

# SES

Social Inclusion and Energy Management  
for Informal Urban Settlements

## CASE STUDY

# THE NEW FACE OF ADDIS ABABA: TOWARDS NARROWING THE GAP BETWEEN THE PERSISTENCE OF INFORMALITY AND EMERGENCE OF PROSPERITY

Mamaru, Tsion Lemma



Funded by the  
Erasmus+ Programme  
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## ABSTRACT

The new wave of urbanization with its multi-faceted challenges in the developing world, and the fragmented response of nations, manifests a gap growing at an alarming rate between the haves and the have-nots. This new trend of unblended growth is starting to be experienced in Addis Ababa, departing from the intermingled way of living between the rich and the poor.

The concern of this study is to understand the level of persistency of informality in the city while exploring the level of inclusivity of the formal sector in the light of urban planning practices. Accordingly, research is conducted on four representative case study areas in Addis Ababa at settlement and cluster level deploying various methods of data collection & analysis using primary and secondary data sources. The deployed data collection methods are secondary data review, sample household survey, interview of key inform-

ants, field observation, local-knowledge based visual image interpretation, interactive supervised image classification and focus group discussion.

Results of the analysis have shown that 90-100% of respondents have moved to the three peripheral settlements from different part of the country, including Addis Ababa, in the last three decades. Particularly, significant numbers of respondents have moved from different parts of Addis Ababa, where about 72 % of them are only from the inner city. This implies that not only the unprecedented urbanization, but also the fragmented urban planning & policy responses among others have contributed to the persistently unaddressed need of the urban poor contributing to further proliferation of informal settlements. This calls for an inclusive, collaborative, and holistic planning approaches in order to bring about inclusive prosperity and sustainability to the city. ♦

**Keywords:**  
**informality, formal development, urbanization, inclusion, prosperity, sustainability**

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## ACRONYMS

EPRDF – Ethiopian People’s Revolutionary Democratic Front  
IHDP – Integrated Housing Development Program  
LDP - Local Development Plan  
PASDEP – Plan for Accelerated and Sustained Development to End  
Poverty  
SDPRP – Sustainable Development and Poverty Reduction Program

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## PART 1 INTRODUCTION

The growing presence of deprivation of housing and urban land in association with unprecedented urbanization remains to be a challenge for many nations in the urban global south. Since urban informality involves urbanization in its process of formation & expansion; it is now seen not only associated with poor squatter settlements but also as ‘generalized mode of urbanization’ (Sandoval, Hoberman, & Jerath, 2019).

Though urbanization help the poor in getting better life opportunities, its multi-faceted challenges in developing nations, and the fragmented response of governments manifests a gap growing at an alarming rate between the haves and the have-nots. The new trend of social divide, cultivated out of the new city development endeavours, has started to be experienced in cities like Addis Ababa. The hybridized socio-spatial composition in Addis Ababa, the capital city of Ethiopia, used to be an acclaimed strong character by its dwellers and visitors alike. Perhaps it currently is adopting a new face, departing from strong hybrid to disparity, the two ends in a continuum of informality.

Currently the issue is pinned to the new global urban agenda (SDG: Goal 11) which aims to make cities and human settlements inclusive, safe, resilient and sustainable by 2030. In line with this, “eradicating poverty through accelerating broad-based, inclusive, pro-poor, and sustainable growth”, is pointed out as one of the national urban development objective in the Growth and Transformation Plan (GTP II) of the Ethiopian Government. Within this framework, the city government of Addis Ababa, as a main development actor, is striving for inclusive

and sustainable development through aggressive implementation of infrastructure development, grand integrated housing development and various employment generation programs, targeting the low and middle income earning section of the society.

Nevertheless, studies and sectoral performance reports reveal that these interventions couldn’t adequately meet the planned targets both in magnitude and spatial extent. These coupled with dynamics of urbanization, forced the issue of the urban poor to be persistently unaddressed contributing to further proliferation of informal settlements. In fact, the emergence of the widening gap between the rich and the poor has become pronounced than it was before. Meanwhile, on the basis of the newly prepared master plan, the city government of Addis Ababa is planning to develop 4050ha area and build 521,500 housing units between the years 2017-2021 in the inner, infill and expansion areas of the city (AAMPPO, 2017). However, the state of planning and design practice is not promising for inclusive, holistic, and integrated development, even though the broader goals promote otherwise. As stated in SECR (2015), the ground reality of the urban planning in Ethiopia speaks for the need for the variety of interventions to enable sustainable and optimal practices based on methodical knowledge management systems.

This calls for “an in-depth understanding of the situation through updated & realistic urban information” and “new integrated and holistic planning and design strategies, tools and processes” that can transform the city into inclusive and sustainable city. Otherwise, the city will fall back to “business

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as usual” planning and design practice where the market as a main force drives its growth, and the situation will continue to persist.

Various local and international researches are being conducted in this regard. However, the focus of this research is making a comparative and comprehensive study of urban informality in a continuum through selection of representative four case study areas in Addis Ababa. In order to understand the extent of persistence of informality & disparity in the light of the current urban planning practice in the city. It is also to contribute to the search for inclusive contextual development approaches that enable to accommodate the poorest and most vulnerable section of the city residents whom persistently are left out from the benefits of the development. This requires rethinking the current practice of urban development in terms of revived form of urban planning and design systems. ♦



## PART 2 THEORETICAL BACKGROUNDS

### 2.1 Definitions of informality

‘Informal settlements’ and the term ‘informal’ in particular, have been defined and used extensively in academic researches and policy documents for decades, yet no clear meaning is found for it (d’Alencon, et al., 2018), it is rather complicated to give a universal definition because of its complexity (Lutzoni, 2016). However, to mention some of the definitions: OECD (2001), defined informal settlements in two ways: 1: “informal settlements are areas where groups of housing units have been constructed on land that the occupants have no legal claim to, or occupy legally”; 2: “Informal settlements are unplanned settlements and areas where housing is not in compliance with current planning and building regulations (Unauthorised Housing)”. Further, UN-Habitat (2016), defined informal settlements based on their characteristics as areas lacking “equal social rights including basic public services, goods and amenities” and “conventionally motivated by lack of formal tenure” (UN-Habitat, World Cities Report, 2016, p. 78).

Locally MUDHC (2014, p.58) defined informal settlements as “unplanned housing proliferated as a result of high urbanization, limited housing supply, and the limited affordability of formal housing”. Whereas, AAMPPO (2017, p.49) explained informality in terms of its drivers as by “the growing gap between demand & supply of land and housing leading to the growth of informal land transactions and to an alarming proliferation of squatter and unplanned settlements”.

Having different perspective, in the 90s & 21<sup>st</sup>

century, scholars have defined informality as “a capacity of flexibility, adaptation and resilience; whereas informal settlements and their inhabitants as entities in search of meaningful identities, lives and livelihoods in rapidly changing urban environments. On the other hand, De Soto (2000), cited in (Karenina & Guevara, 2014), considered informality as a natural response to legal barriers, bureaucratic procedures and also to real market forces. In view of urbanization, Sandoval, et.al., (2019, p. 3), defined informality as “a state of exception from formal order of urbanization, which falls outside of formal processes and policies that moderate the urbanization process”. Further, as explained in the same document, “informal settlements can be in the form of real estate speculation for all income levels of urban residents, affluent and poor”. Further more, informality is defined as a mode that results from the interweaving of the formal and informal, a sort of mobile and elastic way between legal and illegal (Karenina & Guevara, 2014, p. 253)

In the context of Addis Ababa, Alemayehu (2008, p.68), defined informal settlements under the umbrella word “slum” as follows:

1. unplanned-old inner city settlements
2. Informal peripheral squatter settlements built on vacant land with little or no infrastructure and with uncertain or no tenure right. The same study, divided this category into two: first-sub-group includes small houses built with mud & wood by low-income people, usually because of the lack of access of land through the formal process. The second sub-group includes houses built by middle and high income people either because of lack of access of land through the

formal means of for speculative reasons. Land is usually bought informally from farmers and the houses could be of durable materials.

3. Inner-city squatters with no tenure rights occupying parts of public parks, squares, vacant open spaces as attachment to street side fences.

Despite diversity of definitions and the categorization of 'formal' & 'informal' as dichotomy rather than as a continuum, the term has continued to be used globally (UN-Habitat, 2009). In this research the first two definitions are adopted, despite of variety of definitions, as they are contextually feasible. The definitions are used to identify case study locations and analyse related attributes, for further understanding of their manifestation, level of disparity, direct and underlying causes in the light of urban planning practices.

## 2.2 Concepts of informality

The continuous search to redefine informality has not enabled a concept to be formulated in a relevant way; the term is often used with negative sense, indicating "not that it represents, but how it differs from the formal sphere" (Lutzoni, 2016, p. 8).

The traditional ways of dualistic conceptions of informality, in terms of 'formal' and 'informal', is being challenged as inability to define adequate perspectives for the contemporary urban conditions (Lutzoni, 2016). The recent discourse of informality focuses on understanding of informality as continuum rather than condition. Accordingly, it is explained as bridging the duality between formal and informal sectors in respect with economic, social, environmental and spatial conditions; and the processes as a way of life (d'Alencon, et al., 2018). Moreover, Landry (2006) in (Lutzoni, 2016), tried to frame informality as concepts of hybrid, simultaneousness and coexistence; where both formal and informal may be considered as legitimate, in a simultaneous ways of "making the city".

Stating its complexity because of its various forms & attributes, Karenina & Guevara (2014), confirmed that the presence of informality is beyond 'formal' and 'informal' categorization in space. Rather, it can imply a practice that is not static exhibiting complex character. It is also a process within the existing and prevailing inequalities of a specific context.

Furthermore, in terms of conceptualizing & viewing informality, Lutzoni (2016), divided & summarized the concept in three phases: the first phase, between the 70s & 80s, there was a dualist view of informality that excludes informal from the formal, in the second phase, between the periods of 80s & 90s, informality was viewed in two dominant ways in terms of economy: one is in line with De Seto's conceptualization of informality as a response to inefficient regulation of the economy; contrarily, in late 90s, the other approach viewed informality as an integral part of a single system, in addition to this, it was able to show how informality can no longer be considered as a phenomenon found only in the south; the third phase, in the 21 century, informality started to be viewed, as hybrid space, expression of diversity of interactions rather than its dichotomous categorization.

## 2.3 Informality in the light of Urban Planning practices

"Urban planners' typical approach to informal settlements include: eviction, abandonment, regulatory enforcement, resettlement, integration and improvement and regularization. (UN-Habitat, World Cities Report, 2016, p. 132). However, it is important to have a change of perspective in understanding informality for a planning responses to be realistic. According to (Sandoval, Hoberman, & Jerath, 2019), the manifestation of informal housing and settlements require a view to understand the complex continuum of legality and illegality, where squatter settlements formed through land

invasion and self help housing can exist alongside the affluent informal subdivisions formed through legal ownership and market transaction but in violation of landuse regulation. This shows the presence of a number of actors and processes involved in the informal settlement formation and transformation, which should not be only defined as the opposite to formal but, as a continuum between the legal and illegal.

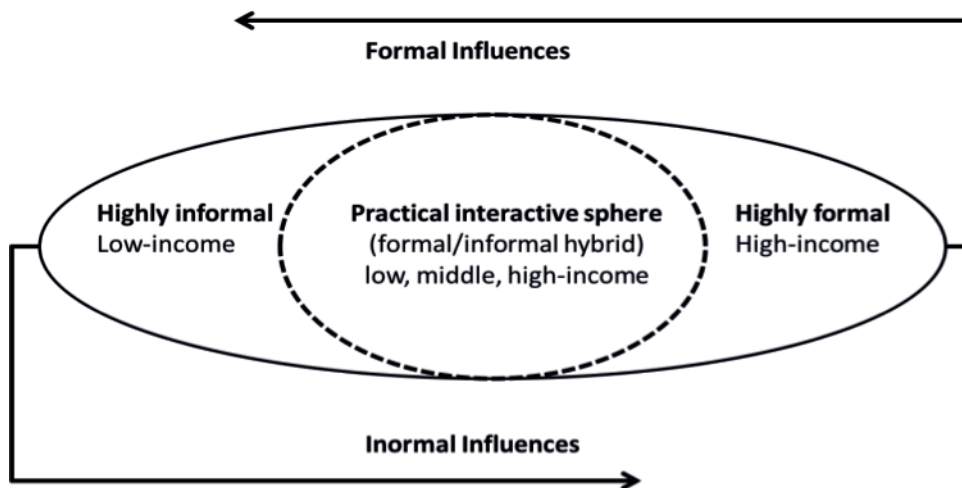
Karenina & Guevara (2014) have also explained the new perspectives as follows:

- a. informality does not necessarily mean lack of planning, it is important to understand there is intrinsic order behind what seems chaos;
- b. It is important to notice there are potentially powerful organizations behind informal settlements, as marginalization generates social cohesion;

- c. Informality can no longer be considered as a phenomenon found only in the south but in developed countries too;
- d. The recent informality phenomena show that the boundary between the formal and informal is even more blurred by the overlapping co-existence of both formal and informal conditions across the sectors.

