction, new or rebuilt, the best examples make for a secure and durable shelter, allow for owner participation and adaptation, and provide for expression of community and individual identity.

These buildings never stand alone. They are always integrated into landscape and agricultural patterns, and most especially into the social context of the “Lakou.”



Kay Chamhot, Port Au Prince

8. URBAN BUILDING MODELS

In Haiti’s cities, the Kreyol Town House is the typical building model. Like the rural buildings, it has a “Galri” that connects it to the streets and shared public spaces. It allows for extraordinary flexibility and variety in layout and use.

The “Kay Chamhot” (house with tall rooms) is an excellent example of the creative urban transformation of the “Ti Kay” rural house model.

The largest examples of the Kreyol Townhouse, the “Grand Maison” can cover a full town block, with multi-story wraparound Galri, landscaped interior courtyards, and beautifully ornamented columns and balconies. The Kreyol Town House is a vibrant expression of Haitian civic life.



Cap Hatien Doors



"Gingerbread" House, Port Au Prince

9. COLOR, PATTERN & ORNAMENT

In Haitian culture color, pattern and ornament are essential elements.

Overall, the approach to building and landscape is straightforward and practical, thus it is often through decoration that particular places are distinguished and celebrated.

Haitians employ color, pattern and ornament in their environment because it says who and where they are, and it is beautiful and celebratory.

Certain colors and decorative elements can have specific meanings and significance.

Consciously and skillfully employed, they can enhance the legibility of the environment.

10. KREYOL ARCHITECTURE

The full artistic potential of the Kreyol, and indeed of African American architecture, can be seen in Haiti's late 19th and early 20th century Gingerbread Houses.

They are aesthetically expressive, structurally ingenious and adaptively responsive to the extremes of the Caribbean climate.

Although their formal sophistication marks them as works of the highest artistic quality, in their fundamental practicality and structural transparency they drink deeply from the Haitian vernacular, particularly the "Kay Chamhot" (house with tall rooms) and the Kreyol Plantation House. They exemplify the Haitian Kreyol blend of African, European and American influences.



CASE STUDY--EXEMPLAR COMMUNITY--IN THE RURAL VILLAGES, THE MAIN STREET IS A LAKOU

Landscape Stewardship & Living Off the Land Patterns At The Rural Village Scale Includes:

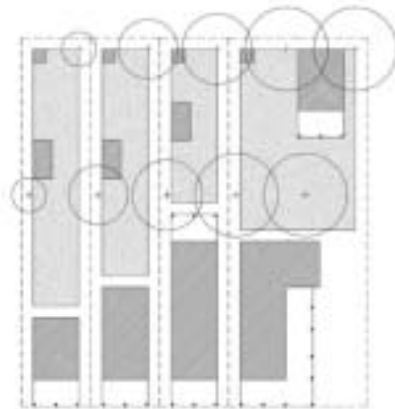
- ↓# Connection to & Support of Reforestation & Soil Replenishment Projects
- ↓# Drainage Hedgerows & Swales Connected to Integrated Water Resource Management
- ↓# Trees Planted for Shade & Fruit
- ↓# Kitchen Gardens (Jaden Pre Kay)
- ↓# Community Gardens at Undeveloped Village Lots

Kreyol Settlement Structure Patterns At The Rural Village Scale Includes:

- ↓# Enhancing the Relationship between the Street, Lakou & Galri to Create Intimate Semi-public Places
- ↓# Integrated Water Resource Management Including Clean Water Harvesting, Storm Water & Sewage, Connected to Roads & Streets
- ↓# Connecting Agricultural Villages to Larger Scale Economic, Social & Communications Networks



CORE MODEL PLAN



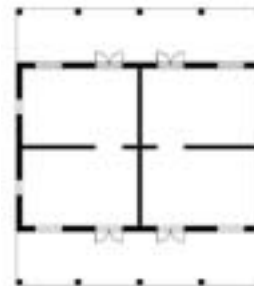
INCREMENTAL ADDITIONS

CASE STUDY--TI-KAY COTTAGE

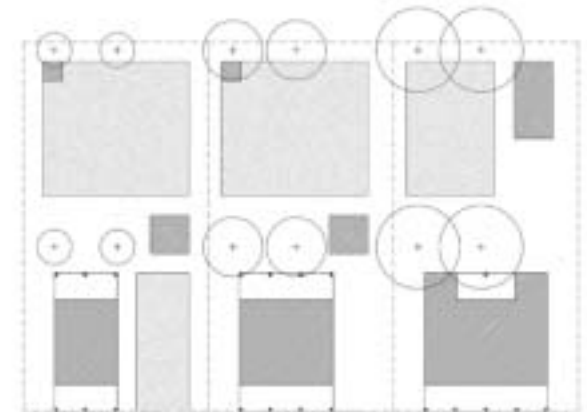
The Ti Kay or Maison Bas (small house/shotgun house) is the basic starter model of Haitian housing.

