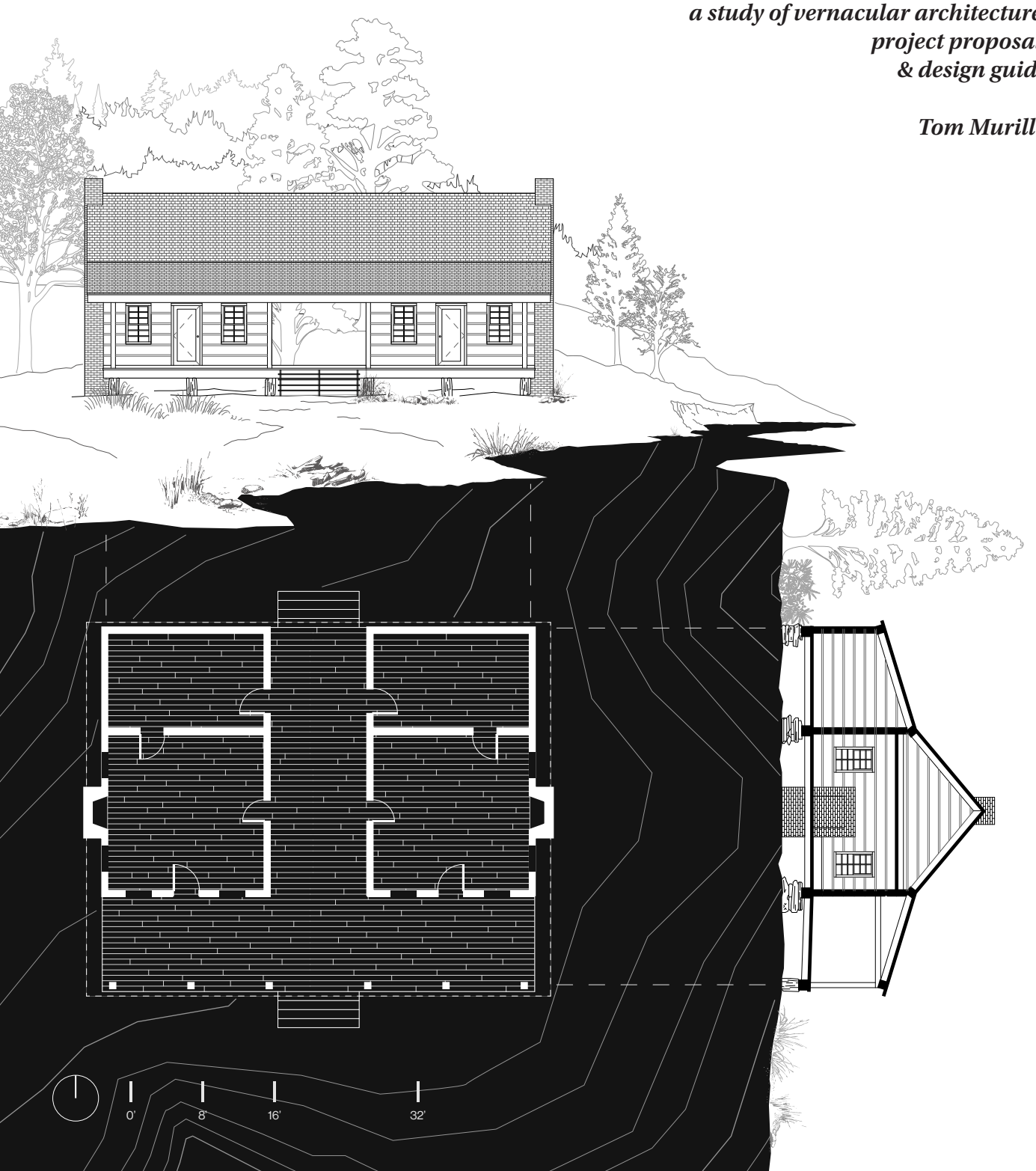
LEARNING FROM PLACE AND TIME

a study of vernacular architecture, project proposal, & design guide

Tom Murillo



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Tom Murillo

Kansas State University
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Prof. Chad Schwartz

Contents

Introduction

This anthology is to serve as a comprehensive guide for the design of an open air museum showcasing vernacular architecture from across the globe.

The museum's goal is to teach the lessons inherent in vernacular architecture both through lectures and exhibitions, and by serving as a living example of architecture that is respectful and inspired by its environment.

On Tectonics

Kenneth Frampton describes the tectonic in architecture as the art and science of construction. More than just the technical joining of building components, it is the poetic expression of place and time in which culture, site, materials, and artistic intention come together to form a grounded piece of the built environment.[1]

What better way to understand how to root a building from earth to shingles than to study the vernacular? Vernacular architecture is that which is built in response to regional needs, accessible materials, and culture. It is architecture that has not been designed by a master architect based on his or her tastes or ideas of style and art; it is architecture that has been shaped through generations based on what is necessary and appropriate for its culture and its place.[2]

In his writings on architecture, style, and tectonics, Gottfried Semper expressed the importance of studying the vernacular. In doing so he also concluded that vernacular architecture was not defined by romanticized architecture from a different time and place, such as contemporaries inspired by the ancient Greeks. Semper noticed that buildings in the warmer climates utilized courtyards, and those in the north built protection from the rain and the cold (See Fig. 1). He realized these buildings were defined by place. “As in the earliest buildings, the relationship to place continues to significantly impact the design and construction of our built environment.

Fig. 0.1 Coutyard Building
Beit Rumman Hotel, Demascus

From the foundations to the roof, architecture can – and should – be configured to meet local social, cultural, and climatic needs."[3]

If tectonic expression is the holistic narrative capacity of a building including both the building itself and the building's socio-cultural variables, then vernacular is an excellent precedent study for such a concept. In Robert Maulden's writing on tectonics, he argues that tectonics are concerned with the building's "inner-consciousness," the building itself, and the "inter-consciousness," the position within its surroundings, be it physical, social, political, or economic. He goes on to say, "It is the whole combination of landscape and building together which form the architectural whole."[4] Vernacular architecture does this inherently. It is a reflective definition, in that both are products of a deep understanding of their place in time. The only discrepancy is tectonic architecture is considered to be intentionally artisanal,[5] whereas vernacular architecture may or may not have this intention in mind.

Fig. 0.2 International Style
Villa Savoye, Le Corbusier 1929

After the blatant disregard for place from the international style of the early 20th century Modernists (See Fig 0.2), contemporary architects are coming around to the notion of designing for their given environment. Critical Regionalism is a theory coined by Alexander Tzonis in 1981 and expanded upon by Kenneth Frampton in a number of works under varying titles of "Regionalism."[6] Critical regionalism rejected the placelessness of the international style and the whimsical iconography of post-modernism. The theory is still a product of these movements and has taken lessons from their objective design qualities but seeks to create architecture that is inspired by its regional and cultural context. (Fig. 0.3)

In his 10 points of Critical Regionalism, Frampton explores the dichotomy between the "Architectonic" and the "Scenographic." The Scenographic relates to post-modernist approaches to construction techniques which attempted to pay homage to historical precedents but through dishonest material connection such as stucco on foam. The Architectonic is inspired by the past but attempts honest expression of materials and joinery while balancing innovation with preservation.[7]

This exploration into tectonics, vernacular, and critical regionalism is meant to inform the open-air vernacular architecture museum and, more notably, the design of its contemporary entry building. Critically understanding the lessons that architectonic construction theory, vernacular responsiveness, and critical regionalism's innovations have to offer is crucial for creating a comprehensive design. The design will attempt to showcase these lessons to the public through museum storytelling and an exemplary entry building.

Fig. 0.3 Example of Critical Regionalism
Simpson Lee House, Glenn Murcutt 1993

End Notes

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3. Schwartz, Chad. Investigating the Tectonic from Introducing Architectural Tectonics, 2nd Edition, (2024), 9.

4. Maulden, Robert. Tectonics in Architecture: From the Physical to the Meta-Physical. Master's thesis, (Massachusetts Institute of Technology, 1986), 29.

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6. Carlson-Reddig, Kelly. "Re-Reading Critical Regionalism." In Local Identities Global Challenges, 269-275. University of (North Carolina at Charlotte, 2011), 269.

7. Carlson-Reddig, Kelly. "Re-Reading Critical Regionalism." In Local Identities Global Challenges, 269-275. University of (North Carolina at Charlotte, 2011), 273.

DOGTROT HOUSE

SOUTHERN U.S.

