HOME AS WORKPLACE
A spatial reading of work-homes

PART -B
# Table of Contents

## Introduction

## Single activity work-homes: Production (SP)

- Case SP1 | CRIT & J J College of Architecture, 2010 ........................................................................................................ 5
- Case SP2 | Bhadja, 2019 ............................................................................................................................................... 9
- Case SP3 | Dennis, 2018 ........................................................................................................................................ 13
- Case SP4 | Mathankar, Karsoliya & Siva, 2018 ........................................................................................................ 17
- Case SP5 | Bhadja, 2019 ........................................................................................................................................ 21
- Case SP6 | Bhadja, 2019 ........................................................................................................................................ 25
- Case SP7 | Bhadja, 2019 ........................................................................................................................................ 29
- Case SP8 | Girmay, 2015 ........................................................................................................................................ 33
- Case SP9 | Girmay, 2015 ........................................................................................................................................ 34
- Case SP10 | Girmay, 2015 ......................................................................................................................................... 35
- Case SP11 | Datta, 2008 ......................................................................................................................................... 36
- Case SP12 | Herlekar et al., 2021 ......................................................................................................................... 37
- Case SP13 | KRVIA, 2016 ......................................................................................................................................... 38

## Single activity work-homes: Retail (SR)

- Case SR1 | CRIT, 2011 ........................................................................................................................................ 41
- Case SR2 | Tanaka et al., 2018 ......................................................................................................................... 45
- Case SR3 | Herlekar et al., 2021 ......................................................................................................................... 49
- Case SR4 | Datta, 2008 ........................................................................................................................................ 50
- Case SR5 | Girmay, 2015 ........................................................................................................................................ 51
- Case SR6 | Tanaka et al., 2018 ......................................................................................................................................... 52

## Single activity work-homes: Service (SS)

- Case SS1 | Girmay, 2015 ......................................................................................................................................... 55
- Case SS2 | Bhadja, 2019 ......................................................................................................................................... 59
- Case SS3 | Lantz & Engqvist, 2008 ...................................................................................................................... 63
- Case SS4 | Bhadja, 2019 ......................................................................................................................................... 67
- Case SS5 | Bhadja, 2019 ......................................................................................................................................... 71
- Case SS6 | Bhadja, 2019 ......................................................................................................................................... 75
- Case SS7 | Datta, 2008 ......................................................................................................................................... 79
Single activity work-homes: Storage (SSt)

Case SSt1 | CRIT & JJ College of Architecture, 2010
Case SSt2 | CRIT & JJ College of Architecture, 2010
Case SSt3 | Girmay, 2015
Case SSt4 | Girmay, 2015

Multi activity work-homes: (M)

Case M1 | Sonowal, Jain & Pillai, 2018
Case M2 | Bhadja, 2019
Case M3 | Karlsson, 2009
Case M4 | CRIT, 2011
Case M5 | Garg, Paul & Himanshu, 2018
Case M6 | Mathankar, Karsoliya & Siva, 2018
Case M7 | Dhanraj et al., 2018
Case M8 | Girmay, 2015
Case M9 | Huba & Yohannes, 2015
Case M10 | CRIT, 2011
Case M11 | CRIT & JJ College of Architecture, 2010
Case M12 | CRIT & JJ College of Architecture, 2010
Case M13 | Herlekar et al., 2021
Case M14 | Herlekar et al., 2021
Case M15 | Ernawati et al., 2020
Case M16 | Ernawati et al., 2020
Case M17 | Ernawati et al., 2020
Case M18 | Ernawati et al., 2020
Case M19 | Kellett & Tipple, 2000
Case M20 | Kellett & Tipple, 2000
Case M21 | World Habitat, 2017

Annexure B: Tabulated list of cases
This document makes Part B of this two-part report on work-homes. An inventory of spatial analysis of work-homes across the Global South, it is designed to be read alongside Part A of the report. These cases are not a primary study but a representation of secondary cases from across the globe, analysed with the framework established in Part A in as far as possible through a secondary study. The cases are across a combination of scales, viz. Individual work-homes, work-homes in buildings, streets, neighbourhoods and settlements. The word ‘intervention’ is used to recognise the active agency of users in adapting the space to serve as work-homes. This may be done by the many ways of maneuvering the work-home boundary as has been discussed in detail in Section 3 of Part A. The study has tried to look at the following parameters as far as possible across all cases:

**Type of case and spatial configuration**

Cases have been categorised into five types, viz.

<table>
<thead>
<tr>
<th>S.no.</th>
<th>Types of cases</th>
<th>Number of cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Single activity work-homes</td>
<td>Production (SP) 13</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Retail (SR) 6</td>
</tr>
<tr>
<td>3</td>
<td></td>
<td>Service (SS) 7</td>
</tr>
<tr>
<td>4</td>
<td></td>
<td>Storage (SSt) 4</td>
</tr>
<tr>
<td>5</td>
<td>Multi-activity work-homes</td>
<td>(M) 21</td>
</tr>
</tbody>
</table>

Each case has a unique code signifying its type. They are named SP1, SP2; SR1, SR2, and so on. In multi-activity work-homes there is a combination of different kinds of productive activities occurring together. These have been tagged with a code signifying number of activity types and the kind of activities. All single activity cases are tagged Type 1P, Type 1R, Type 1S, and Type 1St as relevant. Multi-activity cases can have a wide range of mixes and have been tagged such. For instance, a case tagged as Type 2PR has two kinds of productive activities, viz. Production and Retail. While the study does not cover examples of each type, the figure below shows all possible combinations of productive activities in work-homes.

**Location and industry**

Cases have been represented from across the Global South and various industries. Annexure B enables a quick glance at geographies and industries covered.

**Type of intervention**

Across the cases, work-homes can be seen as adapted for productive activities either by users themselves or by other actors. These have been distinguished as ‘user intervention’ and ‘intervention by other actors’ respectively. In certain cases, like Case SR6, there is a combination of intervention made by other actors, as well as users themselves.

**Scale and kind of intervention, and tenure situation**

Some interventions are carried out at the scale of the work-home, others in scales like the street or neighbourhood. An important aspect to note in these is whether these interventions are made within the unit, or adjacent
to the unit. The tenure conditions of the work-home become particularly relevant in this respect. The floor on which said work-home is located plays a crucial part in the amount of space available adjacent to the unit, and the claims a resident is able to make.

Activity mapping
Activities carried out in the work-home are mapped to read how different spaces are used for domestic and productive activities. This is typically accompanied by architectural drawings, sketches or photographs of the space where productive activities are carried out. Activities have been distinguished into the framework of production, retail, service and storage. While storage remains pervasive across most cases, and is often taken as a given with other activities, viz. P, R and S, storage has been marked separately when especially occupying significant space or articulated specifically, happening in conjunction to productive activities that are not carried out in the work-home or when interventions have been made specifically for storage.

Context and spatial schematic
In line with Section 2 of Part A, a spatial impact of the work-homes and its context on each other is explored in as many cases as possible. This is done by looking at the built fabric in the vicinity through aerial imagery, and readings of spatial patterns in the immediate vicinity, street, or in the neighbourhood through images, drawings and sketches. A spatial schematic highlighting morphology of the work-home viz.a.viz its vicinity has been drawn for as many cases as possible, to understand the relationship work-homes have to space adjacent to the unit.

Annexure B tabulates all 51 cases covered in Part B for a quick comparative reading across types, locations, industries, type of interventions, tenure and infrastructure.

Built form and spatial characteristics
The material qualities of the work-home and the kind of access to physical infrastructure are of particular importance to understand the quality of space that is available for work. As also established in part A, the quality of space impacts productivity, and also indicates possible conflict in time or space between the domestic and productive spheres. This may be explored by looking at the quality of access to physical infrastructure.
Single activity work-homes:
Production (SP)
CASE SP1 | CRIT & JJ College of Architecture, 2010

**Type 1P**
Home + Production

Name: Kunchikorve Nagar
Location: Kalina, Mumbai
Tenure: Occupant-made dwellings on govt and private land.
Industry: Broom making
Type of practice: User Intervention.

Activity Mapping

1. Verandah
2. Living
3. Sleeping
4. Kitchen
5. Toilet

The main occupation of the women in Kunchikorve Nagar is broom-making. Verandahs and internal spaces of work-homes are used for productive activities.

Scale: Building

Fig (i)
Floor plan mapping productive activities in a typical work-home.

Physical Infrastructure

- **Water**: The settlement has municipal water supply with individual meters. The people also obtain water from bore wells dug at various locations.

- **Sewage**: Waste water flows in channels along houses, covered at places with concrete slabs.

- **Toilet**: There are three public toilets in the area. About 15% houses have their own toilets.

- **Electricity**: Unclear

- **Access**: Present means of access unclear

A section(ii) and a plan(iii) of a typical street in Kunchikorve Nagar.

---


Single storeyed work-homes are typically built with brick walls and tin sheet roof. These have two to three homes, sometimes with a verandah.

Two storeyed work-homes are typically built with steel frames and tin sheet roofing. These units generally have a single room on each storey.

Concrete plinth through the street that becomes the extension of the unit entrances.

Steel frame staircases used to access upper floors which are generally rented.

Verandah outside the work-home.

Tin sheets and wooden rafters are often used along the walls and roofs of these dry structures.

Built form and spatial characteristics

Space adjacent to the units along the streets is used to store items used for the production of brooms.