TI-KAY CORE MODEL

- ↓# 1 Story, 2 Rooms, Outside Bath (on Transitional & Rural Sites Only)
- ↓# ~3.5m Ceilings
- ↓# ~3.6m x ~9.3m= ~33.5 m² (Including Galri)



CORE MODEL PLAN



INCREMENTAL ADDITIONS

CASE STUDY--KREYOL COTTAGE

The Kreyol Cottage accommodates a full range of expansion, from a simple two bay "Maisonette" to a two story "Grand Maison"

KREYOL COTTAGE CORE MODEL

- ↓# 1 Story, 2 Rooms, Outside Bath (on Transitional & Rural Sites Only)
- ↓# 3m-4m Ceilings
- ↓# ~10.8m x ~9.6m= ~103.4 m² (Including Galri)



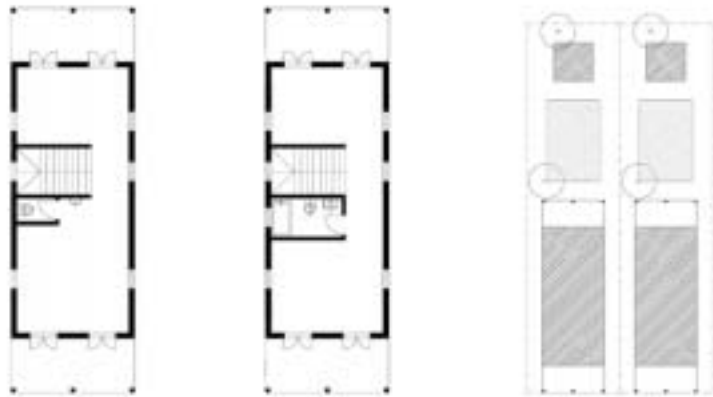
CASE STUDY--EXEMPLAR COMMUNITY--MARKET STREETS ARE THE HEART OF HAITIAN TOWNS

Landscape Stewardship And Living Off the Land Patterns At The Urban Level Include:

- ↓# A Garden Network at a Range of Scales, from Window Boxes & Kitchen Gardens to Urban Community Farms & Gardens at Publically Accessible & Undeveloped Sites
- ↓# Green Streets (Street Trees & Plantings) as Part of Integrated Water Resource Management--Clean Water Harvesting, Storm Water & Sewage

Kreyol Settlement Structure Patterns At The Urban Level Include:

- ↓# Neighborhood Scale Lakous at the centers of Blocks
- ↓# Urban Sidewalk Galri Creating a Caribbean Type of "Great Street"
- ↓# Urban Infrastructure Connecting the Entire Country and Region
- ↓# Buildings & Neighborhoods that Accommodate & Nurture a Mix of Residential & Working Life
- ↓# A Program of Building Back Better in the Bidonvilles



GROUND FLOOR

UPPER FLOORS

SITE PLAN

CASE STUDY--THE KAY CHAMHOT

The Kay Chamhot (house with tall rooms) is an extraordinary Caribbean type, a freestanding urban mixed use building that supports Market Streets.

KAY CHAMHOT CORE MODEL

- ↓# 2 Stories, 4 Rooms, 1-1/2 Baths
- ↓# 2.5M-3.5m Ceilings
- ↓# ~4.8m x ~15m x 2 Stories = ~144 m2 (Including Galri)



GROUND FLOOR

UPPER FLOORS

SITE PLAN

CASE STUDY--THE KREYOL TOWNHOUSE

The Kreyol Cottage accommodates a full range of expansion, from a simple two bay "Maisonette" to a two story "Grand Maison"

KREYOL COTTAGE CORE MODEL

- ↓# 1 Story, 2 Rooms, Outside Bath (on Transitional & Rural Sites Only)
- ↓# 3m-4m Ceilings
- ↓# ~10.8m x ~9.6m = ~103.4 m2 (Including Galri)



CASE STUDY--HEALTHY LITTLE HOUSES & STRONG HEALTHY COMMUNITIES

Utilizing Kreyol Living Wisdom, Ti Kay Sante and their attendant settlement and landscape structures can be inaugurated as an economical, safe, and healthy transitional shelter, and over time be improved and expanded as aspirational, safe and healthy permanent structures.

