# 4 ORIENTATION FOR SUSTAINABLE DEVELOPMENT OF THE ANCIENT QUARTER

## 4.1 Basic Orientation

## 1) Values of the Ancient Quarter and its Changes

The core value of the AQ from the international society and Vietnam perspectives is its historical and cultural heritage which has been sustained as a traditional commercial and residential area for more than 1000 years. For Hanoi City, the AQ is expected not only to preserve the core of history and tradition of Hanoi, but also to enhance its economic values as a Central Business District (CBD). While the French Quarter is expected to be a modern commercial and business center, the AQ has a role to develop small and various types of commercial activities which are rooted in tradition and culture. In addition, there is an excellent potential for tourism development. Furthermore, the AQ is an ancestral living place where residents call "a rural area in urban city", and they expect to stay for long.

Individual architecture (traditional houses, religious and historical sites, etc.) and historical townscape have been changed because of rampant and uncontrolled development activities, while these are designated to be preserved by the government. The tube house, which characterizes the AQ, has many difficulties for living such as degraded structure and sanitation, lack of privacy, worsened community, etc. because of the changes of resident status (from single to multiple households in one house), though many residents respect the traditional way of living and convenience of the AQ and they still prefer to stay in the AQ. While its role as a commercial center has still remained, most of traditional commercial activities like craft production have been lost. Intangible cultural heritages such as traditional festivals, entertainments, social network and relationship between rural areas only remain deep in memories of the original residents.

## 2) Necessity of Development for Preservation

Historically, traditional values had been inherited since these are essential for livelihood and commercial activities in the AQ. But at present, in the period of various lifestyles and commercial activities, the measures of preservation for individual elements are nothing but frozen assets of tangible cultural heritages. Under individual efforts for preservation, "the whole atmosphere of the AQ" cannot be preserved in future ages.

The AQ has a role as a center of history and culture for 1000 years, as well as a central business district which supports future growth and development of Hanoi City. It is necessary i) to preserve and revitalize traditional values of the AQ, ii) to sustain its livelihood and commercial activities and iii) to create new cultural and economic values.

To enhance the AQ's values in terms of cultural, social, economical, and physical aspects in a comprehensive manner, an integrated mechanism for preservation and development need to be established. This mechanism is not only aimed to preserve physical preservation of architecture and carry on traditional culture, but also to create new added-values while revitalizing existing stocks and to revolve these values into traditional preservation and physical improvement.

## 3) Vision and Basic Objectives

It is important to consider preservation and development of the AQ from viewpoints of not only economic aspects but also cultural, social and environmental aspects. In addition, to enhance the vitality of the AQ, a multiple urban function of traditional cultural heritage, residential, and commercial business is the advantage to contribute sustainable development of the AQ.

### Vision

AQ will enhance the identity and competitiveness as the most significant traditional commercial and living quarter enriched with exquisite blend of cultural, social, economic and living functions for the city as well as Vietnam.

## (1) Preservation/Enhancement of Culture

To preserve and enhance tangible and intangible cultural heritages and values which are shared among stakeholders.

## (2) Sustainable Economic Development

To further promote commercial and economic development in conformity with socio-cultural values of the AQ while strengthening competitiveness of existing traditional business.

## (3) Social and Living Environment Improvement

To improve living conditions, while strengthening community ties and social network as well as attending to the poverty effectively and building a new urban community.

## (4) Urban Planning and Urban Space Improvement

To establish overall urban design concept of the AQ and a workable mechanism to promote envisioned spatial and physical development of the blocks and streets in the AQ.

## (5) Institutional Mechanism Improvement and Management Capacity Development

To establish an effective operation and management system of the AQ, while roles are shared among all stakeholders.

## 4.2 Strategies and Actions

## 1) Preservation/Enhancement of Culture

## (1) Basic Orientation

Various types of intangible and tangible traditional values, which are rooted in living space, streets and scenery of daily life, strengthen the original characteristics of the AQ. Many residents respect these memories as traditional values need to be preserved, and wish to stay there and inherit them to the next generation. It is necessary to make efforts to preserve these traditional values before these will be lost because of changes of the times and generation.