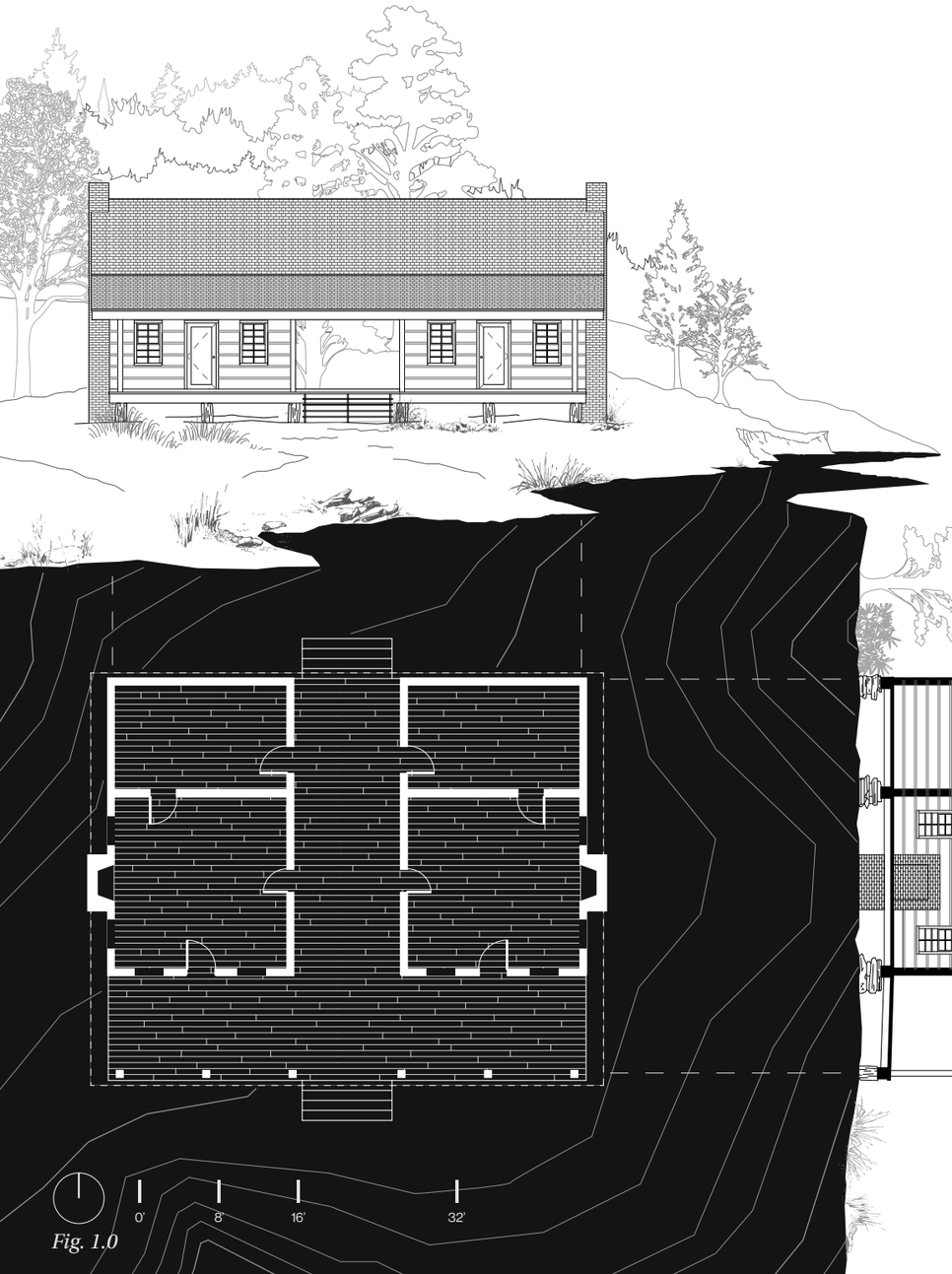


Fig. 1.0

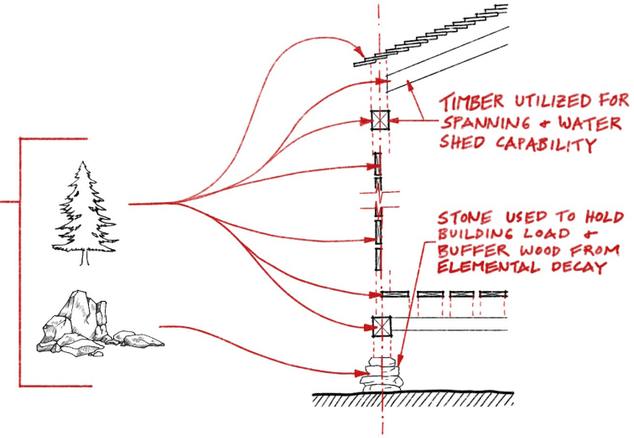


Fig. 1.1 Regional Materials & Tectonic Assembly

The Southern Dogtrot House, also known as a breezeway or dog run house, originated in the early 1800s, with roots tracing back to the Kentucky and Tennessee Appalachians. It became widespread across the Southern United States, from the humid, subtropical climates of the Southeast to as far west as Texas.[1]

Constructed primarily from timber, these houses typically used log cabin methods. Timber is abundant in the region and was used for everything from the structure to the cladding, flooring, and roofing. Stone footings were also used to elevate the timber off the ground, protecting the wood from rot. (Fig.1.1)

The defining feature of a dogtrot house is the central breezeway that runs from front to back, separating the interior spaces. Rooms open into the breezeway, enhancing ventilation and cooling the house. Raised floors allowed additional ventilation and protection from potential floods. (Fig.1.2) Wide covered porches on the front or rear of the home provided shady work and social space. Kitchens, separated from living areas by the breezeway, reduced heat transfer to the main living spaces, creating a more comfortable interior.[2] (Fig.1.3)

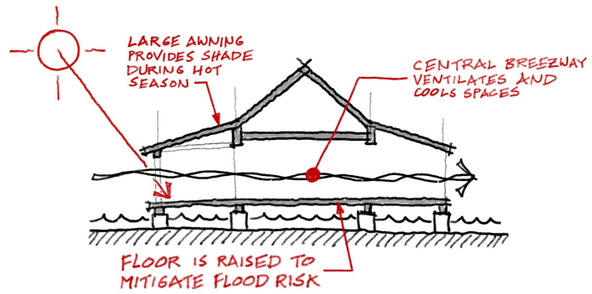


Fig. 1.2 Building Form Responds to Climate

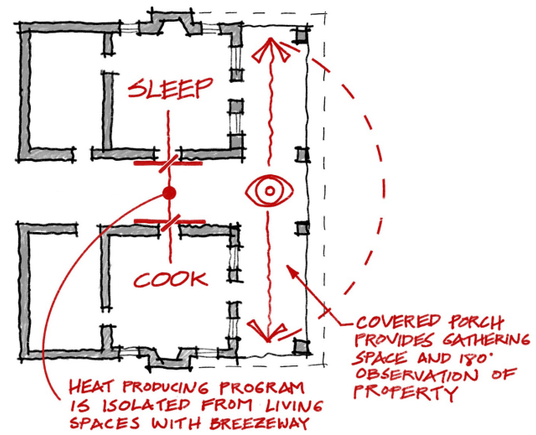


Fig. 1.3 Spatial Organization Responds to Culture

Fig. 1.4 Dogtrot Breezeway

GER (YURT)
MONGOLIA

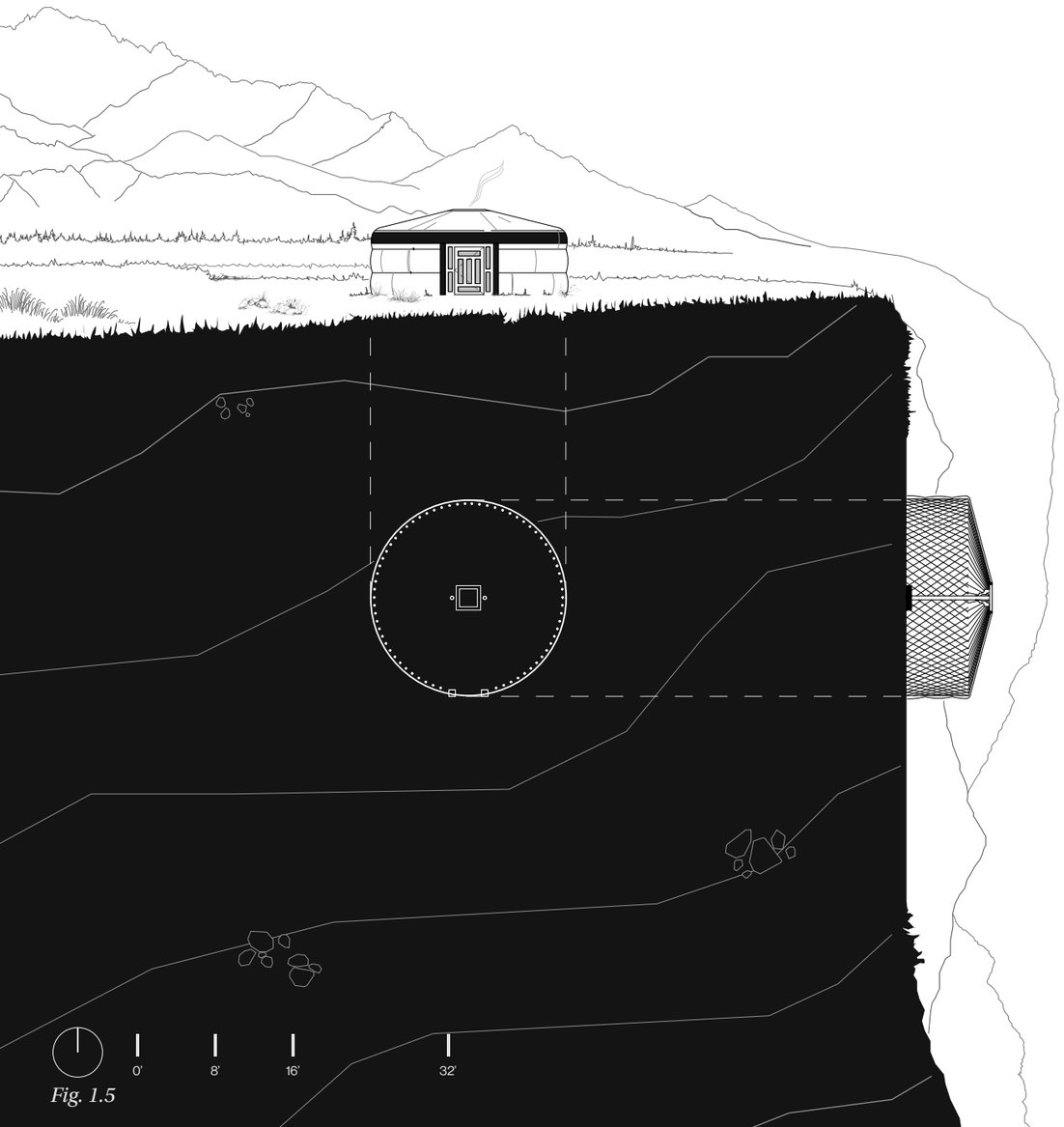


Fig. 1.5

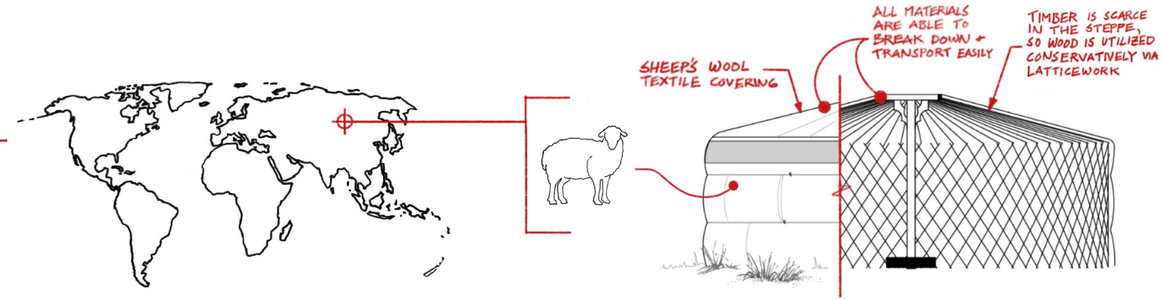


Fig. 1.6 Regional Materials & Tectonic Assembly

The Mongolian Ger, Turkic Yurt, or Russian Kibitka is a portable, tent-like dwelling used by the nomadic peoples of the Central Asian Steppe. These structures have been in use for thousands of years, with the earliest known depictions dating back to 600 BCE. The ger is portable and well suited for the cold semi-arid climate of the Asian Steppe.[3]

The ger's construction is adapted to the sparse resources of the steppe. It features a lattice framework called "khanas," made from thin wood poles, and a circular roof ring or "toono" at the top. The structure is covered with felt made from sheep's wool, providing insulation. The lattice design allows the ger to fold and collapse easily for transport for the people's nomadic lifestyle.[4] (Fig.1.6)

The ger's form is aerodynamic, built to withstand high winds, and its roof features a central hole that provides light, ventilation, and even acts as a sundial. Felt flaps at the base can be lifted for additional ventilation. (Fig.1.7) Internally, the space is divided into quadrants based on traditional roles: the south is the entrance, the west is for the male or head of household, the east for women and children, and the north, which is believed to be a holy direction, is reserved for religious altars.[5] (Fig.1.8)