The apparent small size of the Ti-Kay Sante is belied by its larger outdoor and communal or “virtual” footprint. Stemming from its African and Kreyol cultural origins, the context of the Haitian kinship and neighborhood relationships, and the reality of the tropical Caribbean climate, the exterior spaces of the Galri, Jaden and Lakou extend and overlap the Ti Kay, to form the real center of both the dwelling and settlement configuration—so that the

interior of the house itself is actually a kind of servant structure, a “cabinet” for storage and sleeping.

The regeneration of both Haitian domestic life and the Kreyol settlement patterns must center on the Lakou, Galri and Jaden, which have been almost entirely overlooked in the conventional aid response, so that even many Haitians themselves seem to have lost touch with their significance.

As the Ti Kay Sante will be built using local indigenous building knowledge and materials, they are reasonably priced, durable, and readily maintained, well within the means and aptitude of most Haitian citizens. They thus exemplify and celebrate the best of “Kreyòl Entelijans Viv”.



CASE STUDY--FÒ LAKOU SANTE--OVERALL SITE PLANNING PATTERNS

1. The Lakou (shared courtyard) is the center of Haitian community.
2. The Galri (Veranda) mediates between the public and private realms.
3. The Galri and the major openings of buildings are oriented to the North and South, to mitigate solar gain and maximize shading.
4. The Lakou is located close to the main road or street, reinforcing the surrounding settlement structure, and balancing access and privacy.
5. Mature trees are a treasure to be honored and celebrated. Mature existing trees create a shaded and enclosed place for the Lakou.
6. Gateways mark entry.
7. Fences, Hedges and walls mark boundaries.
8. A larger mixed-use building anchors the Lakou compound and connects directly to the larger scale street and road settlement structures.
9. Areas are reserved for agriculture and landscape restoration.
10. Topography is considered, in terms of drainage, breezes and views.
11. Soil and slope conditions are considered for agriculture and stability.
12. A shared fresh water well is a central element in the Lakou.
13. A roof and columns Peristyle structure provides a symbolic center for ceremony and celebration.
14. Unique landscape features are attended to in the site layout. The initial design concepts are verified in the field and adjusted as required.



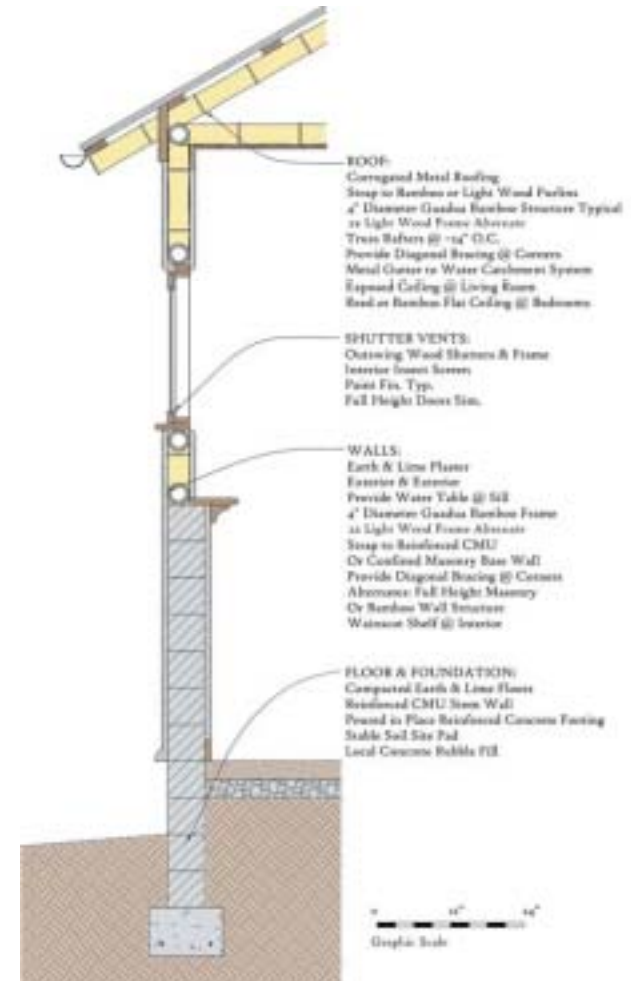
CASE STUDY--TI KAY SANTE--HOUSEHOLD SITE & LANDSCAPE PATTERNS

1. Lakou
2. Galri
3. Jaden Pre Kay (Kitchen Garden)
4. "Charleston" Side Yard Orientation
5. Two Room Inaugural Ti Kay
6. Expanded Four Room Build Out Ti Kay
7. Drainage Hedgerows at Property Boundaries Enhance Privacy & Security
8. Shade & Fruit Trees
9. Roof Water Harvesting & Water Storage Cisterns
10. Outdoor Kitchen
11. Outdoor Bathing & Washing Court
12. Dedicated Bath House
13. Composting & Urine Separating Toilets