Spatial schematic

The floor plan mapping the productive activities within Kanubhai’s home.

The unit was expanded and changed by Kanubhai to accommodate production of sweets and have access from the road. 

Ground floor plan of Kanubhai’s apartment mapping changes made to original layout. Being on the ground floor allows Kanubhai to make significant changes to the access and configuration of the work-home.

Fig (ii)

The front room is the room which serves as the entrance to the house. Its proximity to the kitchen is cited as the reason to carry out productive activities here. This room opens to the adjoining road.

“Guests and customers are allowed only in the front room. One can see in the kitchen but not beyond the kitchen.”

“My wife works in the living room only and guests are also entertained in the living room. All the other spaces have their independent functions and do not overlap.”
Built form and spatial characteristics

Fig (vi)

Kanubhai's work-home is part of a muti-storey apartment complex. The image above maps lighting in different spaces.

This mass housing scheme is an excellent example of work-homes for a particular trade, facilitated by a trade union. It is also noteworthy that basic services viz. electricity and water supply were brought it by the State because of union intervention. Productive activities take place within and adjacent to the work-homes in this housing scheme.
Scale: Neighbourhood

![A view of the housing scheme.]

Physical Infrastructure

- **Water:** Supply provided by Municipal Corporation of Solapur
- **Sewage:** Unclear
- **Toilet:** Unclear
- **Electricity:** Lines installed by the State.
- **Access:** Unclear.

An image of the housing scheme while under construction. Wet-construction techniques were employed.

Women using the open space outside their work-homes for beedi-making.

"Earlier we used stay in a small hut in a slum in Shastri Nagar, Solapur city. When it rained, the hut used to leak, and there wouldn’t be a single dry patch inside. We had to continuously bail out the water when it rained."


A typical unit in the scheme measures around 555 sq. ft. The project is spread across 182 hectares.

CASE SP4 | Mathankar, Karsoliya & Siva, 2018

**Type 1**

Home + Production

Name: Mason’s house
Location: Chanderi, Madhya Pradesh
Tenure: Owner occupancy
Industry: Beedi making, handloom
Type of Intervention: User Intervention.

**Activity Mapping**

1. Room 1
2. Room 2
3. Room 3
4. Courtyard
5. Room 4
6. Room 5
7. Room 6

Productive and domestic activities are both carried out in most rooms of the work-home. Rooms 1, 2, 3, 4 and 6 are used for beedi production. Room 3 is also used for handloom weaving.

![Ground floor plan](image)

Fig (i)

The ground floor plan mapping the productive activities within Mason’s house.

Scale: Building

First floor plan mapping the productive activities within Mason’s house.

Physical infrastructure

- **Water**: Unclear
- **Sewage**: Unclear
- **Toilet**: Bath and toilet on both levels.
- **Electricity**: Unclear
- **Access**: Present means of access unclear.

Fig (ii)


Room 3 is used for two types of productive activities viz. handloom weaving and beedi making.

Beedi making being carried out in the courtyard.

The structural system employs load-bearing stone walls.

Spatial schematic

Fig (v)

CASE SP5 | Bhadja, 2019

Type 1P
Home + Production

Name: Bharatbhai Bokolia
Location: Amee Apts, Memnagar, Ahmedabad
Tenure: Owner occupancy
Industry: Mochi
Type of practice: User Intervention

Activity Mapping

1. Front room
2. Kitchen
3. Living
4. Bathroom
5. Toilet
6. Inside room

The front room is used for cutting shoe soles and drying the leather sheets. The room is also used for sleeping during the night. Other areas of the house remain largely dedicated for domestic activities. The overall area of the work-home is 51 sq.m, and the working hours are from 12pm to 6pm.

Fig (i)
Ground floor plan mapping productive activities within Bharatbhai’s house.

Ground floor plan of Bharatbhai’s work-home mapping changes made to original layout.

The front room is used for both domestic and productive activities. Only women use the entry through the kitchen, while the entry through the front room remains open to anyone. The front room is better lit and therefore chosen for work.

“I am working in the front room and guests also will be entertained in that room only. So I have to stop my work and engaged with the guests.”

“I always work in the front room, whoever is free in the house they join me for the work according to their convenience. We have hanged strings in the front room. So, that we can hang the leather sheets.”

“We have enough light in the front room. Inside room is very dark and kitchen is well lit. So, we chose to work in the front room.”

(iii), (iv), (v), (vi) Base image floor plan : Dwg.2.2.2.3, Dwg.2.2.2.5, Dwg.2.2.2.6, Dwg.2.2.2.4 respectively from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277) (Undergraduate Thesis, Faculty of Architecture, CEPT University), CEPT Repository. https://repository.cept.ac.in/
Bharat bhai’s unit is on the ground floor of a multi-storey apartment complex. The above image shows the ground floor plan of the house mapping the light and shadows.

“...The front room is very small for six of us to do most of the activity. The inside room has two single beds. So, living activities can be accommodate. Right side inside room is mainly for men and left inside room is mainly for women. Sometimes house become so mess, and this leather is stink for some time so it is very hard to get things up.”

CASE SP6 | Bhadja, 2019

Type 1P

Home + Production

Name: Maheshbhai Sathiya
Location: Nanranpura, Parasnagar Society, Ahmedabad.
Tenure: Owner occupancy
Industry: Flower garland making (Fulhaar)
Type of practice: User Intervention

Activity Mapping

1. Foyer
2. Living room
3. Inside TV room
4. Bathroom
5. Toilet
6. Kitchen
7. Bedroom

The foyer at the entrance of the work-home is used for domestic and productive activities. The rest of the work-home is mostly used for productive activities. The overall area of the work-home is about 69 sq.m. The working hours are from 7am to 12pm.

Fig (i)
A floor plan mapping the productive activities within Maheshbhai’s house.

Ground floor plan of Maheshbhai’s work-home mapping the changes that were made.

Original layout of the apartment.

The unit as expanded and changed by the owner to accommodate productive activities.

Physical Infrastructure
- Water: Unclear
- Sewage: Unclear
- Toilet: Toilet indicated in the floor plan
- Electricity: Unclear
- Access: Present means of access unclear

Fig (ii)

The foyer serves as the entrance to the house. It is also used for productive activities of garland-making.

“Me and my mother, work in the foyer. The following space is a formal living room where guests and customers are entertained.”

“Guests and customers are only welcomed in the entrance foyer and living room, while they are restricted to enter beyond that space.”

“I work in the entrance foyer and guests are entertained in the following living space. So, I have to pause my work and engage with the guests.”

The living room is the most used space throughout the day. This is where the family eats and sleeps, and is also where the TV is.
Maheshbhai’s work-home is on the ground floor of a multi-storey apartment complex. The above image maps lighting in the work-home. The foyer is preferred as workspace because it is the best-lit room of the work-home.

“Flower garland making requires constant indirect day light that does not affect the flowers. Hence in our house this light only directs in the entrance foyer only.”

CASE SP7 | Bhadja, 2019

Type 1 P
Home + Production

Name: Vipulbhai Vadodariya
Location: Lakshmi Krupa, Vibhag 1, Ahmedabad.
Tenure: Owner occupancy
Industry: Tea masala and other masala making
Type of practice: User Intervention

Activity Mapping

1. Front room - Production
2. Kitchen
3. Utility/Store
4. Bathroom
5. Toilet
6. Bedroom

The front room is used for carrying out productive activities between 2pm and 6pm. This room is also used for other domestic activities by different users of the work-home.

Fig (i)
Floor plan mapping productive activities within Vipulbhai’s house.

(i) Base image floor plan: Dwg. 2.4.3.3 from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). [Undergraduate Thesis, Faculty of Architecture, CEPT University], CEPT Repository. https://repository.cept.ac.in/
Ground floor plan of Vipulbhai’s work-home mapping changes made to original layout.

Fig (ii)

The front room is used as a masala production area by Vipulbhai’s wife and as a study space by the children of the family. It is used as sleeping and eating spaces at other times of the day.

“My wife always works in the front room. My daughters watch TV everyday after their school gets over. All the activities are held in the front room only.”

“The bed in the front room is used for seating when guests come. My daughters do home work on that bed and my children always sleep there at night.”

(iii), (iv), (v), (vi) Base image floor plan: Dwg.2.4.3.3, Dwg.2.4.3.5, Dwg.2.4.3.6, Dwg.2.4.3.4 respectively from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). (Undergraduate Thesis, Faculty of Architecture, CEPT University). CEPT Repository. https://repository.cept.ac.in/
Built form and spatial characteristics

Vipulbhai’s work-home is on the ground floor of a multi-storey apartment complex. The floor plan above maps lighting conditions.

Spatial schematic

CASE SP8 | Girmay, 2015

**Type 1P**

Home + Production

Name: Mrs. Elfinesh Tadesse  
Location: Addis-Ketema, Ethiopia  
Tenure: Tenancy (kebele* house)  
Industry: Traditional clothing cotton preparation  
Type of Intervention: User Intervention

Activity Mapping

- Domestic activities  
- Production

Built form and spatial characteristics

The work-home has a single room, and occupies 18.5 sq.m. The furniture within the room is moved around to accommodate the cloth preparation machine. Fig (i) and (ii) show the same corner of the room used for domestic activities such as cooking as well as productive activities such as cloth making.