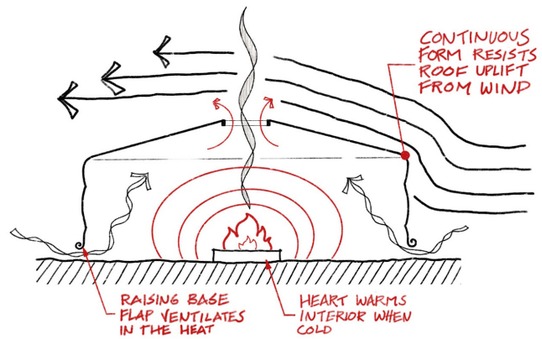


Fig. 1.7 Building Form Responds to Climate

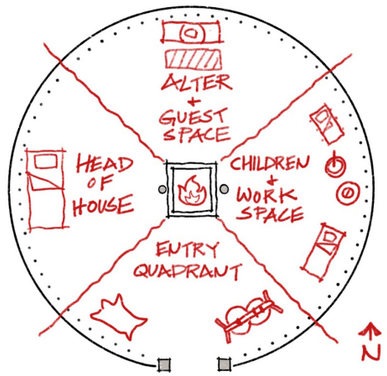


Fig. 1.8 Spatial Organization Responds to Culture

Fig. 1.9 Yurt structure

TOLEK
CAMEROON

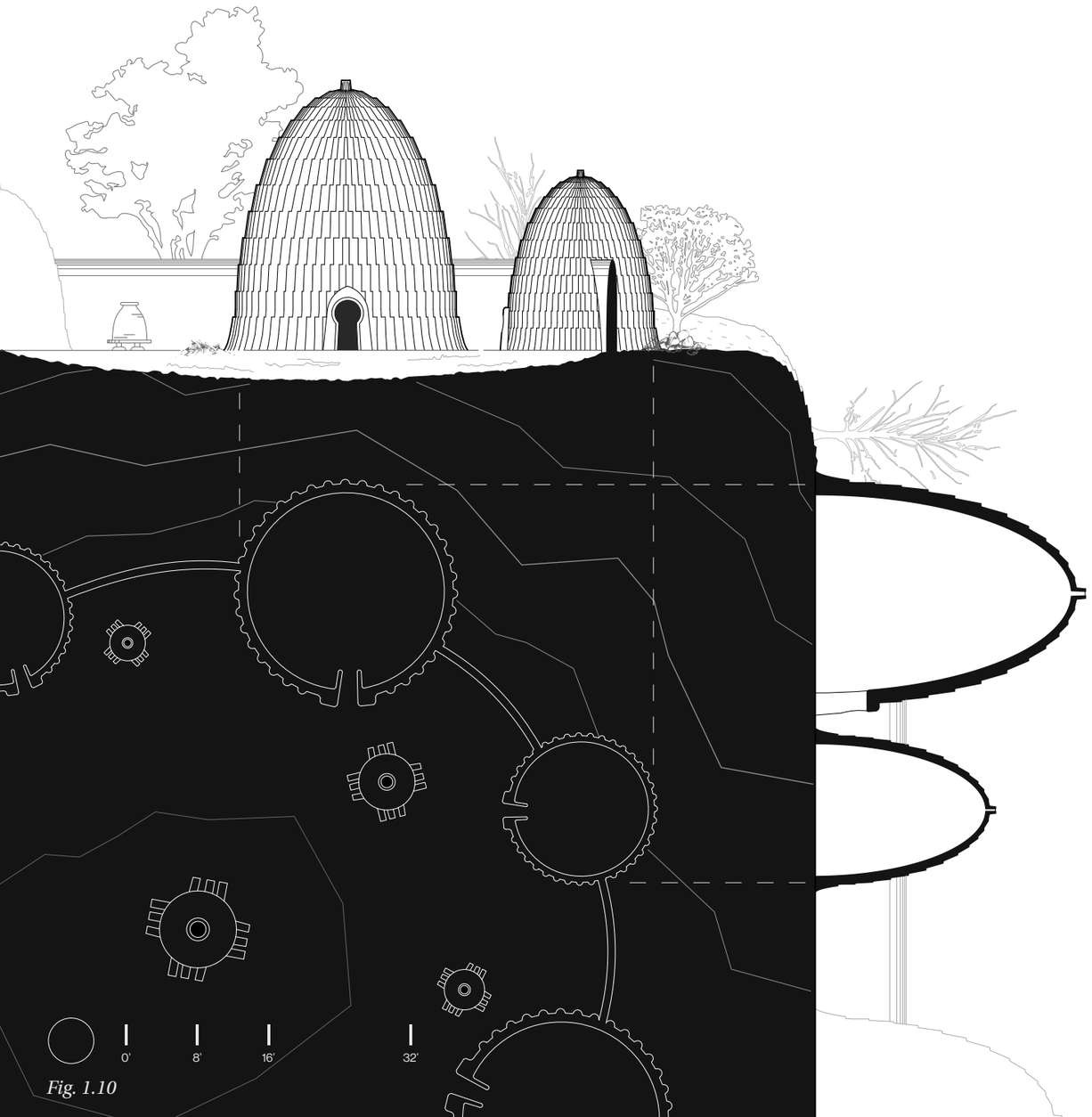
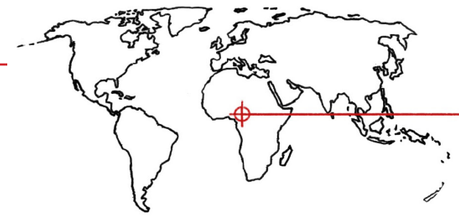


Fig. 1.10



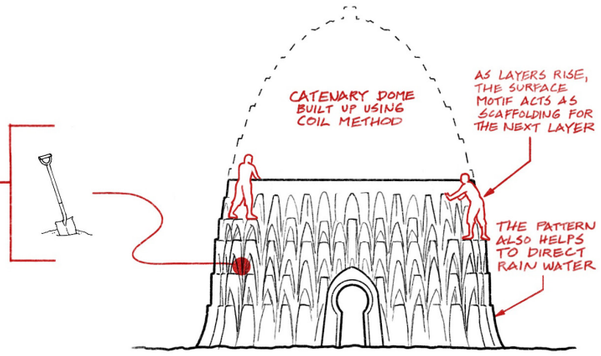


Fig. 1.11 Regional Materials & Tectonic Assembly

The Mousgoum Tolek is a traditional earthen dwelling found in the hot semi-arid regions along the border of Cameroon and Chad in Africa. These unique, clay formed structures, have been in use for at least three centuries. Though their construction declined during French colonial rule in the 1930s, they experienced a resurgence in the 1990s, largely due to interest from tourism.[6]

Toleks are catenary domes, meaning their form naturally supports itself without the need for additional foundations. The thick clay walls are built using a potter's coil technique, where layers of clay are added one at a time.[7] The reverse V-shaped pattern on the exterior serves both decorative and practical purposes, allowing the walls to act as their own scaffolding during construction.[8] (Fig.1.11) These homes are well-adapted to the hot arid climate. Their thick walls provide high thermal mass, preventing heat from entering during the day. Heat that does enter rises and escapes through a vent at the top. The earthen floor connects to the cool ground, further regulating the interior temperature.[9] (Fig.1.12)

Toleks are typically arranged in rings to form family units, with each individual member having their own dwelling. The central courtyard is a shared space for gatherings, and other daily activities. (Fig.1.13)

