

HOLISTIC HEALING CENTRE FOR PHYSICALLY CHALLENGED

Submitted in partial fulfillment of the requirements for the award
of Bachelor of Architecture degree

By

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**DEPARTMENT OF ARCHITECTURE
SCHOOL OF BUILDING AND ENVIRONMENT**

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INSTITUTE OF SCIENCE AND TECHNOLOGY

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DEPARTMENT OF ARCHITECTURE

BONAFIDE CERTIFICATE

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A. VENNILA

ABSTRACT

“We shape our buildings and later they shape us.”

-Winston Churchill

The project discusses ways to explore how architecture can cure and comfort or provide space and activities for healing. In today's wellness centers and hospitals, for example, there are efforts to use science best to achieve a healthier atmosphere that can help cure and recover the well-being of patients. In residential architecture, designing a relaxing atmosphere is important for creating a sense of place for a pleasant and safe lifestyle. The research will help reinforce and promote the connection to the external natural world through spatial design, by the typology of the building, the impact of the physical environment will be explored, planned, and designed.

The primary objective of this study is to build a healing environment that gives meaning to all kinds of spatial design, reducing stress on the people, strengthening the capacity to cope, and optimizing the effectiveness of a safe and soothing lifestyle. It is necessary that human beings avoid deteriorating due to stress and the cycle of being monotonous by establishing a healthier lifestyle. Stress is the barrier to human recovery, whereby people lag with healing in certain areas.

This dissertation explores the relationship between the environment and human behavior that aids in soothing the soul and mind. The proposed design focuses on how planning and architecture can create a positive impact on the human mind.

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CHAPTER ONE

INTRODUCTION

1.1 HEALING THROUGH ARCHITECTURE

Architecture is a part of the built environment. Inside a building, its parts become the whole environment, from outside it's only part of our surroundings. Over and over bigger buildings like architecture, but usually, that is because they're solid and dominant when we do it. Such buildings inflict their presence on us and each of them projects a different environment.

Once we recognize that many qualitative aspects of the environment have universal effects in addition to personal and cultural ones, we must acknowledge that each of us is potentially an objective instrument of assessment. The essence of a place conveys a mysterious feeling and is made up of many emotions. The smell of pine trees or frenzy movements, flashing lights, and people rushing begin to feel that there is something extraordinary, peculiar, lively, and varying about the place, but lasting beyond slight transition, based on this composite of sensory encounters, compounded by historical comparisons is a separate entity – *the essence of the place*.

And this essence plays an important role in any healing spot. Healing is not the same as curing, it is the act of restoring balance to the human mind and spirit. The approaches used to provide a building its soul or existence in order to enhance the sense of place in their lives are discussed in this project. Often discussed is how places that are intertwined with the environment establish a feeling of healing.

1.1.1 ArchitectureWithAPurpose:Attain Soul

We begin to sense that there is something special about such an environment, that it is peculiar, alive, and changing, but that it will endure through small changes. It is a separate entity – **the spirit of the place**. The events inside and outside the spirit of the buildings are illuminated, and these activities can have a larger effect on their surroundings than the buildings themselves.

A building can be made or tuned soulfully by treating their common space with any kind of natural elements into the built space. The houses that occupy the site are scarcely affordable in constructed areas where open space and sunshine are of the highest value.

From (fig1) Buildings are cited to give priority to the place, they are bound to make better environmental and economic sense. The surrounding area has been treated with plants and landscapes that are emerging with the natural world, providing a feeling of connectivity in this built-up area. from (fig2) The space between the buildings is not left unused, and it is treated with plants and seating areas to provide a sense of interaction.

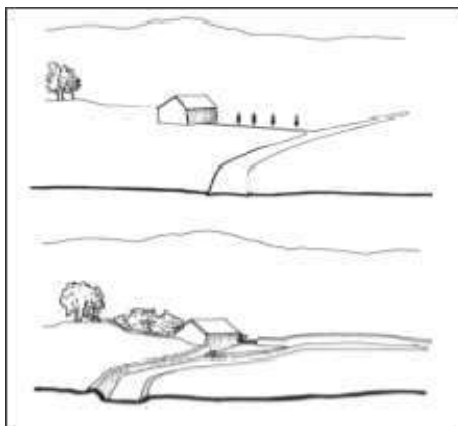


Fig 1-1 : Treating the exterior space with physical environmental.

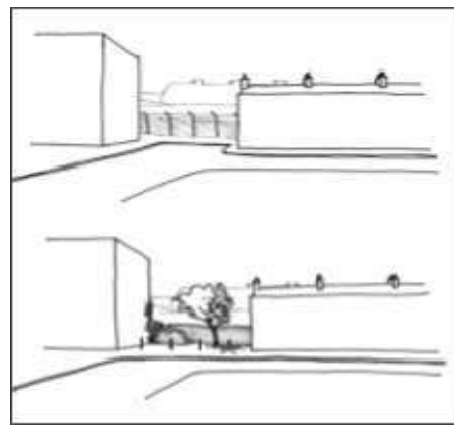


Fig 1-2 : Treating the negative space into common interaction with seating

1.1.2 Defining A Good Architecture

Every person wishes to have their mental and physical wounds healed. Healing has the power to improve our lives. Any atmosphere, color, or location that makes them feel better. It is important to consider human emotions, thoughts, attitudes, and behavior, as well as affect the physical component, based on constructing a therapeutic atmosphere.

Architectural environments and surroundings that are well-designed are environmentally safe and have a positive effect on human psychology. The effectiveness of art in promoting healing and creating a sense of location is examined through the lens of architecture. These natural physical aspects that influence a soulful spatial design are daylighting, ventilation, openness, thermal comfort, and waterscape.



Fig 1.3 : connection with nature

Good architecture is also regarded as architectural design associated with the physical surroundings, influenced by natural elements such as transparency, views, greenery, and a balanced lifestyle.

1.2 ENSOULING BUILDINGS AS BUILT FORM, BUILT ENVIRONMENT, AND ENVIRONMENT AS A WHOLE

Built Form: To maintain a peaceful and balanced atmosphere, the spatial architecture of some kind of building has to deal with natural elements, so that the whole building looks bright. It is carried out in such a manner that space is associated between the interior and the exterior.

Built Environment: When an atmosphere is constructed, the human behavior and Attitude will change differently based on the form of building, which may be rather expressionless, to break down expectations of numerous open spaces, transformation space was developed with the effects of natural elements, which in turn used them as a space for recreation and interaction.

Environment As A Whole: The environment includes the presence of all life, atmosphere, climate, and natural capital affecting the subsistence and economic activities of human beings.



Fig. 1-a. **BUILT FORM** : achieving natural elements into the design space.



Fig. 1-b. **BUILT ENVIRONMENT** : natural elements integrated into built form, adding a interactive space



Fig. 1-c. **ENVIRONMENT AS A WHOLE** : creating a built environment integrating with the natural elements to create a balance.

1.2.1 Adopting This Practice Significance

In certain ways, it can contribute to the development of an endogenous ecosystem and lead to a healthier lifestyle. Studies conclude that natural illumination and openness to space with a view lead to the nature of the space.

The use of colors, the sound of rushing water, the sight of water bodies eases the soul of the human being. Hence, to enlighten the individual minds and behavior it is very significant to have a comforting connection between the exterior environment into the built-up.

The main aim for adapting an ensouling environment is to:

- Eliminate environmental stress, such as bad air quality, more use of artificial lightings, noises, lack of openness
- Create a huge amount of connectivity with the exterior nature/ environment.
- To inspire the feeling of peace, sense of spiritual connection with nature

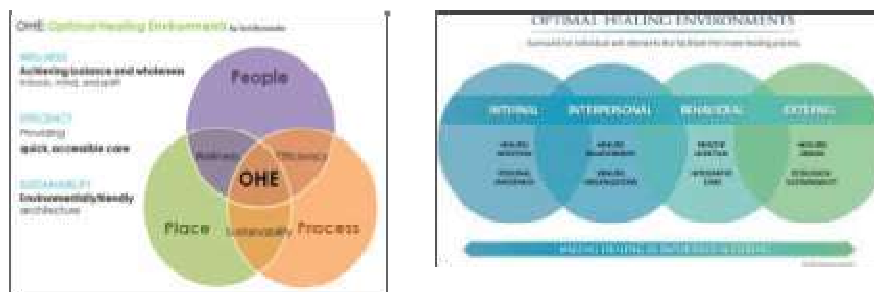


Fig 1 7 : optimal healing environment



Fig 1 8 : Psychology through Architecture

1.2.2 AnalysisOfTheUserGroup

This sort of sure is for people of all ages who are trying to adjust to a recent loss or who are physically handicapped. The majority of this endeavor focuses on rural folks who cannot afford to counsel and are losing hope.

The people in the area are primarily fishermen, as the site is located in a rural area of Villupuram in the district, and the physically challenged people in the society are only engaged in net knitting and do not tend to leave their homes, eroding their self-confidence. The design aims to help the physically challenged adapt to their new normal, allowing them to achieve goals and live life as normal as other people.

INTENT OF THE PROJECT

This thesis aims to explore how architecture: optimizes the healing process through the senses, making it imperative that vision only reinforces the other senses. With only sight, people become detached from a relationship with the environment through the suppression of the other senses. The main is to provide a space where people who are physically challenged mainly on people who are blind, deaf, and dumb, and how multi-sensory architecture, and making them in every different way.

Architecture As A Healing Pathway

LeCorbusier's theory of an architectural revolution is based on the belief that the constructed form may affect people's lives in a variety of ways, including their health, psychological well-being, physical comfort, and environmental balance. As a result of these facilities, societal awareness will be raised, equal opportunities will be provided, and they will be treated as regular people.

Evidence-based design :

Evidence-based design (EBD) is a rational approach to therapeutic architecture that applies scientific observations to design principles. This approach can be defined as design decisions based on the best available information from credible research and evaluation of existing projects. It analyses patient environment observational studies to determine environmental factors that may be supportive of healing.

1.4 User Group Based On The Topography Of The Building

These are the buildings that witnessed the interconnection of the exterior environment into the built space induced with natural elements.

Classification of the building based on the use: residence, wellness

center,

spa and meditation,

hospitals and rehabilitation center hospitals and health care

CHAPTER TWO:

METHODOLOGY

To achieve the objectives of the study the following methodology is proposed:

Research-based on literature studies/ theories:

The literature review is done to increase the theoretical understanding of the relevant publications, related to the ensouling buildings. The main focus was to identify key techniques and strategies that are used in architectural and spatial design induced with the physical environment. The identification has been done the same way only based on residential and public buildings.

The analysis is based on the different natural elements and their effect on human health and behavior. Exploration of design considerations and their interventions are implemented into the ensouling buildings.

Research-based on Case Studies :

The above-learned theories and relevant understandings were used to identify case studies. The case study broadened the understanding of the physical environment used in the built space as ensouling and its key role in uplifting a healthy lifestyle.

Analysis :

The next section is an examination of the elements, the interpretation found, their interaction with the built form, and the environmental interconnection by case studies, along with a qualitative analytical basis on the document. A quantitative assessment was carried out on the basis of a survey focused on the interests and desires of people integrating urban architecture with nature and on the analysis of behavioral change.