## (2) Strategies

A1) Identify specifically and promote shared understanding of cultural resources and values of the AQ;

A2) Establish an effective mechanism of preserving cultural resources and values of the AQ;

A3) Create and dispatch new cultures and traditional values from the AQ.

## (3) Action Plans

Preservation and	Research and evaluation of history and current status of	
revitalization of traditional	traditional architecture	
livelihood and spaces	Preservation and renovation of facades of traditional architecture	
Preservation and Establishment of designation and financial support system		
development of traditional	traditional streets and crafts	
commercial activities	Effective use of preservation funds from revenues from tourism	
	sector	
Creation of new cultures	Multiple uses of traditional houses (rental space, commercial	
	space, hotel, museum, etc.)	
	Creation of new industry with tradition and culture (art, craft,	
	entertainment, etc.)	
Promotion of preservation	Promotion of community activities for cultural preservation	
activities	Renovation and revitalization of historical and cultural sites for	
	public use	
	Education and dissemination of local culture (voice transfer,	
	research, publication, etc.)	
	Promotion of cultural tourism programs (cultural discovering tour,	
	etc.)	
	Establishment of supporting system of preservation of traditional	
	architecture (subsidy, revolving from commercial use, etc.)	
	Establishment of traditional preservation fund	

## (4) Indicators

- No. of traditional houses: designated 850 houses in 1998 -> good condition 127, changed 577, renewed 146 in 2005 -> target 704 (good condition 127, renovation 577) in 2020
- (ii) No. of historical and cultural sites: accessible to public
- (iii) No. of traditional festival: revitalization by local community
- (iv) No. of designated traditional streets and crafts

### 2) Sustainable Economic Development

#### (1) Basic Orientation

The AQ has been developed as merchant guilds which were devoted to the Royal Citadel, and it is a commercial center of wholesale and retail which contribute to the economy of northern Vietnam as well as Hanoi City. There is a long history of unique streets. Traditional crafts and local industries of northern region are gathered into the AQ and merchants of same trades have clustered into the same streets under the competitiveness of quality and skills. Since consumers' needs have been diversified and the number of tourists has been increased, only traditional industries cannot contribute to strengthening competitiveness. Household businesses of wholesale and retail at home cause worsening living environment and narrowing living spaces. The core economic value of the AQ is a variety of commercial activities in small scale which are rooted in traditional values. These values can attract both residents and visitors if once traditional and modern business types are harmonized. It is necessary to establish the mechanism for revolving these economic values into socio-economic development and traditional preservation.

- Economic activities in the AQ shall contribute to creation of job opportunity, activation of local community network, improvement of environment and socio-economic development.
- (ii) Sustainable economic development mechanism shall be established based on traditional values and high development potentials, and in collaboration with public and private sectors as well as local communities.
- (iii) New business industries shall be based on traditional values with high added values in small spaces to enhance the uniqueness and charm of the AQ.
- (iv) Wholesale functions shall be modernized with new system of distribution and stock control to take full advantage of limited commercial spaces.
- (v) Local industries shall be promoted to preserve traditional industries and strengthen social network between rural areas.
- (vi) Financial revolving mechanism shall be established to promote investments from private and international sectors and to revolve development benefits for public services and preservation activities.
- (vii) Economic activities which cause environmental damages shall be prohibited or restricted.

#### (2) Strategies

- B1) Strengthen competitiveness of existing traditional businesses;
- B2) Create and promote new urban businesses;
- B3) Promote tourism by making use of the charm of AQ to further enhance its image.

