SUSTAINABLE DESIGN OPTION STUDIO 1

2025 FALL TERM

Course lead: Prof. Khoo Peng Beng

Moderators: Prof. Eva Maria Castro, Dr. Zheng Kai

Studio Instructors:

1. Prof. Erwin Viray
2. Prof. Timothy Matthew Collins
3. Dr. Jason Lim

SUTD | Architecture and Sustainable Design

SINGAPORE UNIVERSITY OF TECHNOLOGY AND DESIGN

1. Introduction

1.1 Course Description
Option Studio 1 builds upon the foundational principles established in Core Studio 3 on urban design, extending the scope of architectural inquiry into the international realm. This studio invites students to critically engage with urbanism beyond the local context, fostering a comparative and experiential understanding of sustainable design across diverse cultural and spatial settings.

This year, the studio focuses on three globally significant cities — Kyoto, Tokyo, and Vienna — each offering unique urban typologies, historical layers, and sustainability paradigms. Through a structured research process initiated in Singapore, students will investigate the urban conditions of these cities, followed by immersive travel to encounter, experience, and document their spatial and temporal dynamics.

The studio encourages students to compare and contrast these international urban environments with the Singaporean context. Using methods such as mapping, overlay analysis, and diagrammatic studies, students will extract insights that inform new design propositions. These proposals aim to generate innovative spatial-temporal interventions that respond to contemporary challenges in urban sustainability, while reflecting the nuanced interplay between global precedents and local conditions.

By synthesising cross-cultural urban experiences, Option Studio 1 cultivates a critical design approach that is both globally informed and locally responsive, preparing students to contribute meaningfully to the evolving discourse on sustainable architecture and urbanism.

1.2 Design Projects
The precise operational directives, briefs and specific sites, will be defined by the individual design critics in separate yet interconnected studio options. Each of these individual studio options will be led by ASD faculty and/or visiting professors and culminate in a speculative final project that will articulate architecturally specific positions regarding sustainable design in real world projects. The descriptions of the individual studio options for Fall 2025 are listed in Section 5.

1.3 Learning Objectives
At the end of the course, students will be able to:
- Identify issues of sustainable design in relation to socioeconomic, demographic and cultural trends, through the analysis of literature and review of architectural precedents
- Perform rigorous site analysis and map the site conditions
- Critique a project brief and develop strong, generative sustainable design concepts
- Translate design concepts into meaningful architectural and/or urban propositions at appropriate scales and levels of granularity
- Create convincing arguments for the design propositions and persuasive visual and tangible evidence

1.4 Measurable Outcomes
- Interpret the sustainable parameters and other issues of relevance to the project using drawings and diagrams
- Respond to a specific project brief and a specific context with a meaningful design concept
- Produce coherent architectural representations and models at sufficient levels of detail
- Communicate convincingly sustainable design propositions in the form of renderings, drawings, simulations, models

2. Course Schedule

Studio is based on a 14-week schedule, from 15 September 2025 to 20 December 2025. Lessons held weekly except Week 7, Recess from 26 October 2025 to 2 November 2025. Each project identifies its particular meeting schedule and work requirements. Ordinarily, there will be at least 2 formal reviews that cut across all studio options: an intermediate (mid-term) design review, and a final review.

Weekly lessons
Tuesday 3pm-7pm, Architecture Studio 3
Thursday 3pm-7pm, Architecture Studio 3

Mid-term review
Tuesday, 23 October 2025, 3pm – 7pm

Final review
Tuesday, 18 December 2025, 9am – 6pm

3. Assessment

Components	Percentage	Remarks
Class Participation	10%	Assessed on lesson attendance, quality of peer review feedback, and completion of course survey
Mid-term review submission	30%	Assessed on timely submission and project assessment criteria. Refer to notes below
Final term review submission	60%	Assessed on timely submission and project assessment criteria. Refer to notes below

Projects will be reviewed and assessed based on 4 criteria:
• their conceptual strength,
• the coherence of their architectural translation,
• their representative clarity and expressive power,
• and the persuasiveness of their communication, both orally, and through the physical and digital artefacts

Moderation will be held to ensure parity in grading across studios.

Letter grading is used for assessment.

Letter Grade	Grade Point	Explanation
A+	5.3	Exceptional performance
A	5.0	Excellent performance
A-	4.5	Excellent performance in most aspects
B+	4.0	Very good performance
B	3.5	Very good performance in most aspects
B-	3.0	Good performance
C+	2.5	Fairly good performance
C	2.0	Satisfactory Performance
D+	1.5	Improvement Needed
D	1.0	Minimally acceptable performance with much improvement needed
F	0.0	Fail

4. Submission Requirements

Digital submission is expected as well as a physical presentation. Instructors to provide students with an online link to collect online submissions.

4.1 Online submission specifications
- Original plans and boards in *.pdf file format; settings printing quality, but not larger than 50MB per file
- Slides in *.pdf file format where applicable
- Other files such as movies, animations where applicable

4.2 Physical model submission
- Details on model submission will be shared nearer review dates. Ordinarily, students are expected to make a submission the day before actual review. Submissions will be tagged for assessment purpose.
- Where applicable, selected models will be kept by pillar after review for accreditation purpose. Students will be informed if their models are selected.

5. Option Studios

There are 3 studio options for Fall 2025.

Instructor	Studio Title
Prof. Erwin Viray	From Tea House to AI Design
Prof. Timothy Matthew Collins	Vienna's Anschluss: Exclusionary Urbanism
Dr. Jason Lim	Sanya: Rendering the Erased Neighbourhood

Refer to Annexes for studio briefs and instructors' profiles.

6. Important Notices

6.1 Plagiarism
Students are reminded that plagiarism is not acceptable at SUTD, all works should be original with proper credits given where applicable.

6.2 Originality of work
The work must represent the student's own effort. Work cannot be substantively done by another including outsourcing.

6.3 Submissions and presentations
All submissions and presentations are compulsory for all students; unless prior excuse with valid reason has been sought and approved by studio lead. Failure to meet any required items will result in grade penalty.