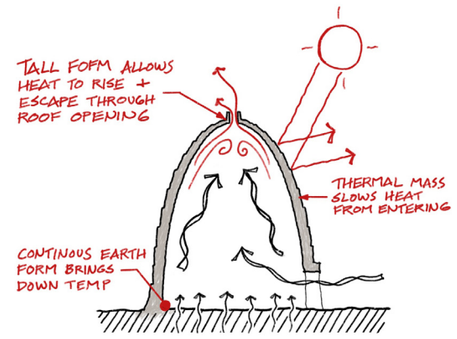


Fig. 1.12 Building Form Responds to Climate

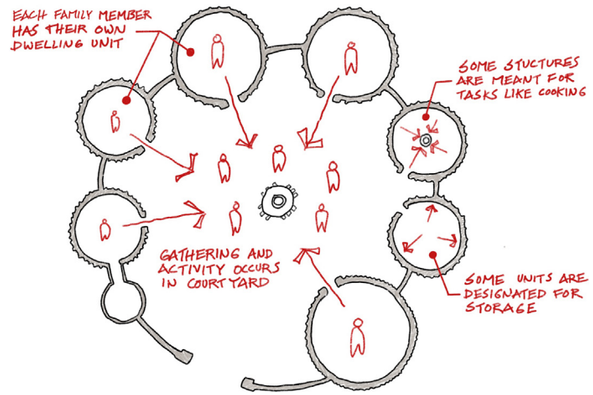


Fig. 1.13 Spatial Organization Responds to Culture

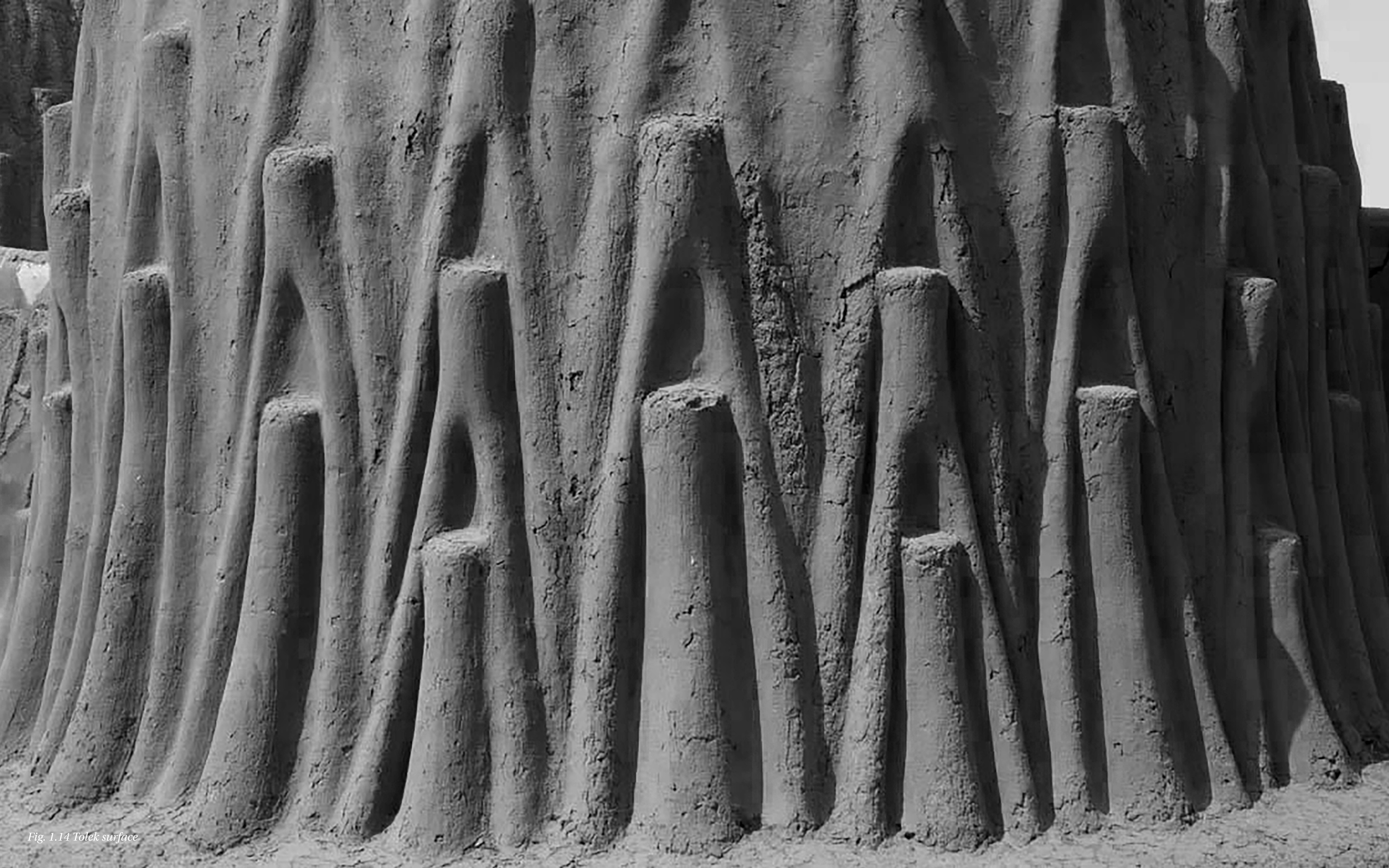


Fig. 1.14 Tolek surface

AB ANBAR

IRAN

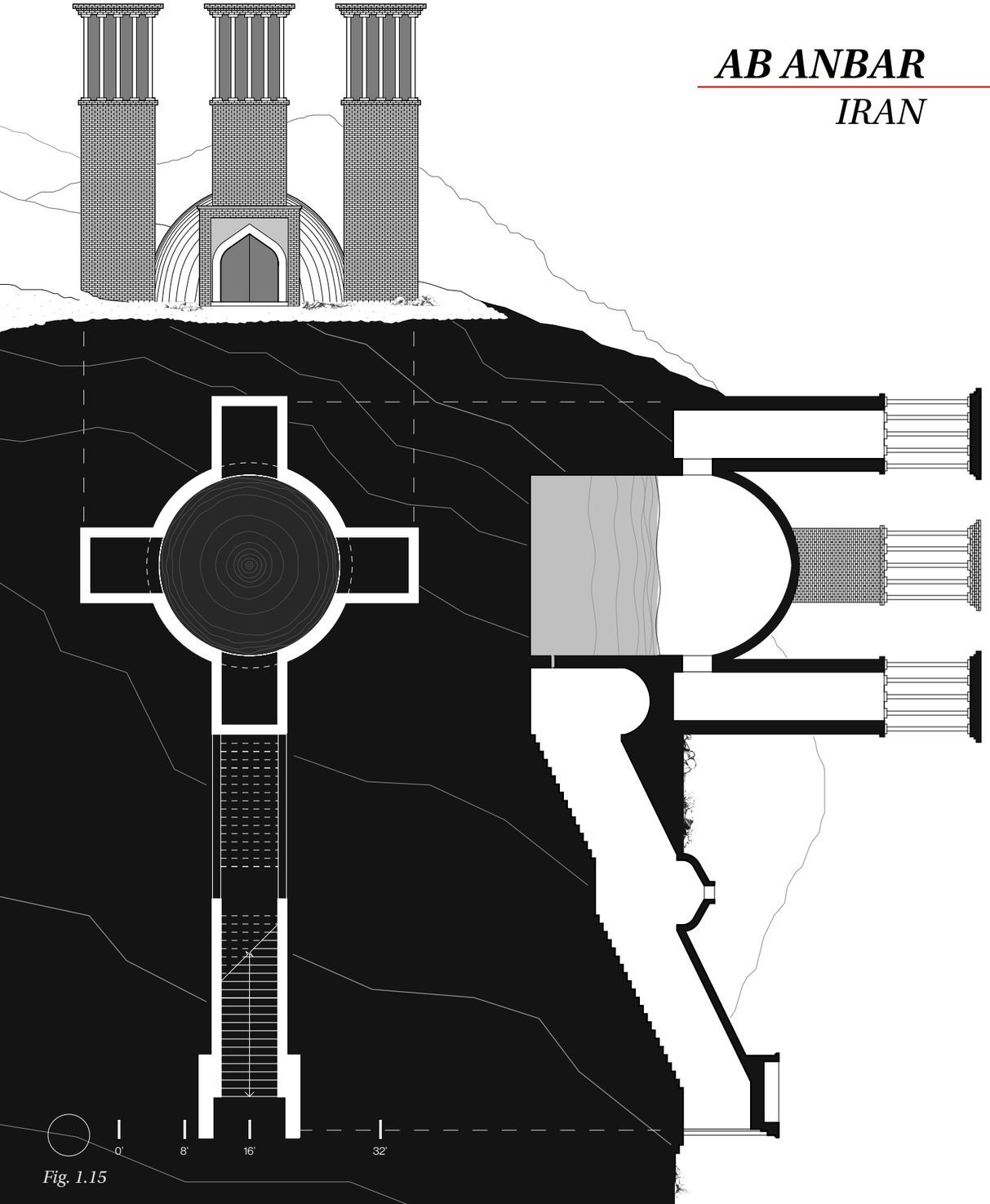


Fig. 1.15

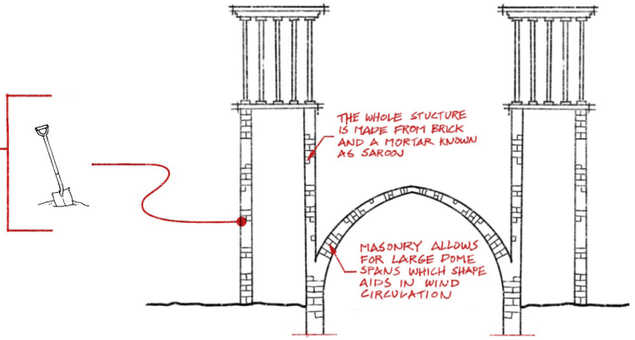


Fig. 1.16 Regional Materials & Tectonic Assembly

An Ab Anbar is a traditional underground cistern in Iran, used to store water during the warm seasons. These cisterns date back to at least 1500 BCE and were vital in the hot desert climate, providing a reliable chilled water source. Typically 10-20 meters deep, they collect water through qanats, underground channels, from the highlands during winter and store it in cool, subterranean chambers.[10]

The Ab Anbar's structure is built with fired brick and a special mortar called saruj, made from earth, egg whites, lime, goat hair, and ash. The heavy masonry and underground foundation helps the structure resist seismic activity. The egg shaped dome can span large distances without the need for internal columns.[11] (Fig.1.16)

Wind catchers, or "badgirs," drive air down into the chamber, cooling the water and creating a cool interior microclimate. The water is stored deep underground further aiding its temperature stability.[12] (Fig.1.17)

The "pasheer" chamber allows access to the water at the base.[13] Historically, Ab Anbars have also served as cool retreats from the heat, and smaller versions were often built in private homes to aid in cooling interior spaces.[14] (Fig.1.18)

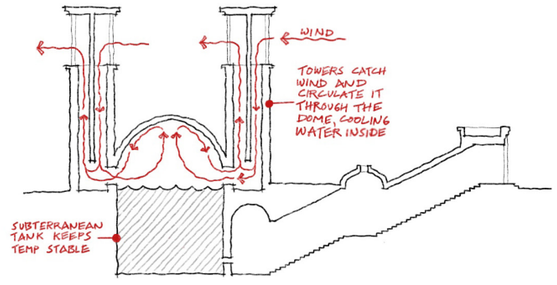


Fig. 1.17 Building Form Responds to Climate

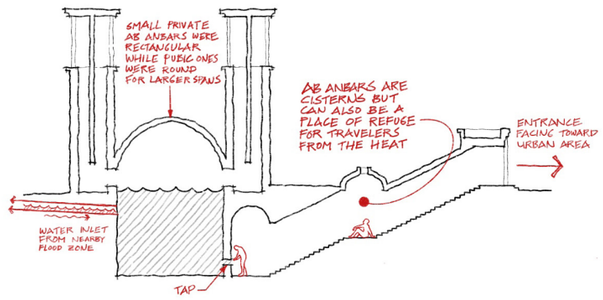


Fig. 1.18 Spatial Organization Responds to Culture

Fig. 1.19 Ab Anbar in Yazd, Iran

CRUCK HOUSE
SCOTLAND

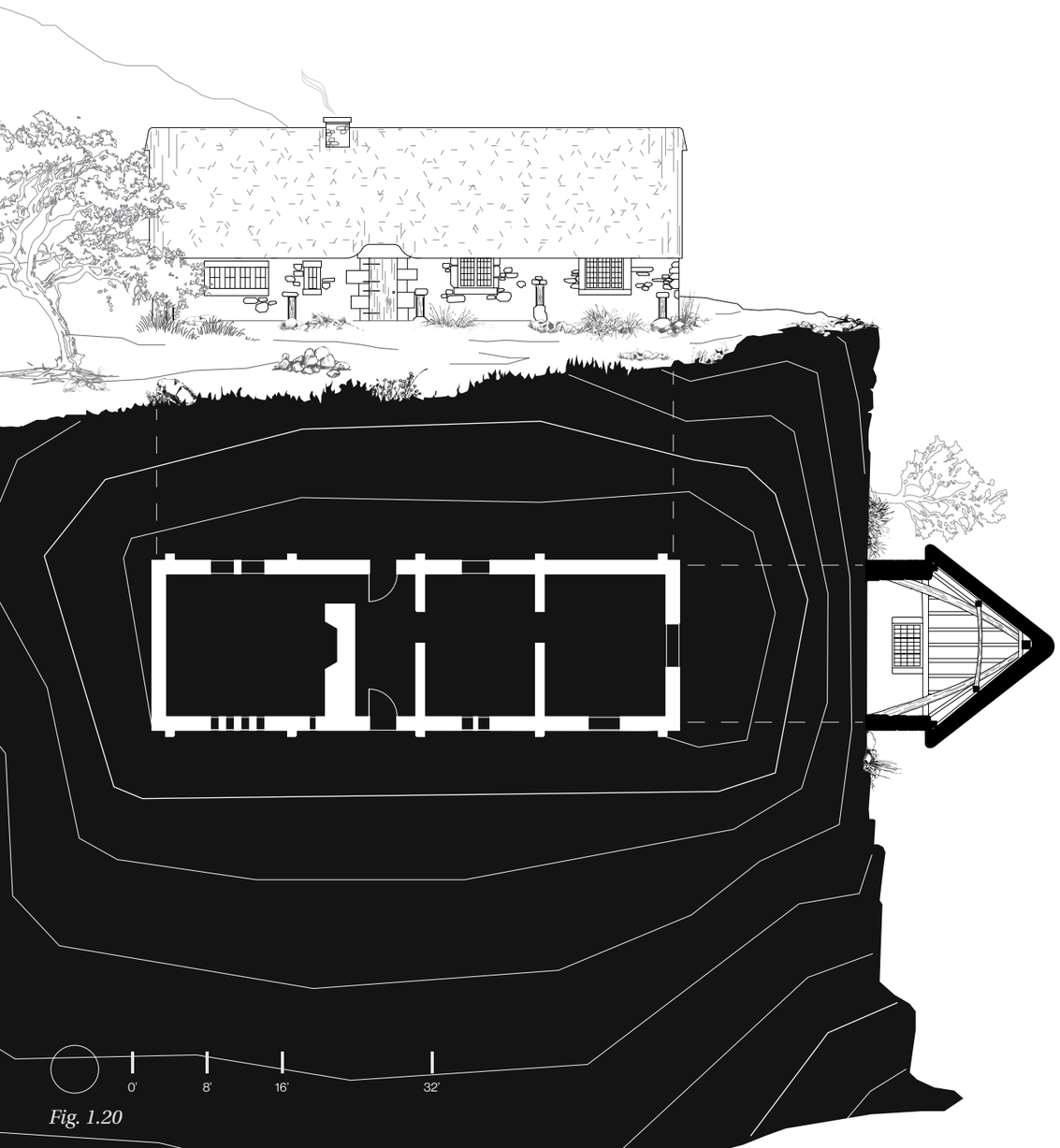


Fig. 1.20

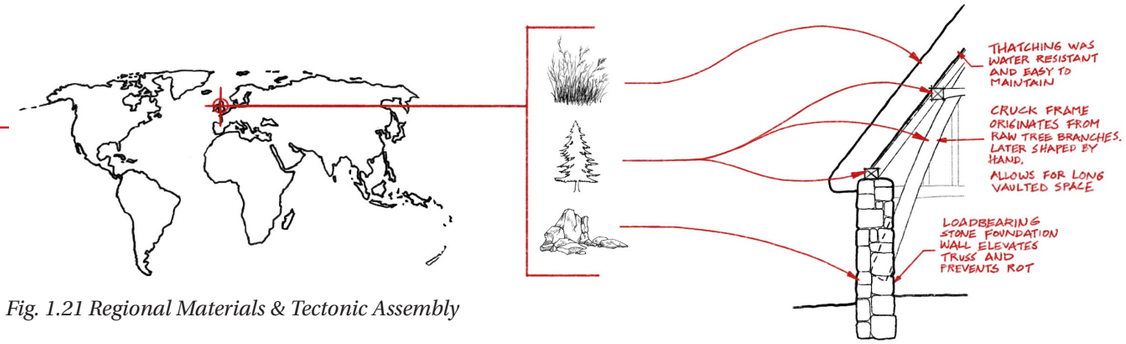


Fig. 1.21 Regional Materials & Tectonic Assembly

A Cruck-Framed House is a traditional timber-framed dwelling, defined by its large A-frame truss. Originating in the 13th century, it was common in Scotland, England, Wales, and other parts of northern Europe's temperate oceanic climate.[15]