CHAPTER THREE:

LITERATURE STUDY

3.1 Architecture And Environmental Design As A Healing Art - Places Of The Soul By Christopher Day

Architecture is also more than that because the eyes make it relaxing, but potentially safe”.

Aesthetics is less the role of money than treatment and takes a lot of time and details. The use of architecture and design materials can be local with a natural look.

Also, aesthetic tasks are not just a visual and sensory experience. but also to the essence of the position intangible but perceptible. This calls for the use of stylistic and individualistic desires for architecture to listen to what the location, the moment, and the society want. Their aims are well-being. Architecture is not only an appearance in buildings for **Christopher Day** but rather a way of living in them. The perception of the occupants can vary considerably from the wishes of the planners because of their interests and their thoughts.



Fig 3-1 . PLACES OF THE SOUL : Heavy client. HATHOR. 1997. even those not yet born, in an individual, a human person, and a feeling person who is to be protected. They need their own places as houses for the soul, not as houses for the body



Fig 3-2 . PLACES OF THE SOUL : A primitive window, rounded but flat and balanced in shape, with soft plaster texture can add to the mood of a new culture.

In addition, in a multi-sensory atmosphere, when a spatial and embodied spirit resounds in the human psyche, sustainable architecture implies even more than energy efficiency: if the soul is not nourished even by sustainable structures, there would be a lack of consideration for occupants and eco-technologies will be ineffective. This major revision of his classic text builds on more than forty years of experience in ecological design across a range of climates, cultures, and 25 years of hands-on building.



Fig 3-3: PLACES OF THE SOUL : The office space is been designed which creates a openness connecting to the nature

Treating buildings as environments inherent to their environments, the book addresses compromise architecture, economic and social development, and how an approach by listening can organically produce architectural ideas through the interaction of place, persons, and the situation, which is often contradictory. Architecture is just a part of the world being created within a debt. Its components become the whole exterior world that is just part of our environment. When the connection between the building and the environment makes the building an entity. It has a duty not to offend the environment. It does not make us safer by imposing ideas. They are more likely to be unhappy and mad. Similarly, if forced, architecture is not beneficial for well-being.

3.2 The Role of Architecture in Promoting Healing Environments in the Design of Small, Rural Hospitals - JENNYE. YOUNG

This article describes the healthcare facilities' soothing function in architectural properties. Architecture's function consists of creating surroundings that help cure and improve the quality of life. The main aim is to discover alternative treatments that can cure and relax rather than cure. The key subject of this paper is:

The facade, as the interface between the city and the health center. The facade could include doorways, atria, natural elements of plants and water, sculpture and music, and could be opened to the public.



Fig. 3-3 : The facade provides an interface between the community and the health care facility and the external expression of the building's spirit within the community.

Corridor quality finding reduces discomfort levels for patients and tourists in the healthcare region. "Less gap for the staff resulting in improved patient treatment" was investigated. The hallway is the space object that connects the house. The passage between patient and personnel should have spaces for conversation, a peaceful area with a view.

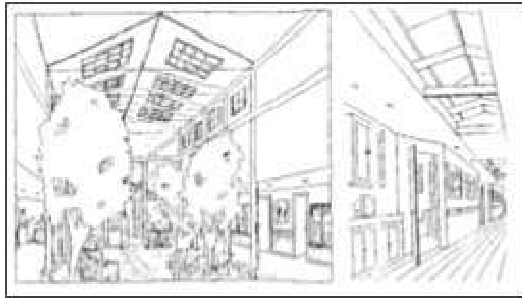


Fig 3-6. Corridor makes the use of the hospital interior with character visible to outdoor setting. Perspective view of corridor through glass doors to the outdoors of the hospital complex with a view of nature.

The Space Outdoor A retreat promotes informal contact with patients, staff, and the public and a venue for formal meetings in the city. Outdoor spaces, courtyards, and atria will be a natural focal point of the building and active links to the natural world's therapeutic resources. A patient in a visual environment is healed more quickly than in a room without one. The effectiveness of the procedure is improved by windows, classical



Fig 3-7. The courtyard of an outdoor has a view of nature and a view of the building.

3.3 Seven Principles of Life-Enhancing Design The Architecture of Erik Asmussen, Gary J. Coates

Health can only be defined as a living mechanism of adaptation, instead of a steady and fixed state of a distinct autonomous self to continuously changing inner and outer circumstances. Therefore architects must build structures that encourage and improve the healing process by building a complete ecosystem that both facilitates and photographs this complex process.

Erik Asmussen provides a soothing experience that strengthens and re-equilibrates the body, soul, and mind. It concentrates on the healing of nature with the same healing properties in the medium of architecture. By uniting construction, site, and community, a therapeutic climate, even though treatment for the disease is not found.

- **Colour:** a strong way of supporting construction and moods. The white layer allows light to enter outside color layers and bounce from within the outside, while enlightening colors show the material used and exposed it. Soft, clear colours break away from the space boundaries, whereas light-filled colors change sun-dependent patterns.
- **Dynamic equilibrium of spatial experience:** the balancing of the constancy, up and down, in and out, symmetry and asymmetry, a sheltered privilege, and vast flexibility to establish dynamically polarised spaces with a sense of freedom is the organic balance of the room experience.



Fig 1-7: Auditorium in culture house

- Unity of form and function-** In buildings, the interior spirit and events should express themselves. The feature should be perceived by its visible shape. For example, a genuinely organic structure does not have an external appearance but must be natural. It should be felt alive as nature is experienced.

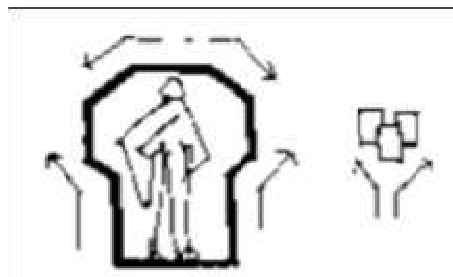


Fig 1-8: Note the wall-mounted lights and spatial volume of the doorway house section seen mirror the form of the upright human body.

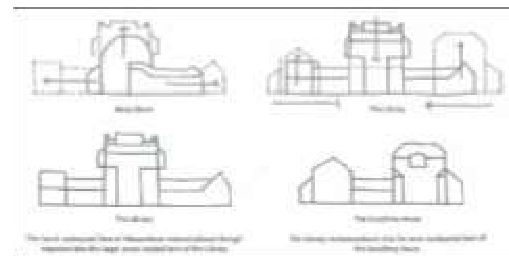


Fig 1-9: The house form is a series of interconnected volumes, each with its own spatial organization, yet they all share a common spatial organization, a common order.

- Polarity:** Architecture represents endless displays of colour, shape, and material variations as the bond between opposites to rhythmically changing repetitions. Polarized rooms, colours, shapes, and material energies of the building are present in the course and the mode of polarity.

- The **metamorphosis** develops and transforms by a natural, progressive development of shifting shapes, which are distinct in structure but identical in nature. Using the transformation of shapes, textures, colours, and spaces, unifying buildings and elements of the construction is done.
- **Harmony with nature and site-** Construction should be positioned and shaped to provide an affordable and useful outdoor environment. The buildings should be separated from the surroundings and linked to them by adapting to existing site features. Architecture could help people relate to the calming force of nature and make them feel part of the natural world and their hominess.
- **Living wall** - A balance of protection and freedom should be expressed by walls and windows. Eg-the impression of connection to the universe and the remoteness of carved wooden walls and colour glass windows that are beyond the world.



Fig 3.10 - The open gallery



Fig 3.11 - The gallery arcade forms the natural boundary of the courtyard.

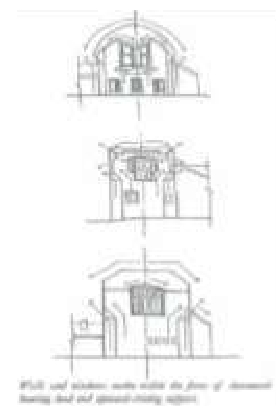


Fig 3.12 Wall and window walls, with the form of structural beams and roof structure.

3.5 Can Architecture Contribute To Wellness And Healing?

-by Mereana Beconcini

Recently, but in the sense of your daily home, we discussed this idea. We wondered why wait until you have an agency to include this in building design? Why don't these topics take into account everyday life?

These principles and philosophies are often reserved for clinics, hospitals, or spa facilities. However, we assume that in residential housing, these concepts should be used. Not only for the sick or rich but the ordinary citizen who lives every day to improve well-being and the quality of life.

The objective is to build homes that will lead to well-being intentionally and methodically. Research shows that 90 percent of our time is spent indoors in today's world. If a figure is a little surprising but one which reinforces the need of improving our homes.

You must build to avoid discomfort to encourage health and well-being in the built environment. Stress exacerbates institutional patient symptoms. Thus, the most evidentiary study into architecture concentrates on stress reduction causes. Everyday tension is a major health problem in our fast-paced, device-packed, industrial nations. We think that considering them is necessary.

What Are The Main Factors In Your Wellness Area To Consider?

1. SIGHT/ VISION:

Visual diversion and nature interaction. The borders between the outside and the inside are blurred. Not only by seeing or the sight through the five senses but also through incorporating the natural fabrics, shapes, and patterns, to promote human connection to nature.



Fig. 3-6 : This image shows the house's interior, which is a white space with a large window.

2 LIGHT:

Dynamic and diffused natural sun, and natural light. The aim is to connect natural light as much as possible through windows or skylights to strengthen natural day and night rhythms. This architecture approach aims to control the normal circadian rhythms of the body.

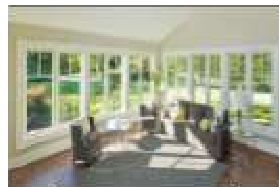


Fig. 3-7 : The light source improves the communication between the regions of the brain that are involved in our handling of emotions such as stress and anxiety.

3 SOUND:

The audio setting atmosphere, sound privacy, and again the link to nature and natural sounds to enhance well-being.

4. TEMPERATURE:

Thermal comfort and sense of environmental control to provide warmth and refreshment as desired.



Fig. 2-1: Temperature preference varies widely between people and no temperature will meet everyone.

5. AIR QUALITY:

One of our most important necessities is the air we breathe. It is so essential to your health how a building respires and how it affects every breathing.



Fig. 2-2: If air quality in a home leads to stuffiness or other discomforts, it can affect sleep quality, as well as cause respiratory symptoms and headaches.

6. VISUAL BIOMORPHIC FORMS AND PATTERNS

This biophilic architecture rule also occurs as repeated patterns or as natural forms in the form of wall patterns or floor arrangements influenced by nature. Again, it strengthens our relationship with nature that enhances our well-being.



Fig 3-19 : to maximize the accessibility of the occupant to the natural world by using the direct, indirect nature, space, and location conditions.

7. WATER:

The proximity to water and water view has shown to have many well-being advantages, including lower tension, lower heart rate, and blood pressure, enhanced peace of mind, healthy reactions, increased focus and vision, and memory enhancement.



Fig 3-20 space infused with water element!