Mrs. Elfinesh has made an attic as a vertical extension to the house, to accommodate both work and home in the limited space. She also separated the room into sleeping area and a multi-purpose room using a curtain as partition, as can be seen in fig (i).

---


*Kebele* means local government. It is forbidden for tenants to undertake any renovation or repair in kebele houses, unless the situation is life threatening (Girmay, 2020).
Name: Mrs. Senait Kerissa  
Location: Addis-Ketema, Ethiopia  
Tenure: Tenancy (kebele* house)  
Industry: Traditional clothing cotton preparation  
Type of Intervention: User Intervention

Activity Mapping

Domestic activities - 1. Living room  
production - 2. Room 2

Built form and spatial characteristics

The work-home has two rooms and measures 20.4 sq.m. The machine is set up in the corner near the entrance of the living room. The furniture around the workspace are used as temporary storage areas for the raw materials. The furniture in the main room has to be covered to protect it from the dust particles from the cotton.

Mrs. Senait cleans the area and sets up the machine on the floor. She says she moves the machine to the sofa when she has to perform domestic activities. Fig (i), (ii) and (iii) show the same corner of the room used for productive activities.

“Accommodating this job at home is a bit not convenient. I have to clean the house now and then, since the dust particles blowing from the machine are spread all over the living room. However, when I think of the income I gain from this and the feeling of being an employed women makes me compromise to these side effects of this HBE.”

*‘Kebele’ means local government. It is forbidden for tenants to undertake any renovation or repair in kebele houses, unless the situation is life threatening (Girmay, 2020).
Built form and spatial characteristics

The work-home measures 22 sq.m. and has two rooms, with a separate kitchen which is used for injera preparation. The work-home quite often gets filled with smoke due to lack of proper ventilation.

Fig(i) shows corner of the living space used by Girmanesh to store the flour and the injera before she sells it to her customers. Fig(ii) shows a view of the adjacent streets where Girmanesh stores the raw material. Fig(iii) shows Girmanesh making injera.

CASE SP11 | Datta, 2008

**Type 1P**

Home + Production

<table>
<thead>
<tr>
<th>Name</th>
<th>Location</th>
<th>Tenure</th>
<th>Industry</th>
<th>Type of Intervention</th>
</tr>
</thead>
<tbody>
<tr>
<td>Shanta</td>
<td>Madipur widow colony, West Delhi</td>
<td>Owner occupancy</td>
<td>Box making and decoration</td>
<td>User Intervention</td>
</tr>
</tbody>
</table>

**Built form and spatial characteristics**

The work-home is a double storey structure located in the middle of the courtyard module in the colony. Shanta’s son demolished and reconstructed the house expanding vertically and covering the front and back porches. Shanta uses the park and courtyard adjacent to her work-home as ‘extensions to domestic realm’.

Shanta leverages the good relations she has with her neighbours to engage them in the box producing business her son has, seasonal as it may be. The additional labour from her neighbours enables her to make good profit while delivering large orders on time. She stores these boxes in her sister’s unoccupied house next door.

Fig(i) shows the the courtyard module where Shanta’s work-home is located.

CASE SP12 | Herlekar et al., 2021

Type 1P
Home + Production

Name: Meenaben Soni
Location: Vishwas Nagar, Ahmedabad
Tenure: Owner occupancy
Industry: Tailoring dresses and bags
Type of Intervention: User intervention + intervention by MHT.

Built form and spatial characteristics

Meenaben purchased her one room semi-pucca house in 1997.

In 2003 she renovated and expanded her work-home adding a living room, kitchen, storeroom (specifically for work) and toilet with an an underground water tank, shown in fig (i).

In 2007, with MHT support she reconstructed the toilet and also got access to water and drainage connection under the Slum Networking Program, as shown in fig (ii).

In 2012 she installed Modroof on her unit with MHT support, and in 2019 installed solar panels and improved on her Modroof, illustrated in figures (iii) and (iv) respectively.
Name: Ganagubhai’s home
Location: Dharavi, Maharashtra
Tenure: Owner occupancy
Industry: Broom making
Type of Intervention: User Intervention

Boom making is carried out in the front room which is also used as an eating space.

A view mapping productive activities within Gangubhai’s work-home with a key-plan (ii).

Single activity work-homes:
Retail (SR)
There are two separate entrances, one to the shop, and the other to the living and rented spaces of the work-home. Thus, the spatial configuration of the work-home ensures minimal overlap between the domestic and productive spheres.
The top floor of the building has been rented out to four people, and has another toilet.

1.4m raised plinth to protect the structure from flooding.

A section mapping productive activities in Imran’s work-home.

Physical Infrastructure
- Water- Unclear.
- Sewage- Unclear.
- Toilet- The house has two toilets and one bathroom.
- Electricity- Unclear.
- Access- Present means of access unclear.

Built form and spatial characteristics

The raised plinth made with wet materials to protect from flooding in monsoons.

Shop front has a roof extension made with steel sections for shade and protection from rain.

The walls are made with bricks with RCC beams supporting the framework.

Bathroom and toilet with a loft space above for storage.

Tin sheets used for roofing used at the top floor.

Aluminum frame sliding windows with grill outside.

The neighborhood has a mix of structures built of consolidated wet construction material to recently built dry construction.

In this project the National Housing Authority (NHA) constructed cores of different kinds to facilitating incremental self-built housing. In this example, the household expanded on an R1 type of core. The activities within the shop seem to mostly remain separated from the rest of the work-home. However, the productive and domestic spaces share a common entrance.

Fig (iii) shows the original layout of Tung Song Hong (TSH) Core Housing settlement.
Fig (iv) shows different types of extensions to houses in the settlement as of 2002.

Physical Infrastructure

- Water: Unclear
- Sewage: Unclear
- Toilet: Available in all the units through the settlement.
- Electricity: Unclear
- Access: Narrow roads


Unit F is of R1 type module core housing.

Fig (v) shows a typical R1 type module without the shop extension.

Fig (vi) shows a typical R1 type module without the shop extension.

The project provided a steel beam at 2.2 meters from the ground for possible extension of a loft space.

Users typically place windows at a higher position for better lighting and ventilation.

Built form and spatial characteristics

Prefabricated load bearing wall was used in the core structure.

Spatial schematic

R Retail
D Domestic

Entrance

open space
Covered

name : PPP housing  
location : Laxmi Nagar, Ahmedabad  
type of intervention : Intervention by MHT-PPP housing

built form and spatial characteristics

MHT was community partner in multiple Public-Private Partnership (PPP) redevelopment projects in Ahmedabad executed under the Gujrat Slum Rehabilitation policy. MHT introduced design reforms and changes to the schemes to make the housing units more amenable to being used as work-homes.

The minimum carpet area of the unit was increased from 25 sq.m. Fig (i) illustrates a unit with carpet area between 30 and 35 sq.m.

It also recommended that ground floor of the housing complex be used by residents to run commercial establishments, as illustrated in fig (ii).

(i), (ii) Base images : Box 1 from Herlekar, V., Lashkari, T., & Devanarayanan, A. (2021). Making home-based work environments safer, healthier and productive: Incorporating needs of home-based workers in city plans and policies (1). Brief No. CP1. WIEGO
**CASE SR4 | Datta, 2008**

**Type 1 R**
Home + Retail

- **Name**: Anita
- **Location**: Madipur widow colony, West Delhi
- **Tenure**: Owner occupancy
- **Industry**: Grocery shop
- **Type of Intervention**: User Intervention

**Built form and spatial characteristics**

Anita’s work-home consists of a double storey structure with four rooms and two wide balconies facing the road. Anita and family have extended space adjacent to the unit and the work-home is double the size of the original structure which was a single room. Initially Anita sold small items at her shop. The opportune location of her work-home on the main road allowed her business to grow. She eventually expanded the front room from where the shop was run and converted it into a grocery. Her customers come from within and outside the settlement.

Fig(i) shows a view of Anita’s store from the main road.

**Name**: Semira Ahmed  
**Location**: Addis-Ketema, Ethiopia  
**Tenure**: Tenancy  
**Industry**: Vegetable selling  
**Type of Intervention**: User Intervention

---

**Built form and spatial characteristics**

The work-home measures 29 sq.m. and has two rooms. Semira has made a small storage area with temporary materials adjacent to the work-home to store the goods she sells. Semira also uses some space adjacent to the work-home (as shown in fig ii) to carry out washing related to both domestic and productive activities.

Figs (i),(ii)and(iii) show different views of the space outside Semira’s work-home.

---

**CASE SR6  Tanaka et al., 2018**

**Type 1**

**Home + Retail**

Name: Unit E  
Location: Tung Song Hong Settlements, Thailand  
Tenure: Unclear  
Industry: Shop  
Type of Intervention: User intervention on intervention by other actors, viz. structures constructed on partial plots.

**Activity Mapping**

1. Shop  
2. Living  
3. Bedroom 1  
4. Bedroom 2  
5. Toilet  
6. Bathroom  
7. Entrance

In this project the National Housing Authority (NHA) constructed cores of different kinds to facilitating incremental self-built housing. In this example, the household expanded on an R5 type of core. The activities within the shop seem to mostly remain separated from the rest of the work-home. However, the productive and domestic spaces share a common entrance.

**Fig (i)**

The R5 type module of core housing with double sloped roof that has been used for unit E. The hatched part in fig (ii) denotes the core as constructed by NHA.