6.4 Warning Letters
In the case where someone is underperforming, students will be issued with a formal warning letter. These are taken seriously with the intent not to be overly punitive but to give students timely warning, so they may seek support and resolve the issues and graduate successfully.

6.5 Studio Attendance
Attendance for studio sessions are vital for the successful completion of the course as discussion and desk critiques are an essential part of the studio experience. In the event that a student is absent for more than 4 studio sessions without valid reasons, the studio instructor reserves the right to award a grade F or Incomplete at the end of term. A warning letter will be issued to students when he/she missed 2 studio sessions. Students are reminded to inform faculty in advance of any absences and to submit any valid reasons of absence thereafter.

6.6 Extension
Under exceptional circumstances, as assessed by individual studio instructor and course lead, a student may be granted an extension for the completion of the course. Three conditions for granting an extension are noted:
1. Request by student due to reasons (non-medical). Up to maximum 3 weeks. Final grade is capped at B maximum.
2. Request by student due to medical reason with supporting documentation. If the medical certificate states the period of rest, the same period of extension shall be granted without cap of grade.
3. If documented medical condition is chronic, 3 weeks extension can be given without a cap on grade. Further extension shall be subject to case-by-case evaluation.

6.7 Selected Works
Selected models and other materials may be retained by the school for use in accreditation and moderation, and also for display as representations of option studio's work.

6.8 Studio Use
Students are responsible for the orderly and tidy use of the studio spaces. This includes dedicated times at the end for cleaning up which must be attended by all. Any infringement or disturbance to the space of others may be subjected to punitive action.

7. **Other Matters**

For curriculum matters, please approach your respective studio instructors or studio TA, Lester Lim at 8182 5754 or Telegram at @lesterrlim.

For administrative assistance, please approach ASD office:
Ng Wee Yi weeyi_ng@sutd.edu.sg
Kathy Sim aileng_sim@sutd.edu.sg
Lee Kah Wee kahwee_lee@sutd.edu.sg (Studios and Materials)

Annex A: Studio Instructors' Profiles

Prof. Erwin Viray
Studio Title: From Tea House to AI Design

Professor Erwin Viray was the Chief Sustainability Officer until March 2025, leading the Sustainability Initiatives in SUTD to address the university's approach to environmental responsibility with the goal to minimise environmental impact.

Prior to that, he was the Head of Architecture and Sustainable Design Pillar from May 2016 – July 2021. Erwin was Global Excellence Professor at Kyoto Institute of Technology and Head of the Graduate School of Architecture and Design in 2012 for two years. In addition, he holds several professional leadership roles including Chief Communications Officer for the Kyoto Design Lab and a member of the Singapore President's Design Awards jury since 2012 and the Chair of the jury since 2013. He is also an Award Ambassador for the HolcimLafarge Awards in Asia Pacific, a jury chair of archiprixSEA 2012 and 2016, a member of management board the TOTO Gallery MA, an Advisory Council member for the Barcelona Institute of Architecture. Erwin has been Editor of the influential magazine, a+u (Architecture + Urbanism) since 1996.

Erwin's research passions revolve around the influence of new technologies and their related tools in broadening the impact of architecture.

Prof. Timothy Matthew Collins
Studio Title: Vienna's Anschluss: Exclusionary Urbanism

Timothy Matthew Collins embraces an interdisciplinary process traversing architecture, visual art, and publications. He has been teaching design studios for almost twenty years, with extensive experience in the entire curricula of university architecture education. Joining SUTD as an Associate Professor of Practice, Timothy will focus on creating a healthy, vibrant, and transparent studio culture. In tandem with academic responsibilities, he has worked on both large-scale mixed-use projects and as a Senior Architectural Designer specializing in residential renovations involving concept modeling, custom detailing, and conscientious construction administration.

Timothy is also a mixed media visual artist focusing on the eschatological implications of collage. His research is directed toward architectural model-making that incorporates found objects to explore the interstitial spaces introduced through the operations of scale. His work has been exhibited in numerous galleries in the United States and are part of several museums' permanent collections. His essays, artwork, and design projects have appeared in several publications including Architects Draw: Freehand Fundamentals by Sue Ferguson Gussow (Princeton Architectural Press, 2008) and Open City: Existential Urbanity by Diane Lewis (Charta, 2015).

Timothy obtained his post-professional Master of Architecture degree from Syracuse University's Graduate School of Architecture in Florence, Italy and received a professional Bachelor of Architecture degree from the Cooper Union for the Advancement of Science and Art in New York.

Dr. Jason Lim
Studio Title: Sanya: Rendering the Erased Neighbourhood

Jason Lim is a Lecturer at Architecture Sustainable Design SUTD and co-founder of Yume Architects. With his background in architecture, engineering, and computation, Jason adopts a unique approach to design that combines artistic intuition with technical mastery. He has dedicated his academic and professional life to exploring the intersection of design and technology—notably in robotic fabrication, algorithmic design, and augmented reality—in search of new unimagined possibilities.

Yume Architects has received numerous awards for design excellence. Notable recently completed and ongoing projects include Rasa Tabula Singapura (Venice Biennale 2025), House at the Corner, The Crescent Wall House, Tsao Foundation Ageing Centre and House in Tochigi, Japan.