The key feature is the cruck frame, made from naturally bent oak or elm timbers which are strong against lateral and compression forces. These frames supported the space without the need for internal columns. Over time, construction evolved from raw logs to carpenter shaped members. The walls varied, with some using wattle and daub techniques, while others employed stone to receive compression forces and elevate the timber off the ground.[16] (Fig.1.21)

The roof was typically thatch and provided excellent insulation and water resistance. Thick masonry walls with high thermal mass further insulated the house. [17] (Fig.1.22) A central hearth served as the primary heat source, radiating warmth throughout.

Spatially, the cruck frame acted as both structure and divider, often organizing the house into rooms for cooking, sleeping, storage, and sometimes livestock. Though the layout varied, the cruck truss remained the defining element of this typology.[18] (Fig.1.23)

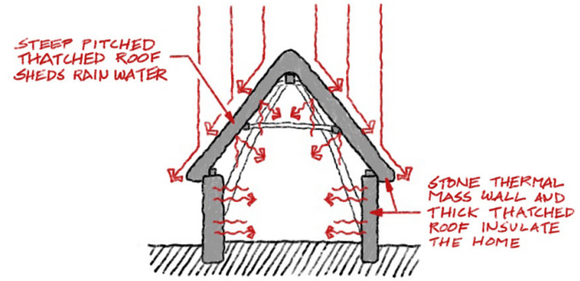


Fig. 1.22 Building Form Responds to Climate

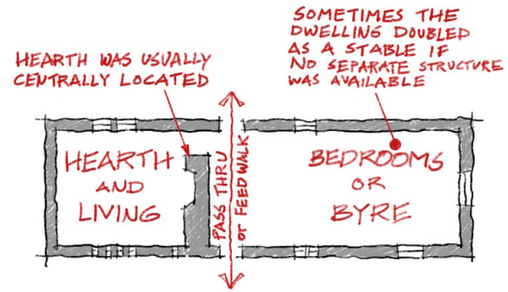


Fig. 1.23 Spatial Organization Responds to Culture

Fig. 1.24 1803 painting of an open hall, in Rhuddlan, Flintshire by John Varley

RUMAH BOLON

INDONESIA

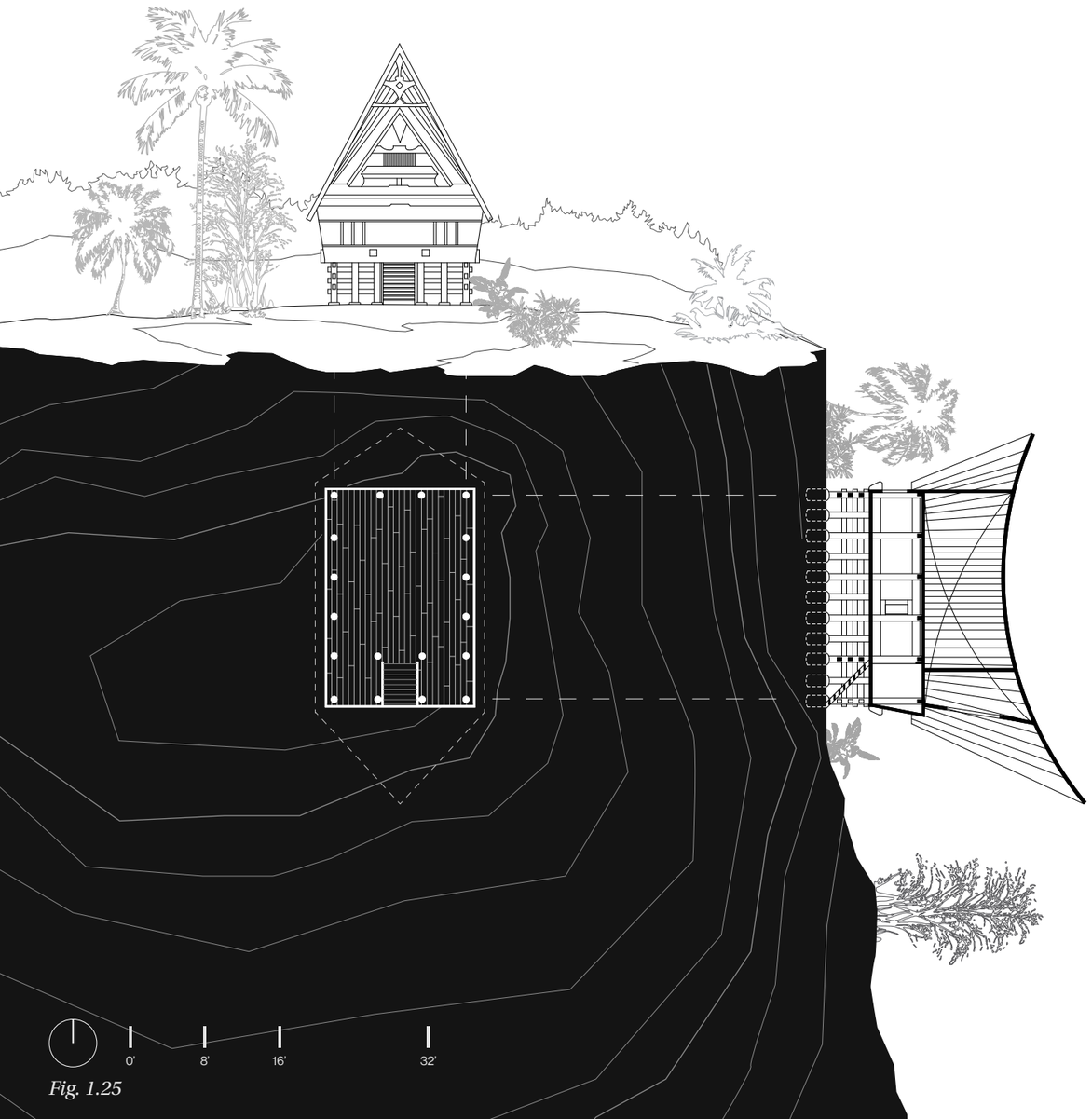


Fig. 1.25

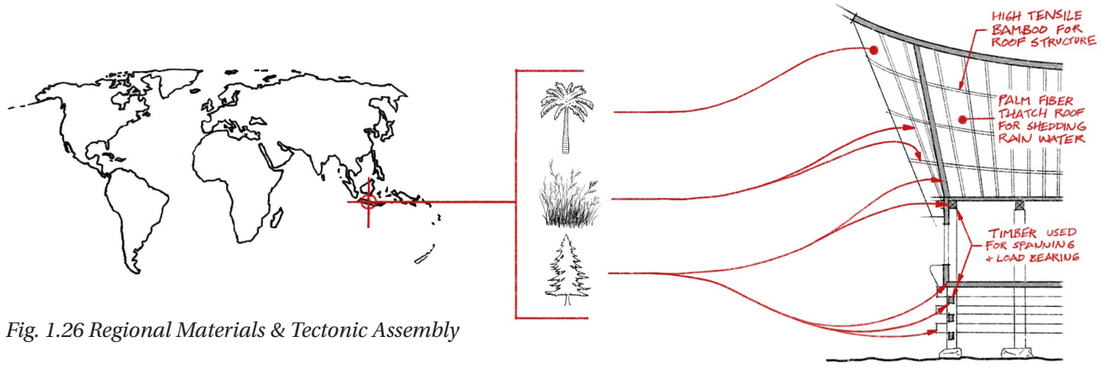


Fig. 1.26 Regional Materials & Tectonic Assembly

The Rumah Bolon, or "great wood house," is a traditional family home of the Batak people in Indonesia, dating back to the 15th century. Built in the tropical monsoon climate zone, the Rumah Bolon is built to withstand the region's heavy rains and humidity.[19]

Constructed primarily from palm and timber, the Rumah Bolon uses timber for its structure and walls, while palm fibers thatch the steep roof, known as Urur. Bamboo is sometimes used for screen walls or roof decking.[20] (Fig.1.26) The home is elevated on pedestal stones called Ojahan, which raise the wooden columns (Basiha) off the ground, protecting the structure from flooding.[21] (Fig.1.27)

The design responds well to the tropical climate. The steep thatched roof and extended overhangs repel rain during monsoon season, while screened walls allow for effective cross-ventilation.[22] (Fig.1.27)

The house is divided into three symbolic parts based on Toba Batak cosmology: Banua Toru (bottom world) for livestock and storage, Banua Tonga (middle world) where humans live, and Banua Gijang (top world) dedicated to the gods and offerings to them.[23] (Fig.1.28)