## (3) Action Plans

Creation of commercial	Effective utilization of existing commercial spaces (stock
floor spaces	management, display arrangement, etc.)
	Utilization of traditional buildings for commercial purpose
Preservation and	Establishment of traditional commercial activities (subsidy,
development of traditional	designation of traditional industries, etc.)
industries	Promotion of production, exhibition and sales of traditional crafts
	Promotion of preservation and multiple utilization of Dong Xuan
	and Hang Da wholesale markets
Enhancement of	Improvement of service quality, management skills and
attractiveness of	competitiveness
household businesses	Promotion of business association set up (trading association,
	street association, etc.)
	Development of joint businesses and promotion events among
	business households in street level
	Establishment of boundary system for business associations
	Establishment of support system for traditional industries
Efficient exerction of	(exemption, designation by government, subsidy, etc.)
Efficient operation of	Improvement of the efficiency of distribution systems (joint
wholesale functions	delivery, time control for delivery cars, traffic management for
	delivery, etc.)
	Improvement of stock management system (construction of
	storage out of the AQ, construction of showrooms, etc.)
Creation of new industries	Provision of rental spaces for business
	Promotion of new businesses based on traditional industries
	(arts, crafts, foods, local industries, etc.)
	Attraction of new service industries with high-added values in
	small scale (IT, fashion, café, etc.)
Tourism development	Identification and preservation of tourism resources (traditional
	architecture, traditional industries, townscapes, intangible cultural
	heritages, etc.)
	Promotion of tour programs of the AQ
	Utilization of informal businesses for tourism (cyclos, vendors,
	etc.)
	Development of accommodations and improvement of services
	to meet international standards
	Development of food and café business and improvement of
	services to meet international standards
Contribution to social	Set up guidelines for commercial activities (construction,
environment improvement	business types, regulation of noise, wastewater and sanitation,
	usage of sidewalk, advertisement, etc.)
	Promotion of community businesses for job creation for local
	community and socio-economic activities (local tourist guides,
	interactive cultural tour with local residents, cooking classes for
	tourists, social welfare business, etc.)
	Implementation of campaign for improvement of sanitary
	condition of public spaces (etiquette training for garbage
	disposal, voluntary cleanup activities, etc.)
	Tax imposition (parking fees, souvenir, accommodation fee, tour,
	etc.) for social works
1	Establishment of the AQ Preservation Fund

Source: HAIDEP Study Team

#### (4) Indicators

- (i) Sales volume
- (ii) Sales of Dong Xuan Market: 8 mil VND in 2005

- (iii) Tax revenue: 212,453 mil VND (13.3mil US\$, 28.1% increase over the previous year's in 2004) -> 30% rate of increase per year
- (iv) Share of tax revenue by sector: commerce 75%, service 25%, tourism 5.5% in 2005
- (v) Commercial floor area
- (vi) No. of registered companies: 1,430 in 2006 ->
- (vii) No. of business households: 10,000 in 2006 ->
- (viii) No. of tourists
- (ix) No. of hotels and capacities
- (x) No. of designated traditional crafts, streets, industries
- (xi) No. of designated tourist guides

#### 3) Social and Living Environment Improvement

#### (1) Basic orientation

Infrastructure of traditional houses has been degraded because most of them are aged more than 30 years and the number of residents has tremendously increased. Some residents decided to move out from the AQ because of privacy and sanitation problems. It is a critical issue to improve living environment in a comprehensive way for inheriting a livable and cultural area.

- (i) Population shall be controlled to decrease overflowed high-density.
- (ii) Values of traditional lifestyles and customs shall be re-identified to promote local community network.
- (iii) Local residents shall participate in living environment improvement projects to motivate awareness and self-help efforts.
- (iv) Public services and infrastructures shall be improved to strengthen a competitiveness as a commercial and residential area.
- (v) Development projects shall be promoted in block and street levels.
- (vi) New business and service industries shall be revolved while preserving traditional industries to activate vital commercial atmosphere and strengthening international competitiveness.

#### (2) Strategies

C1) Strengthen community networks which are the core supporters of promoting the vision of AQ

C2) Preserve and expand traditional social network to strengthen linkages between AQ and outer areas.

C3) Improve living conditions and promote shift to new life style.

### (3) Action Plans

Renovation of existing	Securing living floor spaces	
houses	Increase of building storeys inside the block	
	Development of common spaces (inner courtyards, alleys, etc.)	
Establishment of support	Provision of consulting services and technical support for	
systems for housing	housing improvement (diagnosis by consultants, dispatch of	
improvement	experts, intervention in community for consensus building, etc.)	
	Securing finance for housing improvement (subsidy, fund, etc.)	
	Provision of consulting service for housing improvement by	
	experts or private sectors	
Supply of new housing	Supply of public housing for low income	
	Supply houses and apartments for rent	
Improvement of public	Improvement of quality of education and health facilities	
services and facilities	Provision of job opportunities for elders and retirement	
	Secure of open space for public	
Promotion of community	Promotion of community activities for cultural preservation	
activities	(inheritance of intangible cultures, festivals, etc.)	
	Promotion of community activities for social action works	
	(cleanup, security, traffic safety, etc.)	
	Promotion of community businesses	
	Support informal businesses (license system, site provision for	
	business, etc.)	