Annex B :
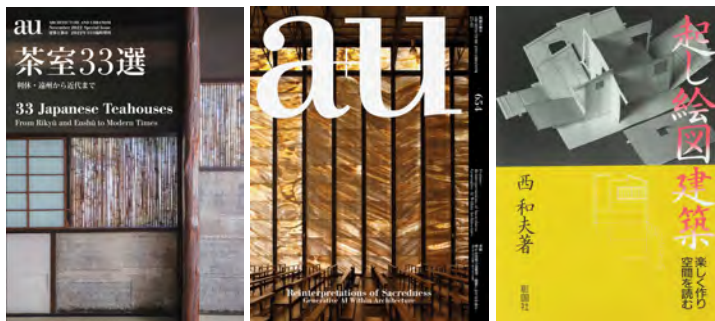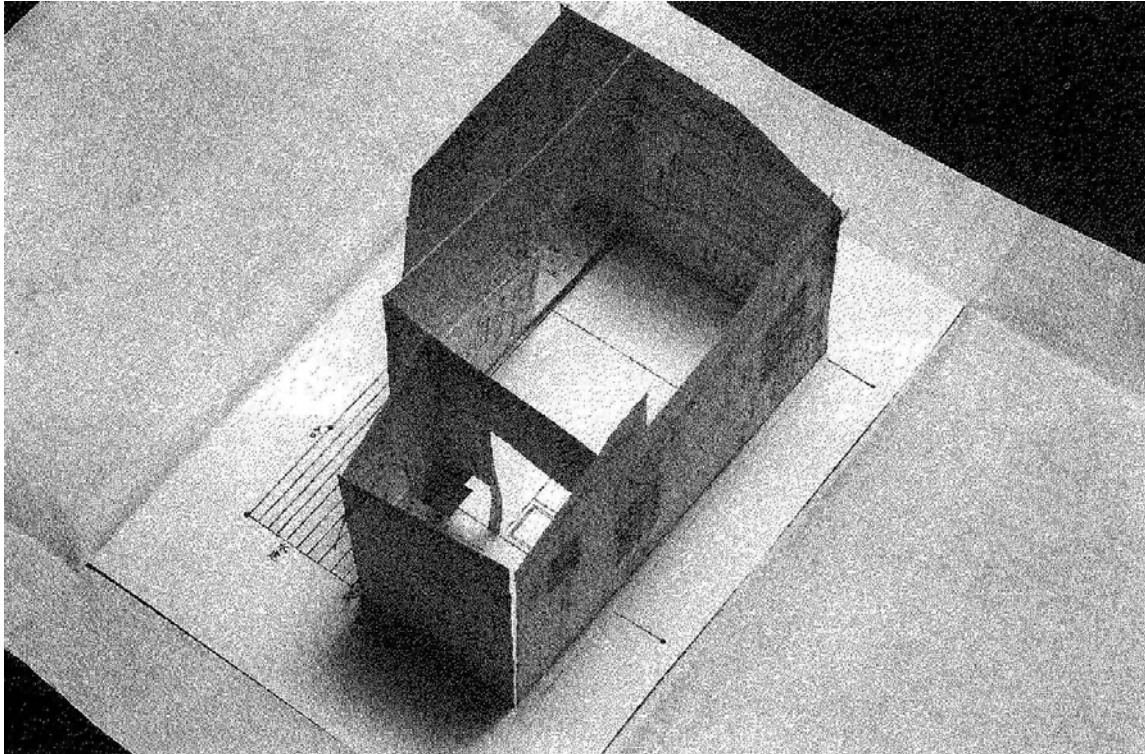# Studio Briefs

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Sustainable Design Option Studio

[From Tea House to AI Design — Okoshiezu, Database Creation, and Diffusion-based Exploration]

Instructor: Erwin Viray

1. Overview

This studio explores the convergence of spatial spirituality, sustainability, and artificial intelligence through the architectural lens of the Japanese tea house. Students will investigate the architectural and cultural codes embedded within tea house design and explore how these traditions can be reimagined through collaborative work with AI.

Grounded in the wabi-sabi principles of humility and ritual practice that define traditional tea houses, and extending into the speculative possibilities of AI design systems, ReGen AI – Sacred Space becomes an inquiry into how space, ecosystem, and artificial intelligence can coalesce to create future environments for contemplation, care, and healing.

2. Studio Objectives

・Reconstruct the tea house as an architectural prototype rooted in harmonious relationships with nature
・Transform architectural traditions into datasets to develop new AI-assisted design methodologies
・Critically examine the role of AI in interpreting and generating sacred atmospheres
・Explore the intersection of ritual practice, material properties, environmental design, and AI image recognition
・Foster design approaches that balance precision with ambiguity, technology with craftsmanship, and nature with memory

3. Project Progression

Phase 1: Traditional Analysis and Data Construction (Approximately 1.5 months)
Students will analyze a selected tea house from a+u 33: Tea Rooms. Through the study of architectural drawings and creation of okoshiezu (folding paper model drawings), they will understand the spatial composition and structural principles. The analysis results will be converted into datasets optimized for AI applications.
Phase 2: Collaborative Proposal Development with AI (Approximately 1.5 months)
Using platforms such as Think Diffusion, students will input data and prompts into AI systems, analyze the outputs, and propose new interpretations of future tea houses. This process critically engages with questions of beauty, spatial quality, and ethics in the context of AI-mediated sacred spaces.
Phase 3: The Art of Editing (Approximately 3 weeks)
Development of presentations and publications
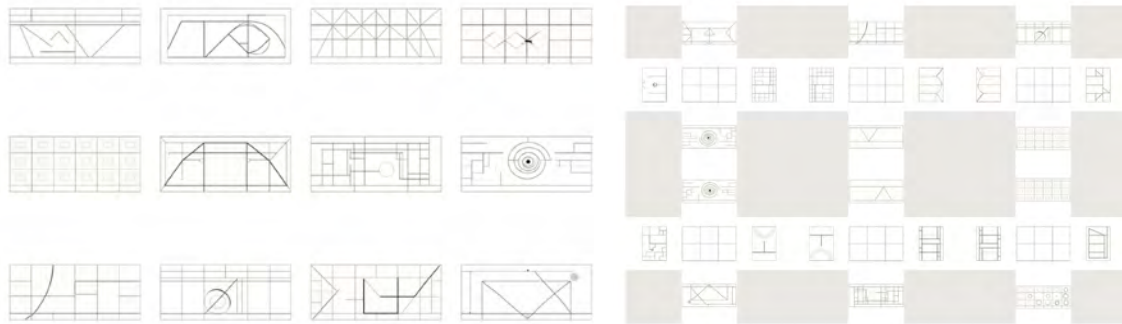
4. Key Themes and Concepts