8. SUSTAINABLE AND HEALTHY BUILDING MATERIALS AND METHODS:

It is so critical for the human well-being and health of our world to use natural and locally sourced construction material.

3.6 Senses of Place: An Architectural Design for the Multisensory Mind - Charles Spence

Vision—Predominant sensitivity: Plato considered perception the greatest gift of humankind (Plato, 1994). Up to now, the vision of the senses has prevailed and our technical civilization has further isolated the senses. Consequently, this is the aim of architectural design. Le Corbusier with the statement that “*Architecture is the masterly, correct magnificent play of masses brought together in light*” is a good example. His declaration leads to architecture for the eye, but he did not turn his buildings into sensory reduction through his sculpting abilities and sensibility for materiality.

Touch—An emotional sense: the eye is an organ of isolation, while the feeling of nearness, proximity, and love is the touch. The eye looks and examines, while the touch approaches and feels. So if light gives shade to our other senses, even the ability to touch becomes sharpened. The texture, density, and temperature of matter are read by the skin.

Acoustics – The silent sense: listening, hearing, is an omnipresent sense, not concentrated as eyes. A vision of a house would not present someone who looks at the building, but the sound of a person going into the building and listening to the sound will come from it.

Smell—Odor of vacuum: Smell is one of the most persistent recollections of any space. A special smell makes us unwittingly return to a space that the retinal memory forgets.

CHAPTER FOUR - CASE STUDIES

4.1: CASE STUDIES BASED UPON EVIDENCE-BASED DESIGN

4.1.1 MukanganMitra,Pune-PrimaryHealthcarecumDrug De-Addiction and Rehabilitation Centre



MukanganMitra
Building

LOCATION: Mohanwadi, off Pune Alandi Road.
DESIGNED BY: Ar. Sirish Beni

An atmosphere that contributes to the drug addict's recovery process. The balance between the feeling of independence by openness and disciplinary discipline has been retained. From the cut-outs, the terraced balconies and the seats allow patients to loosen up visually. Physical and visual interaction facilities are provided.

DESIGN :

The house has an introverted design with all rooms open to the courtyard. Any room that opens up on the central courtyard offers a central area for the patients to still lighten the location. There has been no separate recreation room, which plays an important part in patients' rehabilitation. For patients who require music therapy, art therapy and other various treatments attempt to put their true talent and faith in life.

LANDSCAPE:

The natural healing atmosphere is formed from natural stones, trees, creepers in the sky, and clouds. Characteristics like lifted flowers from the glass, such as hep, cheer the patient in the counseling room. Location facing south built in accordance with the site's natural form. The building's facade consists of the accommodation in random rubble stone. The structure is encircled by massive trees and visitors' outdoor seats. In the window sill, raising planters and flower beds have a connection with nature.



Fig. 4-2 : central courtyard



Fig. 4-3 : entrance facade

NATURAL LIGHT:

Due to the big windows, open courtyards and amphitheater, ample natural light is offered in the house, with dimmed light entries providing a quiet and peaceful ambience throughout the space. In Mukangan, the lighting of the different psychology is a crucial aspect for therapy, as the patient's trauma and experience are remembered by a dark corner or room, while light helps relieve the patient from those conditions.

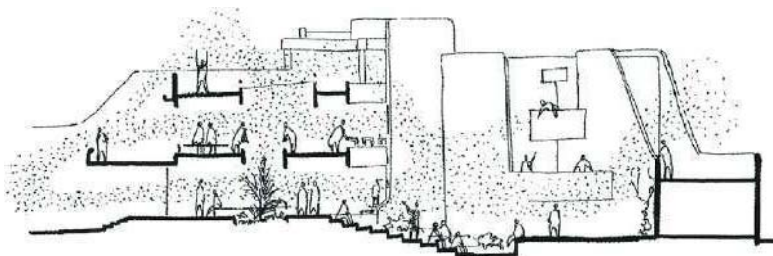


Fig. 4-4 : section

OPEN SPACE:

A feeling of freedom is necessary to treat the drug addict as a closed environment. Promoting the healing experience to make one feel a scheme of countries

has been used to split the whole volume right down the middle, giving the mass some clarity. The aim is to break down both visual and physical obstacles and to encourage good contact. The structural relaxation encourages independence to be expressed and enables patients to become more healthy.



Fig 4-5: central open courtyard for meditation



Fig 4-6: use of locally available materials

COLOUR :

The interior of the building offers a wet, relaxing atmosphere contrary to the exterior façade with the use of a subtle paint scheme and natural and seamless structural elements.

USE OF MATERIAL:

Natural stones - to create a sense of belonging.



PLANS

Fig 4 7: floor plan

4.1.2 Karunashraya, Home for Terminally Ill Patients.



LOCATED IN Marathahalli, Bangalore

DESIGNED BY AR Sanjay Mohe.

It is a health centre for cancer patients who are not cured in the advanced stage. They allow patients to survive painlessly and peacefully before the completion of their journey. Since 1999, you have offered hospital treatment

DESIGN :

The aim was to build a peaceful and quality atmosphere. Many of it is accomplished by designing spatial environments that complement the mind and body to be in harmony, where context awareness is imperative. In addition to the feel of being connected to nature, the wards are situated to the water bodies with greenery.

LANDSCAPE :

The design makes extensive use of landscape elements such as a fountain, pond, rockeries, and statutory greenery, and pavers to the facility are shrouded with heavily shaded trees to the right of the entrance. The central pool acts as a cooling agent as it carries cool air from the south to the north. Each ward is arranged in such a way that it gets the view of the water body.



Fig 4-8: waterscape



Fig 4-9 : waterscape

LIGHTINGINTOSPACE:

All-natural spaces where patients follow their daily routines have been induced by light. The solar panels are integrated into the complex powered artificial illumination.

VIEWS :

Theviewscomefromtheroom'spondsandpatios.Thebodyisamini landscape to the north of the waters with ornamental perennials and fruit trees. Pathways are below these trees. Illuminated and granite benches are usedappropriately so the patients can walk or sit and talk.



Fig 4-10 : waterscape

OPENSOURCE:

The entire composition is combined. The emphasis is on the open space between a body of water and the patios. Open areas provide a fun stay, physical and mental relaxation for the patients, and an opportunity to meet each other. The use of a patio in the arrangement of the interior room is for ventilation. It is also to construct interactive meeting spaces.The courtyard functions as an immersive community space.



Fig 4 11 : seating area

COLOUR :

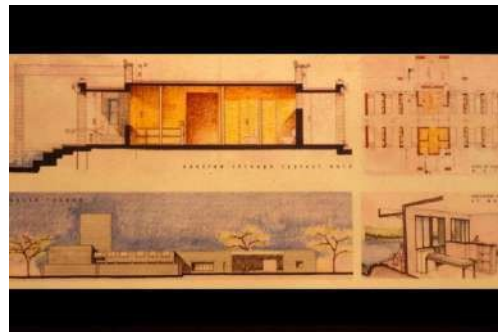
The whole atmosphere is white and green with no bright colors. This is for patients' psychological comfort.

MATERIAL:

Granite stone structure with composite masonry.



Fig 4 13 : plan and sections



4.1.3 Houses of 5 Elements, Bangalore



Fig. 4.14: Internal courtyard

Site Location—Venkateshpura, Bangalore.

Contractors—Mr. Gurudayal Saran, Aditi Constructions.

Aditi Greenscape is a residential building with the goal of cultivating its own water, using waste as fuel, and producing on-site electricity. It is built privately in the 4,375 acres residential area. In 5 kilometers of this plan, there are 5 lakes. They are being invaded and contaminated and need to be rejuvenated urgently. In this place, there is no water and water supply.

Each of the five elements of nature can be found everywhere in the house: water, air, soil, fire, and greenery. The house is extended from the east-west to the north. The spaces in the house flow and fusion, courtesy of the spacious patio, open kitchen, and double-height dining.



Fig. 4.15: Living room hall

DESIGN:

The house is extended eastward and northwards. The room in the house courtesy of the open courtyard, open kitchen, and a double-height dining area. Around the courtyard are five bedrooms and a lounge which helps in cross ventilation. The skylights are three - one above the patio, the other above the kitchen and a porch facing east. The first floor has two bedrooms with balconies and terraces. The event is not over here – nature and interior spaces fuse effortlessly together with the climate of Bangalore.

OPENSOURCE:

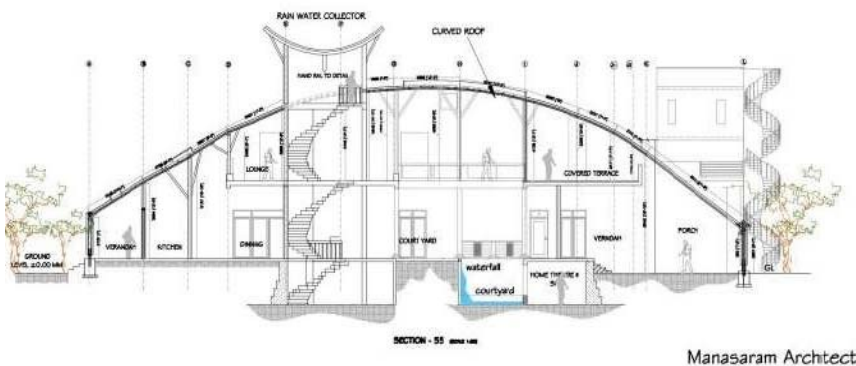


Fig 4.16 section

The double-height courtyard with a roof made of bamboo creates a huge sense of openness in the space.

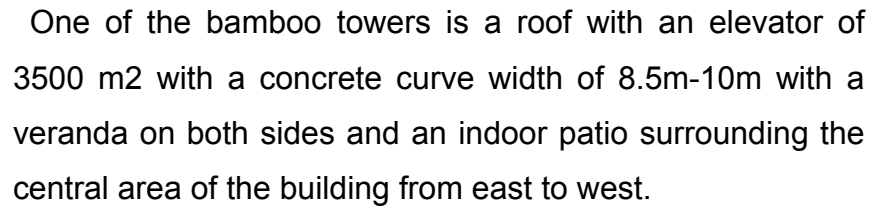
NATURAL LIGHTING:

Large curtains, higher floor heights, and skylights have ideal lights for daytime.

PASSIVE HEATING/COOLING:

Ventilators on each window and door ensure cross ventilation of spaces. The use of terracotta, filler slabs, mud blocks, and stone in the building keeps the interiors cool. The presence of an internal courtyard with a water body maintains humidity and enhances comfort levels.

The building is built according to the ideals of sustainability and thus is designed for more than 100 percent of numerous green roofs and terraces.



It has been designed as a lightweight roof (2" RCC slab) with minimal reinforcement supported on two curved triangular bamboo beams simply supported on bamboo columns of varying heights following the curve of the roof.