In terms of urban planning and design, thinking of areas of hybridization and relational spaces between formal and informal spheres, instead of thinking what differentiates formal and informal, gives a complete change of perspective (Lutzoni, 2016). Thus “it would be necessary to indicate (See fig. 1) that the transformation process from formal to informal and vice versa is a continuous adjustment to economic, political and social conditions” (Karenina & Guevara, 2014). In this regard, the formal-informal continuum is fundamental for understanding current urban planning practices.

**Figure 1**  
 Formal-informal hybridization



Source: Karenina & Guevara (2014)

Many authors have progressively arrived at conclusion that informality is nothing else but ‘a new paradigm for understanding urban culture; Appaduri (2001) and Roy and Alsayyad (2004) in (d’Alencon, et al., 2018), viewed informality as a new way of living, governance, and most of all, a new way of urbanization. As elaborated in the same study, increase in informality is not necessarily increase in poverty, informal practices are not relevant to the poor, however, those urban actors who are in position to benefit from informal urban practice and process, are to their disobedience of the rules or a lack of enforcement by the governments, are often supported by their financial, social or political power and connections.

In general, as discussed above, informality is a new way of life, which is not outside of the formal system. The new perspective towards informality is crucial to be able to interpret the phenomena in a realistic manner. It no more is relevant to think informality is only a problem of the poor as there are ranges of actors involved both from the formal and informal sector. Moreover, the idea of informality as a way of life gives way to understanding the relations and interactions with urban development that give shape to and build up this system (Lutzoni, 2016). New modes of intervention can be developed on the basis of new understanding of informality as ‘it is not just an image of precariousness’; but it is a set of practices, a set of functional urban operations that counter and transgress imposed political boundaries and hierarchy economic models (Sandoval, Hoberman, & Jerath, 2019). ♦

## PART 3 METHODOLOGY

Data collection methods deployed in this study are designed to understand the socio-spatial and spatio-temporal changes occurring in the informal settlements and the underlying cause in the light of the existing urban planning practice. Four representative case study areas have been selected based on pre-defined criteria (see section 4) and local knowledge. Data was collected through secondary data review, sample household survey, interview of key informants, field observation and focus group discussion.

Prior to data collection, reconnaissance survey was conducted and maps were updated by analyzing existing line maps, aerial photos, satellite Google

Images and direct observation. Parcels are given new, unique numbers in a GIS environment. Clustering or stratification of each site was conducted through identifying homogeneity to avoid selection bias (unrepresentative sample). Sample size margin of Error was 5% and the confidence level 95%. Simple random sampling of parcels/compounds in each cluster was conducted using randomly generated numbers out of a set of consecutive numbers given to the population (all compounds/parcels) of each cluster. Parcels and samples in each case study area are presented on table 1 below. Systematic sampling of households in parcels with multiple households was conducted as described on the survey protocol (see Section 8-Annex).

**Table 1**  
Number of Sample Parcels in the Case Study Areas

CASE STUDY AREA	ADDRESS	PARCELS	SAMPLE	PERCENTAGE
Gedam Sefer	Arada sub city, Woreda 5	411	199	49% (Residential & mixed)
Ayat	Yeka city, Woreda 13	137	101	73%
Goro	Bole sub city, Woreda 9	492	216	44%
Selam Sefer	Bole sub city, Woreda 13	470	212	45%

Mixed data collection techniques were employed including sample survey interview of key informants, structured interview on households, mapping, photography, sketching secondary data through literature and contextual review. A single questionnaire, commonly developed by all (SES) team members was used for all case study sites. Structured questions were used to reduce interview time and ensure uniformity of the collected data. A set of instructions were also provided to data collectors

to document observations (measuring, sketching, labeling and photography). Pilot survey was conducted and the questionnaire was further developed through the feedback. A total of 520 households were surveyed in all four case study sites. A shared database access of the collected data was availed to all team members.

In order to analyze the impact of socio-economic as well as governance factors, spatial manifestations

on the ground should be studied. Thus, interactive supervised image classification and visual image interpretation is conducted to analyze the spatio-temporal change of the informal settlements as well as the city in the last couple of decades. Moreover, the new unblended trend of formal/informal development was identified via visual image interpretation.

GIS mapping and SPSS were used for the analysis. Intra- and inter-case analysis, paraphrasing, tabulation, examining relationships between variables, comparison, interpretation, spatial configuration and mapping techniques were used. The preliminary findings were further triangulated and validated through key informant interview and focus group discussion conducted during a stakeholder's workshop. ♦

## PART 4 STUDY AREAS DESCRIPTION

The methodology is applied in the capital of Ethiopia, Addis Ababa on selected case study areas. Various types of informal settlements exist in Addis Ababa depending on their location, age, legal status, development pattern and so on. Nevertheless, respective researches have been done in a piecemeal approach with less perspective on comprehensive & comparative pictures. In this research, it was found important to address each type and get an overall understanding of the informal housing development in the city. Broadly, these settlements are categorized in four mainly considering their location and legal status, which are:

- a. Inner-city informally developed kebele house areas
- b. Informal settlements both in the inner and in the outskirts of the city on environmentally vulnerable areas (riverside)
- c. Informal settlements in outskirts of the city, on acquired farm lands
- d. Informal settlements in the outskirts of the city, on environmentally vulnerable areas

Taking the above categories into consideration, for more representative coverage, further criteria such as location in terms of proximity to the inner city & distribution, age, pattern and status (legal) of respective settlements, are considered. Accordingly, four case study sites are identified which are Gedam Sefer, Ayat, Selam Sefer & Goro.

### Detail description of the case study sites.

**Gedam Sefer** is located in Arada Sub-city, Woreda 5 Addis Ababa. It is an old settlement with houses that are legal but informally developed. The site has a

total area 30.7 ha with a perimeter of 2.6 km. In total there are 411 parcels with an estimated population size 2,055.

The new master plan of the city designated the area for a high density mixed development.

### Figure 2

Parcellation map of the Gedam Sefer site prepared based on 2003 topographic map



**Figure 3**  
 Gedam Sefer site located on 2018 Google Image



**Figure 4**  
 Parcellation map of the Goro site prepared based on the 2003 topographic map



**Goro** is located in Bole Sub-city, Woreda 9 Addis Ababa. The site is a recently regularized and legalized. It was an informally developed settlement in the outskirts of the city situated along the bank of a river and partly under high-tension line. It has a total area 26.8 ha with perimeter of 3.56 km. In total there are 492 parcels with an estimated population size 2,460. The settlement is established in the last three decades where its fastest growth is observed only after 2010. The new master plan has designated the area for low density mixed residential development.

**Figure 5**  
 Goro site located on 2018 Google Image

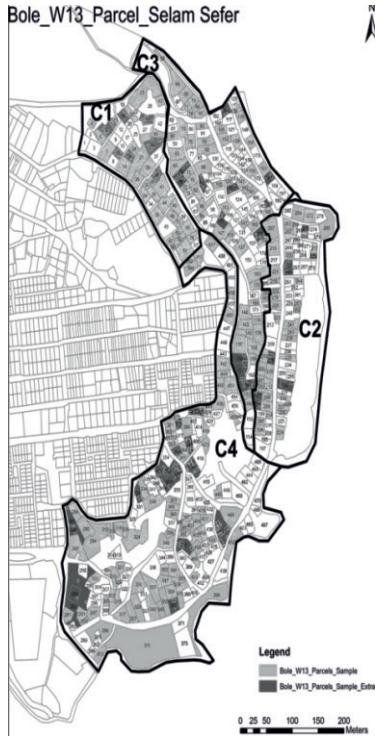


**Selam Sefer** is located in Bole Sub-city, Woreda 13 Addis Ababa. The site is an informal settlement in the outskirts of the city located along a river on a former quarry site which is hazardous & degraded area. It has a total area 23.9ha with a perimeter of 3.27 km. In total there are 470 parcels with an estimated population size 2,350. The settlement is established in the last three decades where its fastest growth is observed only after 2010. The new master plan has designated the area for low density mixed residential development.



**Figure 6**

Parcellation map of the Selam Sefer site prepared based on 2001 topographic map



**Figure 7**

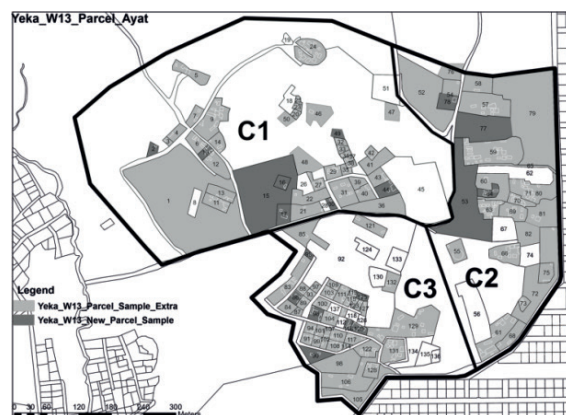
Selam Sefer site located on 2018 Google Image



**Ayat** is located in Yeka Sub-city, Woreda 13 Addis Ababa. It is an informal settlement which is acquired farm land in the outskirts of the city. It has a total area 30.7ha & with 2.6 km perimeter. In total there are 79 parcels with an estimated population size 395. Its fastest growth is observed during the last decade. The area was left for green development in the previous master plans of the city; however, the new master plan designated the area for low-density mixed residential area development. ♦

**Figure 8**

Parcellation map of the Ayat site prepared based on 2003 topographic map



**Figure 9**

Ayat site located on 2018 Google Image



## PART 5 DISCUSSION AND RESULTS

Proliferation of informal settlements and the emergence of unblended city growth in Addis Ababa have become recurrent spatial manifestations. Whereas the inevitable movement of people from rural to urban areas is the underlying challenge in general, the non-inclusive policy & urban planning practices in the city are considered as main contributors among others. Hence, it was found important to undertake image analysis to understand the extent of the city's growth and detect proliferation informal settlements in-terms of their temporal transformations as well as the continuum of formal to informal. Moreover, in order to understand disparities and spatial variability within the case study areas socio-spatial data analysis is conducted. Further, persistence of informality is discussed based on secondary data review in combination

with the non-spatial data captured through sample household survey, interview, & FDG.

### 5.1 Unprecedented city expansion: city level spatio-temporal changes

Addis Ababa is growing at an alarming rate both spatially & demographically. Projections by CSA (2013) show that about 3.44 million people resided in Addis Ababa in the year 1917 and the number grows to reach 4.7 million by 2032 (See table 2); though (WBG, 2015) predicted Addis Ababa to be a mega city in 2037. In terms of rate of population growth, between the years 2007-2013, it was 2.1, however, in recent years it has accelerated to the rate of 3.8 annually (UN-Habitat, The State of Addis Ababa: The Addis Ababa We Want, 2017).

**Table 2**  
Estimated and projected population growth trend in Addis Ababa

YEAR	1967	1984	1994	2007	2012	2017	2032
Population (Estimated & projected in Millions)	1.27	1.42	2.11	2.7	3.04	3.44	4.69

Source: CSA (2013) & UN-Habitat (2017)

Such demographic change is mostly explained in terms of urbanization. It is evident that natural population growth in Addis Ababa is the lowest in the country; whereas, rural-urban migration is one of the highest, five times larger than Afar & Dire Dawa which stood next in the rank (CSA, 2013). As shown in (table 2), population growth is inconsistent because of various factors. For instance, major demographic change between the periods 1984-1994 was because of the drought during the

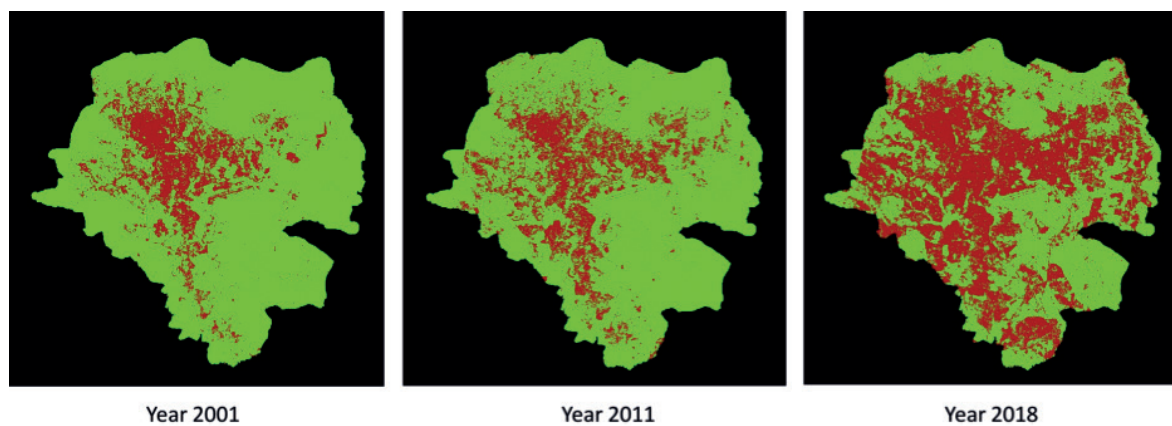
Dergue Regime and the government change in 1991 (UN-Habitat, 2017). Next to this period, major demographic change occurred after the 2005 election. As also confirmed in the analysis of the sample household survey, many of the informal settlements started to proliferate in the last three decades, which is after the change of government in 1991(See fig 10). Nevertheless, urban growth both spatially and demographically has relatively slowed down in the 1990s and 2000s because of the introduction of the federal

system where emerging regional cities were encouraged and deliberately promoted to absorb migrants (UN-Habitat, 2017). However, recently between periods of 2011 & now, unprecedented low-density spatial expansion (See fig. 9) is being witnessed in the city, outpacing the rate of population growth (WBG, 2015). This development is a response from both formal and informal sectors to the pressures of rapid urbanization, urban development policies, &

planning practices; through annexation of agricultural land both formally and informally. Whereas in the inner cities, “with the absence of a mechanism to resolve the conflict between the need of residents to stay in proximity of their workplaces and the need of business people to maximize profit, “friction of spaces” landuse transformation, over crowdedness and severe shortage of basic services have been common (Alemayehu, 2008, p. 43)”.