・Reinterpreting the Sacred: Moving beyond religion toward rituals of ecology, silence, memory, and care
・Data as Memory: Reframing the tea house as a cultural heritage repository where values and relationships are recorded
・Machine as Mirror: Utilizing AI not to replace intuition, but to reveal hidden possibilities in form, spatial quality, and spiritual value
・Regeneration as Method: Creating designs that enrich the environment at a human scale through site-responsive, low-impact approaches
・Design as Gift: Treating architecture as a gift to the senses—restrained, humble, sensory, and contemplative

5. Deliverables

Phase 1:
・Traditional analysis portfolio (including okoshiezu)
・Dataset and prompt collection
・Reflections on architectural and cultural codes
Phase 2:
・AI-generated images and prompt systematization
・Design proposals (drawings, models, concept descriptions)

・Environmental and regenerative strategies
Phase 3:
・Integrated project book
・Final exhibition presentation (multimedia encouraged)
・Process documentation: AI process records and learning documentation

6. Readings and Resources

・"33 Japanese Teahouses: From Rikyu and Enshu to Modern Times," a+u Architecture and Urbanism, November 2022 Special Issue (Tokyo: A+U Publishing Co., Ltd., 2022).
・"Reinterpretations of Sacredness: Generative AI within Architecture," a+u Architecture and Urbanism 2025:03 (Tokyo: A+U Publishing Co., Ltd., 2025).
・Nishi, Kazuo. Okoshi-ezu Kenchiku: Tanoshiku Tsukuri Kūkan wo Yomu [Pop-up Architecture: Creating and Reading Space with Joy]. Kyoto: Showado, [c.1995].

7. Timeline & Milestones (12 Weeks)

Week	Focus	Activities / Milestones
1	Introduction	History of tea house, sustainability principles, intro to okoshiezu method
2	Foundations	Study precedents, practice okoshiezu drawing
3	Field / Archival Research	Document reference tea houses, start drawing sets
4	Drawing Development	Complete okoshiezu sets, extract spatial/material data
5	Database Structuring	Convert drawings to structured dataset, define tags
6	Database Finalization	Complete tagging, verify data integrity
7	AI Diffusion Introduction	Learn prompting, model setup, test generation
8	AI Experimentation	Generate variations, evaluate outputs
9	Design Concept Development	Select promising ideas, refine into proposals
10	Integration	Merge traditional + AI elements, iterate design
11	Final Design Development	Detail drawings, finalize sustainability strategies
12	Presentation	Deliver final proposal, AI documentation, and sustainability statement

Course + Instructor:
20.111 Sustainable Design Option Studio 1
Associate Professor of Practice Timothy M. Collins

Location + Meeting Time:
Studio 3 (BLDG 2, LV 5)
Tue/Thurs 3:00–7:00pm

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Studio Title – VIENNA'S ANSCHLUSS: EXCLUSIONARY URBANISM

Vienna: Anschluss, digital collage with portrait of Margaret Stonborough-Wittgenstein by Gustav Klimt (1905), Haus Wittgenstein (completed 1928), *Kristallnacht* destruction (9–10 November 1938), *Cella* quotation and signature of Franz Werfel (1940), and the Roman Towers of Stephansdom's west facade (damaged 1945).

"In public, they bow and scrape to the cross, but in private they have prepared their crooked cross, their swastika, just in case…."

- Franz Werfel, *Cella, or, The Survivors*, Chapter 4 (1938–39)

STUDIO OVERVIEW

Does architecture really matter in the face of political corruption, war, and genocide? *Fin-de-siècle* Vienna was an epicenter of music, philosophy, politics, architecture, and applied design, yet the "annexation" (*Anschluss*) of Austria by the NSDAP / Nazi Germany in 1938 resulted in the collapse of Austria's independence and permitted the persecution, humiliation, and ultimate annihilation of Jewish residents. Among the cultural symptoms preceding these calamities were the manipulation of journalistic language, the abrogation of institutions, and political anti-Semitism.

Students will encounter these alarming precedents through a contemporaneous text written by the Viennese poet and author Franz Werfel while in exile after the *Anschluss.* This fictional narrative intersects both real history and actual facts, while offering insights into the complex emotional terrain of Austrian political culture. The studio will experiment with unconventional model making and "thick" representational techniques in order to explore this literary space and the psychogeography of the city, using the text to identify potential architectural interventions into the fabric of Vienna.

By treating Vienna as a laboratory to think through historical questions larger than design, but entwined with architectural and decorative polemics, we can confront the problem of language itself. The language we use as architects is line, form, color, surface, projection, solid and void. This tectonic vocabulary is directed toward solving a problem, be it programmatic, cultural, or historical, but can we use architecture to confront the subversion of language itself, as seen in the syntax of propaganda, ideology, and political mobilization?

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METHODOLOGY

Franz Werfel's unfinished novel, *Cella, or, The Survivors* (*Cella oder Die Überwinder*) will be used as the studio's primary research apparatus for discussing the political and sociological climate of Vienna, especially surrounding the *Anschluss* (the annexation of Austria by Nazi Germany in March 1938).