**Fig (ii)**

Single activity work-homes:
Service (SS)
Mrs Hiwot operates her tailoring service from the corner of the room where she has placed her tailoring machine and a chair. She has had to close up one of the doors of the work-home to prevent being disturbed. When there is too much work, she also uses the sleeping room to store the clothes she has sewed. The work-home has two rooms and measures 62.5 sq.m.

A view mapping the productive activities in Mrs Hiwot’s work-home.

A view of the internal streets near Mrs Hiwot’s work-home.


“I do this work in the main living room and I dedicated some corner of the dwelling for this purpose. Most of the work is done here, however I also use the bedroom as a store to put some staff I use for this work. Besides when there is too much work, I use the bed as working space to put the clothes I sew.”

“One of the challenges I face doing this home-based work (tailoring) is collecting the left over piece of clothes. Whenever I have too much work to do, at the same time it increase the left over pieces. Hence, this creates a messy environment.”

Space under the dining table used to store clothes and sheets for sewing.
Courtyard of work-home used for domestic activity.

CASE SS2 | Bhadja, 2019

Type 1 S
Home + Service

Name: Shefaliben Harpanchal
Location: Amee Apartments, Memnagar, Ahmedabad.
Tenure: Owner occupancy
Industry: Beauty parlour
Type of practice: User Intervention

Activity Mapping

1. Front room
2. Balcony
3. Washroom
4. Bathroom
5. Bedroom
6. Kitchen
7. Balcony terrace

The parlour space runs from 11am to 7pm from the front room. The room is used for eating and sleeping in the evenings. The overall area of the expanded work-home is 57 sq.m.
Floor plan of Shefaliben's work-home mapping changes made to original layout. The work-home is on the second floor of a multi-storey apartment complex. Such an extension was possible because her neighbours on the ground and first floors extended their units.

"This work creates maximum dirt as well as a lot of mess in the house. During lunch time when any customer comes I have to refuse them."

"I always work in the front room. My husband does work outside. So, he does not stay at home for the whole day and this is the occupation that deals with ladies customers. So, it is good to not have male in the house."

"When there are more number of customer then our beds in the front room are used for waiting. Customers are not allowed to enter ahead of first room."

Front room is used as a parlor throughout the day. In the evenings the space is mainly used for eating and sleeping.
Built form and spatial characteristics

Floor plan of Shefaliben’s unit mapping lighting conditions.

Spatial Schematic

Fig (vii)

CASE SS3 | Lantz & Engqvist, 2008

Type 1

Home + Service

Name: Meldridge’s house.
Location: New Poonawalla Street
Tenure: Unclear
Industry: Nursery and tuition classes
Type of practice: User Intervention

Activity Mapping

1. Street
2. Balcony
3. Kitchen
4. Living
5. Rented floor

Domestic activities

Productive activities

Domestic and productive activities overlap at the entrance balcony and in the living room. The living room is used as a children’s nursery (service-1) during the day and the entrance balcony is used as a tuition school (service-2) in the evenings.

Fig (i)

A 3-D view mapping productive activities in Meldridge’s work-home.

Scale: Building

A section and a plan mapping productive activities in Meldridge's work-home.

Physical Infrastructure

- **Water:** Stored in RCC tanks built along with the unit.
- **Sewage:** Covered sewage channel runs across the street.
- **Toilet:** The unit has two toilets and one bathroom.
- **Electricity:** Connection available.
- **Access:** 2.5 m wide concrete access road.

Metal railing around the entrance verandah. This space is used as a sit out as well as for taking tuitions. There is a staircase here going to the upper storey that is rented out.

A 2.5 m wide street with a covered drainage channel runs along the street.

Metal staircase to access the upper floors of the G+1 storey houses.

(iii), (iv) Base Image: Fig 2:28, Fig 2:26 respectively from Lantz, M., & Habib Engqvist, J. (Eds.). (2008). Dharavi: Documenting Informalities. Royal University College of Fine Arts, Art and Architecture.
Details of survey conducted by SPARC showing PV New Chawl.

This illustration shows the many commercial establishments and work-homes along the street outside Meldridge’s work-home.


The living room is used for teaching as well as other domestic activities. The overall area of the work-home is 30 sq.m.

Activity Mapping

1. Living room
2. Balcony
3. Kitchen
4. Bathroom
5. Toilet

Domestic activities

Service activities

Productive activities

A floor plan mapping productive activities in Seema's house.

Floor plan of Seema’s work-home mapping changes made to original layout. Extension was possible because her ground floor neighbours had extended their home.

The front room is the living room, used for most domestic and productive activities. The layout of the furniture changes through the day to accommodate different activities at different times. The balcony is used at some parts of the day to store furniture that is not in use.

Activities such as teaching, eating and sleeping, all take place in the living room at different times of the day.

“Me and my wife work in the front room, and it is always occupied by students and we eat during the interval.”

“The front room means everything to us. Whole day we run teaching classes and carry other activities like eating and sleeping.”

(iii), (iv), (v), (vi) Base image : Dwg. 2.4.2.3, Dwg. 2.4.2.5, Dwg. 2.4.2.6, Dwg. 2.4.2.4 respectively from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). [Undergraduate Thesis, Faculty of Architecture, CEPT University]. CEPT Repository. https://repository.cept.ac.in/handle/20.500.12725/14314.
Floor plan of Seema’s work-home with lighting conditions mapped.

“Well lit space is required for teaching and there are only two closed spaces, out of that one of it is kitchen. Hence living room is the only possibility.”

The semi-open area is used exclusively for productive activities which happen from 9am to 12pm, and 6pm to 9pm. This space is separated from the rest of the spaces in the work-home. The overall area of the expanded work-home is 91 sq.m. There are two distinct entrances to the work-home, one leading to the semi-open space, and the other to the living room of the house.

Ground floor plan of Rajubhai’s work-home, mapping changes made to original layout.

Fig (iii)
There are two entrances to the work-home: one opens into the semi-open space for ironing, and the other opens into the living space. The former is used for customers, and the latter for guests.

The above illustrations (iii), (iv) and (v) show spatial configurations at three different times of the day.

(iii), (iv), (v) Base images: Dwg. 2.2.1.4, Dwg. 2.2.1.5, Dwg. 2.2.1.6 respectively from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). [Undergraduate Thesis, Faculty of Architecture, CEPT University]. CEPT Repository. https://repository.ceph.ac.in/handle/20.500.12725/14314.
Built form and spatial characteristics

Floor plan mapping lighting conditions of Rajubhai’s work-home.

Activity mapping

1. Living room
2. Inside room
3. Kitchen
4. Bathroom
5. Toilet

Dilipbhai carries out tailoring in the living room roughly from 4pm-8pm, where his son also watches TV after school, and his wife carries out household activities. The room is also used for sleeping and eating at other times of the day. Domestic and productive activities take place within the same space.

Scale: Unit

Floor plan mapping the productive activities within Dilipbhai Darji’s work-home, measuring roughly 25sq.m.

Dilipbhai Darji's apartment floor plan shows changes made to the original layout.

- The balcony was enclosed to create a kitchen.
- The original kitchen was converted into a room.
- The main room serves as the living room.

Fig (ii) The floor plan of Dilipbhai Darji’s apartment mapping changes made to the original layout.

One finds themselves in the front room on entering Dilipbhai’s work-home, and connects to other rooms in the work-home. This is the space where productive activities are carried out alongside domestic activities by different members of the household through the clock.

"The front room is very small for all four of us to do most of the daily activities. But in a way it is very flexible, for example the bed in the front of the room is used for seating when guests come. My son is always eating on that bed and he sleeps there at night."

"Sometimes because of the organisation, the functions overlap in a not so comfortable way. There were times where the customers would have to wait while we were having lunch in the living room. But in a way, the arrangement is good as it allows easy switching between living and tailoring work."

(iii), (iv), (v), (vi) Base images : Dwg.2.1.1.3, Dwg.2.2.1.6, Dwg.2.2.1.5, Dwg.2.2.1.4 respectively from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). [Undergraduate Thesis, Faculty of Architecture, CEPT University]. CEPT Repository. https://repository.cept.ac.in/handle/20.500.12725/14314.

"We have enough light in the front room. Inside room is very dark and kitchen is well lit. So, we choose to put the sewing machine in front room."

Plan mapping lighting in Dilipbhai’s work-home.

Dilipbhai’s work-home is on the second floor of a multi-storey apartment complex, built using wet construction techniques.
Built form and spatial characteristics

Mimi uses the terrace of her work-home to conduct tuition classes for children from the neighbourhood. Mimi and her family are tenants. Earlier, when their landlord had not granted them access to the terrace, Mimi used to go house to house to take private tuitions in the neighbourhood. Access to the terrace has allowed Mimi to take classes for multiple students at a time.

Fig (i) shows the terrace being used to conduct classes.
Single activity work-homes:

Storage (SSr)
Type 1 St
Home + Storage

Name: Bhainu house
Location: Versova Fishing Village
Tenure: Owner occupancy
Industry: Fishing equipment storage
Type of practice: User Intervention

Activity Mapping

Domestic activities

1. Inner rooms
2. Verandah

Productive activities

storage

The entrance verandah of the work-home is used to store nets and other fishing equipment.

A section and a plan mapping Bhainu’s work-home.

The above images show the streets in Versova fishing village.

Scale: Neighbourhood

A street in Versova.

The neighborhood has warehouses and cold storage facilities.

Scale: Neighbourhood

A street in Versova.