**Figure 10<sup>1</sup>**

Addis Ababa's Growth Trend in 2001, 2011 & 2018



As there is always an interplay between policy & laws, actor & urban land (Alemie, 2015), the spatial manifestations observed in the city witness on what have been implemented in terms of various policies and urban planning practices, particularly, the last three decades (See fig 9). As pointed out in Lutzoni (2016), informality is not created outside the formal system, but it is produced in the formal system and is always connected to it. In view of this, various housing development strategies & approaches, land development and management policies including Master Plans, Local Development Plans (LDP), and various urban upgrading and renewal projects have been implemented throughout the years. Consequently, real-estate developments, housing cooperatives, condominium housing development, various types of investments as well as unprecedented proliferation of informal settlements & over-crowdedness have transformed the city spatially.

Both spatial and non-spatial analysis of the four case studies, confirmed that, major growth is observed after the year 2011 (See also Fig10). More than half of respondents who live in the three informal settlements (Ayat, Goro & Selam Sefer) at the outskirts of the city, moved to the settlements in 2011 and afterwards. Apart from urbanization which is the underlying factor; main causes for such rapid transformation in the specified period, as per the primary & secondary data sources, can be related to the massive demolition of the inner city residential areas for implementing the urban renewal program after 2009, though actual data cannot be found on the uncompensated relocates (UN-Habitat, 2017). The other cause can be related to the culture of government providing title deeds for informal settlements through regularization after each data capture through satellite images or aerial photo for topographic map preparation & other

<sup>1</sup> Growth trend of Addis Ababa prepared using supervised interactive classification of UCGS 2019 Images

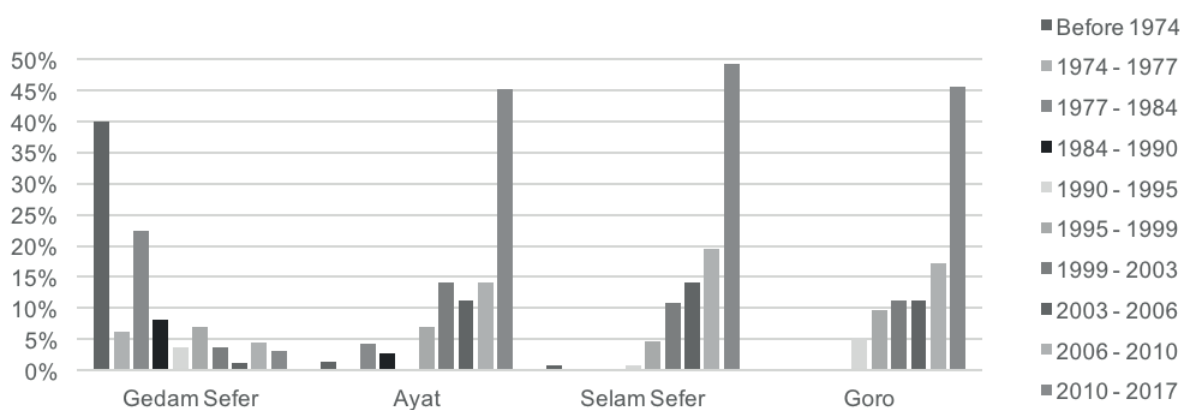
purposes (Berhe, A. et.al, 2017). This happened in the year 1996, 2005 and again in 2010/11. Many houses that can be identified on topographic maps of 1996 & 2005 are all regularized and given a title deed as long as their location is not against the regulation of the master plan.

On the other hand, despite the efforts, the unprecedented spatial transformation has implication on infrastructure development including transport and

service delivery which affects mainly the poor who are destined to reside in the informal settlements at the outskirts of the city. According to UN-Habitat (2017, p.12), such growth will put “further and continued challenges and pressure on the city administration to provide efficient and affordable basic services and housing in sufficient quantities requiring doubling of the city capacity in urban planning, management and effective implementation, supported by strong political leadership from the top.”

**Figure 11**

Time in which the house head moved into the settlements (Year)



### 5.2 Emergence of unblended city expansion: settlement level socio-spatial disparity

The morphology of settlements in Addis Ababa used to express the close economic and social relationships of its residents. Part of these settlements still existent marking the cities establishment back in 1886. Discussing on the rapid growth & changing character of the city, Hebel, (2012, p. 33) stated that “the city is eating its hinter-land and almost forgets its unique history and character”.

Accordingly, this section discusses on intra & inter case settlements’ morphological features in order to understand the spatial variability in different spatial scales & continuum of informality. The three settlements Ayat, Goro & Selam Sefer are established in the

outskirts of the city and Gedam Sefer in the inner city following particular geographic locations and having variety of topographic features (refer section 4). The establishment and the growth of these settlements demonstrate the occurrence of huge transformation in the peripheries after 2011, which is in line with the fastest expansion trend observed at city scale. Even though four of the case study areas portray informality in a continuum that falls in the fuzzy zone; the unblended growth in terms of spatial disparity is clearly observed between the informal settlements and the surrounding from the remotely sensed data (Google Earth Imagery\_2018) (see also Fig.11). According to (Kuffer, 2017) morphological features typical for informal settlements<sup>2</sup>, are size, pattern, density and size characteristics as explained in the following table (See table 4).

<sup>2</sup> The term slum is used in the particular research, however, if not all, most of the morphological characters match informal settlements too

**Table 3**

Morphological features typical for slums or informal settlements

FEATURES	INFORMAL SETTLEMENTS	FORMAL BUILT-UP AREAS
Size	Small (substandard) building size	Generally larger building size
Density	(very) high roof coverage densities Lack of public (green) spaces within or in the vicinity of slum areas	Low to moderate density areas Provision of public (green spaces) within or in vicinity of planned areas
Pattern	Organic layout structure (no orderly road arrangement and noncompliance with set-back standards)	Regular layout pattern (showing planned regular roads and compliance with set-back rules)
Site characteristics	Often at hazardous locations (e.g. flood prone, close to industrial sites, steep slope) Proximity to infrastructure lines and livelihood opportunities	Land has basic suitability for being built-up (basic) infrastructure is provided

Adapted from Kuffer (2017, p.19)

On the basis of the above features, visual image interpretation is conducted based on local knowledge to identify the two settlement types (formal/informal) distinctly as well as in a continuum, for settlements located both in the outskirts & inner city.

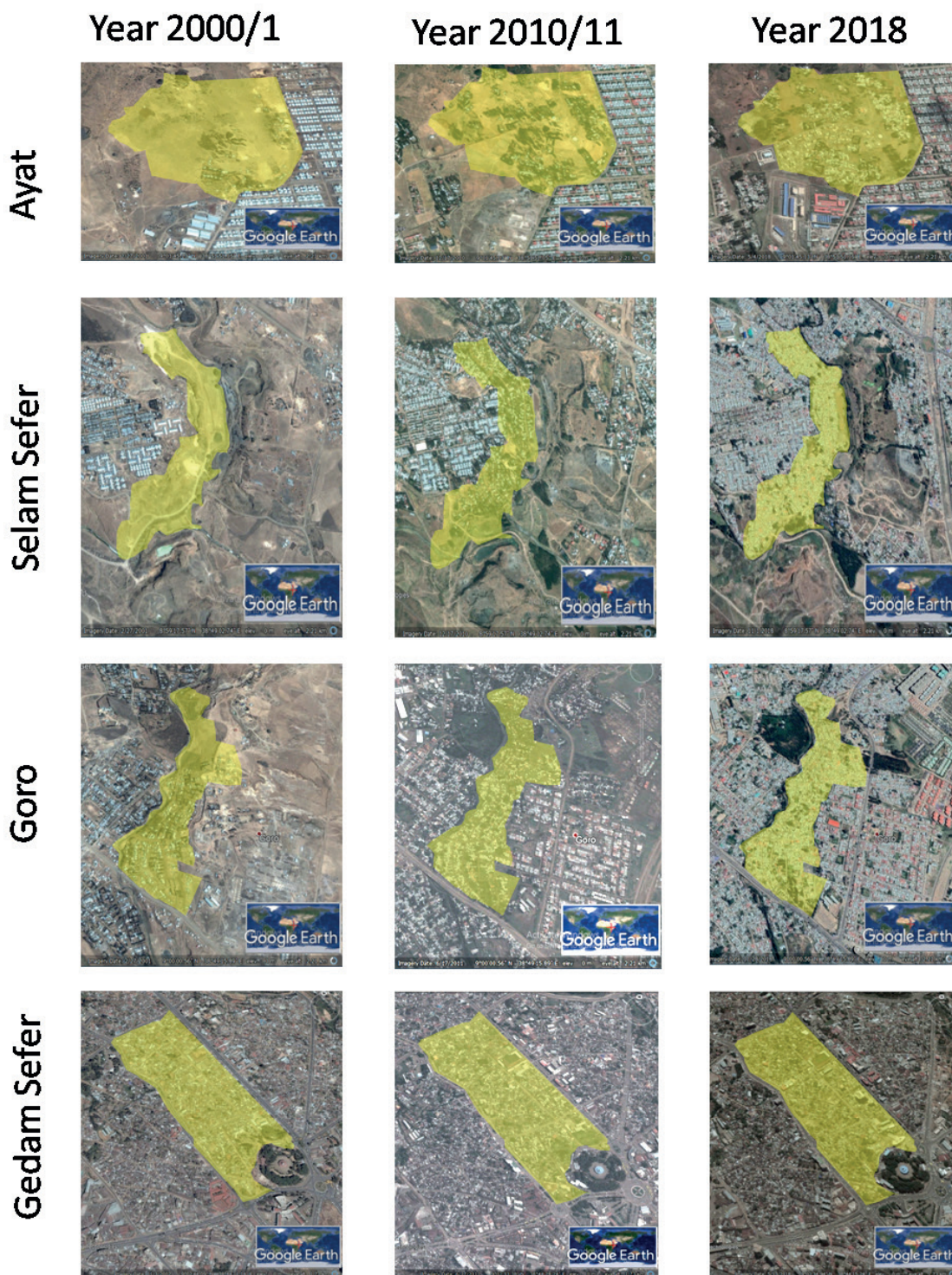
**Ayat:** the settlement is situated adjacent to a formally developed real-estate developed for high-income residents. According the stated morphological features, **Size** of buildings in the informal settlement is much smaller than that of the real-estate (See fig 12). In terms of **Density**, however, relatively low density is observed in the informal settlement than the formal because the site is on the process of conversion from a village (with an agricultural land) to urban through mostly informal transaction. This implies that the settlement portrays the co-existence of both formal and informal houses in the settlement. In terms of legality, the captured data shows that, there are households who are original owners of the land that lived in the area before 1974 who are entitled to get a title-deed, including households who did stay in the settlement before 2005. The information captured through sample household survey confirms that, more than 85% of respondents acquired the land through buying from pre-existing farmers, though land is owned by the public where selling or buying from individuals is illegal. Originally, the land, where the adjacent real-estate situated is also expropriated from farmers by the city government.

Considering the **Pattern**, the buildings and roads are laid out organically as compared to the adjacent real estate where there is regular & uniform arrangement of buildings (See fig 12). The **site characteristics** as one of morphological feature, is distinct as the informal settlement is situated on the hill. There are few accessible routes inside the settlement; whereas the real-estate is situated on relatively flat land with well-planned, interconnected street pattern.