In tandem with reading discussions, students will investigate the urban morphology of Vienna. We will focus in particular on the development of the city (seen especially in the architecture of the *Ringstrasse*) and the memorialization of political violence in urban space.
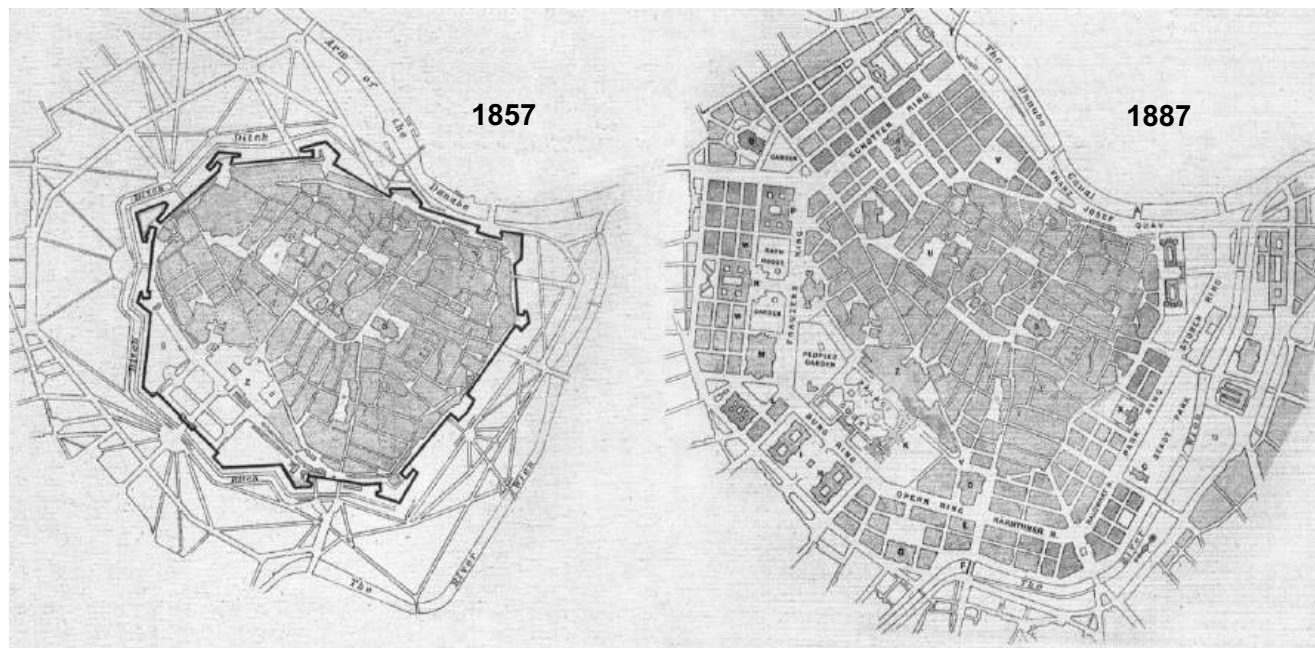
The Inner City of Vienna, 1857 and 1887, in Donald J. Olsen, *The City as a Work of Art: London, Paris, Vienna* (New Haven, CT and London: Yale University Press, 1986), 59.

The primary objective of the studio is for each student to intersect Franz Werfel's text (or an alternate work of Austrian literature) with a Viennese Site, using the text as a conceptual program in dialogue with the City to create an architectural intervention. **Each project should be an encounter between two texts: the literature of Franz Werfel and the lineaments of the city's morphology.**

Deliverables:
The overall trajectory of the studio can be defined through the following exercises.

- **Vienna Mapping**:
  Each student will select a site in Vienna, identifying a unique building, district, or urban enclave to research and draw over the city's history (including events around 1938).

- **'Archifacture' Model**:
  Each student will generate an architectonic response to the assigned class text using collage and assemblage practices derived from Modern Art techniques.

- **Design Proposal**:
  Each student's project will combine an interpretation of Franz Werfel's text (or alternate author) with their site research in Vienna. Interventions shall creatively negotiate between text and site, challenging assumptions about programmatic determinism and tectonic form.

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RESEARCH AND REPRESENTATIONAL APPROACH

Literature, drama, and critical theory will serve as the conceptual instruments to engage Vienna's cultural and sociological fault-lines. We will use Werfel's text not only to research and perceive the largely invisible milieu of the historical time, but to inspire possible programmatic interventions into the contemporary city fabric. By reading the city through its literature, we will attempt to inscribe this reading back into the urban morphology, creating a site of remembrance, encounter or confrontation.

Core bibliographical resources will be provided in studio, however independent research of additional texts beyond the initial scope of the syllabus are necessary. Students are encouraged to explore the broad literary and artistic talents found in Vienna and identify a particular author or artist to explore in-depth. Below is an abbreviated list of suggestions:

Literature / Drama:	Philosophy / Religion:	Architecture / Art:
Rainer Maria Rilke	Sigmund Freud	Gustav Klimt
Thomas Bernhard	Ludwig Wittgenstein	Adolf Loos
Ilse Aichinger	Franz Cardinal König	Otto Wagner
Hugo Bettauer	Friedrich Heer	Josef Hoffmann
Georg Trakl	Leon Zelman	Raimund Abraham

In addition to investigating textual references, we will explore the *"love-language"* of design itself. Students will be introduced to alternate model-making practices that are inspired by modernist collage precedents as a mechanism to translate textual space into architectural space. We will introduce a series of model making exercises intended to disrupt linear design thinking and encourage creative discovery. Students will be encouraged to create "artifacts" capable of communicating more than just geometric ideas. The goal will be to make things that have *presence*, while drawing in a way that reveals the weight of that presence. The language that gives architecture presence is beyond geometry and includes light, shadow, scale, and texture. Architectural artifacts can include models, maps, sculptures, costumes, texts, fixtures, and performances. How can you speak, sing, or think through architectural processes and find your own voice using the discipline?

A CAUTIONARY NOTE

Die Stadt ohne Juden (*The City Without Jews*) by Hugo Bettauer (published 1922); film adaptation Hans Karl Breslauer (1924).

This studio will deal with the history of Vienna just prior to the Second World War. As such, many controversial movements will be discussed. It is possible that students will encounter hate speech, racial or religious epitaphs, and other dangerous language that impoverishes our innate human dignity. The studio does not condone such language or its attendant behavior—quite the opposite—but it is not possible to confront history or to define positive moral values without addressing our all-too-human capacity for sin and corruption. It is expected that each student will exercise maturity and discretion when addressing these historical phenomena, supporting fellow classmates in the process.

The studio is structured to "agitate," encouraging each student to discern their own outlook and design approach in response to the curriculum. Students are asked to take tentative positions in regard to these contentious ideas and historical events that continue to influence the present. It is from these positions that architectural designs will emanate.

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GUIDING PEDAGOGICAL PRINCIPLES

- **Empathy**: Through conscientious class discussion, students will be encouraged to sympathetically address divisive discriminatory attitudes, exclusionary practices, and respond to Austria's fraught socio-political landscape during the first half of the twentieth century.

- *Reading as a Drawing Method*: Student engagement with essential texts should result in significant marginalia that can be used to direct design. Notes, diagrams, and vignettes can emerge in the margins of a book as a response to our engagement with a text.