Physical Infrastructure

- Water: The area has water supply by the municipality and most houses have water meters.
- Sewage: Individual sewer line.
- Toilet: The house has two toilets and one bathroom as indicated in the plan.
- Electricity: Unclear
- Access: Present means of access unclear.

The semi-open verandah space at the entrance of the single storey homes in the neighborhood.

Single storeyed structures have sloped roofing built with mangalore tiles and wooden supports.

Plastered brick walls

A water meter.

The semi-open verandah space at the entrance of the single storey homes in the neighborhood.

The settlement is densely packed. Structures are occupied by families that own them, and are modified as needed.

Qureshi Nagar is a slum in Mumbai along the city’s eastern railway line. Residents earn by working as labour in nearby places or in animal-fat godowns in the slum. Animal fat is stored in large drums along the streets.
Plan of a street in Qureshi Nagar.

Scale: Street

- The neighborhood is made up of row houses touching back to back.
- Drums of animal fat stored in open space.
- An internal street

Scale: Neighbourhood

- Water: A group of 6 to 8 houses have a common connection sharing the supply for duration of 5 hours daily. All the people staying in the chawl have their own pumps, which are enclosed with a metal cover and a lock.
- Sewage: Thin drains outside work-homes carry sewage from nahani ghar and toilet.
- Toilet: All the houses have a mori inside the room. Some have toilets in their homes, others use public toilet.
- Electricity: Electricity meters present; access unclear.
- Access: 1.5 to 2m wide streets.

Physical Infrastructure

Houses are approximately 10’ x 10’ or 12’ x 12’, with only one small window.

Water pipelines and sewage lines run parallel to the streets.

The metal drums used to store the animal fat.

(iii), (iv) Base images: from CRIT & JJ College of Architecture (2010) Typologies and Beyond: Slum Settlement Studies in Mumbai. SPA New Delhi
Higher floors are accessed by metal or timber ladders, which are usually outside the house.

G.I or cement sheets used for roofing.

CASE SS3 | Girmay, 2015

Type 1 St
Home + Storage

Name: Mrs Hadra Ahmed
Location: Addis-Ketema, Ethiopia
Tenure: Tenancy (kebele* house)
Industry: Vegetable, coal & soft drinks seller
Type of Intervention: User Intervention

Built form and spatial characteristics

The work-home measures 36 sq.m. and consists of a single room. The space outside the work-home and the neighbouring street are used to store and sell wares. Mrs Hadra also uses the space within her home to store the products to be sold such as vegetables, coal and soft drinks.

The room is split vertically by the bed to provide storage space below it. Any prep work before the retail activity is done in the courtyard outside.

Fig(i) shows the neighboring street being used as a working and display area for her wares. Figs (ii) and (iii) show productive activities within the work-home. Fig(ii) shows a corner adapted to accommodate a bedroom and for storage underneath it.

“I have appropriated my house to make a vertical extension named in Amharic “kot”, so that I will have enough working space and domestic space. Besides, I enclosed the veranda so that I can put some stuff in there. In addition to display, the products I sell I have built a temporary shop outside this courtyard.”


*Kebele’ means local government. It is forbidden for tenants to undertake any renovation or repair in kebele houses, unless the situation is life threatening (Girmay, 2020).
Name : Mrs Lakech Tekile  
Location : Addis-Ketema, Ethiopia  
Tenure : Tenancy (kebele* house)  
Industry : Vegetable selling  
Type of Intervention : User Intervention

Built form and spatial characteristics

The unit consists of a 56 sq.m. single room unit. The vegetables were stored inside the house and sold in the neighboring street using temporary sheds. Mrs Lakech has built a vertical extension which is used as a store and bedroom. The verandah of the work-home is used for storage.

Fig(i) shows a view of the verandah space used to prepare the stored vegetables before its sale. Fig(ii) shows the vegetable shed set up in the neighboring street. Fig(iii) shows an interior view of the work-home.


*Kebele* means local government. It is forbidden for tenants to undertake any renovation or repair in kebele houses, unless the situation is life threatening (Girmay, 2020).
Multi activity work-homes: (M)
CASE M1 | Sonowal, Jain & Pillai, 2018

**Type 2 PR**

Home + Production + Retail

Name: Dalalji ki Haveli  
Location: Chanderi  
Tenure: Owner occupancy  
Industry: Weaving and general store  
Type of Intervention: User Intervention

Activity mapping

- 1. House(h1)
- 2. Weaving room(h1) - Production  
- 3. Shop - Retail  
- 4. House(h4)  
- 5. House(h3)  
- 6. House(h2)  
- 7. Weaving room(h3) - Production  
- 8. House(h3) - Production  
- 9. House(h2) - Production  
- 10. House(h4)

Dalalji ki Haveli is a weavers’ cluster where four households reside. The productive activities of weaving takes place using large looms, whose spatial footprint is largely towards the fixed end.

The floor plans of the Ground floor(i), First floor(ii) and second floor(iii) mapping the productive activities within Dalalji ki haveli.

A Site plan of the Dalalji ki Haveli. The haveli is located within a community of weavers.

The building is a g+2 structure with courtyard in the middle. Construction technique used is stone frame structure with brick walls and sloped roofing with tiles (possibly stone).

The weaving equipment used by S from from Unit 1. The room is lit by one window and remains active during the morning hours.

---

The central courtyard used for various domestic activities throughout the day by all the households.

Spatial Schematic

- **P**: Production
- **R**: Retail
- **D**: Domestic
- **Open space**
- **Semi-open space**
- **Covered**

Activity mapping

The front room is used by Meenaben to make and dry papad from 10am to 6pm. It is also used by other members of the family for sleeping, eating and as a passage between other rooms of the work-home, also connected to the shop run by Meenaben’s husband. The kitchen is also used for both domestic and productive activities. The overall area of the expanded work-home is 55 sq.m.

Floor plan mapping productive activities within Meenaben’s work-home.

The unit was expanded and changed by Meenaben to accommodate production of papad and retail activity.

Ground floor plan of Meenaben’s work-home mapping changes made to original layout.

The front room used for domestic and productive activities. Further, one has to pass through this room to reach the inner room.

The kitchen is used for domestic as well as productive activities. The shop is also connected internally to the front room, and the husband is able to help with papad making.

“We do not allow customers to come in the spaces at the back of the house. Only guests and family members are allowed.”

“The front room is mostly used for papad making. We mostly use this space to dry the papads, and making of papad. The shop is also connected to that front room. So, my husband acts as a helping hand many times.”

“I work in the front room and guests are entertained in the inside room. So it is very inconvenient for the guests to pass from the papad room, also I have to stop my work and engage with the guests.”

Built form and spatial characteristics

Fig (iii), (iv), (v), (vi) Base images: Dwg.2.2.3.3, Dwg.2.2.3.6, Dwg.2.2.3.5, Dwg.2.2.3.4 from Bhadja, P. (2019). Negotiations in Live-Work typology of Housing (http://hdl.handle.net/20.500.12725/13277). [Undergraduate Thesis, Faculty of Architecture, CEPT University]. CEPT Repository. https://repository.cept.ac.in/handle/20.500.12725/14314.
Meenaben’s unit is on the ground floor of a multi-storey apartment complex built using wet construction techniques.

“We have enough light in the front room. Inside room is relatively dark while kitchen is well lit. This occupation requires a large well lit and ventilated space. Hence we decided to take over the front room for work.”

Plan mapping lighting in Meenaben’s work-home.

Meenaben’s unit is on the ground floor of a multi-storey apartment complex built using wet construction techniques.
The room is used for tailoring jeans, embroidery, sleeping and eating. The kitchen counter is also part of the same room, with no apparent partition. The loft upstairs is used for sleeping and to store plastic products to be sold to the local recycling industry. During monsoons, water can rise as high as a metre inside the work-home due to its low level. The loft then serves as the only dry space, filling all functions. Due to limitations of space in the work-home, the narrow alleyway adjacent the unit is used for doing laundry given better lighting and drainage conditions.

A sketched view of Shenaz’s house with a floor space of approximately 10 sq.m.

A view of Shenaz’s neighbourhood taken from roof of the nearby SPARC building.

Physical Infrastructure

- Water: Unclear
- Sewage: Unclear
- Toilet: Unclear
- Electricity: They pay 100 rupees to the government office for electricity every month.
- Access: The neighbourhood appears to be serviced by narrow roads.


Built form and spatial characteristics

Since the work-home lacks windows and a ventilation system, an old table fan is placed by a barred opening for better ventilation.

The loft above is used for sleeping. A metal grill is used to separate the space.

A metal staircases used to access upper floors.

Built form and spatial characteristics

The sleeping loft is also used to store the plastic products before they are sold to the recycling industry.

The narrow alley right outside Shenaz's house. The electricity meter in Fig (vi) is placed outside their homes towards the alley.

Activity mapping

1. General store  Retail
2. Living room  Service
3. Toilet
4. Kitchen and wash

The retail activity remains isolated from the rest of the domestic activities that take place in the above floors. The tuition space in the first floor overlaps with the other activities in the space such as living, cooking and sleeping.

A section mapping the different types of productive activities within Ibrahim Bhai’s work-home.

(ii) Terrace plan, (iii) First floor plan, (iv) Ground floor plan of Ibrahim Bhai’s work-home.