Ayat is one of the representative site the shows clear spatial disparity with the surrounding formally developed settlements, this recent phenomena is becoming the face of Addis Ababa that jeopardize the peaceful coexistence of the social & economical bond between residents from different walks of life.

**Figure 12**

Spatio-temporal change of the four case study areas (Ayat, Selam Sefer, Goro and Gedam Sefer)



**Figure 13**

picture depicting dangerous access to the dwellings in Selam Sefer



**Selam Sefer:** is situated adjacent to the housing development by cooperatives who mostly are middle & lower middle income residents.

**Building size & pattern** distinctly vary in the two settlements, where houses in the informal settlement are very small irregularly distributed as compared to the formal one where the houses are row house types and are developed as block that have distinctly bigger building size and regular pattern. Concerning the **density** both settlements have densified overtime where open spaces in the formal settlement have also disappeared. This can be explained that, since residents in the formal settlement are not economically strong as that of Ayat real-estate's, house-extensions (for rental purposes) within compound and also within the settlement has increased the density in the settlement (See fig 11). However, evidently, high density can be observed in the informal settlement than the formal one.

There is also distinct difference in the **site character**, where the housing cooperatives are situated on the relatively convenient topography while the informal settlement is situated on former quarry area where there are dangerous access routes. Some of the residents are forced to use ladder to access their home<sup>3</sup> (See fig 12). However, houses that are built before 2005 are legalized, though nearly 99% of the houses are built after 1991. Out of 99 % of the houses that are built in the last three decades, about 45% of them are built after 2010. In terms of formal/ informal categorization, the settlement is highly hybridized in the aspect of legality. As explained above, there is no strongly visible distinction as compared with the formally developed site spatially.

**Goro:** is situated adjacent to the housing development by cooperatives & individuals who are mostly middle & high income residents and acquired the land via lottery using lease system. In the contrary, in the informal settlement more than 65% of respondents acquired the land from the farmers. Since the settlement is established after 1991, when the EPRDF takes over the power many of the households are legalized through regularization.

**Building size & pattern** distinctly vary in the two settlements, where houses in the informal settlement are very small as compared to the formal one. When it comes to street **pattern**, Goro informal settlement has a relatively better laid out street network. In fact, some of the routes are created as a continuation from the formal settlement. Major challenge in this settlement is its **site character** which is very hilly inclining towards the river and houses are built up to the edge. Whereas, the formal settlement is laid out on a relatively flat land which is convenient for construction and accessible from all directions.

Furthermore, there is "a high-tension power line" that carries high voltage electricity across the settlement putting a number of households under health threat. According to the master plan there must be

3 Photo taken during reconnaissance survey by Soressa, Yonas A.



15meters buffer (depending on the height of the tower) on both sides and no construction is allowed underneath.

In terms of *Density*, there is high density in the informal settlement which is similar to the other informal settlements; whereas relatively better density is exhibited in the formally developed settlement.

**Gedam Sefer:** As described in section three, the settlement is located in the inner city and informally developed, where there is no distinct difference with its surrounding. Further, it is part of the inner-city where more than 80% of the houses are labelled as slum, “in fact the non-slum areas are pockets within the larger slums” (Alemayehu, 2008, p. 38). The settlements portray an overall homogeneous morphological character, however, there is small distance (parcel or block level) spatial variability or heterogeneity created through mix of culture, functions as well as socio-economic status & physical conditions (Lemma, 2005). Prior to the urban renewal program, that wiped most inner city settlements, the development before 2002 was somehow piecemeal and the growth was blended with no such distinction between formal and informal, the haves & the have-nots.

In terms of formal/informal continuum, there is a very strong hybridization in all terms. Parcel level variability, in terms of legality, income, access to infrastructure etc. exists. Such settlement pattern & variability with strong hybridization is Addis Ababa’s character since its establishment. As confirmed in Alemayehu (2008, p.76), “the early morphology of Addis Ababa has also contributed to the present day mingling of the rich & the poor.”

UN-Habitat (2004) cited in Lemma (2005, p.58), stated that “A significant character of Addis Ababa is the distribution of its households, typically, an area that contains ultra-modern buildings has slum

adjacent to it”. There could be plots with the size of more than 1000sq. m whereas more than 15 or twenty families could live in a small plot with the size less than 100 sq.m. adjacent to it (See Fig 13), but sharing same social capital & services equally. Thus, the morphological features discussed in the other three settlements, has no significant result for settlement level analysis here.

**Figure 14**  
 Parcels with small & big sizes in Gedam Sefer



Currently the city is adopting a new face, unblended growth, as observed in the outskirts of the city in the three cases: Ayat, Goro & Selam Sefer with adjacent settlements.

The discussion of results confirms that all of the case study areas are composed of both formal and informal houses in varied proportion. The level of hybridization decreases in the peripheries than the inner city, particularly the level of recognizable settlement level variability observed recently, after 2011. This phenomenon is harming the city socially, economically and environmentally.

### 5.3 Social Inclusion in the informal settlements: cluster level socio-spatial disparity

Social inclusion is one of the main dimensions of urban prosperity (CPI, 2015) within the framework of Goal 11: target 3 that aims to enhance inclusive and sustainable urbanization and capacity for participatory, integrated, and sustainable human settlement planning and management in all countries by 2030.

The following section focuses only on few variables that are proxy to social exclusions or barriers to social inclusion. Those are: accessibility to services, physical accessibility, transportation, tenure insecurity, eviction, & redevelopment insecurities. The above sections discussed how the emerging trends in the city are distinctively unblended between formal and informal development and the contribution of planning to it. In this section, the focus will be the level of depravity in the informal settlements as opposed to formally developed adjacent settlements with better physical accessibility, transportation options, and tenure security.

**Physical accessibility:** in terms of ease of access to and from the individual houses by in the case study areas have been analysed as shown in table 4. More than sixty percent of respondents living in Goro rated their neighbourhood as accessible while 70% of respondents living in Ayat and Selam sefer rated the accesses as difficult. Further, cluster level spatial analysis is conducted and the result shows that (See fig 17) significant part of the settlements is less accessible by car. This implies that there are houses & parts of the settlements difficult to access in case of emergency by Ambulance or fire fighting vehicles. Besides, as observed in Selam Sefer & some parts of Goro, some of the areas are difficult to access via walking for children, pregnant women, and elderly. On the other hand, adjacent formally developed settlements are well connected and accessible both by walking and by car implying socio-spatial deprivation is evident between formally and informally developed settlements in terms of access route as discussed in the previous sections.

**Table 4**

Ease of access

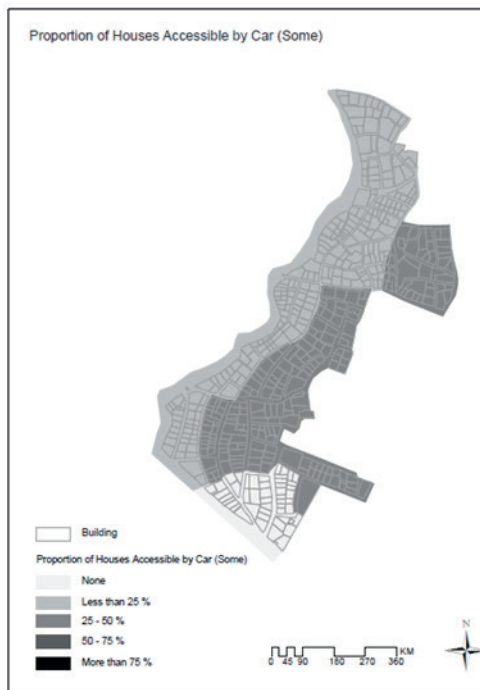
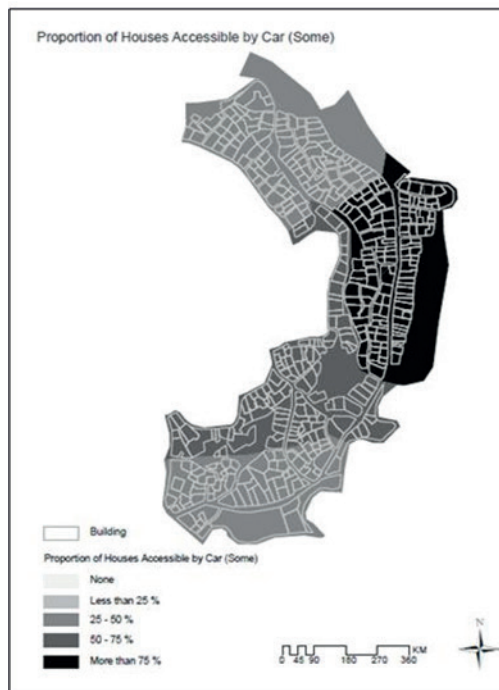
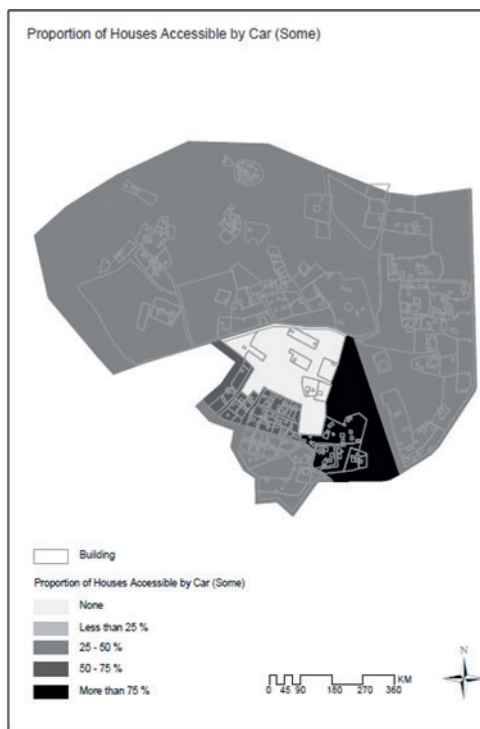
		EASE OF ACCESS		
		ACCESSIBLE	DIFFICULT	DANGEROUS
Site	Gedam Sefer	66.5%	29.4%	4.1%
	Ayat	15.1%	65.8%	19.2%
	Selam Sefer	25.6%	68.4%	6.0%
	Goro	66.9%	19.2%	13.8%
<b>Total</b>		<b>49.2%</b>	<b>41.4%</b>	<b>9.4%</b>

In line with this, physical condition of walk-ways or access routes has also been analyzed. As depicted in figure 19, a significant proportion of residents in the three settlements, described the access routes as difficult for walking. There actually is spatial variability within the settlements (see fig 18). Three of the case study areas located in the peripheries

rated the routes as difficult to access because of the topography mostly. However, in Gedam Sefer, the problem is caused mostly because of narrowness of the access routes, dead-ends, and poor pavement condition. Few, who are located on relatively better topography, have rated the accesses as less difficult (See fig 18) for spatial variability.

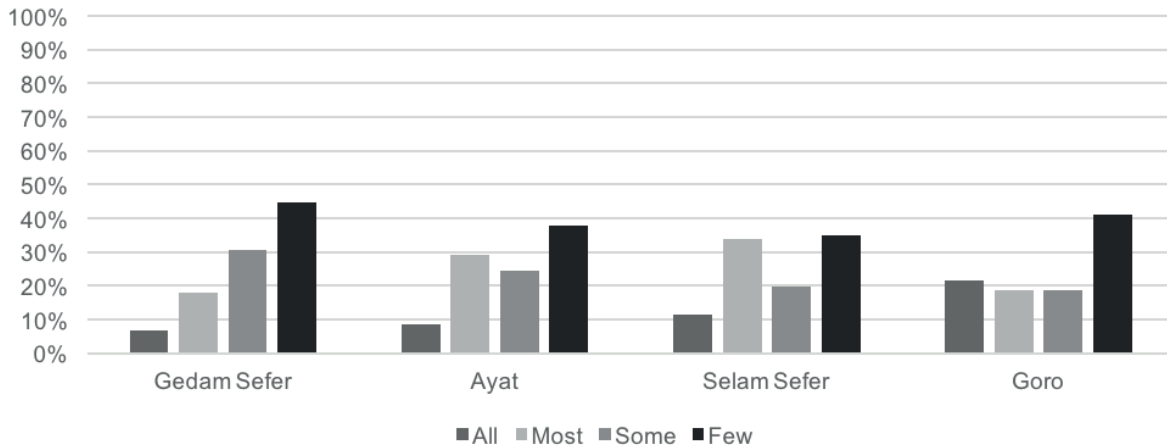
Figure 15

Proportion of some houses accessible by car



**Figure 16**

The Proportion of houses that are difficult to access on foot

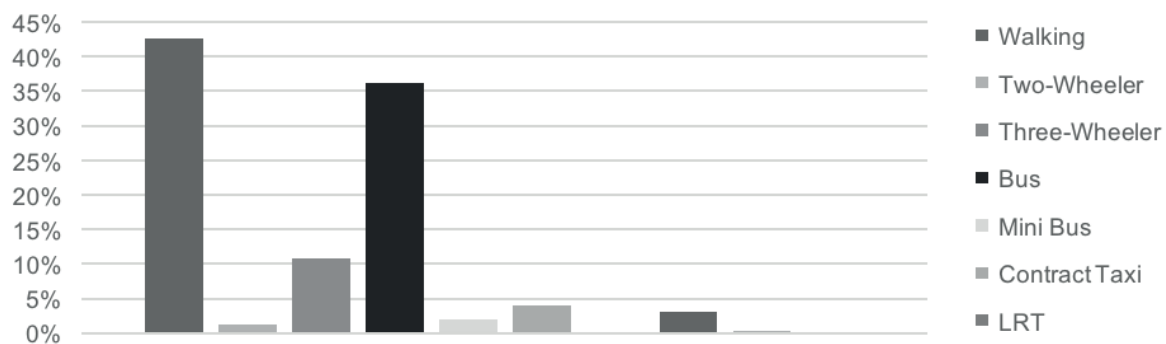


**Transportation:** The other variable that needs to be checked is means of transportation. Accordingly, the major means of transportation in the case study areas is walking, followed by bus & three-wheeler. In contrast to the difficulty of walking within the

settlements as discussed earlier, the main means of transport to get to their job for most of the respondents is also walking for all the settlements, followed by use of bus & three-wheeler, respectively.