4.1.4 MGM Healthcare



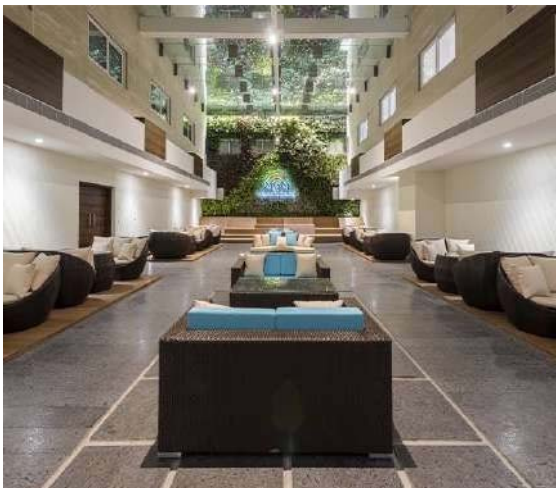
மே : 2016

Architect: Katerra Design Partner

Location: TamilNadu, India

The first USGBC LEED Platinum-certified hospital in Chennai, Tamil Nadu, MGM Healthcare was launched as the next step in its transformation into an integrated health care player. Its genesis is a 'healthcare revolution,' which by conception, knowledge, infrastructure, and sustainability redefines patient engagement in all dimensions.

மே : 2016



DESIGN :

To build in a habitable form that welcomes visitors and encourages the healing of patients while upholding international tertiary healthcare standards. It made patient movement in the hospital easy and smooth. The design of the hospital stresses well-being and positive effects, not disease and anxiety.

LANDSCAPE: AS A GREEN WALL

Tallest vertical garden in the city in the form of a living green wall. An external mini-garden space and internal planter boxes have been placed.

NATURAL LIGHTING:



Vertical Garden Wall



Exterior View of Building at Night

Lobby

VIP Lounge

During the day, large windows allow adequate natural light. 100% strong-state lighting effect is as normal as possible to give patients and staff a greater feeling of well-being.

In addition to the sitting areas, decorated floor lamps and wall-mounted downlights in 3000K are added to enable visitors to sit or socialize with books. 3000K decorative wall-mounted up-down lights are fitted.

OPEN SPACE:

The lobby, lounge spaces, and waiting areas bring a sense of openness and a welcoming atmosphere. There is a restriction for patients to access the spaces outside the hospital. To compensate for this, the vertical gardens in the interior lounges and corridors have benefitted in the process of healing.

4.1.5 TheMaggie'sCentres

Maggie'sCentersareaseriesofcancertreatmentfacilitiesfocusedonprovidingpeople with cancer with an emotionally supportive atmosphere.



Fig. 2.1 - Maggie's Centre

DESIGN:

Onekeydesignguidelineisthephilosophyofkitchens where small kitchenettes are located near the entrance of each centre. These serve to create aninformalenvironmentoveracupofteafor first-time visitors who are still emotionallyvulnerable to inquire about the support available.

LANDSCAPE :

Aiming to harness the therapeutic effect of plants for the benefit of the center's cancer patients, the building was designed as a series of stepped planters that intertwine to form a unique and restorative layout of inside, outside, private and public space. The site is a small patch of green surrounded by the huge volumes of the existing hospital buildings, instead of taking away the open space theywantedtomakeawholebuilding out of gardens. The use of species native to the woodlands is planted. Subtle, understated, and imbued with light, it is designedtolifttheweightfromtheshouldersof all who visit and work there. Private rooms forcounselingandtherapyhaveskylightsto allow natural light while giving the users privacy.

VIEWS :

Each centre has large gardens that add some wonder to the site, with almost heavenly clarity the building comes from this wild naturalistic landscape. The building has been built as a collection of stepped planters to use the healingimpactofplantsto support cancer patients at the centre, and intersect to form an essential, rebuild the architecture of private and public space inside, outside, and beyond.

OPEN SPACE: The courtyard is integrated with the way people will walk through its gardens and landscape-oriented spaces. Open spaces have been provided in a way where there is freedom as well as restrictions in terms of being supervised. Common interaction spaces to interact with other patients, staff and families have been provided in abundance catering with the landscape to feel safe and not bounded.

COLOUR:

Believing in color's sensual and psychological power, they coloured the surrounding rooms to suit the functions and activities they host. In a living room with the colour green, another living space is painted with the colour green, another living space is painted with deep purple. Warm colours like pink, yellow, orange, and white have been used predominantly.



Living Room - Orange Wall

4.1.6 PaimioSanatorium,Finland-TuberculosisHospital



by Alvar Aalto

Designed byAr. Alvar Aalto.

Location:Finland

The sights were beautifully seen on mountain pine slopes. The building was designed to concentrate on sunshine, fresh air, sun and nature. All wings have the same specifications, each with a different character and orientation and are connected to common facilities, according to natural sunlight and views. The building has been well connected internally. The wing orientation makes for plenty of sunshine in the morning.



DESIGN :

A sanatorium for tuberculosis was particularly suited for a hospital that would adopt the latest principles of functionality, in which audacious concrete buildings and modern building facilities became inseparable components of design and practicality. The basis of Aalto's concept for the sanatorium was to make the structure itself a therapeutic donor. He wanted the building to be called a "healing environment."

LANDSCAPE :

Artificial pond garden. Garden of pines. South of the wing were play games, wildflowers, and gravel routes, which provided rooms with views and enabled patients to stroll in the safe and calming natural surroundings.

VIEWS:

The arrangement of the window's opening allows patients to see the pine trees directly.

WATERBODIES:

The curved pathways in the hospital were redesigned with elements of water integrated, encouraging patients to exercise.



Fig. 4-15: Interior view

OPEN SPACE:

The entry wing had communal space, including the dining room of the sanatorium, the library, and workrooms, and lounges with other rooms. Aalto also built a huge roof terrace with a large forest view, which allows sick patients to be kept in bed for fresh air as part of their everyday lives to discuss the issues of the sickness and its care.



Fig. 4-16: Interior view



NATURAL AND ARTIFICIAL LIGHTING:

There is a window to the south of each room that allows the sun to shine through the interior. At the end of each floor was added the sun balcony, angled toward the south, in order to provide as much natural light as possible to bedridden patients on the balconies. Aalto also designed an ingenious natural ventilation system to use fresh air as a component of the patient's care.

Fig 4-31 : hallway as seating area

USE OF COLOUR:

Yellows were used in the main hall, the staircases, and many communal areas; red in the dining hall, the artificial sun treatment room, and for all heating pipes; orange for the x-ray room; soothing colors, such as bright greens and light blues were used for the ceiling of the patient rooms, the lounge, the library, and in the operating room; the corridors of the wards were painted in green, blue, and ochre orange. Calming colors were painted in the rooms where the patients had to stay for long hours.



Fig 4-32 : x-ray room



Fig 4-33 : dining hall



4.1.7 Santiago De Querétaro



Fig 4-34 spa and courtyard

ARCHITECTS : Ambrosi I Etchegaray

LOCATION: Mexico

The task was to create an Integral Yoga and Spa Center with an area of 418 irregular meters.

DESIGN:

The concept principle was to build a natural contact center (the outside). The project creates a large dome in the whole plot, perforated to construct interior patios with gardens. These patios are the subject of all areas in the project which are well connected. The first floor has a wide area, separated by a sequence of patios in which there is a coffee shop and a multifunctional space. This stage was designed to improve the presence of coloured concrete walls.



Fig 4-35 - central courtyard with day lighting

LANDSCAPE:

A central courtyard incorporated with plants placed an important role in the view of the landscape and open space

Adjacent to this sequence of courtyards is the entrance to the spa where assembled wood volumes contain the massage rooms, generating an interesting combination between light and rambling paths. The massage rooms open onto a completely private triangular patio.

On the upper floor are located the yoga pavilions overlying the thick slab. These are solved in steel and glass looking for the best views of the trees in the surroundings. From these pavilions, you have access to a gravel garden surrounded by vegetation which is used for breaks between yoga sessions.



Fig 4 36 : seating area



Fig 4 37: open corridor

OPEN SPACE:

The common spaces are treated with a daylight courtyard with a good amount of interaction and relaxation area for the people before they go to their respective sessions.

NATURAL AND ARTIFICIAL LIGHTING:

The presence of the central courtyard acts as the main source of light penetrating into the built space during the days.

During the night, light fixtures are provided only on the corridors and the session areas.



Fig 4.38 corridor with lighting



Fig 4.39 : seating space

VIEWS:

The building was designed this way so that people could be engaged enormously in reflection and relaxing in a silent, peaceful atmosphere. Hence the view from the opening of the windows and the corridors are limited to a link to the outside world and points to the scenery within the building room.



Fig 4.40 building exterior

4.2 CASESTUDIESBASEDONSENSORY

Given this spatial structure, the visual characteristics of space will influence our understanding of a building. It could easily be assumed. Many artists and architects have therefore over the years played with unique sensitive instruments, showing that every meaning can be important in the transformation of architectural experiential qualities

4.2.1 Hazelwood School, Glasgow-TOUCH



Fig. 4-12 : school corridor



Fig. 4-13 : school corridor

Architect Alan Dunlop

Hazelwood School has been specially built for children with "dual sensory impairments"; they are both blind and deaf. This means their sense of contact was much more important to promote their independence and help them to orient themselves in the house. Architect Alan Dunlop developed a meandering plan that allows children to follow a linear route through the building, avoiding maze-like conditions.

Furthermore, the interior walls are clad with multiple textured materials, which pupils can follow with their hands to make sense of their whereabouts within the school. This means that they can make their way from classroom to classroom with minimal help, increasing the children's confidence despite the challenges they face.

Fig 4 44 building exterior



Fig 4 45 building exterior



DESIGN:

The building is designed to avoid the sharp edges and corners and continue the fluidity of the space till its end and designed out long dark corridors and maximized levels of natural light and incorporated visual, sound, and tactile clues. It is believed that even the smallest feature of the architecture could also be conceived as a learning aid. Ease of navigation and orientation through the building was critical for the pupils. Internally the concept of rail was developed, which doubled as a storage wall.

LANDSCAPE:

The school goes around existing beach trees and creates an array of protected, landscaped gardens. High-grade glazing forms a large part of the façade of the classrooms facing north, which allows complete daylight to reach deep into space and ensures an even distribution of light.



Fig 4 46 : plan



Fig 4 47 : foyer

4.2.2 Dell's children Medical Centre in Austin-SMELL



Incorporating a therapeutic garden into the built space creates a healthy influence on people.



Fig. 4.22 - Aerial view of the garden



Fig. 4.23 - Ground-level view of the garden

DESIGN:

The main aim is to create a therapeutic garden in the hospital for a sense of healing and have a direct connection with the physical environment.

Healing Gardens are therapeutic by nature

The addition of natural elements such as live plants or living walls will relieve patient stress. In addition to the staff, elements of nature can be incorporated into an unknown surrounding, such as an indoor greenhouse in a hospital.

SEATING:

This seating furniture is placed into the garden to create an ambiance of relaxing and healing with the natural environment

OLFACTORY:

use of different plants and flowers which gives a soothing fragrance around the garden, which in fact aids to the factors healing environment.

CHAPTER SIX : INFERENCE

Design considerations:

Based on case reports, research reviews, study, and objective observation, the physical dimensions of the therapeutic environment of health centres. The well-being of its inhabitants may be affected by more design considerations.

Qualitative daylighting.