Source: HAIDEP Study Team

#### (4) Indicators

- (i) Nighttime population: 84,607 in 2003 -> 56,831 in 2020 (reduction of 32.8%)
- (ii) Daytime population: 96,516 in 2003 -> 112,109 in 2020, 16.2%
- (iii) Average living floor space: 44.0m2/HH in 2004 -> 50.0m2/HH in 2010
- (iv) Housing price
- (v) Land price
- (vi) Dissemination ratio of private toilet: about 50% in 2005 -> 100% in 2010
- (vii) No. of health facilities
- (viii) No. of educational facilities: elementary 9, secondary 2 in 2006
- (ix) Employment rate of elders (older than 60 years old): about 15% in 2004 -> 30% in 2010 -> 50% in 2020
- (x) No. of community groups

## 4) Urban Planning and Urban Space Improvement

#### (1) Basic Orientation

Traditional townscape in the past was the organized urban space with unified townscape of low-rise traditional houses and colonial architecture, non-motorized transport (NMT) based transportation system of tramway, cyclos and bicycles, organized commercial activities in sidewalks, etc. After Doi Moi policy, these traditional townscape and organized urban space has disappeared. The attractiveness of the urban space at present is the whole atmosphere with complexity, vitality and chaos. To create the attractive urban space with traditional atmosphere, preservation of traditional townscape and architecture is not the solution. After the construction of metro, pedestrian subway network will be developed and new spaces will be created underground for pedestrian to enjoy shopping and commuting. Comprehensive efforts need to be taken to create a pedestrian-friendly space, to enhance

the originality of streets and guilds, to promote attractive commercial activities, etc. It is necessary to establish the mechanism to harmonize new urban development schemes with traditional atmosphere.

- (i) Attractive townscape shall be preserved based on the original history and culture of each street.
- (ii) Townscape improvement in the street and living condition improvement inside the block shall be conducted in parallel.
- (iii) Benefits of preservation of townscape and traditional houses shall be contributed to local residents and public works.
- (iv) Regulation of setback shall be promoted for creation of unified townscape, environment improvement (noise and dust reduction), provision of sunlight, creation of attractive block inner space, etc.
- (v) Phased restriction of car and motorcycle entry to create a pedestrian-friendly space for living and commercial activities.
- (vi) New construction and renovation activities and urban development projects shall be strictly controlled and monitored to contribute to traditional value preservation, with participation of governments, private sectors as well as local communities.

## (2) Strategies

D1) Restructure and expand harmonized and charming urban space.

D2) Create attractive road space to strengthen street identity, while reducing traffic problems.

D3) Establish effective technical, institutional and organizational system for sustainable physical development of the AQ.

Improvement of	Preservation of façades of traditional architecture	
townscape	Control of new construction (design, height, material, etc.)	
	Building height control by setback system	
Institutional arrangement	Set up Urban Design Guideline of the AQ	
for townscape	Establishment of designation system for townscape preservation	
improvement	(historical district, traditional, cultural and historical architecture,	
	historical street trees, etc.)	
	Establishment of public involvement mechanism (participatory	
	survey and assessment on townscape, townscape competition,	
	etc.)	
Improvement of	Beautification of street space (improvement of garbage disposal	
pedestrian space and drainage, enhancement cleanup activities and etig		
	training, etc.)	
	Control of parking and commercial activities on sidewalks	
	Widening of sidewalks	
	Installation of street fixtures (bench, information board, etc.)	
Improvement of urban	Improvement of drainage and sewerage system	
infrastructure	Underground relocation of electronic wires	
	Establishment of sanitary improvement schemes for residents	
	(finance, technical support, etc.)	
Improvement of	Traffic volume control	
environmental conditions	Effluent control of noise, odor and dust from commercial activities	
	(production, restaurant, entertainment, etc.)	
Traffic management	Control traffic flow by one-way system	