**Figure 17**

Means of Transport to Work



According to World Resource Report, the poor walk to work or use bicycles, locating themselves as close to the employment opportunity as possible, or else if the poor reside far from their employment, they rely on public transport, informal modes or the combinations of the two, spending disproportionate amount of their income on transportation (Beard, Mahendra, & Westphal, 2016). When we see travel

time to their work place, about 46% of respondents travel 10 -30 minutes followed by 30-60 minutes for 24% of them and less than 10 minutes for about 22% of them. These implies that, even if their work place requires them to travel more than ten minutes they are obliged to use walking or combine walking with buses or three wheeler mode of transportation.

**Table 5**

Travel time to work

		TRAVEL TIME TO WORK			
		BELOW 10 MIN	10 - 30 MIN	30 - 60 MIN	ABOVE 60 MIN
Site	Gedam Sefer	25.8%	40.6%	23.6%	10.0%
	Ayat	12.6%	37.7%	24.5%	30.8%
	Selam Sefer	24.6%	42.1%	26.7%	6.7%
	Goro	20.6%	41.1%	23.4%	14.9%
	<b>Total</b>	<b>22.4%</b>	<b>40.6%</b>	<b>24.2%</b>	<b>13.6%</b>

With regard to monthly expenditure on transport, about 42% of residents spend between ETB (200-500). Similarly, as reported in UN-Habitat (2017), residents of the city who are relocated to the periphery of the city because of urban renewal program, their monthly expenditure on transport escalated from about 200 birr to 675 ETB (mean price), which is a 178% more than their previous transport expenditure before relocation. Similarly, nearly 70% of respondents reported that their income is between 1000-5,500 ETB, whereas about 20% of them earn below 1000. Whereas the majority spend 200-500 ETB which make the transportation cost unaffordable for many of respondents in the settlements; whereas, residents in the adjacent

formal settlements might not face such challenges as depicted on (fig 16) images, all access routes are well planned and well paved. Since, all are high and middle income residents; they use private vehicles or mini bus taxi as their main means of transportation. Majority of respondents who use walking as a means of transportation earn an income below 2,500 ETB; whereas, respondents with income between ETB 2,500-5, 383 use buses to work. In the context of Addis Ababa, low & lower-middle income residents usually use buses because of affordability.

**Access to infrastructure: Water Supply for Drinking:** these variables are also considered as an indicator for social inclusion.

**Table 6**

Access to water supply for drinking

		WATER SUPPLY FOR DRINKING			
		TAP PRIVATE (IN HOUSE)	TAP PRIVATE (IN COMPOUND)	TAP COMMUNAL (IN COMPOUND)	TAP PUBLIC (BONO)
Site	Gedam Sefer	51.5%	21.9%	25.4%	1.2%
	Ayat	7.2%	10.1%	4.3%	78.3%
	Selam Sefer	15.9%	33.6%	33.6%	16.8%
	Goro	48.8%	12.4%	14.0%	24.8%
	<b>Total</b>	<b>36.1%</b>	<b>20.4%</b>	<b>21.2%</b>	<b>22.3%</b>

**Figure 18**

Access to Water Supply for Drinking

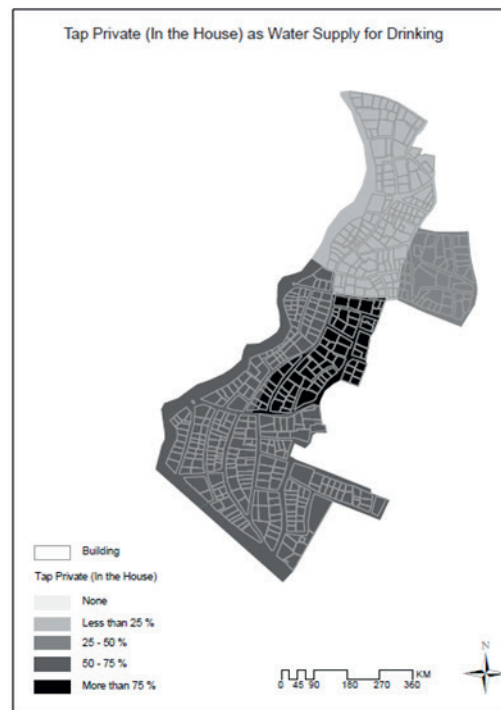
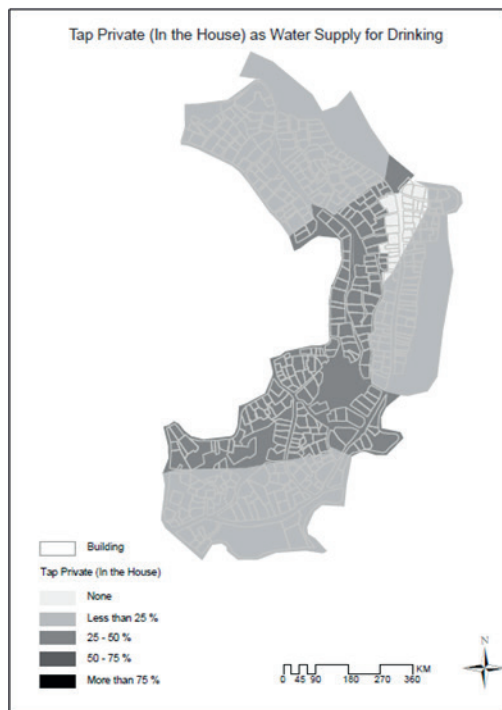
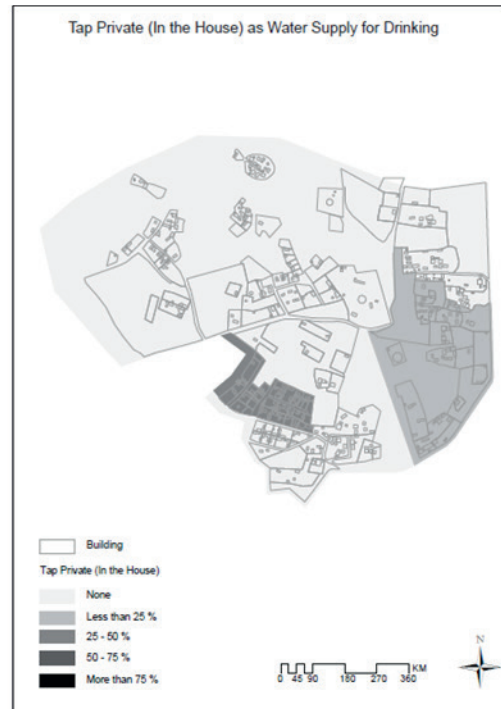
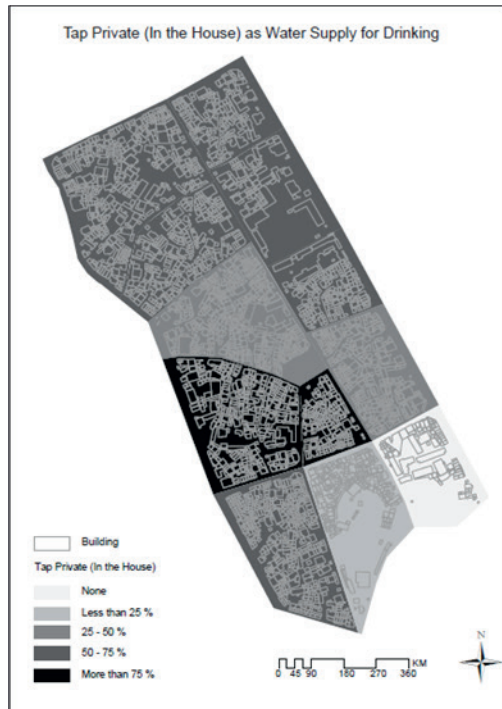
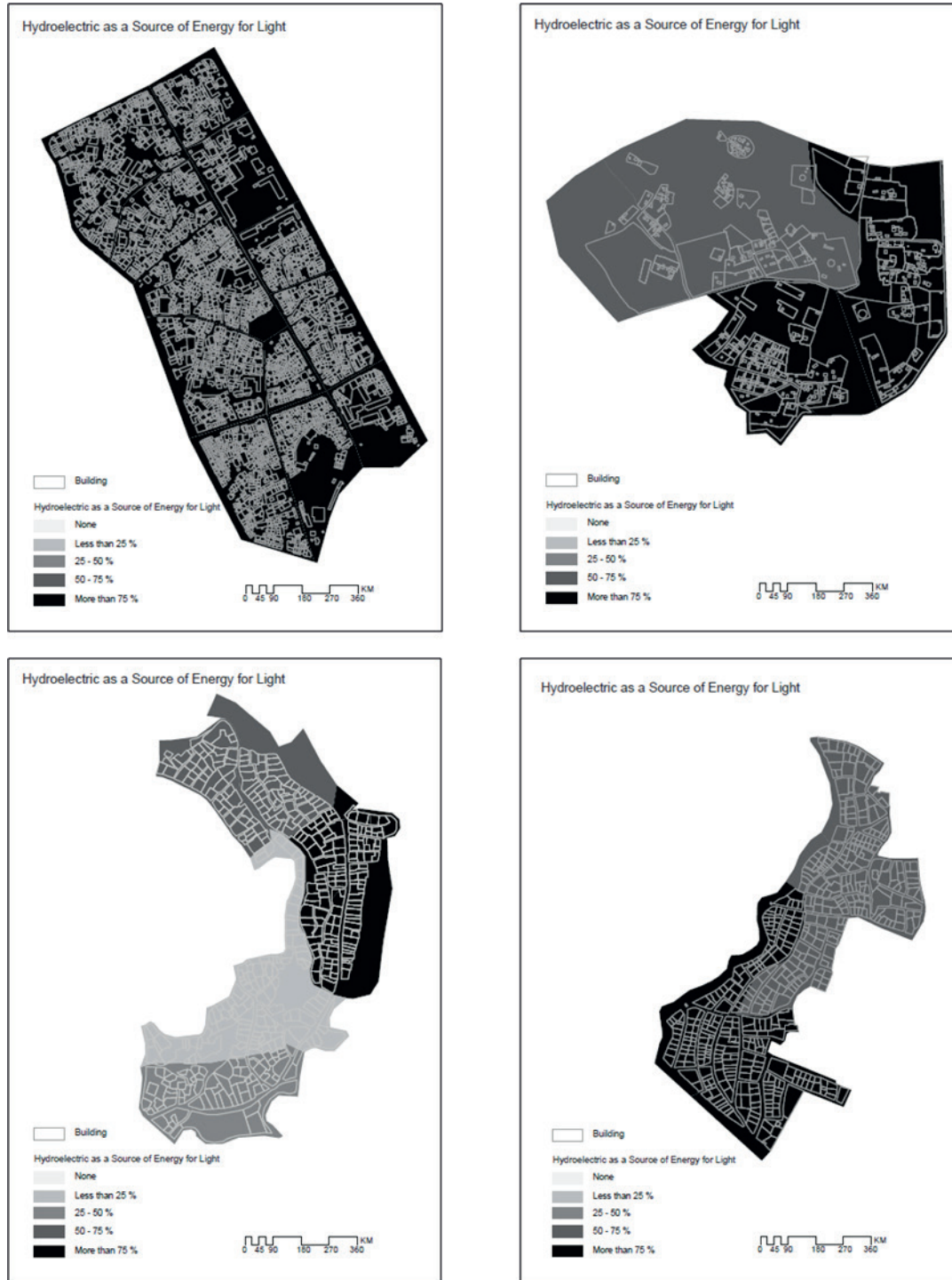


Figure 19

Access to hydroelectric power as energy for lighting



In general, residents in the settlements have access to tap water via different means. In Gedam Sefer, 51, 5 % of dwellings are equipped with in-house water tap; whereas very few, 1.2% of respondents in this settlements use communal water tap. On the other hand, in Ayat, 78% of residents' communal water taps. This shows that not only with the adjacent formally developed settlements, there is variability within settlements, depicting different level of deprivation.