Scale: Building

Scale: Neighbourhood

Physical Infrastructure

- Water: Unclear
- Sewage: Drainage line runs along the street.
- Toilet: Bath area on first two floors, toilet on first floor and a mori on the terrace.
- Electricity: Indicated through photographs.
- Access: Corner plot, streets on two sides of the plan. Streets maintained by BMC. Behind is a small service alley where drains are laid.


A. Corrugated galvanized iron sheet roofing with metal supports
B. 5” x 3” I- sections, above them are 3” wide T-sections between which are kota stones.
C. M.S Staircases.

Built form and spatial characteristics

Load-bearing brick walls. A bed laid along the walls used for sleeping as well as seating during class and other activities.

Houses are organised with narrow alleyways between them. Nearly all the houses are wet construction G+1 or G+2; the terraces have often been covered using AC sheets, GI sheets or tarpaulin. The houses were made incrementally as families grew.

Mehboob Haveli houses five distinct households. Households 1 and 2 earn their primary income through weaving on the loom, and bidi-making. Household 3 has a perfume shop running through the haveli itself. Households 4 and 5 reportedly do not undertake any productive activity at home.
An elevation of Meboob haveli. The building is 100 years old and is occupied by 5 households across different floors.

Physical Infrastructure

- Water: Unclear
- Sewage: Unclear
- Toilet: Indicated in the floor plan; unclear if all households have access.
- Electricity: Unclear
- Access: Present, conditions unclear


Built form and spatial characteristics

A space used for the preparation of thread for loom.

A spinning wheel used used to prepare the loom.

A woman making beedis.

Loom in use by household 2.

Built form and spatial characteristics

Intricate jaali details on facades of the building.

Type 2 PS
Home + Production + Service

Name: Ghosi residence
Location: Chanderi
Tenure: Owner occupancy
Industry: Beedi making and tailoring
Type of Intervention: User Intervention.

Activity mapping

1. Room 1
2. Room 2
3. Room 3
4. Room 4
5. Room 5
6. Courtyard
7. Entrance

Service (tailoring)
Productive activities

Tailoring is carried out in rooms 1 and 2. Beedi making is carried out in rooms 2, 3, 4 and additionally at the entrance, 7. The work-home transforms through the day with domestic activities like cooking, eating and sleeping taking place in the same space as productive activities are. Users appear to maneuver the work-home boundary by configuring schedules.

Ground floor plan mapping the productive activities within the Ghosi residence.

Floor plans mapping temporal and spatial footprints of various domestic and productive activities in the work-home through the day.


Physical Infrastructure
- Water: Unclear
- Sewage: Unclear
- Toilet: Unclear
- Electricity: Unclear
- Access: Unclear

The house is occupied by two brothers and their families. The central courtyard acts as an integral space for interaction.

The building is a single storey stone structure with thatched roofing. Niches in the walls are used effectively for storage.

A raised floor level in Room 2 possibly separating area for cooking and sleeping from space for beedi making and tailoring.

The house is occupied by two brothers and their families. The central courtyard acts as an integral space for interaction.

The sit-out space at the entrance is also used for beedi production during the day.

**CASE M7 | Dhanraj et al., 2018**

**Type 2 R St**

Home + Retail + Storage

Name: Purohit house  
Location: Chanderi  
Tenure: Owner occupancy and Tenancy  
Industry: Print shop and storage for other businesses.  
Type of Intervention: User Intervention

Activity mapping

1. Print shop  
2. Verandah  
3. Interior rooms  
4. Courtyard  
5. Rooms rented out

Ground floor of the work-home is occupied by the print shop and storage rooms. The upper floor has rooms for family members and some rooms that are rented out to two different families. Work-home boundary is maneuvered hence mainly by a spatial separation across floors.

Scale: Building

Ground floor plan mapping productive activities within the Purohit house.

---

Fig (i)

1. Print shop  
2. Storage  
3. Productive activities  
4. Retail  
5. Domestic activity

The building is a double storey courtyard type structure that is accessed from the main road.

The above images show a section(ii) and a view(iii) of the purohit house. The section also maps the productive activities within the work-home.

The verandah on ground floor of the work-home is used to store equipment for other businesses run by the family. The rooms in the back are also used for storage.

The work-home rests on a raised plinth adjacent to the road.

The work-home is built using stone framework and wooden window frames.

The print shop is on the main access road. Fig (vii) shows part of a streetscape with various other commercial establishments such as a grocery store, tailor and a neighbour’s shop in the vicinity of the print shop.

Mrs Tsehay uses her single room work-home to carry out domestic and productive activities. She uses the center of her living room to prepare the detergent and the corner spaces to store the prepared products as indicated in the visual. She maneuvers the work-home boundary by reconfiguring space as well as her schedule. Additionally, due to lack of space she stores bottles over her tin roof, and also under the furniture. The overall work-home measures 54 sq.m. and has a single room.
A view of the neighborhood streets near Mrs Tsehay ’s work-home.


Physical Infrastructure

- Water- Unclear
- Sewage- Unclear
- Toilet- Unclear
- Electricity- Unclear
- Access- Unclear

Public Infrastructure Information derived from GIRMAI, Alemea. 2020. "Exploring the use of domestic spaces for home- based income generation-Annexure." case 4
“Accommodating this job at home is a bit risky (due to the chemical from the detergent). Besides as you can see I only have a single room and when you think six people is added to this you can imagine yourself how difficult it is to accommodate the job at the dwelling. When I am about to start the job I have to send my little kid (4 years old) to play outside, or else I cannot work when she is at home, since I am afraid of the chemical for health. Yet, accommodating this job at home is a choice between keeping your families stay alive or endure the risks with taking some care.”

“I do this job in the main living room. All I have to do this job is to clear the living space and bring the working tools, then sitting on the sofa I can pour the detergent soup in to the little bottles. I use the sofa in the main living room to put my staff and store the poured detergent before I take them to my customers. Besides, I put the bottles under the sofa.”


All quotes from Girmay (2020).
Built form and spatial characteristics

Tin sheets used on the exterior surface of the house.

The roof is used to store empty plastic bottles which Mrs Tsehay uses for repackaging detergent.

The productive activities of the work-home are concentrated towards the outer periphery of the plot. Domestic and productive activities overlap in semi-open spaces like the verandah and yard.

A view of a work-home with a verandah extended over the space adjacent to the unit.

Physical infrastructure

- Water - Unclear
- Sewage - Unclear
- Toilet - Indicated in the floor plan
- Electricity - Unclear
- Access - A 7m wide road on the north and a 3.5m wide access path on the south.


Verandahs on the outer periphery of the building are usually used for commercial activities given their adjacency to the road. The above image shows tea being sold in the extended verandah.

These semi open areas are shaded with corrugated sheets as roofing, supported on wooden poles.

Crates of drinks and bags of maize stored along the internal corridors of these work-homes. Such type of storage activity reduces available space for movement.

(iii), (iv), (v) : Base images : Fig 1, Fig 8, Fig 7 respectively from Huba, N., & Yohannes, K. (2015). Space Use and Environmental Effects of Home-Based Enterprises. The Case of Buguruni Miyamani Informal Settlement, Dar Es Salaam, Tanzania. International Journal of Humanities and Social Science, Vol. 5, No. 4(1), 7-19
Built form and spatial characteristics

Some repair shops use the yard to store two-wheelers and repair parts. This space is also used for drying clothes and other such domestic activities that need open space.

Hasan runs his tailor shop on the ground floor. The mezzanine is used for storage. He rents out a small part of the ground floor to a panwallah who runs his shop there. The first floor of the work-home is residential used by Hasan’s family, and the second floor is residential given on rent.

Scale: Building

An view of Hasan’s work-home from the street.

Scale: Neighbourhood

Physical Infrastructure

- **Water**: The area has water supply by the municipality and most houses have water meters.
- **Sewage**: There are no sewers hence the waste water flows in open channels between houses covered with slabs.
- **Toilet**: People go to defecate in the 8 public toilets in the vicinity or in the open ground opposite near the railway tracks.
- **Electricity**: Available throughout the neighborhood.
- **Access**: Available throughout the neighborhood.

---


The mezzanine on the ground floor is used to store the items from the tailoring service below.

Built form and spatial characteristics

- Rolling shutter on the opening towards the road.
- Smaller narrow alley.
- AC sheets supported on I-sections as the roof.

Spatial Schematic

- R: Retail
- S: Service
- St: Storage
- D: Domestic
- Open space
- Covered


A section (Fig i) and plan (fig ii) mapping different types of productive activities in a work-home in Kumbharwada.

Work-homes in Kumbharwada are flanked by parallel streets on both sides. One side of the work-home becomes retail-oriented and the other side becomes oriented to production. Both sides spill-over to unit-adjacent spaces, and utilise them efficiently. The middle of the work-home is typically dedicated to domestic activities.

(i), (ii) base images : Fig 4 from CRIT & JJ College of Architecture (2010) Typologies and Beyond: Slum Settlement Studies in Mumbai. SPA New Delhi
https://critmumbai.files.wordpress.com/2013/10/slumptypologies1.pdf
Scale: Street/ Neighbourhood

Common internal street used for production and storage or pottery.

The street facing side of the house serves as retail space.

Work-homes in Kumbharwada come together to create a specific street characteristic.

Fig (iii) shows a top view of a row of work-homes in Kumbharwada. The internal street is characterised by productive activities, and the external street by retail.

Public Infrastructure

- **Water**: Unclear

- **Sewage**: There are no sewers hence the waste water flows in open channels between houses covered with slabs.