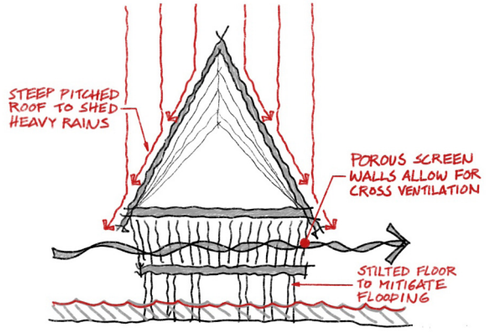


Fig. 1.27 Building Form Responds to Climate

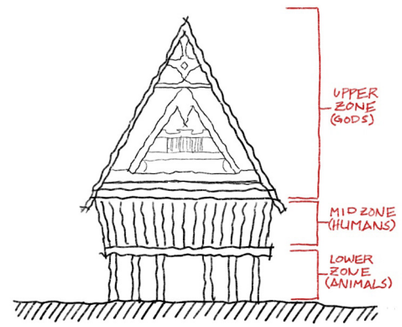


Fig. 1.28 Spatial Organization Responds to Culture

Fig. 1.29 Museum Huta Bolon Simanindo, Royal Compound

PLANK HOUSE

PNW

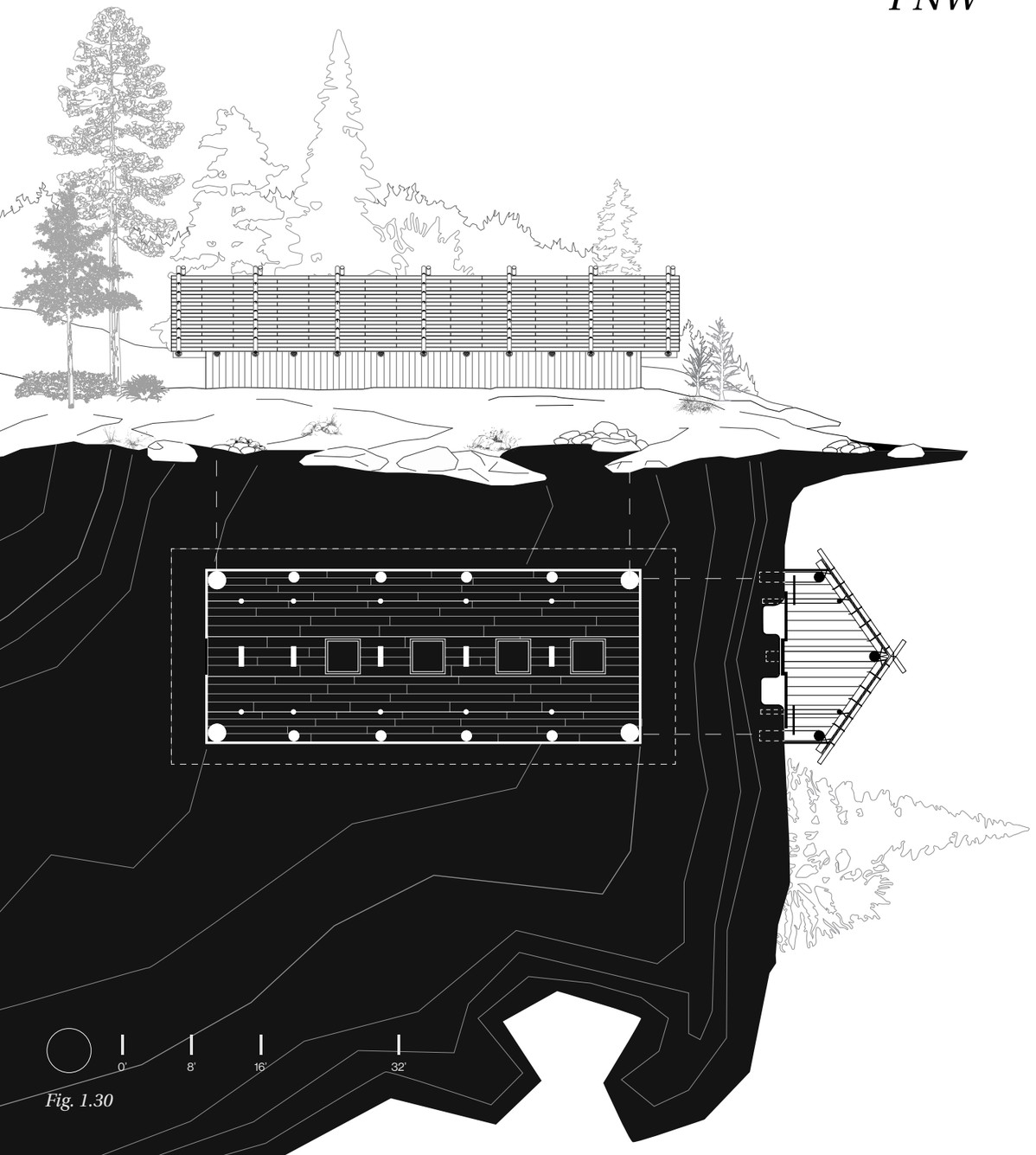
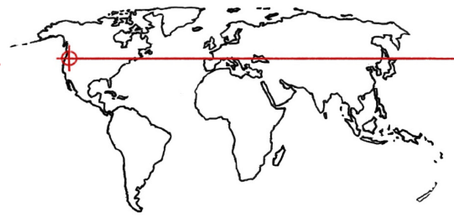


Fig. 1.30



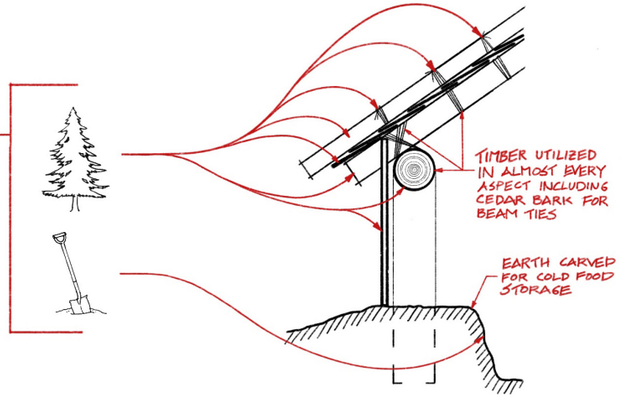


Fig. 1.31 Regional Materials & Tectonic Assembly

The Chinook Plank House was a large, multi-family dwelling used by indigenous peoples of the Pacific Northwest Coast of the U.S. and Canada. Dating back over 4,000 years, these structures served a myriad of purposes for the Chinook.[24] Anthropologist Wayne Suttles described them as "food-processing and storage plants, ... workshops, recreation centers, temples, theaters, and fortresses."[25]

Plank houses were primarily built from cedar timber, with large logs used for perimeter columns and rectangular columns spaced down the center. Cedar phloem, roots, or vines were used as cords for joinery. (Fig.1.31) The gable roof effectively shed rain, while snow accumulation helped insulate the interior. Smoke from hearths cooked meats and ventilated through occasional roof openings, Under the plank benches floors storage pits were dug into the earth for food preservation.[26,27] (Fig.1.32)

Spatially, Chinook architecture had a clear hierarchy. Commoners and slaves carried out task-oriented activities near the front of the house while spiritual practices and the chieftains resided toward the back.[28] (Fig.1.33)

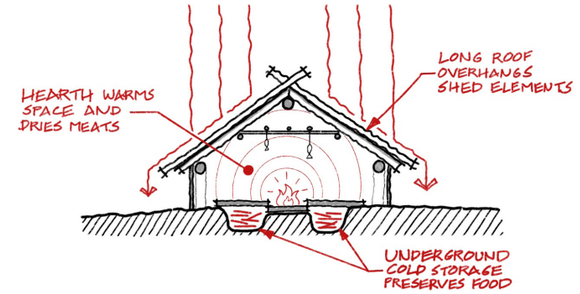


Fig. 1.32 Building Form Responds to Climate

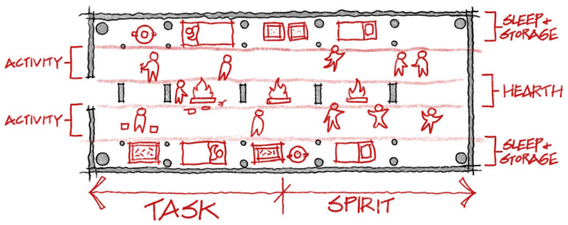


Fig. 1.33 Spatial Organization Responds to Culture

Fig. 1.34 Plank House at Cathlepotle

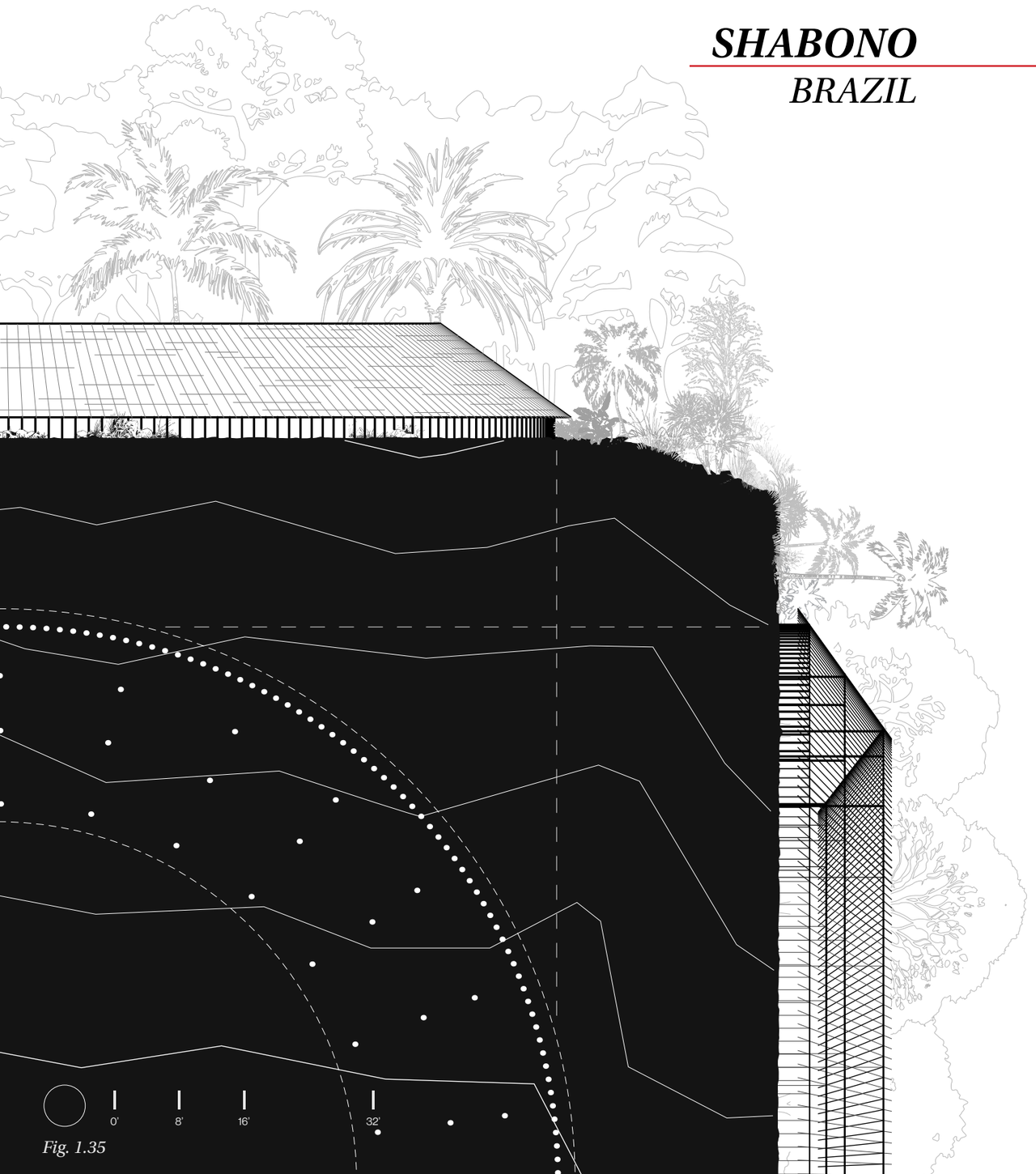


Fig. 1.35

SHABONO

BRAZIL

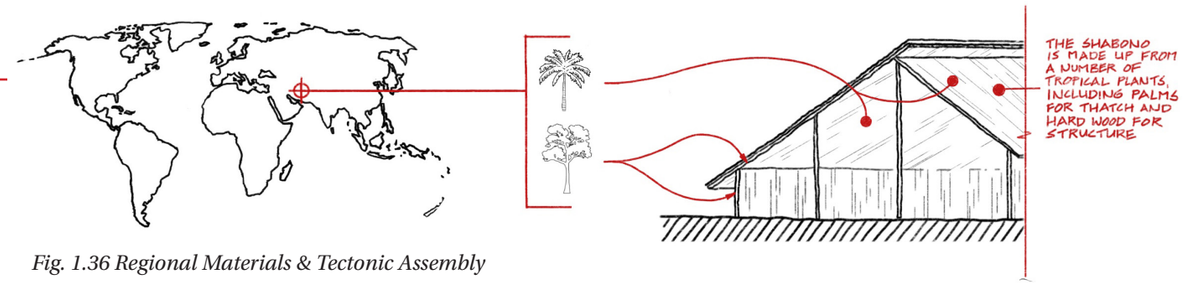


Fig. 1.36 Regional Materials & Tectonic Assembly

The Shabono, or Yano, is a large, circular, open-air dwelling structure used by the Yanomami tribe in the tropical Amazon Rainforest of southern Venezuela and northern Brazil. While the exact age of Shabono construction is unknown, the Yanomami have lived in the region for over 8,000 years.[29]