**Access to hydroelectric power for lighting** in the informal settlements reaches more than 75% of respondents have access to lighting in the inner city. However, in the peripheries only part of the settlements gets access to hydroelectric power for lighting. There is a huge spatial variability of access, again depicting different level of deprivation with in informal settlements.

**Tenure security:**

One of the characteristics of informality is non-conformity with the master plan regulations or having no legal documentation for occupying land. In the context of Addis Ababa, illegality is the main indicator of informality rather than a condition of precariousness

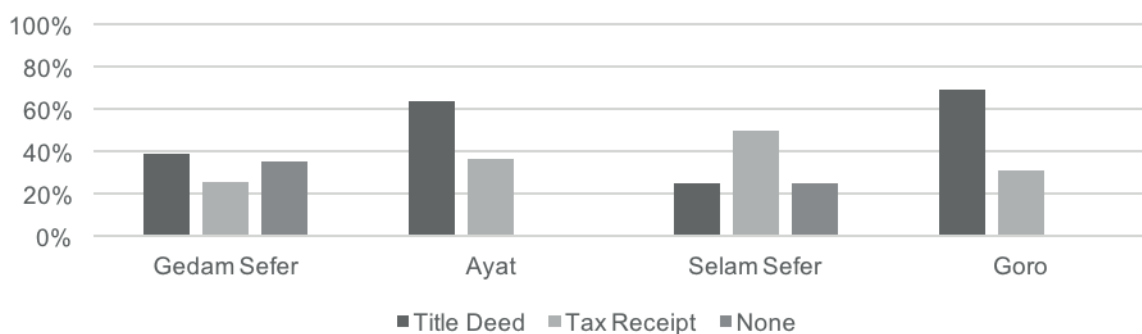
as there are affluent settlements with no legal status. Though there is varying proportion of households with a title deed in all of the case study areas. High proportion of households with legal status is observed in Goro and less proportion in Selam Sefer. In the contrary, there is high proportion of residents without a title deed in Gedam Sefer, next to Selam Sefer. This is because many of the residents in the inner city, Gedam Sefer, are tenants of kebele houses.

**Eviction and Redevelopment:**

Tenure status of the four settlements is shown in figure 20, depicting informality in a continuum in terms of legality. The following map, fig 21, shows various levels of eviction and redevelopment insecurities. In the inner city, Gedam Sefer, despite their legal status, there is nearly 100% insecurity of redevelopment programs of the city. This actually is in line with the renewal program that is being implemented in the city since 2009 keeping the inner city residents in lingering fear of displacement. On the contrary, this part of the city is not threatened of eviction, as they all most of them have legal status but informally developed.

**Figure 20**

Types of property documentation in the informal settlements



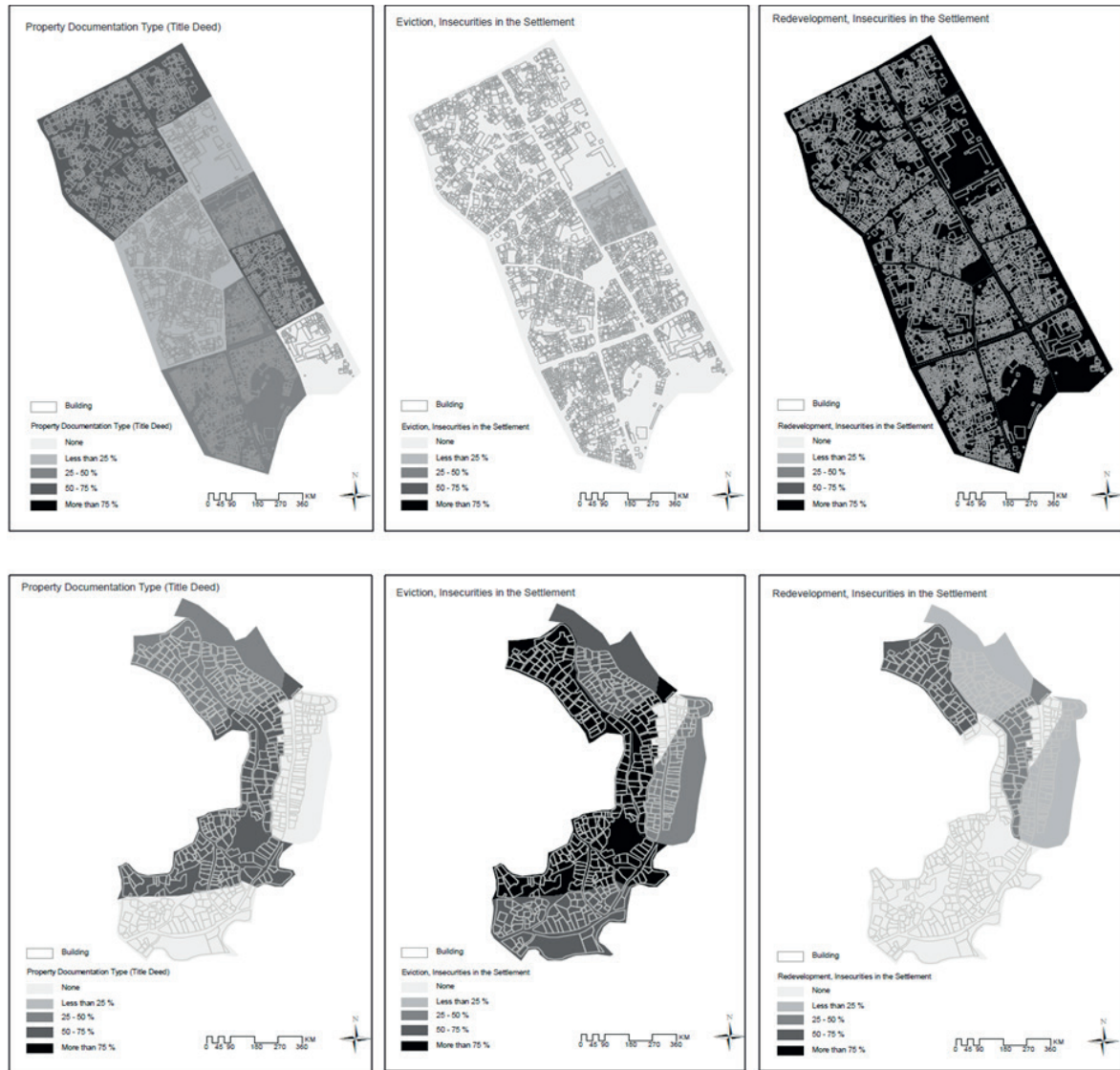
On the other hand, the settlements at the peripheries are insecure because of eviction. Though there exists different level of insecurity at cluster level depicted on the map, it mostly is related with having a title deed or not. Those who have a title deed are sure that they won't be simply evicted even if their location

can't comply with the master plan regulations. As the trend shows, at least they get compensated on either condominium house or land in another location. However, those who do not have any kind of documentation are in constant fear of eviction.



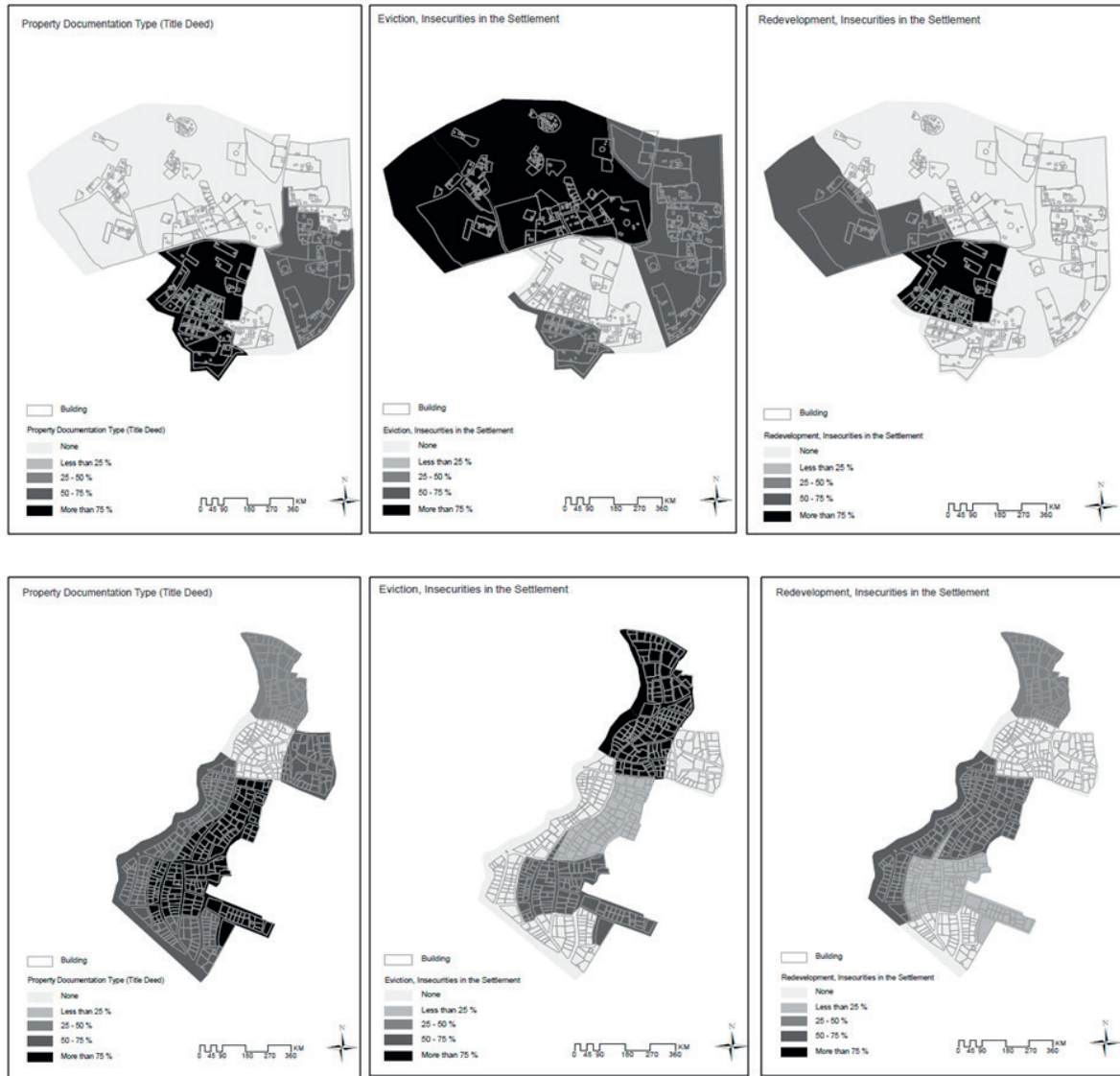
**Figure 21/1**

Property documentation, eviction & redevelopment insecurity in the four case study areas



**Figure 21/2**

Property documentation, eviction & redevelopment insecurity in the four case study areas



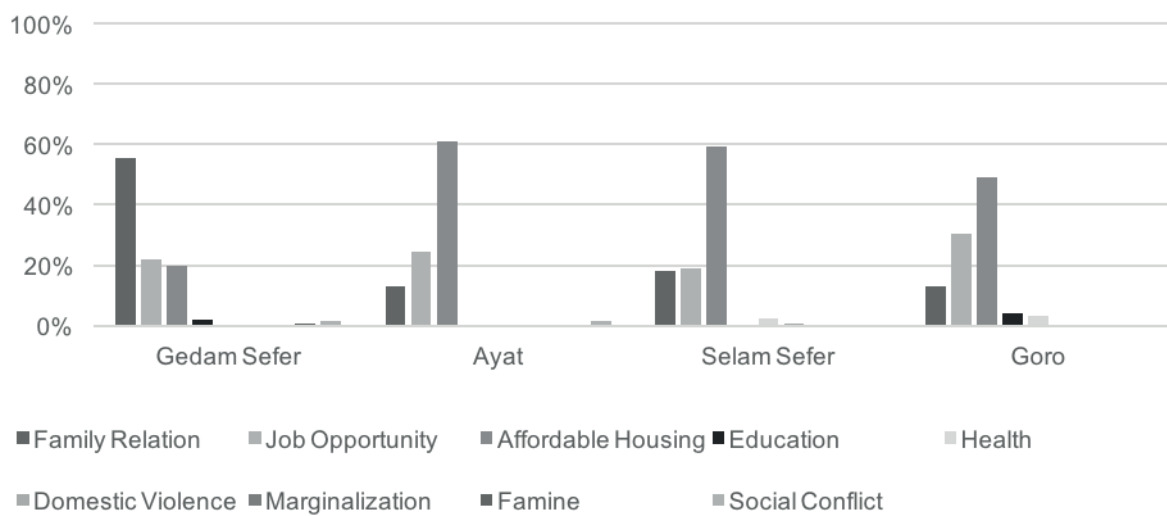
#### 5.4 Persistence of informality in the light of the urban planning practice in the city

Cities of the developing world have become stronger in financial terms, however, their growth has continued to outpace their ability to provide

services, particularly housing for the urban poor (UN-Habitat, 2016). Similarly, in Addis Ababa, despite the efforts, significant unfulfilled demand of affordable housing persists until today as demand outstrips the supply trapping the growth in a vicious cycle (UN-Habitat, 2017).