Analysis suggests that exposure to sunshine results in improved health. Visual comforts, e.g. tinted glass and construction, colours, play a crucial part in optimizing the amount of light, the designs of the openings, and the various materials. Light does not give rise to unwanted light.

Human comfort-

The most critical need of the healing environment, as studied from the study. As everyone has various comforts, optical, thermal, and acoustic comforts. Freedom of temperature regulation, window opening, light control by ranges, and blinds should be given. The room should be soundproofed. In darker colors thus ceilings could be decorated as a restful station as the walls.

Open spaces-

Fasten the recovery data open and secure. It's because a person's well-being is alone, hidden and limited. CNS hand wards and male scenery on the other side. Open supplies food in the room of healing. Long window, open window, deep windows are sized, designed and arranged to allow more flexibility.

Proximity of space:

In order to maximize engagement and involvement, social environments such as spaces for meetings and activities are nearby and centralized. It should be good for everybody. Interior links between spaces should be nice to prevent tiredness.

Colour:

Colors can have a tremendous impact on human psychology; such colours are designed to inspire behaviours. A warm and vigorous colour scheme of soft yellows and oranges, contrasted with wider neutral palettes, personal imagery and established green spaces, breaks frequently the monotony of the typical clinical environment.

Use of Materials:

When used in therapeutic architecture, it is critical to carefully choose building materials, such as natural and locally accessible materials, which do not only have a healthy, but an ecological value as well. The fact that the architecture is harmonious and close to nature has also a positive effect on the environment. Natural goods made by hand are as exquisite as they are authentic.

ADDITION ON THE BASIC OF SENSORY PROPERTIES:

By incorporating majority of these sensory properties into the space, it itself sets an huge example as an ensouling , as it naturally connects the built space with the physical environment which is in turn connecting human to their environment itself

We shape our buildings, and afterwards our buildings shape us

THE MOOD BOARD



ENSOULING ARCHITECTURE

The essence of a place is the mysterious feeling it conveys and is made up of many things: sleepy, silent lanes, and boutique shops, the smell of pine trees, or a frenzy of movement, flashing lights, and rushing people

We begin to feel that there is something extraordinary about this place, peculiar, living and changing, but lasting beyond slight transition, based on this composite of sensory encounters, compounded by historical comparisons

It is a separate entity – the essence of the place, and this essence plays an important role as a sense of healing spot.

Healing is not the same as curing; it is the act of restoring balance to the human mind and spirit.

The approaches used to provide a building soul or existence in order to enhance the sense of place in their lives are discussed in this project.

ENSOULING BUILDINGS - "to endow with the soul"

ABSTRACT

Scientific research has begun to demonstrate that people's physical, social and psychological well-being can indeed be affected positively by "life-enhancing", "healthy" or "therapeutically supportive" environmental settings."

AIM

This thesis aims to explore how architecture optimize the healing process through the senses, making it imperative that vision only reinforce the other senses. With only sight, people become detached from a relationship with the environment through the suppression of the other senses.

The main is to provide a space where people who are physically challenged mainly on people who are blind, deaf and dumb , and how multi-sensory architecture , and making them in every different way

OBJECTIVE

- to create a healing space for the people who are dual sensory impairment to adapt their kind of new normal.

to incorporate multi sensory into the built space and create a sense of healing and equipt them to adapt their impairment

to establish the relationship between the multisensory into the built space.

to continue learning life skills toward independence.

INTRODUCTION

ABOUT THE SITE

LOCATION OF THE SITE :
KIZHPUDUPATTU , PONDICHERRY

AREA OF THE SITE:

ROAD : EAST COAST ROAD
- 8M WIDTH

THE ISSUE

lack of facilities to re-juvenate their own kind of living and to posses their built healthy environment

THE IMPACT

the built environment does not provide equal opportunities for the people facing challenges

THE SOLUTION

to create awareness and and also create condience in them in the people community and create a space to adapt to their recent loss so they dont feel leftout in the social world

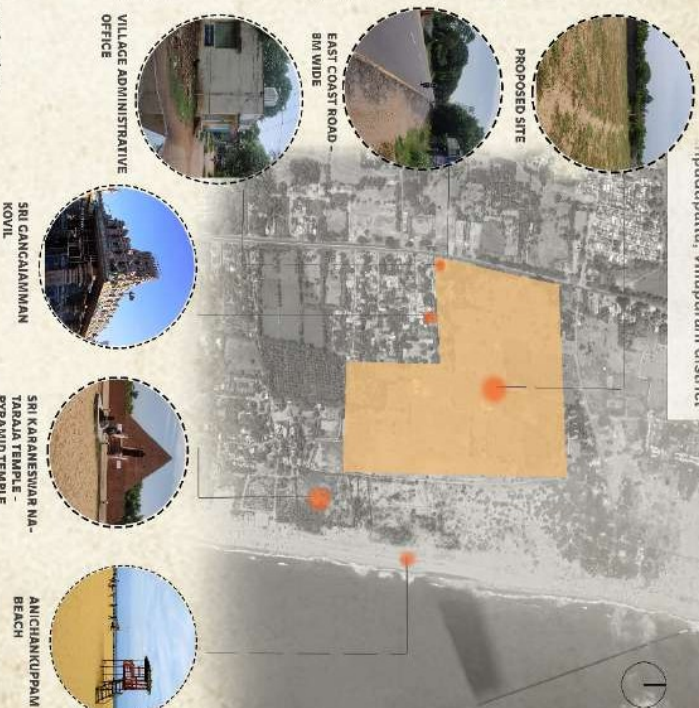
TYPE OF THE USERS

the type of users varies from teenagers to adults who try to adapt to their recent loss and leadntheir life according to their kind of new normal. As the site in the rural area , it is concentrated to the rural people who could adapt and uplift their living.

KARANGAL

THE HOLISTIC HEALING CENTRE FOR DUAL SENSORY IMPAIRMENT

ipudupattu, villupuram district



SITE JUSTIFICATION

The site is presented on the outskirts of Chennai, which is preferable to avoid the busy city activities and behavior and attain solitude during their therapy.

Need for thetherapy centre is to aid the physically challenged people and there are minimal places to aid their living.

As the site is in the rural area, it is mainly concentrated for the people who are from rural to seek help. People from Chennai and from pondicherry can assess to the site only through roadways. People who are taking only the wellness center can assess to space and the main agenda is people to heal holistically

CASE STUDIES ARE DONE BASED ON THEIR CREATING A AMBIENCE IN SENSE OF HEALING

Muktangan Mitra, Pune-Primary Healthcare cum drug de-addiction and rehabilitation

LOCATION: mohanwadi, off Pune alandi road.
DESIGNED BY: Ar. Sirish Beni

An atmosphere that contributes to the drug addict's recovery process. The balance between the feeling of independence by openness and disciplinary discipline has been retained. From the cut-outs, the terraced balconies and the seats allow patients to loosen up visually. Physical and visual interaction facilities are provided.



The aim is to break down both visual and physical obstacles and to encourage good contact. The structural relaxation encourages independence to be expressed and enables patients to become more healthy.



The natural healing atmosphere is formed from natural stones of trees, creepers in the sky, and clouds. Characteristics such as lifted flowers from the glass, such as help, cheer the patient in the counselling room. Due to the big windows and open courtyards and amphitheater, ample natural light is offered in the house, dimmed light entries provide a quiet and peaceful ambience throughout the space. use of natural local materials - stone to create a sense of belonging

LITERATURE CASE STUDY

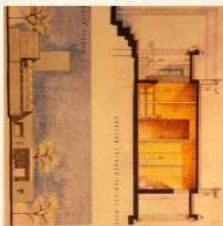
03

Karunashraya, Home for terminally ill patients

LOCATED in Marathahalli, Bangalore
DESIGNED BY Ar Sanjay Mohe.



The aim was to build a peaceful and quality atmosphere. Many of it is accomplished by designing spatial environments that complement the mind and body to be in harmony, where context awareness is imperative. In addition to the feel of being connected to nature, the wards are situated to the water bodies with greenery.



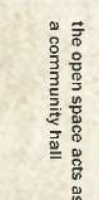
The architecture uses landscape features, such as a fountain, a pool, rockeries, and statutory greenery extensively. Paved trees are lined up to the right of the entry. The main pool is used as a coolant, as cold air is sent from Southwest to Northeast.



The entire composition is combined. The emphasis is on the open space between a body of water and the patios. Open areas provide a fun stay, physical and mental relaxation for the patients, and an opportunity to meet each other. The use of a patio in the arrangement of the interior room is for ventilation.



All-natural spaces where patients follow their daily routines have been induced by light. Granite stone structure with composition the masonry.



the open space acts as a community hall

Paimio Sanatorium, Finland-Tuberculosis Hospital

DESIGNED BY Ar. Alvar Aalto.
LOCATION: Finland



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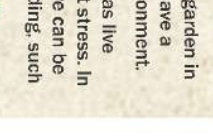
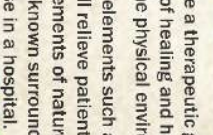
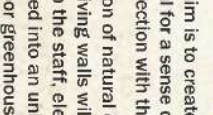
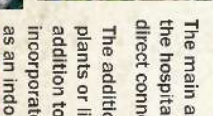
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Dell's children Medical Centre in Austin - olfactory

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The addition of natural elements such as live plants or living walls will relieve patient stress. In addition to the staff, elements of nature can be incorporated into an unknown surrounding, such as an indoor greenhouse in a hospital. use of different plants and flowers which gives a soothing fragrance around the garden, which in fact aids to the factors healing environment.

VENNILA ARUL | 37210043 | THESIS 2022



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The proximity of space:

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LITERATURE CASE STUDY

04

Colour:

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By incorporating a majority of the sensory properties into space, it itself sets a huge example as an ensouling, as it naturally connects the built space with the physical environment which is, in turn, connecting human to their environment itself



KARANGAL

THE HOLISTIC HEALING CENTRE FOR DUAL SENSORY IMPAIRMENT

RESEARCH PAPERS

SENSES OF PLACE: AN ARCHITECTURAL DESIGN FOR THE MULTISENSORY MIND - CHARLES SPENCE

Vision - Predominant Sense: Plato regarded vision as humanity's greatest gift (Plato, 1994). Until today, sight prevailed on top of the hierarchy of the senses and our technological culture has separated the senses even further. As a result, architectural design is meant to please this sense.



Touch - an intimate sense: The eye is the organ of distance, whereas touch is the sense of nearness, intimacy, and affection. The eye observes and investigates, whereas the touch approaches and feels. So when the light makes space for shadow our other senses are sharpened including the sensitivity to touch. The skin reads the texture, weight, density, and temperature of matter.



Acoustics - the silent sense: Hearing, ability to hear, is Omnidirectional sense, not focused like vision. A view at a building will not show the person watching the building but a building will return the sound of a person walking in it and listening to the sound.