- **Toilet**: Individual toilets within home and public toilet in the neighborhood.

- **Electricity**: Present; means of access unclear.

- **Access**: An internal network of streets on one side and a vehicular access road on the retail side of the work-homes.

---


The open internal street is used for different activities in the production cycle of pottery. The floor here remains unpaved and the partitions are mainly made of brick or clay.

Walls on ground floor are generally built with brick or wooden frames and tin sheet cladding.

Wooden supports are used to hold temporary semi-open structures to store the pots, and protect unbaked clay products from elements.

Pots are stored and stacked up at different locations across this internal street.

The upper floors are typically built with brick and corrugated cement sheet roofing.

The shopfront side spills-over onto the street and is used to display the different items for retail.

Space within the work-home is used for productive activities like pot making, decoration and storage.


Buildings in Behrampada have a mix of different kinds of domestic and productive activities. Typically in buildings along roads, the ground floor is occupied by shops. Ground floor spaces that do not open to the main road are typically occupied by owners. The top-most storeys are rented out to labourers or other families. There are also many embroidery, tailoring and zari enterprises here.
A view of the buildings in behrampeda. These vertically stacked mixed use buildings have both residential and commercial establishments.

Public Infrastructure

Water- The area has water supply by the municipality and most houses have water meters.

Sewage- There are no sewers hence the waste water flows in open channels between houses covered with slabs.

Toilet- 8 public toilets in the vicinity or open defecation at the ground opposite near the railway tracks.

Electricity- Unclear

Access- Pucca road indicated in the photograph.


Both dry and wet construction techniques are employed in these structures. The framework consist of steel sections with plywood or brick walls. Tin sheets are used on roofs as well as walls.

A tailor at work at Behampada. Storage space within the room.
Built form and spatial characteristics

- The ground storey occupied by commercial establishment such as bakeries or general stores.
- Canteliver balconies at each level used to hold signages of the lower floor commercial establishments.
- Tin sheets used for roofing.
- Temporary extended roof towards the road to support the shopfront.
- The open space
- Semi-open space
- Covered

Spatial Schematic

CASE M13 | Herlekar et al., 2021

Type 2 P St
Home + Production + Storage

Name: Saiyyed settlement  
Location: Raikhad, Ahmedabad  
Tenure: Unclear  
Industry: Kite making  
Type of Intervention: Intervention by MHT

Built form and spatial characteristics

Most work-homes in Raikhad are engaged in making kites. MHT partnered with design students to propose solutions addressing inadequacy in storage within work-homes.

The work-homes typically have roofs made of Gi sheets. Figs (i) and (ii) illustrate two kinds of storage solutions devised for work-homes in Raikhad.

The first storage option where angles sections are screwed into the wall to optimize the usage of the wall. The angle sections are interwoven with threads to carefully hold the fragile kites.

The second storage option proposes to hang a J-hook from the roof to hold crates nailed together. This creates a suspended platform that acts as a loft for storing kites.

**CASE M14 | Herlekar et al., 2021**

**Type 2 P St**

**Home + Production + Storage**

- **Name:** Rajaben’s house
- **Location:** Rajiv Nagar 3, Ahmedabad
- **Tenure:** Unclear
- **Industry:** Pani-puri making
- **Type of Intervention:** Intervention by MHT

---

**Activity mapping**

- **Domestic activities**
  - 1. Ground floor room + verandah
  - 2. Kitchen + balcony
  - 3. Living + balcony

- **Production**
  - Storage

- **Productive activities**

---

**Built form and spatial characteristics**

Rajaben’s work-home was reconstructed as a pilot project by MHT funded by the Selco foundation. The new structure is built having three storeys, with a semi open balcony space at each level. The walls are constructed using Compressed Agricultural Fiberboard (CAF). Ample openings are given to ensure cross-ventilation and proper lighting.

Fig (i) shows Rajaben’s work-home before MHT intervention. Fig (ii) maps productive activities in Rajaben’s reconstructed work-home.

---

Activity mapping

The same spaces in Choirul’s work-home are used for both domestic and productive activities. The work-home boundary is maintained by reconfiguring the schedule.

Fig (i)
A plan mapping productive activities in Choirul’s work-home.

Name: Elva  
Location: Kampung Kue, Surabaya  
Tenure: Owner occupancy  
Industry: Making and selling cake  
Type of intervention: User Intervention

Activity mapping

The same spaces in Elva’s work-home are used for both domestic and productive activities. The work-home boundary is maintained by reconfiguring the schedule. Different members of the household also undertake different productive activities.


A plan mapping productive activities in Elva’s work-home.
CASE M17 | Ernawati et al., 2020

Type 2

Home + Production + Retail

Name: Ismail
Location: Kampung Kue, Surabaya
Tenure: Tenancy
Industry: Making and selling tofu cake
Type of Intervention: User Intervention

Activity mapping

1. Front of the house
2. Balcony terrace
3. Kitchen
4. Bedroom

Retail (online)
Production

The same spaces in Ismail’s work-home are used for both domestic and productive activities. The work-home boundary is maintained by reconfiguring the schedule.

Fig (i)
A plan mapping productive activities in Ismail’s work-home.

CASE M18 | Ernawati et al., 2020

Type 2 P R
Home + Production + Retail

Name : Kinarty
Location : Kampung Kue, Surabaya
Tenure : Tenancy
Industry : Making and selling cake
Type of Intervention : User Intervention

Activity mapping

The same spaces in Kinarty’s work-home are used for both domestic and productive activities. The work-home boundary is maintained by reconfiguring the schedule. Different members of the household also undertake different productive activities.

A plan mapping productive activities in Elva’s work-home.

CASE M19 | Kellett & Tipple, 2000

Type 2 R  St
Home + Retail + Storage

Name: Ragunath Yadav
Location: Jahangirpuri, Delhi
Tenure: Unclear
Industry: Unclear
Type of Intervention: User Intervention

Activity Mapping

1. Ground floor room - Domestic activities
   2. Bedroom - Domestic activities
   3. Multipurpose room - Domestic activities
   - Retail
   - Storage
   - Productive activities

Fig (i) - Kellett & Tipple, 2000

The upper floor of the double-storeyed work-home is used for domestic activities, while the ground floor for productive activities.

The upper floor of the double-storeyed work-home is used by the brother. The ground floor is used by Nilofar and her husband for both domestic and productive activities. They roll up the mats each morning on waking up, and Nilofar works on the bangles. Her husband sells the bangles on his cart, which they unload and store vertically each night due to spatial limitations.

Activity Mapping

1. Ground floor room
2. Wash
3. Upper floor

---

CASE M21 | World Habitat, 2017

Name of intervention: Ujasiyu
Location: Multiple states in India
Scale: Unit level
Type of Intervention: Intervention by other actors
Actors: MHT, SEWA Bank, Footprints EARTH, SELCO,

A dormer window was designed as an easy to install intervention for work-homes in India. Beneficiaries typically carry out work like embroidery and rolling bidis. This saved costs on electricity, and light and ventilation.

The is a simple dormer window can be fit into the existing corrugated sheet roof. Made of fibreglas, the window is shaped such that it fits into the sheet. The translucent plastic prevents glare, diffusing the light so as to illuminate the room rather than remaining just a shaft of light. The hump shaped window has an opening at the bottom to facilitate circulation of air. This gap is covered with gauze to protect from insects and pests.

Annexure B:
Tabulated list of cases
## Case Study

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Location</th>
<th>Industry</th>
<th>Type of intervention</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Individual access to infrastructure</th>
<th>Citation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Case no.</td>
<td>Type of spatial configuration</td>
<td>Name</td>
<td>Location</td>
<td>Industry</td>
<td>Type of intervention</td>
<td>Scale of intervention</td>
<td>Kind of intervention</td>
<td>Floor</td>
<td>Type of structure</td>
<td>Tenure</td>
</tr>
<tr>
<td>----------</td>
<td>-------------------------------</td>
<td>------</td>
<td>----------</td>
<td>----------</td>
<td>----------------------</td>
<td>-----------------------</td>
<td>---------------------</td>
<td>-------</td>
<td>------------------</td>
<td>--------</td>
</tr>
<tr>
<td>SP10</td>
<td>P</td>
<td>Girmanesh Semerga</td>
<td>Addis-Ketema, Ethiopia</td>
<td>Injera selling</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor/Upper floor/Second floor and above</td>
<td>Unclear</td>
</tr>
<tr>
<td>SP11</td>
<td>P</td>
<td>Shanta</td>
<td>Modipur widow colony, West Delhi</td>
<td>Box decoration</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
</tr>
<tr>
<td>SP12</td>
<td>P</td>
<td>Meena Sori</td>
<td>Khatuw Nagar Chawl, Ahmedabad</td>
<td>Tailors dresses and bags</td>
<td>Intervention by other actors</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Hybrid</td>
</tr>
<tr>
<td>SP13</td>
<td>P</td>
<td>Gangabah’s home</td>
<td>Bharari, Maharashtra</td>
<td>Broom making</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Unclear</td>
<td>Hybrid</td>
</tr>
</tbody>
</table>