**Figure 22**

Reason for moving into the settlement



The sample household survey conducted in the three cases: Ayat, Goro & Selam Sefer, confirms that more than fifty percent of respondents moved to these informal settlements in search of affordable housing (See fig14);Whereas, similar proportion of respondents, before 1974, moved to inner city (Arada) because of family relation. Through the years, like the peripheries, the inner city and its surrounding have also become highly dense & overcrowded accommodating new migrants from rural areas who are in search of better life opportunities. It is clear that migration is an inevitable phenomenon. However, since the city’s establishment, the planning practice does not respond in a balanced and holistic manner. Rather, it mostly is instrumental to the unaddressed housing need of the poor.

The previous sections have dealt with the unprecedented growth of the city in the last three decades and the emergence of unblended growth between settlements (forma/informal) on the peripheries currently. Moreover, various levels of disparity within the case study areas are analysed on the bases of the sample household survey conducted in 2018. This section deals with an overview of persisting informality in the city in the light of planning practices since its establishment in 1886.

#### 5.4.1 Persistence of informality – period before-90s

The contribution of the successive master plans prepared for the city is minimal in addressing the persistent shortage for affordable housing that kept leaving the poor behind. These phenomena can be traced back to the establishment of the city.

In the period before 1974, the poor mostly was provided with privately owned informally developed sub-standard rental housing that was estimated to reach between 60-62% of the total housing (HDM & Mamaru, 2007). The system at that time favoured the 5% of the population who owned 95% of the land in the city (Gossaye, 2001). The first master plan for the city that existed before the arrival of Italians in 1936, 'Taitu-Menilik Development Plan', depicts a development centred on important nodal points that were occupied by smaller affluent of the time surrounded by their followers including the poor. Though such arrangement, the intermingling of the rich & the poor, still influences the cities development culture positively, the development of the city was more of spontaneous hardly giving consideration for the majority, the poor. During the short lived presence of the Italians (1936-41), most features of the current structure of the city were established mainly on the basis of I. Guidi and C. Valle's master plan (ORAAMP, 2002). As elaborated in the same document, the effect of this plan is still evident in the city as it divided the city into two parts the 'European city' and the 'native city' (Addis Ketema) a dense settlement with gridiron street network.

The fourth master plan for the city in 1965, L.De Marien Master Plan, had better opportunity of being implemented better than the predecessor master plans though the plan had less consideration for the social fabric (Alemayehu, 2008). The general form of the plan was developed making 'Arada' the core area of the city and guiding the development of

most inner part of the city (ORAAMP, 2002). Arada is part of the old settlement where one of the case study areas (Gedam Sefer) is located (See section4). Later, between the periods 1974-1991, **the socialist government**, two Master Plans have been prepared which are C.K. Polony's Master Plan, and the Master Plan prepared by the Ethio-Italian technical cooperation in 1986. The later was intended to serve the city for the coming 20 years.

It was during this period that the historical proclamation 47/1975 issued that changed the land ownership from private to public and confiscated all urban land & extra houses. The confiscation included the informally developed rental houses, the 'kebele houses'<sup>4</sup>, and their administration fall under the hands of the government. Though, the government tried to dedicate the system to favour the poor, couldn't satisfy the ever increasing demand for housing particularly the poor because of insufficient land and housing production between the years 1974-1991 (HDM & Mamaru, 2007).

One of the out puts of the 1986 master plan that contributed to the deterioration of the existing housing stock and proliferation of informality in the inner city is the intervention plan. It "prohibited foundation-less houses located in the inner city to be upgraded demarcating the whole inner city for urban renewal (Alemayehu, 2008)". The other contribution was via the change of the land holding system that created mixed type of ownership in a single title deed. This was another obstacle that prohibited the owners to make the necessary improvement to their houses legally rather it contributed to the rampant illegal extensions and sub-divisions within the parcels. As the main destination for migrants, the inner city responded to the housing need of the poor in this manner. Despite the regulations at that time, the houses have transformed and additional spaces were incorporated on all available spaces informally, creating further density and over crowdedness to the already dense & deteriorated inner city.

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4 Kebeles were the smallest administrative unites in the city

Outside the inner-city, the current intermediate part of the city was developed through housing cooperatives and individuals via land allocation for free on the basis of detail plans that were prepared within the framework of the existing master plans. However, formal registration was required as a city resident to get land though it was given freely. The poor, particularly migrants with no formal registration, who came to the city for better life opportunities and escape hunger in rural areas, started to squat in the rural kebeles of the city through illegal transaction from peasants in the 1980s (Berhe, A. et.al, 2017). Generally, the informal land subdivision, house extensions, and property development at large were a response to unmanaged migration, the ineffective planning, inappropriate standards, and unenforceable regulation from the residents side (UN-Habitat, 2009). The response from the government for the emerging development, however, was demolishing. As stated in Berhe, A. et.al. (2017, p. 13), “The first organized public demolishing activity began in 1988 that had no lasting value to stop squatting” .

#### 5.4.2 Persistence of informality – period after-90s

There was a change of government in 1991; the socialist regime was overthrown by Ethiopian People’s Revolutionary Democratic Front (EPRDF). **The federal government after 1991** formulated and implemented various housing and land development strategies under the umbrella of ‘free market oriented economic system’. However, the public ownership of the nationalized urban land and confiscated houses remained unchanged. Taking advantage of the transition, this period was the time when the informal sector started to respond in a recognizable manner. This confirms with discussions in the previous sections, people started to move to the case study areas, particularly in the periphery areas, after the year 1991 (see fig 13).

The new government needed a planning tool to guide the development. Thus, the 1986 master plan got approved only in 1994 to be fully implemented though it was the only tool to guide the minimal development before this period. In 1993, urban land lease regulation was issued. Moreover, the government was encouraging the private sector to participate in the real-estate development via issuing proclamation No 37/ 1996. Hence, between **the years 1993-2001/2**, real estate developers and individuals were allowed to acquire land through lease system. Moreover, plots with an area of 73m<sup>2</sup>, in small proportion as compared with larger size plots, were allocated to the poor for free. Mostly, low-income families, who were relocated because of natural hazard or incompliance with the master plan, were given this opportunity taking a minute proportion from the majority poor. Land allocation during this period was mostly through detail spatial plans. The plans were prepared producing plots in thousands for land allocation using lease system. In one of the detail plans prepared for Akaki sub-city, the proportion of plots dedicated for the poor was only 5-6% of the total plots that were about 4000 (Lemma, 2005) while majority of the city residents were categorized in the low-income social strata. Gossaye (2004) described the development as orchestrated by the formal sector to develop most expansion area by the middle and high income residents where as 60% of the city residents live below poverty line, at the time. PADCO (1997), cited in HDM & Mamaru (2007, p.332), pointed out two major drawbacks in the land and housing delivery systems in this particular period: one is the slow plot production in view of the growing number of residents and the other is the requirement for high building construction standard that disregarded the capacity of low income residents.

On the other hand, a significant number of people have migrated to the inner city, between the period 1991-2002. Further overcrowding was created on the already dense settlement through illegal

transformation and expansion. The share of informal sector reached 34% only between the period 1996-2003 (UN-Habitat, 2017; UN-Habitat, 2011).

**Revised Master Plan of Addis Ababa (2003-2010):**

The master plan approach was considered to be too static & restrictive including its requirement to have strong institutions & resources for implementation (Sliuzas, 2004). Hence, revising the existing master plan was necessitated because of its inability to function as an effective development guide considering the fast paced socio-economic change at the time (ORAAMP, 2002), and master plan preparation has followed a combination of structure and strategic planning approach. Anticipating the future trend of the city development, major proposals forwarded concerning the housing component of the master plan are presented as follows:

- a. maintain mixed social diversity and mixed use in housing areas: mix real estate, cooperative housing and housing for low income in expansion areas, limit the size of high standard real estate development projects and size of gated communities
- b. revise building regulations and codes: permit self help housing with only minimal building standards, foster the use of indigenous, low cost construction materials and technology; give developed plots to low-income population at subsidized rates, support the construction of low income private rental housing
3. introduce phased development and improvement system and provide incentives to the private sector; intermediate the community in self-help upgrading and redevelopment projects, devise compensation, relocation and resettlement strategies
- d. manage informal settlements focusing on relocation and demolishing on 'untenable locations; through provision of some security of tenure for others, and enabling the community to improve infrastructure through supporting community based construction and management; control squatter settlements

In order to assist the implementation of the revised master plan, Strategic Development Framework (SDF) and Strategic Development Action Plan (SDAP) were prepared prioritizing housing as one of the intervention area. Moreover, to supplement SDAP & SDF, Local Development Plans (LDPs), were introduced as an implementation tool replacing detail plans. The main purpose of using LDPs as an implementation tool was to ensure the city's identity (the social mix) and urban quality (duality-modern urban/traditional rural) and facilitate investment (ORAAMP, 2002).

**Major Programs & policies implemented during this period**

Housing development was the top priority for the government during this period, which was in line with the outcome of the revised master plan and the two national level programs in 2002 - Sustainable Development and Poverty Reduction Program (SDPRP) & later in 2006 - Plan for Accelerated and Sustained Development Program (PASDEP).

Furthermore, in 2003, the five years Grand Housing Development Project was formulated for Addis Ababa aiming to address housing shortage, improve living condition of residents, improve, and change the dilapidated housing stock, among others. Later on, in 2005 the program was up-scaled to national level and Integrated Housing Development Program (IHDP). One of the major aims of the program was to increase the housing supply for the low income residents between the years (2006-2010), targeting to clear slum areas within ten years time for Ethiopia to become the middle income country by 2025 (UN-Habitat, 2011). The program has advocated for making the low-income residents the main beneficiaries, but again both the initial payment and the monthly payment required for the smallest typology was unaffordable for the majority poor. As confirmed in (UN-Habitat (2017), eventhough the prices of condominium is highly sub-cidized, from the outset till now it is also not affordable to most residents.

In 2002/3, about, 426.24ha land was delivered to the real estate companies to construct high standard housing for high income residents who were not more than 4% at the time (HDM & Mamaru, 2007). Even though real-estates are required to incorporate all social groups as per the regulation of the revised master plan; it did not materialize.

Urban development policy was formulated in 2005 making housing and urban land provision the two main issues to be addressed. In 2006, land was provided nearly for 34,954 households in the form of individual plots, as well as condominium highrise apartments and attached housing units. This allocation was also for a specific social group, high & middle income who are able to deposite 20% of the construction cost prior to the land delivery. Moreover, based on this urban development policy, the city government launched urban renewal program with an objective to redevelop the inner city, thereby improving the living condition of residents.