- *Literary Dimension of the City*: Urban form will be treated as a *palimpsest* of intersecting "texts" (social, economic, political, and mythical). Projects will be tasked not only to generate formal structures, but also critique socio-institutional assumptions about building program. The city can be understood and interpreted through its tectonic fabric. Time and Memory are embedded in Typological Forms with past events registered in the architectural transformations of discreet buildings.

- *Architectural Syntax*: Design performance (both physical and virtual) can be "read" in the lineaments of building form, often revealed through orthographic projection (Plan, Section, Elevation). *Analysis* will be required to isolate and highlight these formal maneuvers and refine their language.

- *Representation as the driver of Architectural Ideas*: The critical use of multi-modal analogue and "thick" physical modeling techniques along with A.I. softwares and digital fabrication tools will be used to question the form-making process and expand our design visualizations.

EXPECTED REPRESENTATION TOOLS

- Reading (with Marginalia)
- Sketching (and Digitally Documenting)
- Model Making (using found materials and various fabrication techniques)
- Photography (with Phone and/or Camera)
- Adobe Suite (for Diagramming and Drawing Layout)
- AutoCAD (for Orthographic Projection)
- Rhinoceros / Grasshopper (for Parametric Modeling)
- GIS (for Collection of Site-Specific Data Sets in Mapping)
- ChatGPT, Midjourney, and other AI softwares (for Digital Collaboration)

Austrian Chancellor Engelbert Dollfuss with Theodor Cardinal Innitzer, 1933. Dollfuss was later assassinated by Austrian Nazis in an attempted *coup d'état* in 1934. In Heer, Friedrich, and Olinda Pawek. *Katholiken Sehen Dich An*. Styria, Austria: Verlag Styria, Graz, Wien, Köln, 1969.

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ESSENTIAL READINGS

Pauley, Bruce F. *From Prejudice to Persecution: A History of Austrian Anti-Semitism*. Chapel Hill, NC and London: The University of North Carolina Press, 1992.

Werfel, Franz. *Cella, or, The Survivors*. Translated by Joachim Neugroschel. New York: Henry Holt and Company, 1989.

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ADDITIONAL REFERENCES

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Mindrup, Matthew. "The Merz Mill and the Cathedral of the Future." *Interstices: Journal of Architecture and Related Arts* 14 (2013): 49–58. DOI: https://doi.org/10.24135/ijara.v0i0.455

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Tufte, Edward R. *Beautiful Evidence*. Cheshire, CT: Graphics Press LLC, 2006.

Yee, Rendow. *Architectural Drawing: A Visual Compendium of Types and Methods*. Hoboken, NJ: John Wiley & Sons, Inc., 2013.

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Tue/Thurs 3:00–7:00pm

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SINGAPORE UNIVERSITY OF
TECHNOLOGY AND DESIGN

FILM REFERENCES

Bettauer, Hugo. *Die Stadt ohne Juden* (*The City Without Jews*). Directed by Hans Karl Breslauer, 1924. Vienna: verlag filmarchiv austria, 2018. DVD.

Greene, Graham. *The Third Man*. Directed by Carol Reed, 1949. London: Criterion Collection, 2007. DVD.

Beckermann, Ruth, dir. and writer. *Waldheims Walzer* (*The Waldheim Waltz*), 2018. Austria: Menemsha Films, 2018. Downloadable M4V video.

Malick, Terrence, dir. *A Hidden Life*, 2019. USA: Twentieth Century Fox Home Entertainment LLC, 2020. DVD.

Northwest view of Vienna's *Innere Stadt* from inside Stephansdom's South Tower (June 2019).

Institut Für Judaistik, collage detail with coin, brick, paper ephemera, and graphite (2019).

PROPOSED SEMESTER SCHEDULE

The studio will focus on *Experimentation* and *Inquiry*, encouraging students to discover the intent for their design projects through the process of making. It is important to become comfortable with *not-knowing* and *uncertainty*, as this will enable us to treat Space, Time, and Materials as ingredients for Research. We should continually be making at every stage of the semester, and it is expected that we will have a _Pin-Up Every Week_. Please document your process on a regular basis and include your progress work (scans of marginalia, provisional sketches, test models, etc.) together with more refined investigations and artifacts as part of your Midterm and Final Presentations.

The outline below is intended as a general guide for the semester and may be subject to change based on student direction and administrative requirements:

WEEK 1	Read *Cella, or, The Survivors* by Franz Werfel	- *Create Diagrams and Marginalia In-Text as response to reading.* - *Potential AI Collaboration: Input excerpts from book into LLM to extract themes, emotion, tone and critique potential ethical issues of tool bias and "hallucinations".*

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Associate Professor of Practice Timothy M. Collins

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WEEK 2	Research Vienna's Urban Morphology	- *Discuss Franz Werfel's story in relationship to Vienna's history and city plan.* - *Select possible design intervention sites using your intuition, formal interests, or textual reasoning and begin research.*
WEEK 3	Create Generate Mappings of Vienna	- *Use historical maps, GIS data, archival materials / photographs, and other techniques to create layered cartographic drawings.* - *Potential AI Collaboration: Use AI tools such as image enhancement or generative fill to digitally reconstruct or extrapolate lost architectural features (for example destroyed Jewish neighborhoods). Students may also choose to geolocate important moments from Viennese Jewish history and create an interactive digital map.*
WEEK 4	*'Archifacture'* Model Charette	- *Create experimental design artifacts to inscribe an excerpt from Franz Werfel's story (or alternate text) into the Viennese site.* - *Incorporate found objects as "foil" or armature attached to the Viennese site: allowing textual, pictorial, sculptural, and architectural languages to intersect.*
WEEK 5	Synthesize Reading Marginalia, Vienna Mappings, and *'Archifacture'* Model Charette	- *Finalize selection of Individual Project Sites in Vienna and build physical Site Model.* - *Create Orthographic Drawings of the intersection between Mappings, 'Archifacture' Model, and Site.* - *Potential AI Collaboration: Translate 2D images into 3D models using AI mesh generation and digitally fabricate.*
WEEK 6	**Midterm Review** Thursday, October 23, 2025 from 3:00–7:00pm	- *Unique Submission Requirements will be defined closer to the date of the review, but will include cumulative work from Weeks 1–5.*