Smell - space's odor: One of the most persistent memories of any space is its smell. A particular smell makes us unknowingly re-enter a space completely forgotten by the retinal memory



SITE ANALYSIS

ROAD NETWORK AND ACCESSIBILITY

- PRIMARY ROAD - 6M WIDE
- SECONDARY ROAD - 5M WIDE
- WUD ROAD
- ACCESSIBILITY TO THE SITE

TRAFFIC DENSITY

The main road is the ECR road which connects to pondicherry, hence the road considered to be busy one since morning and night

PEDESTRIAN MOVEMENT

the secondary road are used by the residential and the commercial people around the site. Hence the road is busy around the evening and early morning

BUILDING HEIGHTS AND VISUAL

The building around the site have the height of 6-12 story, hence the shading around the site is very minimal from the direct sunlight

due to the presence of fisherman colony there are people who goes for work and creates a happening place

due to the presence of temple around the site, hence people would tend to visit

LANDUSE PATTERNS

- open grounds
- green lands
- main road
- commercial
- existing site road
- secondary

due to the presence of open grounds surrounding the site, the site receive eight amount of sunlight and ventilation.

The housing near the site is very minimal hence, there is no disturbance around the site to achieve the sense of solitude for the rehabilitation centre

CLIMATIC FACTORS

The climate in marakkannam, wilupuram district has a tropical climate.

Due to the lesser high raised buildings where there is no shadow to the direct sunlight into the site

EXISTING LANDSCAPE

the existing vegetation on the site are :

- neem tree
- palm tree
- coconut tree along the sides of the site

MICROCLIMATE

AVERAGE TEMPERATURE

25.6° 27.8° 30.4°

WIND SPEED

11 km/h 19 km/h 28 km/h

RAINFALL AND RAINDAYS

2mm 10mm 30mm

HUMIDITY

75% average humidity percentage

- Microclimate enhancement
- Vegetations that provide shade to reduce solar reflection from nearby buildings
- Air filtration and purification
- Dense vegetation that filters and reduces airborne particulates matter. Broad leaves to trap pollution that will be washed to the ground when it is raining
- Noise pollution reduction
- Dense vegetation along vehicular roads as a sound barrier
- Architectural uses
- Vegetations need to be planted in rows that can connect space

POTENTIAL GREEN GROUNDS

- agriculture land
- green grounds surrounding the temple

WATER AND SOIL TYPE

The beach near the site is considered to be huge view and ventilation

kallivell lake is present near the site which also create an opportunity for the view

SOIL TYPE

red sandy soil this type of soil was present in the agriculture field lands

coastal soil as the site is presented on the coastal line sandy soil was present around the site

USE OF MULTI SENSORY PROPERTIES

THE DESIGN EMPHASIS ON the senses, where taste, touch, smell and an awareness of surroundings could help promote a sense of independence and could act as sensory cues



BASED ON TOUCH

TEXTURED WALL FOR MOVEMENT
Creating textured wall with locally available materials, which is a cue to the navigation for difference space

different textures depicts the sign of reaching different spaces



BASED ON SOUND

the use of green wall in the interior which can be used to define which kind of space they have entered, and it also sets the ambience for each different smell for different spaces



BASED ON SMELL

SANDELOWOOD ON PATHWAY
use of sandelwood pillars on the exterior circulation pathway to reach the fragrance while crossing the path



the use of flowering plants that bands of movement which give natural fragrance among the whole space

GREEN WALL WITH FLOWERING PLANTS

the use of water bodies in the building creates a sense of hope and sound of running water ease the people's mind



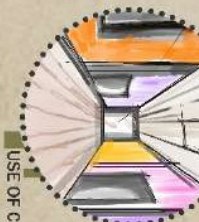
BASED ON VISION

the play of light and shade in the built space show a mystery playing around the spaces



USE OF WATERSCAPE

the sound of the flowing water creates into the space ease mental health



USE OF COLOURS

the use of colours determine the place to go, different colours depict different space in the built up



KARANGAL

THE HOLISTIC HEALING CENTRE FOR DUAL SENSORY IMPAIRMENT

SITE TOPOGRAPHY AND CONTOUR



The site is contoured from a level of 8m down till 5m.

As the site has a ocean view, it can be zoned accordingly

it is zoned in a way that, the front side is covered with:

parking
administration block
awareness area
open stalls
where the public is surrounded, hence there is no need to enter



the private space is covered with:
housing units,
meditation centre,
recreational spaces,
doctors housing units,

MASSING

CLUSTER FORM



A collection of volume grouped together by proximity of sharing of a common visual field.

A collection of volume grouped together by proximity of sharing of a common visual field.



CENTRALIZED FORM

on semi private space, its covered with:
rehabilitation centre,
therapy,
counselling
adaptation centre,
hydrotherapy

hence there will only openness with the doctor and the patient

Mainly horizontal movement, can segregate space according to activity or user

Circulation in circular movement, can segregate space according to activity or user



ORIENTATION

building is oriented in a such a way that they consume the huge view of the sea and the paddy fields on the sides, which creates a good views and vistas

SUNLIGHT AND VENTILATION

building can be oriented in a angular manner to reduce the direct sunlight and increase the amount of ventilation into the building

NOISE AND ODOUR

Creating a buffer space in front of the main road and near the fishermen colony to reduce traffic noise and fish smell

PUBLIC, SEMI PRIVATE AND PRIVATE

As the design is only based for the patient, hence they want solitude from the busy, therefore the site is zoned particularly not to disturb from the public

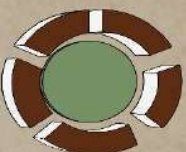
ACCESSIBILITY OF THE SITE

The site has two road, one the main road which is used to enter as main entry to the site, and the secondary road runs along back of the site which can be used for STP and utility

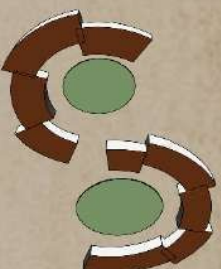
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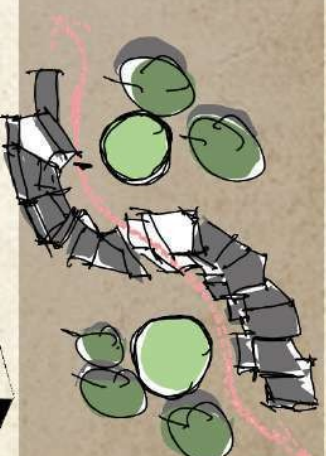
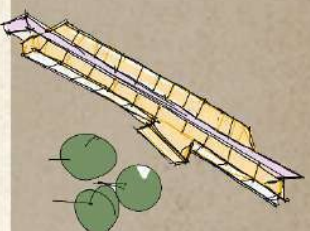
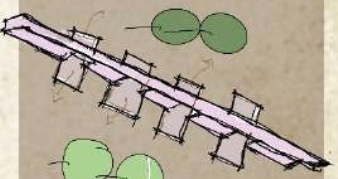
MASSING



A collection of volume grouped together around a dominant form or open space



the play of light and shadow by the segregation and doesn't disturb or break the continuous movement

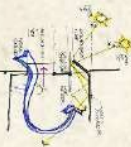


They can embody large congregation space in the centre

Circulation in circular motion. Movement within the volumes made easy

centralized layout creates a sense of togetherness

LIGHT SHELF



A light shelf is a passive architectural device used to reflect natural daylight into a building.



due to the sun angle at peaks, clerestory lighting into the built reduce amount of heat entering



USE OF MATERIAL



use of locally available materials can get the sense of getting connected with the nature in their environment

USE OF COLOURS

use of subtle colours into the interiors place an important role for the mental health of the patients



biophilic interior design can integrate acoustic, sound-absorbing solutions such as moss walls and eco flooring panels which reduce ambient noise while adding a natural aesthetic into a space.

SMELL

use of flowering plants in the landscape would help the people to define which place they are in



CROSS VENTILATIONS

cross ventilation is been achieved due to the site present near the water

INTERIOR CONCEPT

USE OF MULTI SENSORY INTO THE BUILT SPACE

The user perception of any design or space should be a journey of self-exploration. Any work of architecture or design tries to harmonize with the perceiver. To appreciate this to the fullest, all five senses are indispensable. Let's try to understand this by looking at our multi designs as if they are imbued with hundreds of emotions that are open for interpretation.



DESIGN APPROACH

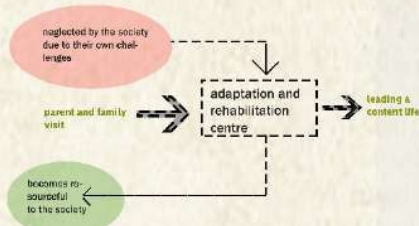
KARANGAL

THE HOLISTIC HEALING CENTRE FOR DUAL SENSORY IMPAIRMENT

WORK PROGRAMME

The main of rehabilitation centre is to give importance to the physically challenged who are inability to walk, see or hear

The main is to prepare them adapt their new change in them and also provide a sense of home while under going the treatment



every program is brought to understand every physical challenges to be beneficial to the patients

ACCESSIBILITY OF THE USERS



as now it is zoned according to the user analysis and their relationship with the space and also separated based on the acessibilty bu public , semi public and private , hence providing a secure environment and ambience to the patients

USER ANALYSIS



ADMINISTATION



RESIDENCE



ADAPTATION/
TRAINING



VOCATIONAL



CLINIC



LANDSCAPING



DISPLAY STALLS



RECREATIONAL

staff people for admission, enquiry booth , meeting room for doctors meeting room for staffs . visitor hall

residents for: staff quaters patients nurse some family visitors

adaptation facilities are: speech therapy , physical education , Braille system, cued speech , sign lanuage vocational facilities are: painting workshop, oraganic farming, workshop for pottery, tailoring, library

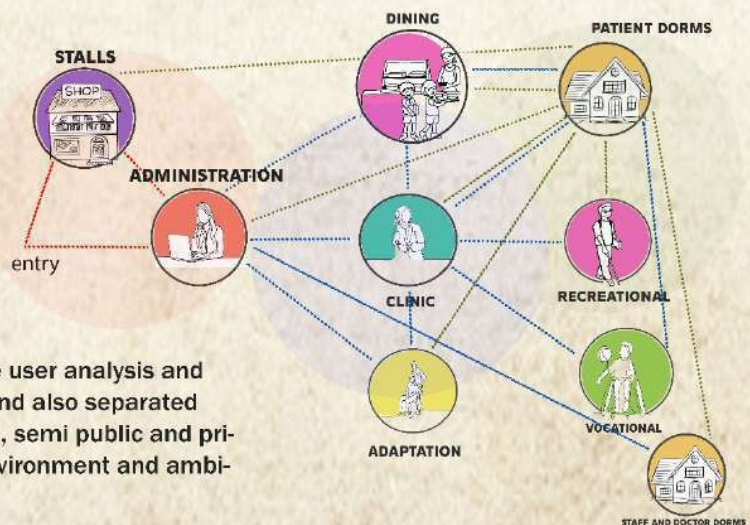
Clinic consists of: physiotherapy, hydrotherapy, counselling centre doctors cabin, medications

outdoor walking . waterscape , softscape

art works done by the patients that are sold to the public

library, mess, dining hall , kitchen , laundry open auditorium , playground, tv room , music room