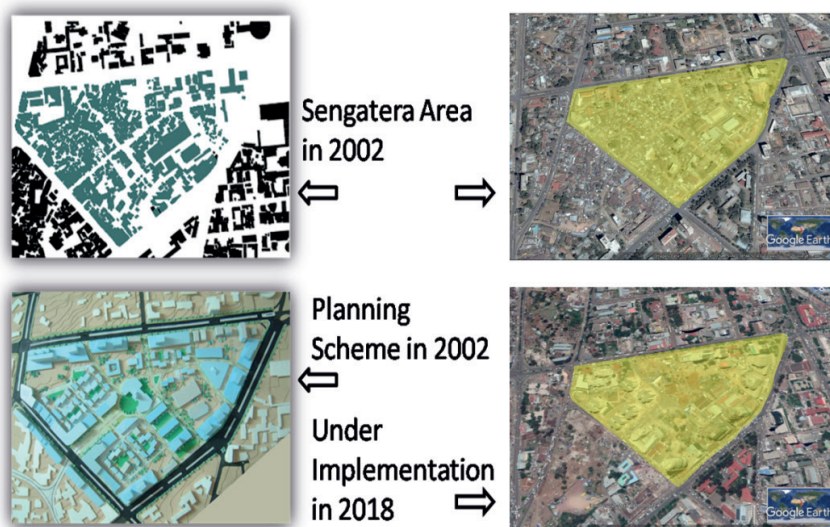
**Local Development Plans (LDP)**

About 32 strategic investment areas were identified in the revised master plan, to be developed for various

purposes including housing based on LDPs. Ten LDPs were prepared as model at the time. Among these, Senagatera & Meri luke LDPs incorporate housing in their program. Accordingly, in the planning scheme social and functional mix was maintained as stipulated in the master plan. However, the ground realities in terms of social aspects like way of living, culture of space use, income status of the actual residents, etc... in the area were given less consideration rather generic considerations were incorporated. The implementation of these LDPs is quite different (See fig. 22) as the housing scheme in the Sengatera LDP was totally changed to serve higher middle income residents while also Meri-Luke's divers housing schemes to house the poor also changed to the middle and high income apartments, almost entirely. Senagera area is located in the main centre of the city and it still is under implementation; while Meri Luke, is located at the outskirts of the city, ones it was agricultural land that is changed to urban development in the 2000s. The following figure (22) depicts sengatera area in 2002 and in 2018, after the massive implementation of urban renewal program in the city.

**Figure 23**

Sengatra LDP & its implementation



Source: Planning Scheme\_ Addis Ababa City Government, Master Plan Preparation, and Implementation Department

This period onwards, the number of LDPs prepared for the city exceeded beyond the stipulation of the revised master plan and the quality of the outputs highly deteriorated. Deviant from the plan, 44 LDPs were prepared between the periods of 2002-2008 and more than 200 between the periods 2010-2013/2014 covering 10, 233 ha (AAMPRPO, 2017; IPI, 2009). These plans were prepared focusing on urban renewal for inner city, urban redevelopment/upgrading for intermediate and new development for expansion areas. The initial idea of keeping the social & functional mix and keeping the duality were far from being achieved, even in the planning phase.

According to the directive (AAMPPO, 2017), these LDPs have been evaluated in 2008 & 2009 by three institutes (EiABC, Lyon Urban Planning Agency & Urban Plan Institute of Addis Ababa City Government). As a result, a number of limitations are identified where three of the major ones are:

1. The original concept of the master plan, keeping the social mix & duality as the city's identity were not translated through the LDPs as planned;
2. Most of the LDPs are prepared with minimal understanding of the ground reality & with limited link with the social & spatial aspects;
3. The project areas are identified with no prefeasibility study & impact assessment, with minimal participation of the concerned residents.

In spite of these comments, the preparation process and the quality of the output has not improved, except very few, on almost all LDPs prepared after wards.

In the early stages of the preparation and implementation of LDPs prepared for expansion areas were for private & cooperative houses trying to keep the social and functional mix. However, later on, both expansion areas LDPs & renewal LDPs for inner cities were dedicated mostly for condominium housing development; supposedly condominiums keep the social balance as their aim was to house the urban poor primarily.

LDPs prepared for condominiums always get priority for implementation as the whole task is institutionalized and supported with budget. At the early implementation of the program (2005-2009), condominiums were constructed on the available vacant land in the inner city and intermediate part of the city. However, given the lack of vacant land in the inner city, the program started to construct the condominiums in the expansion area, missing the objective that it was initiated before. Originally, the strategy was onsite relocation of the tenants from the demolished houses without disrupting the social & economic ties from the area, while also making them owners of the condominium housing units through long term loans (Alemayehu, 2008).

Among the 253 LDPs, about 78 LDPs were not implemented so far, whereas four LDPs prepared for renewal are fully implemented and 29 are partially implemented. About 116 LDPs are being used only for building permit purposes and implemented in piecemeal manner (AAMPRPO, 2017). Since, regulations on these plans disregard the socio-economic status of the residents and are also not realistic; they are mostly vulnerable for violation forcing informality. Most of all, the preparation for LDPs covering this much area is not a good news for residents as it leaves them with the persistent fear of displacement.

#### **Local Development Plans and Urban Renewal Program**

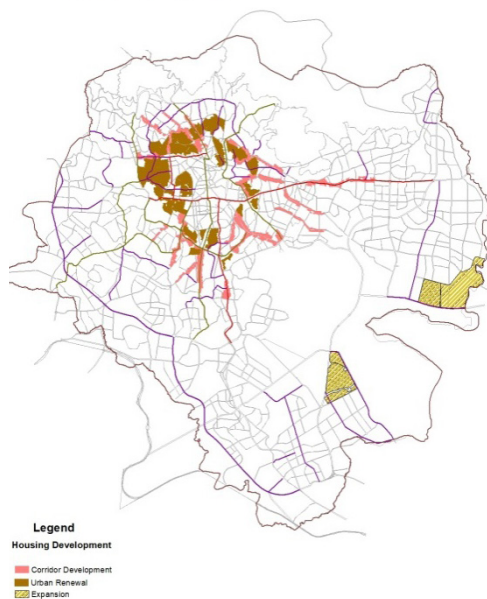
The original output of the master plan, SDAP, that identified intervention areas for housing was not implemented, instead, another intervention plan was prepared that dedicated the inner-city area for urban renewal, the intermediate zone for upgrading, and the rest of the expansion area for new developments. Accordingly, LDPs prepared for these localities were instrumental for implementing the urban renewal program and new development for expansion areas.



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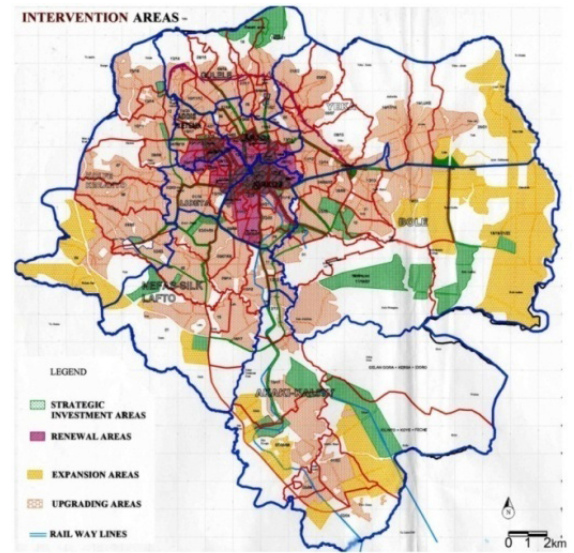
The period (2008-2013) was a time that “the city government embraced a five-year strategic plan introducing LDPs that focused on urban redevelopment and slum renewal (UN-Habitat, 2017, p. 54)”. Accordingly, as stated in the same document, from 2009 to 2015, the city has expropriated 392ha land in the inner city and demolished a total of 23,151 households. Residents with legal documentation are compensated in land, condominium housing units, or another kebele house. However, renters and informal settlers who resided in the settlements mostly were uncompensated in which the exact number of uncompensated relocated households is not known (UN-Habitat, 2017). Evidently, after 2011, the city has grown exponentially, as depicted on Fig 9 & 11, the spatial growth of the city has outpaced the estimated population growth indicating, the significant role migration plays. However, the planning response is also contributor as it lacked holistic views and technical as well as financial mechanisms to integrate the intended social & functional mix, including the acclaimed dual character of the city duality.

**Figure 24**  
 Ten years of strategic plan for housing (2017-2027)



Source: (ORAAMP, 2002, p. 34)

**Figure 25**  
 Plan depicting intervention areas in 2002



As learnt in the household survey, nearly 50% (See Fig 10) respondents in of the informal settlements have moved to the settlements after the year 2011. Moreover, nearly 70% of respondents reported as they moved from Addis Ababa, where similar proportion is also from the inner city of Addis Ababa. Somehow, this confirms the planning responses of the renewal program; also contribute to the expansion of the informal settlements. This information was triangulated with the city level and sub-city level officials and experts through interview and focus group discussion, however, they didn't agree to the huge proportion, though they agreed to the presence of the problem. Rather, their anticipation was twofold: either respondents are speculating for compensation; or respondents are migrants who stayed in the inner city for sometime before relocation but couldn't be compensated because of lack of legal documentation. According to the interviewees and (LDBURPO, 2002), sub-tenants of the kebele houses who delivered evidence for living longer years in the settlement were given opportunity to buy condominium, if they have a capacity. However,

UN-Habitat (2017) stated that the urban renewal program has neglected a significant number (no data is found on the actual count) of informal settlers and renters, in its compensation & relocation program. This implies that, if not all, many of informal settlements are created because of failures of policies and planning interventions. The persistence of informality continues as a certain section of the society, is always neglected or left behind in the development process.

**The New Master Plan (2017-2027)**

On the basis of the newly prepared master plan, the city government of Addis Ababa is planning to develop 4050ha area and build 521,500 housing units between the years 2017-2021 in the inner, infill and expansion areas of the city (AAMPPO, 2017). However, the state of planning and design practice is not promising for inclusive, holistic, and integrated development, even though the broader goals promote otherwise. As stated in SECR (2015), the ground reality of the urban planning in Ethiopia speaks for the need for the variety of interventions to enable sustainable and optimal practices based on methodical knowledge management systems. ♦

## PART 6 CONCLUSION

### **Towards Inclusive Prosperity**

The new face of Addis Ababa is portraying a new trend of divide in its peripheries with distinct physical features portrayed differently in the formal / informal settlements, in terms of size, pattern, and density of buildings as well as in topographic features. Recently, after the year 2011, the city is growing at an alarming rate out pacing the estimated population growth consuming the remaining land resource that is dedicated for various purposes including for environmental protection. Even though, migration is found to be an underlying factor for these, as the results of the analysis indicate, the policy and urban planning responses through the years have contributed as to the present development trend in the city there by contributing to the proliferation of informal settlements.

As stated in Alemie (2015), there is always interplay between policy & laws, actor and urban land. Implying, what has been used as an input for development be it in terms of policy or planning regulation, the impact is always reflected spatially. Hence, in this study, interactive supervised image classification, and visual image interpretation was conducted to analyze the spatio-temporal change of the informal settlements and the city in the last couple of decades. The result showed that the emergence of the new unblended trend of formal/informal distinction, leaving the strong hybridized development that was witnessed in the city throughout the years. This partly is contributed by the planning responses because of their lack of holistic views, technical and financial mechanisms, and institutional backups among others.

In terms of deprivation, the result of the socio-spatial analysis shows, the respondents residing in informal settlements face deprivation in various dimensions

and intensity as compared to the formally developed settlements. In this regard, variables that are concerned with infrastructure are analysed in order to understand the spatial variability of access to transport, potable water, and hydroelectric power for lighting including accessibility of routes within the settlements. The aspect of legality was also analysed and the result shows that there is a range of legality status in the settlements, depicting informality in a legality continuum. This has lead to different levels of sensitivity for eviction and redevelopment interventions. In general, significant spatial variability is observed not only at the settlement level but also within the informal settlements at cluster level. Such variability requires a combination of contextually feasible approaches, not kind of one size fits all approaches. According to Un-Habitat (2016, p.32), “Urban planners’ typical approaches to informal settlements affect informal settlements, either deliberately or not”. Thus, an in-depth understanding of the existing realities is imperative prior to intervention through updated & realistic urban information. Moreover, it is crucial to deploy, “new integrated and holistic planning and design strategies, tools and processes should be emplaced at national, regional and city level” in order to transform the city into inclusive, prosperous and sustainable city through collaboration of various stakeholders including the city residents who are the main beneficiaries.

As stated in (UN-Habitat, World Cities Report, 2016, p. 185), a “revived form of urban planning and design is a ‘development enabler’ that responds to the imperatives of urban expansion, extending across various scales of intervention, to manage ever expanding urban areas”. ♦

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## ANNEX

### SES\_EiABC Survey Protocol

1. Please check and confirm the existence of the sample compounds assigned for you.
  2. Please select one of the sample compounds assigned for you and check the number and tenure situation (owner or renter) of the household(s) in the compound.
  3. If you find only one household in the compound, please introduce yourself according to given Amharic "Introduction Note" and ask for the willingness of the household head to participate in the survey.
  4. If you find more than one household in the compound, please select first household found first as you count the houses counterclockwise (to the right) from the entrance (as you enter the compound); then, please introduce yourself according to given Amharic "Introduction Note" and ask for the willingness of the household head to participate in the survey.
  5. If the household head is willing to be interviewed, please proceed with the interview using the given structured questionnaire.
  6. If the household head is unavailable at the time of your visit, please try to find out the convenient time for him/her to be interviewed and proceed to the next compound assigned to you. Please make sure to go back to the skipped household at the agreed time to complete the survey.
  7. If the household head is still unavailable after your three visits, please inform the situation to your instructors as soon as possible
  8. The tenure condition of at least 20% of the households you interview must be either owners or renters.
-