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WEEK 7	Mid-Semester Break and **International Class Trip** to Vienna, Austria	*- The Class will visit various Landmarks and discuss important cultural and urban phenomena in Vienna's complex history.* *- Each student is expected to use allocated free time during the trip to properly field map and document their project sites (collecting data such as measurements, photos, rubbings, and local ephemera). What valuable insights can you gain from in-person contact with the city?* *Suggestions:* *- Use your Generative Vienna Mappings from Midterm to navigate through the city. What was previously invisible in your maps that can now be detected on-site?* *- Experiment with "Forensic Mapping" by documenting physical traces of time and removal in the city (such as scars or repairs on buildings and streets).*
WEEKS 8-13	Refine Process Work and combine with On-Site Documentation from Vienna Trip into Final Architectural Proposal	*- Scale of overall Project Intervention no greater than 100m x 100m "Masterplan".* *- Define how your Project <u>Collaborates with the Past</u> (through engaging Werfel's text or another work by a Viennese Author or Artist).* *- Develop the Project's "Program" as the Reinterpretation of a traditional function or the invention of a New Civic Typology.* *- In addition to scripting parametric forms and digitally fabricating designs, students will be encouraged to think two-dimensionally and represent their Designs through Plans, Sections, and Elevations at a Schematic level of resolution (as an analogue for the mapping processes used earlier in the semester).* *- Physical Design Models integrating Experimentation with Student Proposal, scales to be determined.* *- A brief 500-word reflection written by the student should accompany each project.* *- Develop "Cartoon Sketch" of Final Presentation including all drawings and models.*

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WEEK 14	**Final Review** Thursday, Dec 18, 2025 from 9:00am–6:00pm	*- Final Submission Requirements will be defined closer to the date of the review, but should include a record of work from the Entire Semester in Book form.*

1828 **1882** **1902**

Historical development of the Federal Chancellery of Austria (located in Ballhausplatz, Vienna).
Source: https://www.bundeskanzleramt.gv.at/en/federal-chancellery/visit-us/history.html

STUDIO CULTURE & PARTICIPATION RUBRIC

Each student is encouraged to treat the Design Studio as a sanctuary for learning and personal growth. The following outline is not meant as a punitive measure of performance, but rather as a guide containing important working habits that will help you succeed in studio. Your Classmates are also a design resource, and we can mutually inspire and support one another through our behavior.

PARTICIPATION	EXCELLENT	CAPABLE	NEEDS WORK
In Classroom			
	Student always on-time to class	Student sometimes late or absent to class	Student consistently late or absent
	Student consistently prepared with work	Student only sometimes has work to show	Student never prepared with work
	Student is attentive / asks questions	Student listens, but does not ask questions	Student does not participate in studio
	Student uses class time productively	Student uses class time inefficiently	Student does not work in class
Outside Classroom			
	Student does independent research and brings resources to discuss with class	Student rarely exhibits research, but shows broader understanding in work	Student does not do any additional background research on project
	Student communicates and coordinates assignments with class expectations	Student misses some class deadlines, but keeps up with overall pace of the studio	Student does not keep pace with class schedule or due dates for assignments
	Student engages in design dialogue with other classmates and studios	Student references multiple perspectives, but is unable to respond or incorporate	Student designs without any input or suggestions from other classmates
	Student uses and translates research / analysis into design solutions for project	Student is aware of applicable analysis, but does not fully utilize in design	Student does not use analysis, only seeing project through surface understanding
Development			
	Student works on own initiative / Student is responsible for their project	Student is diligent with work, but treats project only as an assignment	Student does not engage with work or complete assignments by due dates
	Student is self-critical / Student is able to evaluate own work	Student is engaged in the critique process, but still requires outside reinforcement	Student needs constant evaluation from professor in order to proceed
	Student becomes an expert in what they are studying; can educate the rest of class	Student understands basic / fundamental premises with ideas for advanced research	Student has only superficial understanding of project issues
	Student uses iterations of physical models to design project, not just for critiques	Student thoughtfully produces work, but only treats models as "finished" objects	Student only produces models to show at critique, not used in the design process
Production			
	Student thinks through their hands	Student tries to merge language and form	Student only designs with words
	Student makes process models / drawings	Student only makes "finished" work	Student only produces when asked
	Student designs using different mediums	Student occasionally sketches on print-outs	Student only works on the computer
	Student shows visual evidence of growth	Student's work shows unresolved struggle	No physical evidence of learning

Welcome to the Erased Neighbourhood

Background

Figure 1 – Poster of Ashita no Joe in Irohakai Shotengai (shopping arcade). Photo by Michael Vito

Ashita no Joe, a landmark manga from the 1960s, depicted the struggles of an orphan boy living in a Tokyo slum known as *Doya*. Though ostensibly fictional, the setting was in fact modelled on Sanya, a real neighbourhood in Taito ward. Called a Doyagai, which is a district with abundant cheap lodging for labourers, Sanya's history has long been marked by stigma and social exclusion.

In the 1800s, migrants to Edo (Old Tokyo) who were classified as Burakumin—the 'outcast' castes[1]—were forced to settle in Sanya. Fears of contamination drove the

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[1] This derogatory label referred to people in occupations deemed impure or polluted by death such as leather workers, butchers and executioners.

segregation of this community, producing a distinct enclave of untouchables within the city. Later, as Japan industrialised, the stigma of Sanya shifted but did not vanish. By the 20th century it had become a centre for itinerant day labourers (*hiyatoi rōdōsha*), whose marginal status was circumstantial rather than inherited. Predominantly single men, they gathered each morning at *yoseba*[2]—informal labour markets—to be recruited for dangerous, low-wage work. By night, the men returned to cramped *doya*[3] that offered little more than shelter. Once drawn into this cycle, most never left.