**Single activity work/homes: Retail (SR)**

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Type of intervention</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Individual access to infrastructure</th>
<th>Citation</th>
</tr>
</thead>
<tbody>
<tr>
<td>SR1</td>
<td>R</td>
<td>Imran’s house</td>
<td>Shrey Nagar, Mumbai</td>
<td>Retail</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor and above</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
</tr>
<tr>
<td>SR2</td>
<td>R</td>
<td>PPP housing</td>
<td>Laxmi Nagar, Ahmedabad</td>
<td>Shop</td>
<td>User intervention + intervention by other actors</td>
<td>Unit/Plot</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Unclear</td>
</tr>
<tr>
<td>SR3</td>
<td>R</td>
<td>Anita</td>
<td>Modipur widow colony, West Delhi</td>
<td>Grocery shop</td>
<td>User intervention</td>
<td>Building</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Unclear</td>
</tr>
<tr>
<td>SR4</td>
<td>R</td>
<td>Semira Ahmed</td>
<td>Addis-Ketema, Ethiopia</td>
<td>Vegetable selling (Chircharo)</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Unclear</td>
<td>Tenancy - kebele house</td>
</tr>
</tbody>
</table>

**Citation**


**Single activity work/homes: Retail (SR)**

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Type of intervention</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Individual access to infrastructure</th>
<th>Citation</th>
</tr>
</thead>
<tbody>
<tr>
<td>SR5</td>
<td>R</td>
<td>Imran’s house</td>
<td>Shrey Nagar, Mumbai</td>
<td>Retail</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor and above</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
</tr>
<tr>
<td>SR6</td>
<td>R</td>
<td>Unit F</td>
<td>Tung Song Hong Settlements, Bangkok, Thailand</td>
<td>Shop</td>
<td>User intervention + intervention by other actors</td>
<td>Unit/Plot</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Unclear</td>
</tr>
<tr>
<td>SR7</td>
<td>R</td>
<td>Jumna Nagar Housing</td>
<td>Laxmi Nagar, Ahmedabad</td>
<td>Shop</td>
<td>User intervention + intervention by other actors</td>
<td>Building</td>
<td>Building</td>
<td>Building</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Unclear</td>
</tr>
<tr>
<td>SR8</td>
<td>R</td>
<td>Anita</td>
<td>Modipur widow colony, West Delhi</td>
<td>Grocery shop</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
</tr>
<tr>
<td>SR9</td>
<td>R</td>
<td>Semira Ahmed</td>
<td>Addis-Ketema, Ethiopia</td>
<td>Vegetable selling (Chircharo)</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Unclear</td>
<td>Tenancy - kebele house</td>
</tr>
</tbody>
</table>

**Citation**

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Type of spatial configuration</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Kind of intervention</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Water</th>
<th>Toilet</th>
<th>Sewage</th>
<th>Electricity</th>
<th>Access</th>
<th>Citation</th>
</tr>
</thead>
</table>

**Single activity work-homes: Service (SS)**

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Type of spatial configuration</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Kind of intervention</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Water</th>
<th>Toilet</th>
<th>Sewage</th>
<th>Electricity</th>
<th>Access</th>
<th>Citation</th>
</tr>
</thead>
</table>

**Single activity work-homes: Storage (SSt)**

<table>
<thead>
<tr>
<th>Case no.</th>
<th>Type of spatial configuration</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Kind of intervention</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Water</th>
<th>Toilet</th>
<th>Sewage</th>
<th>Electricity</th>
<th>Access</th>
<th>Citation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Case no.</td>
<td>No.</td>
<td>Type of Spatial Configuration</td>
<td>Name</td>
<td>Location</td>
<td>Industry</td>
<td>Type of intervention</td>
<td>Scale of intervention</td>
<td>Kind of intervention</td>
<td>Floor</td>
<td>Type of structure</td>
<td>Tenure</td>
<td>Individual access to infrastructure</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---------</td>
<td>-----</td>
<td>-------------------------------</td>
<td>------</td>
<td>----------</td>
<td>----------</td>
<td>----------------------</td>
<td>---------------------</td>
<td>---------------------</td>
<td>-------</td>
<td>------------------</td>
<td>--------</td>
<td>----------------------------------</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SS11</td>
<td>1</td>
<td>St</td>
<td>Daud ji ki Haveli</td>
<td>Chanderi, Madhya Pradesh</td>
<td>Weaving and general store</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor and above</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
<td>Y</td>
<td>Y</td>
<td>Y</td>
<td>Y</td>
<td>Y</td>
</tr>
<tr>
<td>SS11</td>
<td>1</td>
<td>St</td>
<td>Meenaben Shah</td>
<td>Mangalmurti Apartments, Naranpura, Ahmedabad</td>
<td>Papad making and retail</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
</tr>
<tr>
<td>SS11</td>
<td>1</td>
<td>St</td>
<td>Shenaz's House</td>
<td>Tever Nagar, Dharavi, Mumbai</td>
<td>Tailoring jeans and embroidery. They also store plastic products which they sell to local recyclers.</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor</td>
<td>Hybrid</td>
<td>Y: narrow</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
</tr>
<tr>
<td>SS11</td>
<td>1</td>
<td>St</td>
<td>Ibrahim Bhai’s house</td>
<td>Bharat Nagar, Mumbai</td>
<td>Retail and tuition classes.</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit adjacent</td>
<td>Ground floor and above</td>
<td>Wet structure</td>
<td>Owner occupancy</td>
<td>Y: narrow</td>
<td>Y: narrow</td>
<td>Y: narrow</td>
<td>Y: narrow</td>
<td>Y: narrow</td>
</tr>
</tbody>
</table>

**Citation**

**Notes:**
- Y: Y at unit level
- uc: unclear
<table>
<thead>
<tr>
<th>No.</th>
<th>Ref.</th>
<th>Name</th>
<th>Location</th>
<th>Industry</th>
<th>Type of spatial configuration</th>
<th>Scale of intervention</th>
<th>Kind of intervention</th>
<th>Kind of premises</th>
<th>Kind of floor</th>
<th>Type of structure</th>
<th>Tenure</th>
<th>Water</th>
<th>Toilet</th>
<th>Sewage</th>
<th>Access</th>
<th>Citation</th>
</tr>
</thead>
<tbody>
<tr>
<td>M11</td>
<td>3 R 5</td>
<td>Kumbhwarwada</td>
<td>Kumbhwarwada, Mumbai</td>
<td>Pottery</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit</td>
<td>Unit</td>
<td>Ground floor</td>
<td>Hybrid</td>
<td>Owner occupancy</td>
<td>Y</td>
<td>Y</td>
<td>Y</td>
<td>Y</td>
</tr>
<tr>
<td>Case No.</td>
<td>Name/Location</td>
<td>Industry</td>
<td>Type of intervention</td>
<td>Scale of intervention</td>
<td>Kind of intervention</td>
<td>Floor</td>
<td>Type of structure</td>
<td>Tenure</td>
<td>Individual access to infrastructure</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---------</td>
<td>---------------</td>
<td>----------</td>
<td>----------------------</td>
<td>----------------------</td>
<td>---------------------</td>
<td>-------</td>
<td>------------------</td>
<td>--------</td>
<td>-------------------------------------</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>M14</td>
<td>Rajaben’s house, Rajiv Nagar 3, Ahmedabad</td>
<td>Pani-puri making</td>
<td>Intervention by other actors</td>
<td>Unit/Building</td>
<td>Unit</td>
<td>Ground floor and above</td>
<td>Unclear</td>
<td>Unclear</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>M15</td>
<td>Choirul Kampung Kue, Surabaya, Indonesia</td>
<td>Cake making and selling</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Tenancy</td>
<td>Unclear</td>
<td>Unclear</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
</tr>
<tr>
<td>M16</td>
<td>Ismail Kampung Kue, Surabaya, Indonesia</td>
<td>Cake making and selling</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Tenancy</td>
<td>Owner occupancy</td>
<td>uc</td>
<td>Y</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td></td>
</tr>
<tr>
<td>M17</td>
<td>Ismail Kampung Kue, Surabaya, Indonesia</td>
<td>Cake making and selling</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Tenancy</td>
<td>Owner occupancy</td>
<td>uc</td>
<td>Y</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td></td>
</tr>
<tr>
<td>M18</td>
<td>Kinarty Kampung Kue, Surabaya, Indonesia</td>
<td>Cake making and selling</td>
<td>User intervention</td>
<td>Unit</td>
<td>Unit</td>
<td>Ground floor</td>
<td>Wet structure</td>
<td>Tenancy</td>
<td>Owner occupancy</td>
<td>uc</td>
<td>Y</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td>uc</td>
<td></td>
</tr>
<tr>
<td>M21</td>
<td>Ujasiyu Multiple states in India</td>
<td>-</td>
<td>Intervention by other actors</td>
<td>Unit</td>
<td>Unit</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Citation:
When home serves as workplace, the interface of domestic and productive spheres has spatial and social effects on various users of the space, scaling at times to the neighbourhood and the city. This study looks at all the ways in which home aids work — spatially and infrastructurally — and illustrates the role of various factors and actors in engaging with and shaping the work-home boundary. Work-homes in the Global South often engage transversally with formal planning. Users of work-homes exercise their agency in complex ways to maneuver the work-home boundary, often making post-facto modifications to the work-home. The study collates a repository of spatial and temporal innovation strategies devised by users to balance domestic and productive spheres in their homes, as a site to derive lessons for planning, housing policy and architecture. It investigates the role of the state in spatially enabling or limiting work-homes, and using the Indian context as an illustrative example, suggests enabling frameworks in planning that address the spatial particularities of work-homes.