## (3) Action Plans

PILOT PROJECT A: SUSTAINABLE DEVELOPMENT AND PRESERVATION OF THE ANCIENT QUARTER

	Restriction of car entry (registration system, entrance fee charge, etc.) Distribution control Designation of pedestrian streets
Traffic safety	Raising awareness of traffic safety (campaign, education etc.) Strengthen regulation of violation of traffic rules (signal, parking, one-way, etc.)
Improvement of parking condition	Construction of car and motorcycle parking area Promotion of motorcycle parking system on carriageway
Improvement of public transport	Operation of public mini buses Construction of underground and pedestrian subways

Source: HAIDEP Study Team

#### (4) Indicators

- (i) No. of renovated historical buildings
- (ii) Ratio of violations in height building restrictions (higher than 4th floor in front of street): 911 (18.3%) in 2006 -> none in 2020
- (iii) Capacity of car and motorcycle parking lots
- (iv) No. of permitted motorcycle parking carriageway: 13 streets in 2005
- (v) No. of permitted motorcycle parking sidewalk: 6 streets in 2005
- (vi) No. of prohibited motorcycle parking sidewalk: 18 streets in 2005

#### 5) Institutional Mechanism Improvement and Management Capacity Development

#### (1) Basic orientation

Since the AQ has various urban functions such as historical district, residential district, commercial district, and tourism district, it is necessary to develop comprehensive efforts with various stakeholders for its preservation and development. There are many stakeholders of public sectors in the central, local levels and private sectors of commerce, business, tourism, as well as individual investors and entrepreneurs, etc. Furthermore, many national and international experts and donors are interested in the traditional values and its preservation. To preserve the tradition, opinions and voices of local residents and business entities, which are the main actors of the AQ, need to be reflected to the projects and plans. The governments should initiate coordination mechanisms to discuss multiple issues with stakeholders and implement appropriate policies and plans. Private sector investment and financial and technical supports need to be effectively operated for implementation of various projects for sustainable development of the AQ. Local residents should be motivation to lead initiative efforts, while financial and technical supports will be provided from governments and experts.

#### (2) Strategies

E1) Establish effective operation and management system with clear role-sharing among all stakeholders, especially including community and private sectors.

E2) Establish sustainable financial mechanism for sustainable development and management of the AQ.

E3) Mobilize residents to develop community empowerment and raise awareness for preservation and improvement.

## (3) Action Plans

Promotion of traditional	Establishment of trading associations (guilds) of traditional
cultural preservation	industries
activities	Establishment of organization for preserving intangible cultural
	heritages
	Establishment of academic network of international and national
	experts and researchers
	Strengthening collaboration with old cities and towns around the
	world (technical support, joint project, dispatch experts, etc.)
Activation of community	Strengthening existing community for living condition
organizations	improvement
	Set up organization of business, residents, local governments in
	street and block unit for preservation of tradition and
	environmental improvement activities
	Establishment of town management organization by residents
Promotion of information	Establishment of the AQ information center (for tourist, academy,
storage and project	investors, etc.)
implementation	Promotion of joint research and study by professional
	researchers and donors
	Promotion of participatory survey and projects with local
	residents and governments
	Organization of seminars and events to share information among
	stakeholders
Establishment of legal	Establishment of micro finance system for living condition
and institutional	improvement, traditional preservation, business promotion, etc.
frameworks	for local residents and business entrepreneurs
	Establishment of the AQ Preservation Fund

## 4.3 Concept Plan of Block and Street Development

As proposed in Chapter 3, the block surrounded by streets and each street are the suitable units to consider urban redevelopment as well as preservation issues. Though its scale and status vary, local history and tradition are rooted in inside the block where original residents have lived from generation to generation, and in streets where traditional commercial and social values are represented.

## 1) Block Development Plan

In the block, the most critical issue for residents is worsening living condition, especially the appalling sanitary condition, limited living space, degraded structure, etc. Physical improvement should focus on improvement of sanitary condition and structure while creating additional floor space to expand floors inside the block. Since many residents live in the same buildings and share common facilities with neighbors, it is necessary to make a consensus on how to cooperate to improve living condition. At the same time, residents respect traditional way of living as well as traditional houses and historical sites. After revitalization of a community network, it is expected to accelerate self-help efforts among community to improve living condition and preservation of traditional values for next generation.