Figure 2 – Scene at a Yoseba showing labourers being bused away by contractors in work details. Photo by Shoko Hashimoto

By the time of the 1964 Olympics, Sanya's day labour population swelled to 15,000. But the unregulated *yoseba* system left workers precarious, often exploited by

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[2] The *Yoseba* is an auction site where labour is hired by the day. It has existed as a word and institution since 18th century Japan and started out as labour camps.

[3] 'Doya' is derived from 'Kichinyado' which translates to 'cheap lodging house'. Doyas are equivalent to America *flophouses* or *British* doss-houses.

contractors tied to organised crime. Poverty, violence, and stigma concentrated here, producing a counter-image to the narrative of postwar progress at a time of international visibility. In 1966, the government attempted to resolve this contradiction through erasure: redistricting Sanya into neighbouring wards (Kiyokawa and Zutsumi) and deleting its name from official maps.

Figure 3 – Streetview of Tokyo skytree from Sanya

This political sleight-of-hand succeeded partially. Today, many Japanese cannot locate Sanya at all and remain indifferent to its existence. The population of day labourers— once the neighbourhood's defining presence—has dwindled to around 1,500, mostly elderly men reliant on social welfare. In their place, new residents have arrived: artists and writers seeking affordable space and opportunities, foreign backpackers drawn by cheap lodging, families running small businesses, and misfits seeking anonymity and refuge. This demographic change has diversified the community and caused the neighbourhood's identity to shift.

Although far from the "dangerous urban slum" sensationalised in Western media, Sanya retains its marginal status. Competing imperatives now shape its future:

affordable housing confronts the pressures of gentrification, community care struggles against institutional neglect, and collective memory contends with historical erasure. How might architecture navigate these tensions in a site society prefers to forget?

Agenda: Hospitality as infrastructure

This studio explores 'Hospitality' within the context of Sanya. Here, we extend the term beyond its conventional association with hotels and Airbnb—commercial models that often displace the economically vulnerable from a neighbourhood and alter its existing fabric.

At its core, hospitality presumes a host and a guest. Yet, etymologically, the Latin *hospes* conflates the two, suggesting that roles may blur or even reverse. Jacques Derrida further distinguishes between conditional hospitality, where the host imposes terms and expectations, and unconditional hospitality, where welcome is offered without preconditions,[4] and suggests that, in practice, there needs to be a balance between the two. Beyond mere shelter, hospitality can also encompass broader forms of care—for the elderly, the mentally ill or the isolated—who form part of Sanya's social fabric. It aspires to enable dignity and sustain life at the margins of society.

The studio is interested in the design of infrastructures for *hospitality* understood in this more expansive sense. Here, we define *infrastructure* as an interconnected framework—material, social, economic, and affective—that enables cohabitation and meaningful encounters between different groups: elderly day labourers, emerging artists, itinerant tourists, and local families. These infrastructures will be shared and used by the various stakeholders, resisting both singular ownership and hybridising programs. Rather than imposed solutions, they might emerge from careful observation of existing social patterns and spatial practices.

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[4] Consider the boutique hotel (curated, controlled, economically exclusive) versus the public library (open, unscripted, socially inclusive) as examples of conditional versus unconditional hospitality.

Figure 4 – Scene at a Doya, Photo by Sho Niiro

Japan itself offers relevant precedents. Atelier Bow-Wow's *Made in Tokyo* documents strange architectures that are cross-categorical hybrids. Meanwhile, the *doya* (flophouse) and *kissa* (internet café) are native forms of transient hospitality. The studio is especially interested in the doya. Around 100 remain in Sanya today; each student will select one from this existing stock and through adaptation, re-imagine it as an anchor for a new kind of hospitality in the neighbourhood.

Approach

Phase 1: Mapping the Erased Neighbourhood (Weeks 1–2)

Research at the neighbourhood scale: history (Edo to Reiwa), morphology, flows, and affects (including social media). Locate elements of social infrastructure—public bathhouses, shelters, vending machines—and map existing doya. Students will also identify key stakeholders, community organizations, and informal support networks.

- Deliverable: Multi-layered cartography combining historical analysis, infrastructure mapping, and social networks. Scale 1:1000

Phase 2: Imagining an Encounter (Weeks 3–5)

Figure 5-Public showers, by Sho Niiro

Narrowing to the street scale: students will build a catalogue of Sanya vignettes. Using Neural Radiance Fields (NeRFs) as a representational method, they will capture atmospheres and textures. Technical workshops will be provided for NeRF capture and processing. Within this scene, students will propose a designed everyday object that stages an encounter, exchange, or ritual—this could be as simple as a bench configuration or the act of showering. The proposal will be described through line drawings overlaid on the NeRF model.

- Deliverable: NeRF model with overlay drawings showing proposed intervention. Scale 1:10 – 1:20

Phase 3: Building Adaptation (Weeks 6–13)

At the building scale: students will adapt a doya. They will identify user groups and propose programs that could hybridise worker housing, short-stay rooms, community kitchens, sento-style baths, galleries, and co-working areas. Projects must grapple with

the tension between conditional and unconditional hospitality, integrating practices of care while also addressing the economic logics that underpin the design. The building can spill out of its immediate plot and relate to dispersed elements in the street to form a larger infrastructure.

- Deliverables: Coordinated set of drawings including site plan (1:500), plans, sections, and elevations (1:50), a key axonometric demonstrating tectonic resolution and phased adaptation, 1:50 physical model augmented with projected scenes of encounter.

Conclusion

This studio asks how architecture might intervene in a neighbourhood with a charged history and uncertain future. Our ambition is not to "solve" Sanya, which would be unrealistic, but to speculate on how new infrastructures of hospitality not based on capitalistic models can contribute to the betterment of the neighbourhood and its inhabitants.

Learning objectives

1.   Develop critical frameworks for engaging with marginalized urban communities through architectural intervention

2.   Master multi-scalar design thinking, moving fluidly between neighbourhood, street, and building scales

3.   Explore adaptive reuse as a method for preserving collective memory while enabling transformation

4.   Understand hospitality as both architectural program and ethical practice

5.   Employ advanced representational techniques (NeRF modeling, hybrid drawing methods) to capture urban atmospheres