The Shabono can reach up to 80 meters in diameter, with a walled exterior and an open interior. It is constructed from hardwood species for the structure and palm leaves for the thatched roof. All components are tied together using vines for lashing.[30] (Fig.1.36)

Built for the tropical climate, the Shabono provides shade for its inhabitants and sheds rain with the palm leaf roof. The roof often features a split overhang to allow smoke from cooking fires to escape, and the outer walls, made from tree trunks or palm thatch, act as a barrier while permitting air circulation.[31] (Fig.1.37)

At the center of the Shabono is a large communal space, or yano a miamo, where social gatherings, rituals, and feasts take place. Surrounding this space, individual family groups live in sections around the ring, each with their own hearth, sleeping hammocks, and personal belongings.[32] (Fig.1.38)

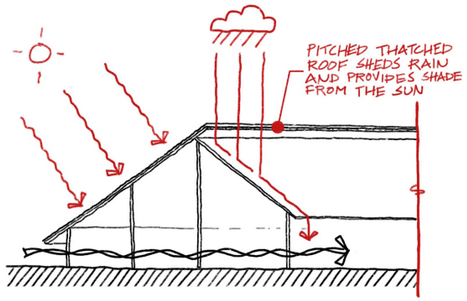


Fig. 1.37 Building Form Responds to Climate

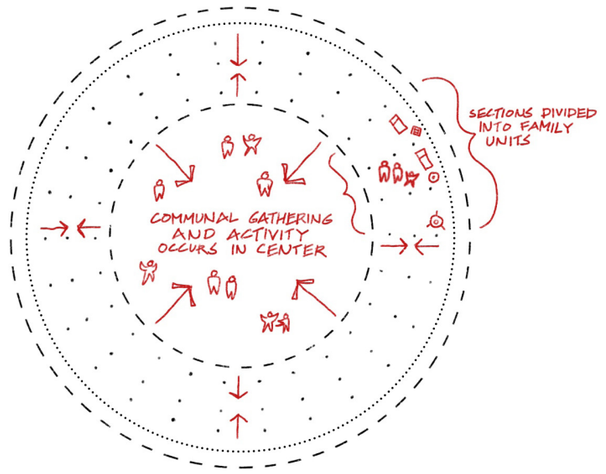


Fig. 1.38 Spatial Organization Responds to Culture

Fig. 1.39 Yanomami Shabono

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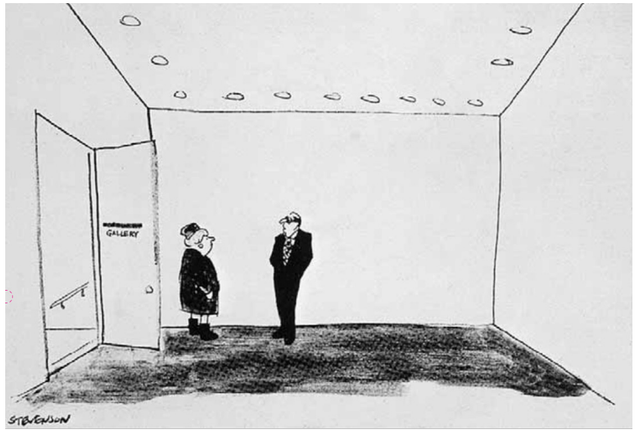

Fig. 2.0 "This is the show, Madam."
James Stevenson in The New Yorker, 1967.

On Exhibition

Early museums, such as 16th century Renaissance cabinets of curiosity, displayed eclectic objects in a manner that reflected their collectors' intellectual interests and worldly wonders.[1] By the 18th century museums began organizing collections by schools and regions. The dense, decorative arrangements of paintings evolved into more structured displays that focused on thematic or chronological orders.[2] The 19th century saw the rise of museums, such as the Altes Museum in Berlin, which introduced linear galleries and a spatial progression to guide visitors through art history. By the end of the century, most museums adopted similar chronological and school-based displays, reflecting the growing influence of art history as a discipline, and laying the groundwork for modern curation.[3]

Emerging in the early 20th century, the "white cube" became prominent with modern art institutions like MoMA in New York. Its rationale was to create a neutral, minimalist environment characterized by plain white walls that would isolate artworks from external influences, allowing them to be viewed without distractions. This approach was supposed to emphasize the autonomous, aesthetic purity of the artwork. It offered flexibility for displaying various types of art while minimizing any architectural distraction on the viewer's experience.[4]
However, the white cube was criticized for being overly sterile and detached from social and historical contexts. Critics, such as Brian O'Doherty, argue that it strips art of its cultural and political meanings, turning galleries into spaces that serve market-driven aesthetics rather than fostering critical engagement.[5] There was design opposition to the white cube during the modernist movement as well. Constructivists like Frederick Kiesler and László Moholy-Nagy sought to create exhibition spaces where art and architecture were unified into a cohesive, dynamic experience. They created spaces that encouraged visitor interaction and participatory immersion.[6]

The modern art white box gallery can be compared to the architectural modernist movement. Both modernist white cube architecture and the white cube exhibition space design share the concept of "placelessness," promoting neutrality and universality. In modernist architecture, minimalist, functional designs strip buildings of regional or cultural specificity, attempting a timeless aesthetic. Similarly, the white cube exhibition space isolates art from its broader context, removing decorative or historical references to present works in an abstract, neutral environment.
In contrast, contemporary exhibition designers like Elizabeth Bogle reject the white cube approach. In her book Museum Exhibition Planning and Design, she states

that, “Every shape, form, and space must be planned/designed so that the exhibition will be harmonious and cohesive. Whether they are artifacts, structures, or areas, their configuration and placement should be compatible with each other and support the ambiance, aims, and story line.”[7]

The white cube is not the only exhibition theory that may do a disservice to the artwork. Certain museum architecture may dominate the art, creating space that ignores the art for the sake of architectural prowess. Museum curator Steve Murillo has commented that, “Some creative building designs handicap exhibition curators such as the Guggenheim Museum (NYC) with its spiral corridors and curved walls,” and that, “Ideally, an exhibition space does not distract from appreciating the displayed items.”[8] However Murillo is not opposed to architectural manipulation of an exhibit based on the art. He has been known to create tailored experiences for museum guests by adjusting room sizes, alternating lights, or painting walls “to fit the scale, aesthetic, medium, and requirements needed for the works shown.”[9]

Exhibition design has the opportunity to learn from and work with the artwork it is meant to house. It can be tailored to enhance the guests experience through interaction with the work and/or it can be designed in a way to harmonize with the art, to allow it to shine without ignoring it and treating every piece the same as the last.

Parallels can be drawn between this approach of exhibition design responding to art and architectural design responding to its geographic location. Architects prescribing to movements like critical regionalism carefully study the building site to understand its needs, its importance, its affect on the building, and how might the building give back to its surroundings. Architecture designed with regionalism in mind strives for a contextual harmony between the building and the site. There is much to be learned from the relationship between exhibition planning and regionally responsive architecture, as both prioritize a deep responsive connection between design and context.

The open-air vernacular architecture museum design aims to do just that. A comprehensive understanding of exhibition design, regional architectural design, and a synthesis between the two is necessary for its success. Consider this: Museum design should respond to the existing artwork it will house. Architecture should respond to the existing site it will now be a part of. The vernacular museum’s site will need to be designed to respond to the existing buildings it will house; buildings that are important because they respond to their site. It is a circular

Consider this: Museum design should respond to existing artwork. Architecture should respond to an existing site. The vernacular museum’s site will need to be designed to respond to existing buildings – buildings that are designed to respond to their site. It is a circular design approach that has certain contradictions: How does one design an environment for a set of buildings that are all dependent on their own respective environment? How does one design a new museum entry pavilion to respond to its own respective region (The Kansas Flint Hills) while simultaneously manipulating the region to respond to foreign vernacular?

The task is borderline paradoxical. However, there are ways a balance can be achieved. Surrounding each vernacular typology, minimal land manipulation will occur. The form of the topography and types of vegetation used will reflect that of the vernacular’s origin, but never strive so far as to be unrecognizable from the Kansas landscape. The goal is to be less of a zoo or botanical garden which attempts to immerse the viewer in a total replica of the original environment, and more of an art gallery, in which the viewer can understand the original context through subtle manipulation of scale and proportion, rather than being fooled through mimicry.

Fig. 2.1 Adelaide Cobb Ward Sculpture Hall BNIM, 2005.

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Figure 1.0 Plan Section Elevation
by author

Figure 1.1 Regional Materials & Tectonic Assembly
by author

Figure 1.2 Building Form Responds to Climate
by author

Figure 1.3 Spatial Organization Responds to Culture
by author

Figure 1.4 Dogtrot House
Dogtrot House. 1860s. Log. https://jstor.org/stable/community.8734313.

Figure 1.5 Plan Section Elevation
by author

Figure 1.6 Regional Materials & Tectonic Assembly
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Figure 1.7 Building Form Responds to Climate
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Figure 1.8 Spatial Organization Responds to Culture
by author

Figure 1.9 Yurt Structure
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Figure 1.10 Plan Section Elevation
by author

Figure 1.11 Regional Materials & Tectonic Assembly
by author

Figure 1.12 Building Form Responds to Climate
by author

Figure 1.13 Spatial Organization Responds to Culture
by author

Figure 1.14 Tolek Surface
"Mousgoum Clay House Cameroon." Accessed September 21, 2024. https://artsection.org/mousgoum.html.

Figure 1.15 Plan Section Elevation
by author

Figure 1.16 Regional Materials & Tectonic Assembly
by author

Figure 1.17 Building Form Responds to Climate
by author

Figure 1.18 Spatial Organization Responds to Culture
by author

Figure 1.19 Ab Anbar in Yazd, Iran
Dan. Ab Anbar (Cistern) in the Towers of Silence, Yazd. April 19, 2011. Photo. https://www.flickr.com/photos/twiga_swala/6745064385/.