USER- ACTIVITY INTER - RELATIONSHIP



and doctors

CONNECTION WITH GREEN SPACE

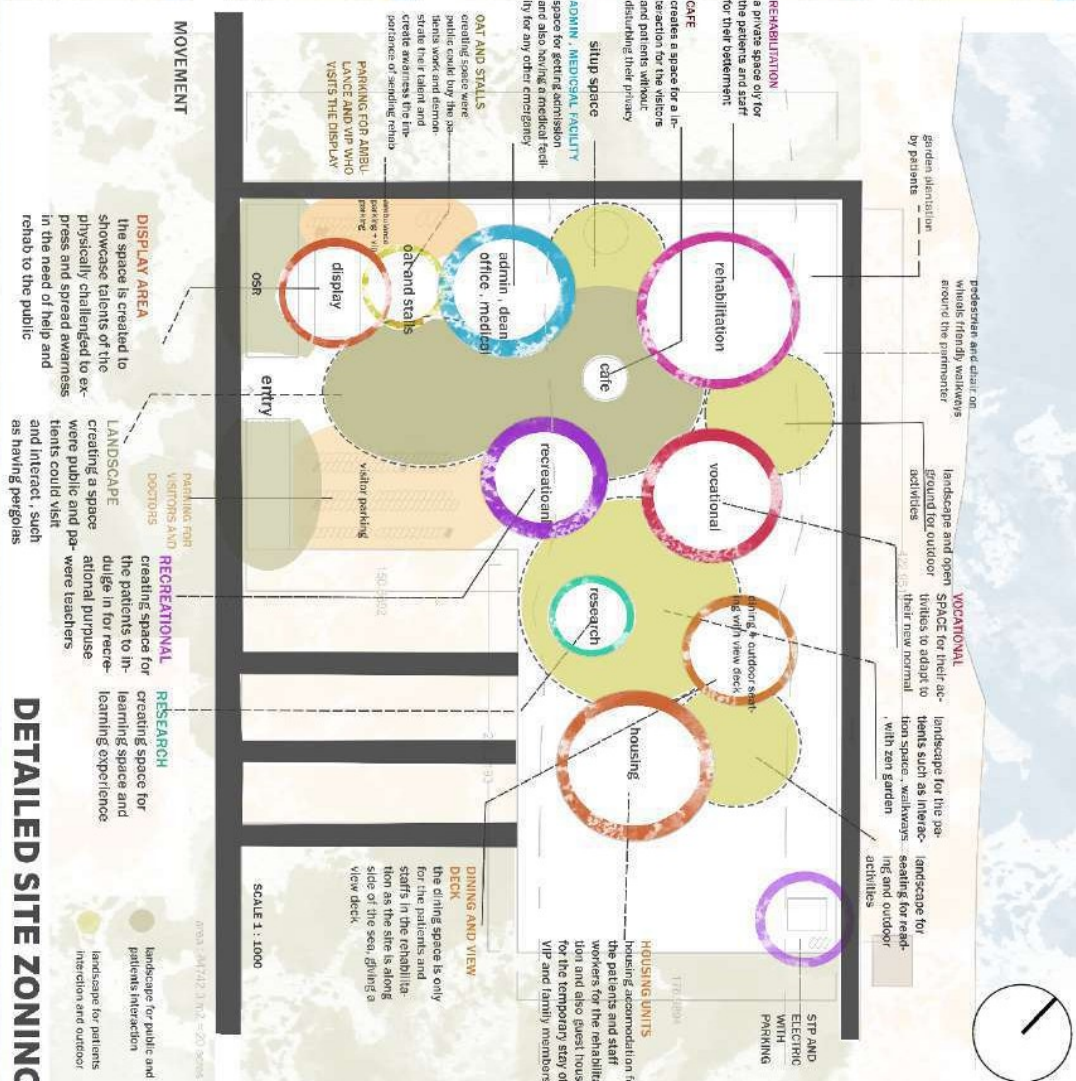
VEHICLE CIRCULATION

the site is zoned with an image of having a

SPACE FOR INTERACTION

INTERACTION AMONG THE SPACES

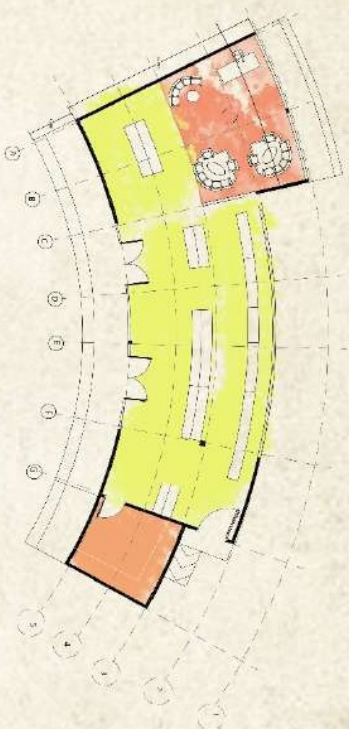
creating interaction spaces and landscaping among the blocks to create a sense of connectivity with the environment during their sessions and classes



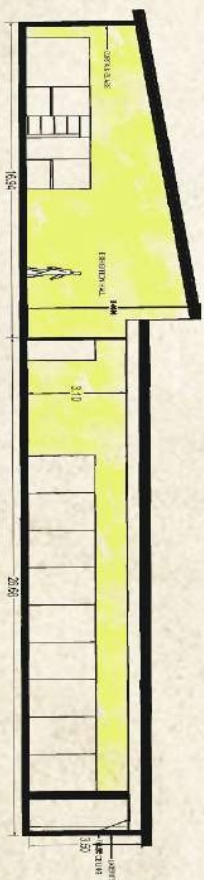
DETAILED SITE ZONING



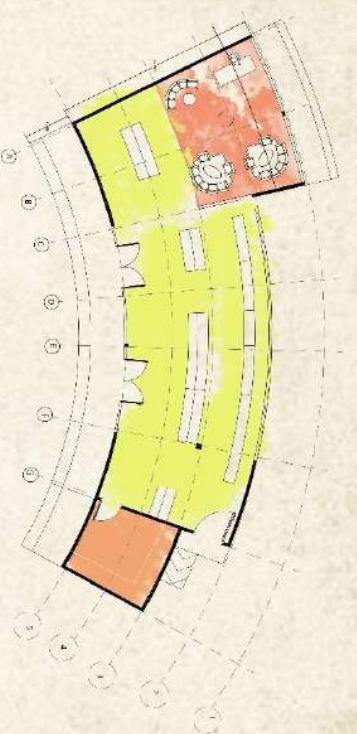
EXHIBITION CENTRE



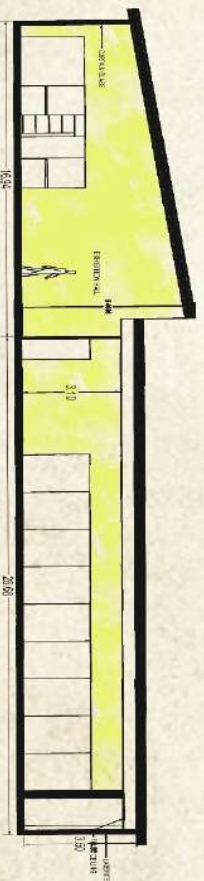
- STORE ROOM
- EXHIBITS
- WAITING LAUNGE

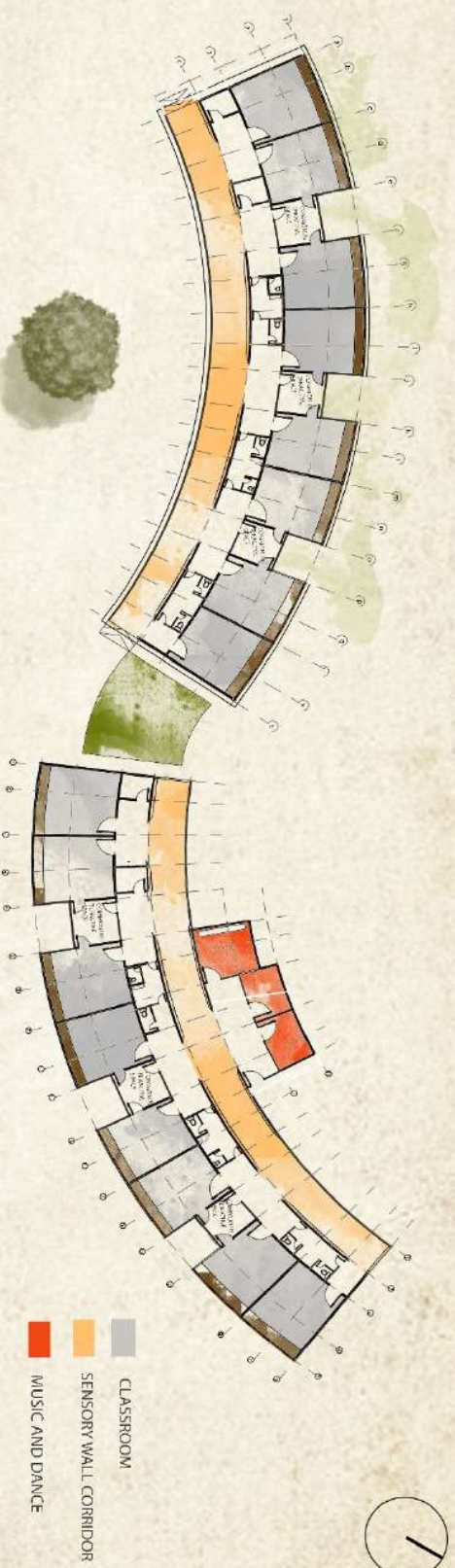


EXHIBITION CENTRE



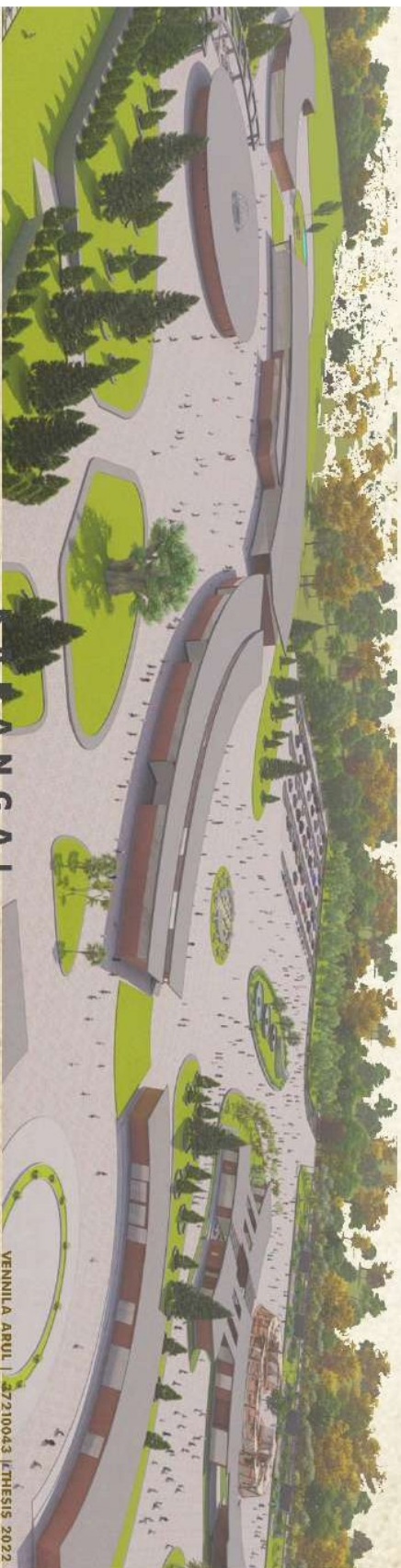
- STORE ROOM
- EXHIBITS
- WAITING LAUNGE