To improve physical condition, financial resources should be secured not only from residents and public sectors, but also from private sectors especially investors and business entities. For the redevelopment of the block, creation of enough commercial floor spaces to contribute to the budget for redevelopment project is essential.

It is necessary to develop urban blocks and buildings to improve living and infrastructure condition while preserving and renovating traditional and cultural spaces as well as original urban morphology.

Items	Objective Indicators	Subjective Indicators
Traditional Values	<ul> <li>No. of historical and cultural sites</li> <li>No. of ancient houses</li> <li>No. of tube houses</li> </ul>	<ul> <li>Maintenance condition of traditional sites</li> <li>Accessibility of traditional sites</li> </ul>
Building Condition	<ul> <li>Infrastructure condition</li> <li>Condition of common space and utilities</li> <li>Parking space</li> <li>Sunlight and ventilation</li> </ul>	<ul> <li>Safety of housing structure</li> <li>Sanitary condition</li> <li>Social relationship with neighbors</li> <li>Privacy protection</li> </ul>
Physical Condition of Block	<ul> <li>FAR</li> <li>BCR (% of open space)</li> <li>Ratio of violated height buildings</li> </ul>	Accessibility to houses
Commercial and Social Condition	<ul><li> Opportunities to do business</li><li> Business floor ratio</li></ul>	<ul> <li>Popularity among visitors</li> </ul>
Environment	Flood prevention	<ul><li>Noise condition</li><li>Air and odor condition</li></ul>

 Table 4.3.1
 Evaluation Indicators for the Block Development Plan

Source: HAIDEP Study Team

Note: FAR: Floor Area Ratio, BCR: Building Coverage Ratio

The planning approaches for the block development plan are proposed as below (see Figure 4.4.1):

## (1) Define Traditional and Cultural Spaces/Sites in Block

Religious sites (pagoda, temple, etc.), historical and cultural sites (traditional tube houses,

communal house, theater, etc.) are needed to be preserved as core values of the block. Public spaces are also essential spaces for community. These spaces and sites for preservation should be identified by local community.

## (2) Identify Potential Spaces to be Developed and Renovated

Common spaces and alleys, state-owned facilities as well as degraded buildings need to be developed or renovated.

## (3) Define Characteristics of the Block

Taking street identity and developed Street Plan into consideration, land-use zoning is planned, especially the usage of inner block of 1st floor to feature the characteristics of the block. It is necessary to define whether the plan is preservation-oriented or development-oriented.

## (4) Design the Block Redevelopment Plan

Based on these identified spaces, land-use zoning of the block is designed. In the block, development direction is categorized into "preservation", "renovation", "newly-built", and "open space". Common spaces (open space, alleys) and business spaces are being promoted for improvement of living quality and profitability. Priority space such as open space, business floor, living floor, architectural design including facade, height and floor plans need to be designed while being open to opinions from local community and private sector. Revolving financial plan need to be planned for utilization of profits from commercial activities, private sector involvement, financial sharing between residents and investors, etc.

## 2) Street Development Plan

Street of the AQ is the core value where various elements of both tangible and intangible are clustered. As already mentioned, traditional commercial activities are rooted in each street and merchants gathered to compete with each other while introducing its skills and knowledge from same rural areas. Up until a few years ago, we could find the original atmosphere with specialized commercial activities and traditional townscape and architecture when we walked around in the AQ. Nowadays, it is difficult for visitors as well as local people to discover its originality and characteristics of each street, since commercial activities have been modernized and traditional townscape have been changed.

To preserve tradition and revitalize originality of streets, it is necessary to start from identification of original values of tangible and intangible. Common understanding of the value and originality of each street will contribute to the improvement of street condition in terms of socio-economic, cultural and physical aspects. While many visitors and tourists seek for traditional atmosphere in the AQ, local people prefer modern economic activities. Any commercial and cultural activities need to be enhanced in small scale, diversified and contribute to preserve the values of the AQ.