Figure 1.20 Plan Section Elevation
by author

Figure 1.21 Regional Materials & Tectonic Assembly
by author

Figure 1.22 Building Form Responds to Climate
by author

Figure 1.23 Spatial Organization Responds to Culture
by author

Figure 1.24 Painting of an Open Hall in Rhuddlan, Flintshire by John Varley
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Figure 1.25 Plan Section Elevation
by author

Figure 1.26 Regional Materials & Tectonic Assembly
by author

Figure 1.27 Building Form Responds to Climate
by author

Figure 1.28 Spatial Organization Responds to Culture
by author

Figure 1.29 Museum Huta Bolon Simanindo, Royal Compound
"Museum Huta Bolon Simanindo, Royal Compound." Accessed September 21, 2024. https://jstor-org.er.lib.k-state.edu/stable/community.14678754.

Figure 1.30 Plan Section Elevation
by author

Figure 1.31 Regional Materials & Tectonic Assembly
by author

Figure 1.32 Building Form Responds to Climate
by author

Figure 1.33 Spatial Organization Responds to Culture
by author

Figure 1.34 Plank House at Cathlepotle
Oh Kaye. Cathlepotle Plankhouse. June 26, 2018. Photo. https://www.flickr.com/photos/9742303@N02/27536970177/.

Figure 1.35 Plan Section Elevation
by author

Figure 1.36 Regional Materials & Tectonic Assembly
by author

Figure 1.37 Building Form Responds to Climate
by author

Figure 1.38 Spatial Organization Responds to Culture
by author

Figure 1.39 Yanomami Shabono
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Figure 2.0 "This is the Show, Ma'am."
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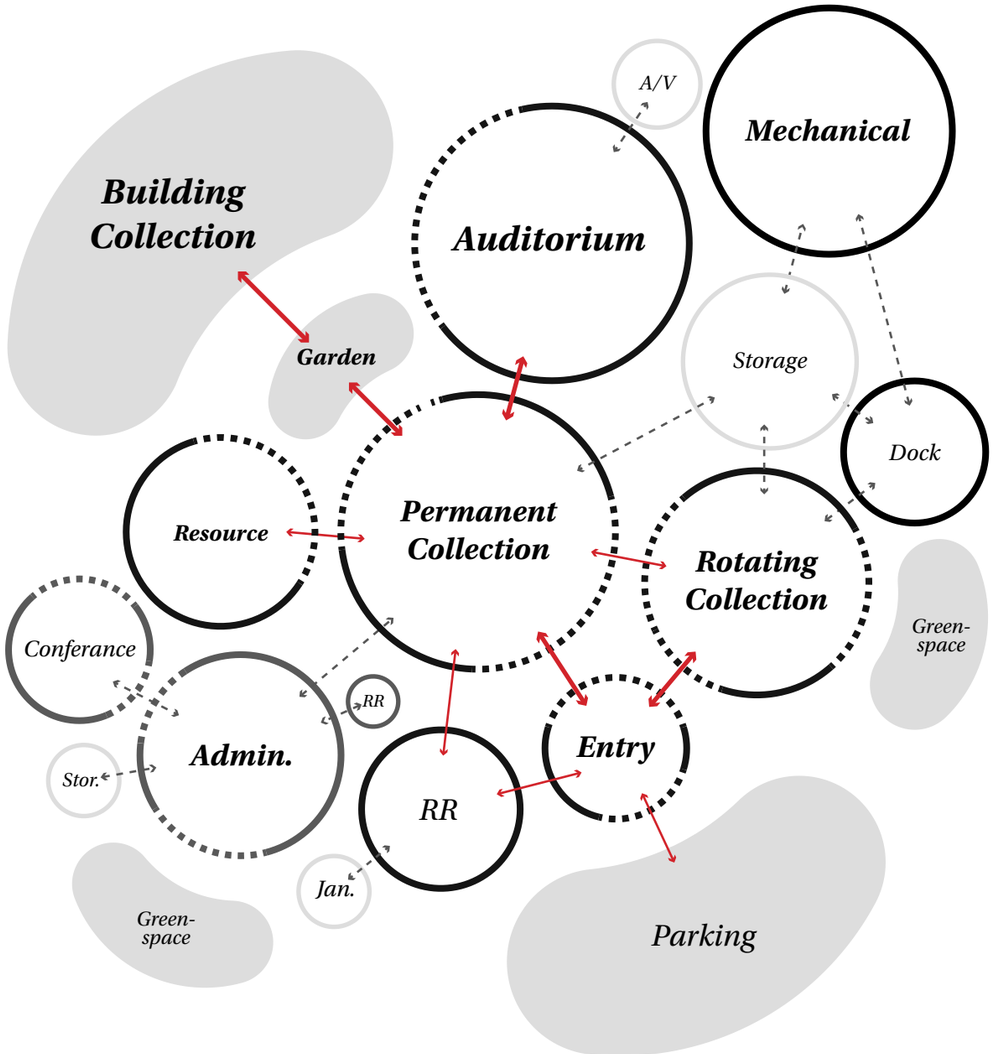
Figure 2.1 Adelaide Cobb Ward Sculpture Hall
BNIM. "Adelaide Cobb Ward Sculpture Hall." Accessed September 23, 2024. https://www.bnim.com/projects/adelaide-cobb-ward-sculpture-hall/.

Figure 3.0 Building Program
by author



Forum and Exhibition Programatic Goals

The Vernacular Architecture Forum (VAF) will serve as the entry point to an open-air museum in the Flint Hills near Manhattan, Kansas. Designed to introduce visitors to global vernacular, the building will feature an auditorium space for up to 100 guests, permanent and rotating exhibition galleries, office space for museum staff, and a resource room for researchers and architects. Key goals include intentional connections between indoor and outdoor spaces, creating an engaging learning environment, and providing a venue for lectures and exhibitions. The building will emphasize clear programmatic circulation for visitors, with an approximate footprint of 10,000 square feet. The forum will balance its primary focus on architects and designers with its openness to the general public.

Figure 3.0 Building Program

- Public Space
- Private Space
- Support Space
- Exterior Space (not to scale)
- Public Circulation
- Private Circulation
- Visual Connection

I. Public Spaces

1. Entry/ Vest./ Front Desk	500 sf	Entry sequence to the building. The first point of contact, secure boundary, and wayfinding assistance.
2. Permanent Collection Gallery	1,500 sf	An exhibition dedicated to permanent Kansas/Midwest vernacular documentary photography and artifacts.
3. Rotating Collection Gallery	1,000 sf	An exhibition dedicated to rotating photography and artifacts from the guest speaker's region.
3. Auditorium	1,500 sf	A 100 person capacity auditorium with fixed seating and floor level stage meant for architectural lectures.
4. Reading/Resource Room	700 sf	A space dedicated for a small library collection, storage, and meeting table.
5. Exterior Garden	n/a	A garden and outdoor exhibition space between the building and the beginning of the collection walk.

II. Administration Spaces

1. Office Space	800 sf	Room dedicated to the administrative employees of the facility. Open floor plan to house 5 desks and 1 private office.
2. Conference Room	400 sf	Room for staff to hold meetings that accomodates up to 12 people and a table facing TV.
3. Storage	100 sf	A small storage space for office materials.
4. Restroom	50 sf	ADA compliant single occupancy employee restroom.

II. Utility Spaces

1. Restrooms (2)	500 sf ttl.	3 stall restroom per gender including one ADA compliant stall and two lavetories each.
2. Storage	600 sf	Room dedicated to housing access collection materials or to temporary hold artifacts inbetween exhibitions.
3. Mechanical Room & AV Room	1350 sf ttl.	MEP access and maintenance room and an audio visual hub adjacent to the forum.
4. Janitorial Closet	100 sf	Adjacent to the restrooms, equipped with mop sink and other maintenance materials.
6. Dock	400 sf	A loading dock & trash enclosure adjacent to gallery storage.
Total	8,150 sf x 1.3 grossing factor =	10,595 gsf

The building will follow 2021 IBC standards in compliance with Occupancy Classifcation Group A-3 as well as 2010 ADA Guidelines.

Final Thoughts

As an entry point to a collection of vernacular typologies from around the world, the building must serve as more than just a functional space, it should set the tone for the entire museum experience, conveying the lessons learned from vernacular architecture and values of critical regionalism while acting as a gateway for visitors to engage with the exhibits. The design should reflect a deep understanding of the surrounding landscape, tectonic principles, and the importance of sustainability. In doing so, it will become an integral part of the museum's mission: to celebrate architecture that is rooted in place and tradition.

Vernacular architecture is inherently responsive to its environment, shaped over generations by the cultural, material, and climatic properties of its region. Unlike architecture designed by academically trained architects, vernacular buildings evolve through trial and error, resulting in buildings that are deeply integrated into their surroundings. This process of adaptation creates buildings that are both functional and symbolic of their respective cultures. In designing the entry building for the museum, it's important to draw from these lessons of vernacular architecture; understanding how the use of local materials, construction techniques, and spatial organization can create a building that feels both responsive and authentic to its setting.

The museum's collection of vernacular, from the Dogtrot House to the Shabono, provides examples into how architecture can respond to its place and time through material tectonics, climate adaptation, and cultural influence. The entry building for the museum should follow similar rules, like using appropriate, honest materials associated with the Kansas Flint Hills. The region is known for its rolling hills, tallgrass prairie, and extreme weather, which presents challenges and opportunities for the design. By responding to these conditions, through the use of local stone, wood, or other materials, the building can form a strong connection to the land and its inhabitants while at the same time minimizing environmental impact.

The weather of the Flint Hills ranges from hot summers to cold winters requiring a building that can adapt to its environment. Further lessons can be gained from the vernacular collection, such as passive design strategies like natural ventilation, thermal mass, and shading, which can help reduce the building's energy consumption.

Tectonic expression of construction and the relationship between material, structure, and place, offers a useful framework for designing the building. Tectonics is concerned not just with the technical aspects of construction, but with how the materials and methods used can convey a sense of place, time, and culture. The museum should not only serve a function, but also reflect the culture and environment of the Flint Hills region.

The building itself is not the only item to consider either. The multi-acre site will need to be developed in a way that does not disrupt the natural landscape, yet suites the needs for the vernacular collection. Specific strategies have been explored in previous chapters of this book, (see chapter 3 on exhibition,) but organizing exterior space while also integrating indoor and outdoor connections will be important for this design's success.
The entry building is the first point of contact for visitors and will set the tone for their entire museum experience. Because of this, the design must create an environment that is welcoming, engaging, and educational. The building should be more than just a gateway, it should introduce visitors to the core concepts of historic vernacular and contemporary regionalism and prepare them for the exhibits they will encounter.

The spatial organization of the building's programs should guide visitors through a experience that mirrors the museum's broader narrative. The entry sequence could begin with an introduction to the Flint Hills and its unique architectural traditions via documentary photography and artifacts, followed by a tour of the rotating exhibit, curated by guest speakers invited from abroad to learn not only about the Flint Hills but global vernacular as well. The use of natural light, views of the surrounding landscape, and curated exhibits can create a sense of connection between the building, the collection, and the broader environment.

The building will also serve practical functions, including administrative offices, meeting rooms, and a resource center for architects and researchers. Understanding the role of these spaces, their connections to one another and the landscape will be equally important in creating a functional museum.
The open-air vernacular museum in the Flint Hills presents a unique opportunity to engage with both regional and global architectural traditions.

By learning from the lessons of vernacular architecture and tectonic principles, the design can create a building that is not only functional but also deeply connected to its environment. Through the use of local materials, passive design strategies, and a thoughtful engagement with the surrounding landscape, the building will serve as a model for contemporary architecture that harmonizes with its place and time.

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