INSTITUTIONAL BLOCK

DESIGN RESPONSE :
 use of sensory wall as the cue for movement
 creating interactive pockets
 curved structure would break the sense of infinite feeling



ADMINISTRATION AND EMERGENCY CLINIC



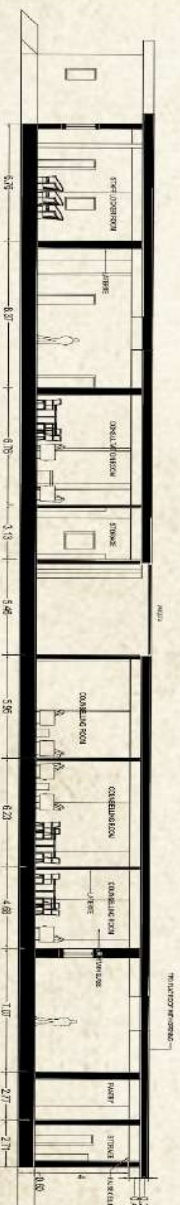
- WAITING ROOM
- OFFICE ROOM
- PHARMACY
- STORE
- ADMINISTRATION
- CONFERENCE ROOM
- EMERGENCY CLINIC



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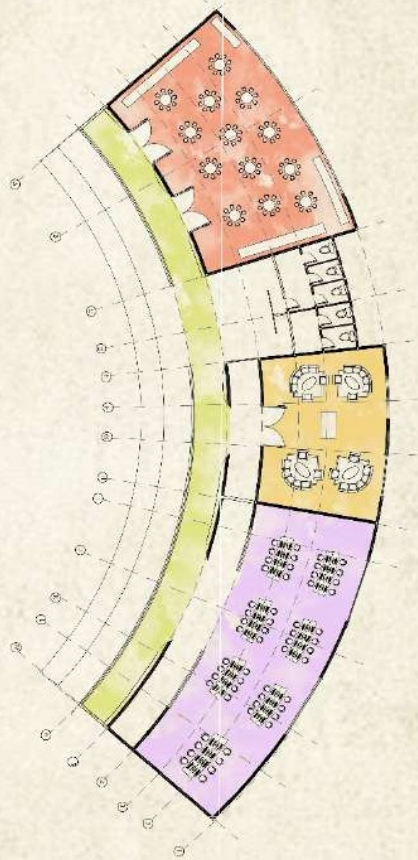


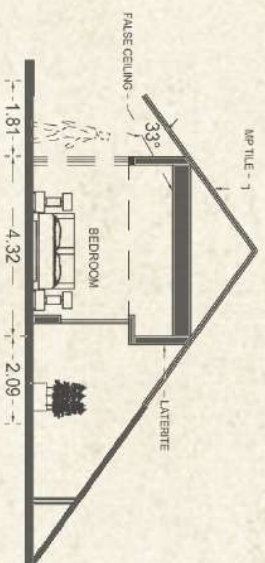
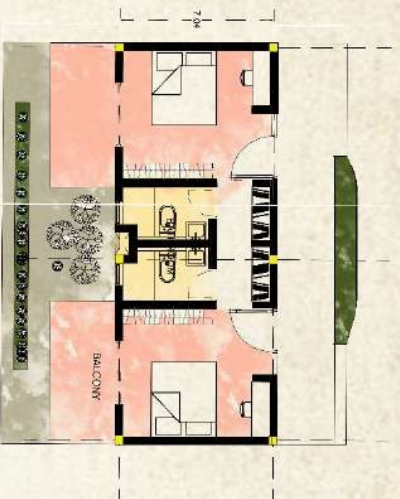
PLAN



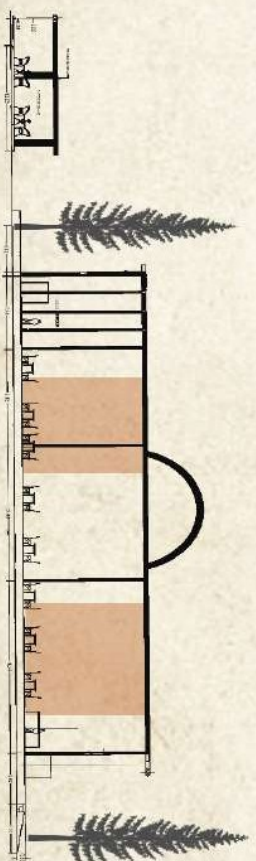
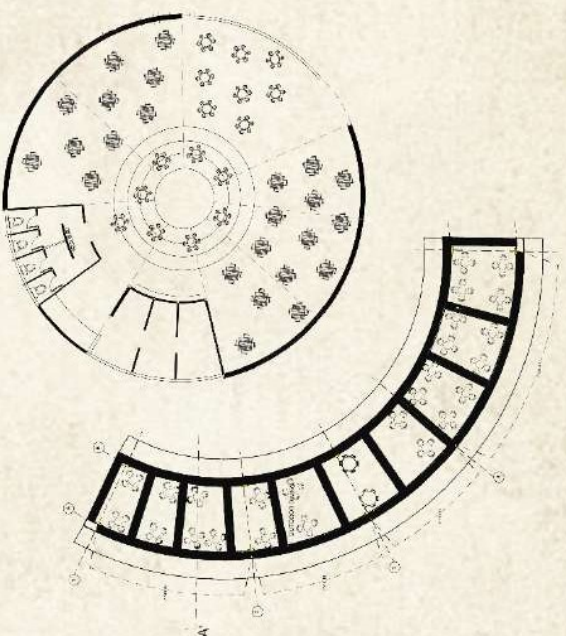
SECTION

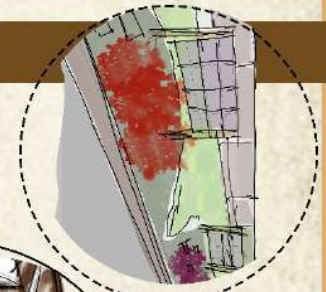
READING BLOCK





RESTURANT





SENSORY WALL EXPERIENCE
its for the public to experience and to understand how vision impaired people walk with

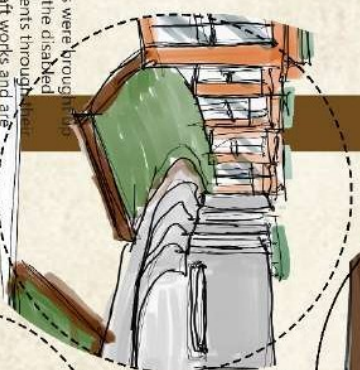
PAVILION OF LIGHT

light and shadow places a vital role which creates a patterns on the pathways makes the user feel interesting



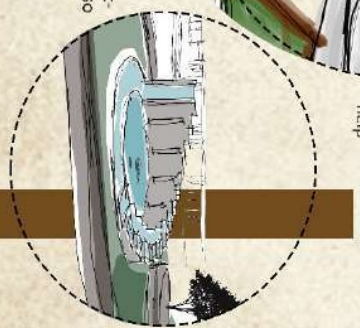
OAT AND STALLS

the use of open amphitheatre id only to gather people and spread awarness about the disability and the tendency to seek help

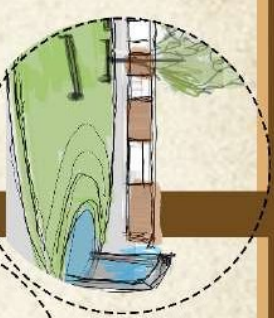


WATERSCAPE

open stalls were brought to display the disabled people talents through art and craft works and are kept in display



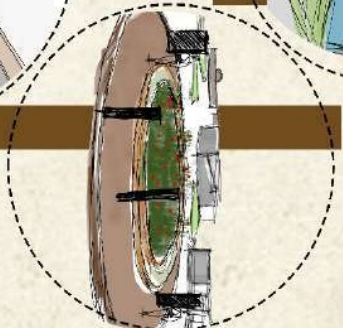
SEE THROUGH



WATERSCAPE WITH SITUOUT
the view of a running water makes ease for both who has only ability to see and only ability to listen. it puts the minds in ease, and also stimulates multi sensory

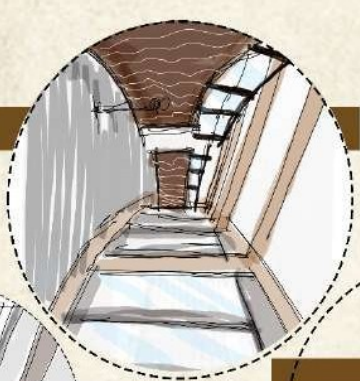
BREAK THE LINE

the stone wall acts as a reflector in the walkways paths for the people who make sound to identify the obstracle nearby

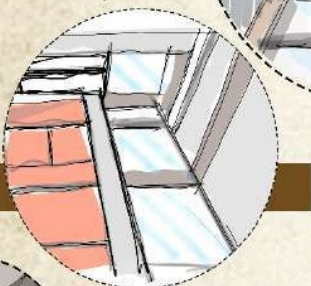


THE SMELL

smell of flowers or any pleasant scented area gives a intristing way to pass through the space or the nodal points. the people would understand which is place is where according to the different use of smell they attain while locomotion

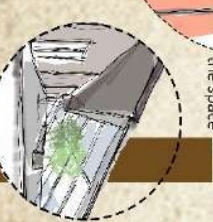


INTO THE INTERIORS
the sensory wall acts as a cue for the movement or locomotion to arrive at their destinate place



BALCONY IN HOUSING :

the balconys are shadded with glass roof reaching to the ground which creates a sense of gathering space into their built space for the sense of community and also gets directly connected with environment around the space



THE USER EXPERIENCE



CONCLUSION

Healing does not treat physical symptoms, and with increased technology doctors have increasingly stepped away from holistic healing. More scientific progress is not simply tantamount to improved treatment, results are evidence-based research. The environment is one of the most important and harmful influences in the rehabilitation of a patient. However, as people access the spaces they are limited to little or no sunshine, scent or natural conditions in many hospitals.

In several researches their body reacts in a favourable way when people feel happier and happy, thereby enhancing their immune system to improve healing. It begins with the world a patient is exposed to. These environments have some common elements of light, colour, privacy and nature interaction which interconnected with the built.

Creation aspects were suggested in an effort to investigate the potential of settings to increase healing. It was focused on community use. The gardens enable patients to be part of a wider community and to concentrate on live plants which reflect a sense of hope, development, and renovation.

Currently, the construction of the health centre requires very stringent health regulations. This thesis focuses on exploring possible designs which could activate the senses to relieve tension and cure

“Ensouling : to endow with the soul”

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