CASE STUDY--TI KAY SANTE PLAN PATTERNS

1. Expansion Potential from Inaugural Structure to Built Out Options
2. Front Gable & Galri Open To Lakou
3. Galri with Storage Loft Above
4. Living Room Open Onto Galri
5. Options for Outdoor Kitchen & Indoor Kitchenette
6. Bathing & Washing Court
7. Separate Bath House
8. Shuttered Tall Doors
9. Shuttered High Vent Openings



CASE STUDY—HYBRID LIGHT FRAME & MASONRY

Appropriate interior and exterior finishes include earth and lime plasters. These materials are locally available, and provide more readily maintained and less fossil fuel intensive processing than Portland cement stucco. Special finishing details for Ti Kay Sante are hand crafted. Plaster relief patterns and vivid, saturated paint colors provide opportunity to express the personality and character of the builders, inhabitants, and community. These details also include handmade wood paneled doors and ventilation shutters, and wrought iron details, including door hardware and the crowning “Veve” roof finials. These elements bring the touch of the human hand to the building work, helping to imbue it with a highly personalized character.

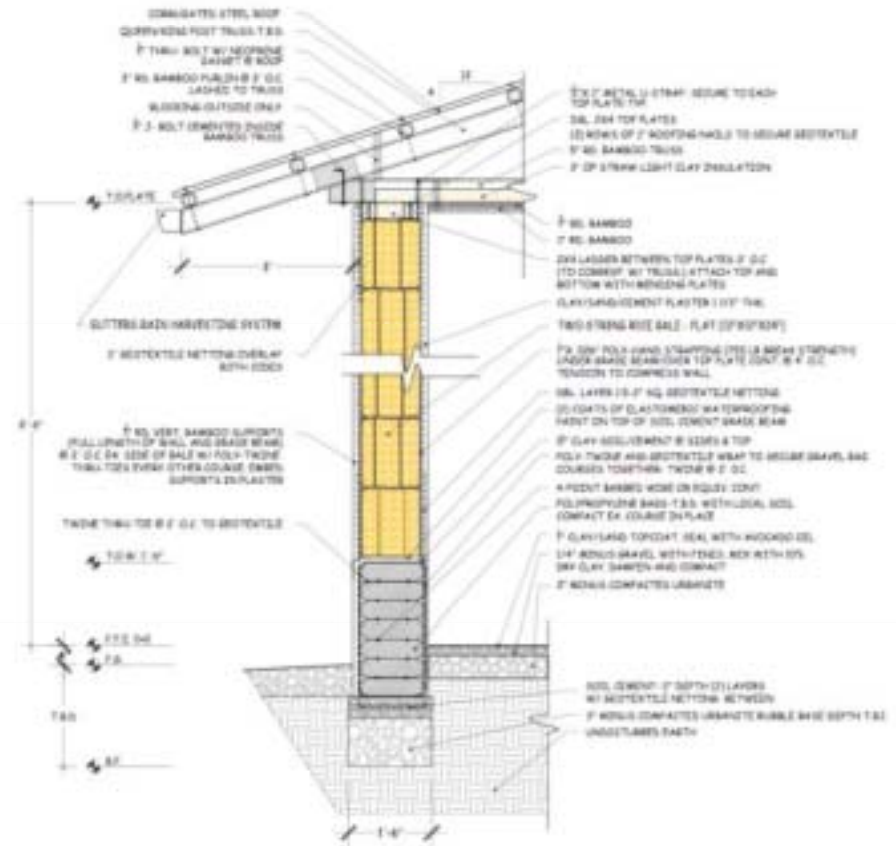
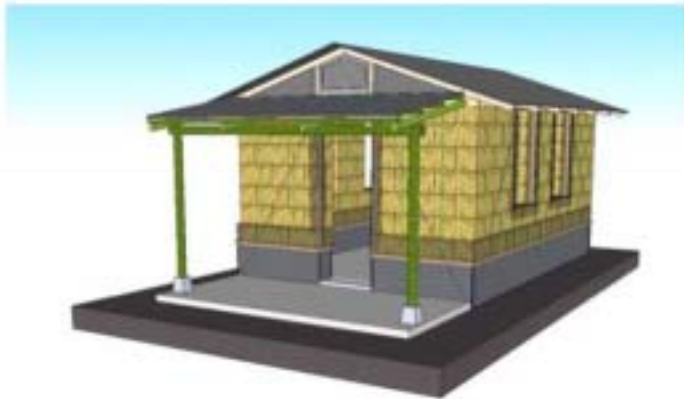


CASE STUDY--MEDICORP CLINIC PROTOTYPE

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CASE STUDY--TI KAY PAY

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