Item	Objective Indicator	Subjective Indicator
Traditional Values	<ul> <li>No. of Historical and cultural sites</li> <li>No. of ancient houses</li> <li>No. of traditional business</li> </ul>	<ul> <li>Maintenance condition of historical and cultural sites</li> <li>Accessibility of traditional sites</li> <li>Potential of traditional business</li> </ul>
Walking Condition	<ul><li>Width of sidewalk</li><li>Traffic volume of cars</li><li>Traffic volume of motorcycles</li></ul>	<ul><li>Walking condition of sidewalks</li><li>Parking manners</li><li>Information provision</li></ul>
Townscape	<ul> <li>Ratio of violated height buildings (4F or more)</li> </ul>	<ul> <li>Continuity of building height</li> <li>Unity of colors of façade</li> <li>Unity and variety of façade design</li> </ul>
Commercial Activities	<ul> <li>No. of new business</li> <li>No. of tourist services</li> <li>No. of hotels</li> </ul>	<ul> <li>Competitiveness and popularity</li> <li>Popularity for foreign tourists</li> <li>Concentration of street vendors</li> </ul>
Environment	No. of street trees	<ul> <li>Noise and air condition</li> <li>Cleanliness of street</li> </ul>

## Table 4.3.2Evaluation Indicators for the Street Development Plan

Source: HAIDEP Study Team

The planning approaches for the street development plan are proposed as below (see Figure 4.3.1):

## (1) Categorize Street Types by Function

Street types are categorized into "Commercial", "Traditional", "Local industry and residential", and "Tourism".

## (2) Evaluate Characteristics with Indicators

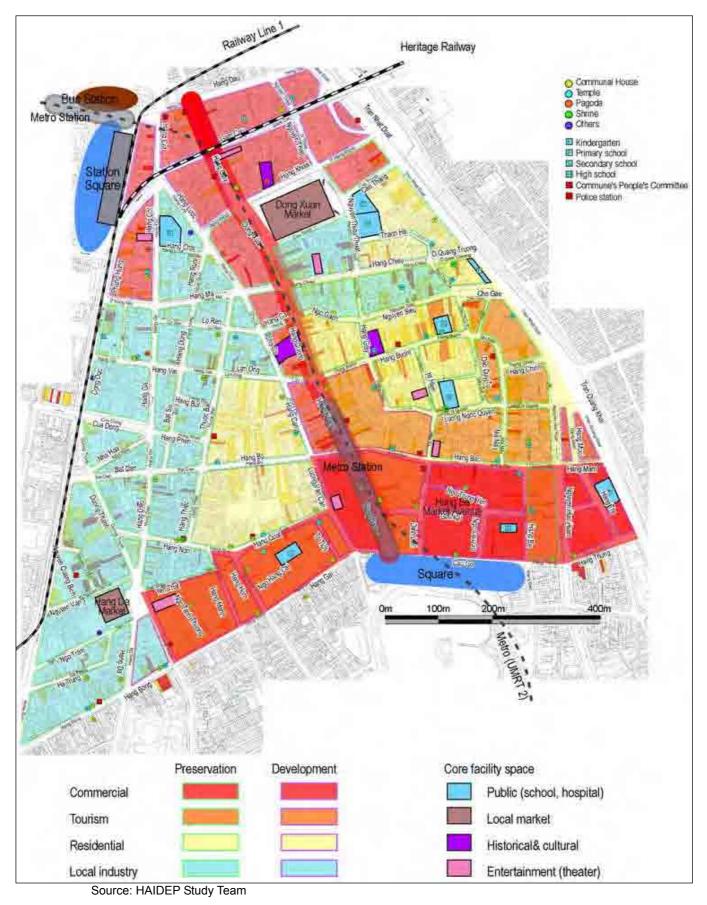
Potentials of street development need to be evaluated while taking into consideration indicators such as "Traditional values", "Walking condition", "Environment", "Townscape", and "Commercial space".

## (3) Develop Street Plan

While street network and structure (total width, etc.) cannot be changed by regulation, functions of street side need to be identified to strengthen the street identity based on historical background and current condition. Community participation is necessary to develop the Street Plan.

## (4) Define Priority for Preservation and Development

Several streets are prioritized for improvement. "Pedestrian Mall" is selected where visitors and tourists are clustered and street-width is narrow (less than 7.0m). "Historical Townscape Street" is selected where traditional commercial activities remain and historical sites and ancient houses are clustered. These streets create pedestrian networks to connect stations, historical sites and commercial areas to encourage people to enjoy walking.





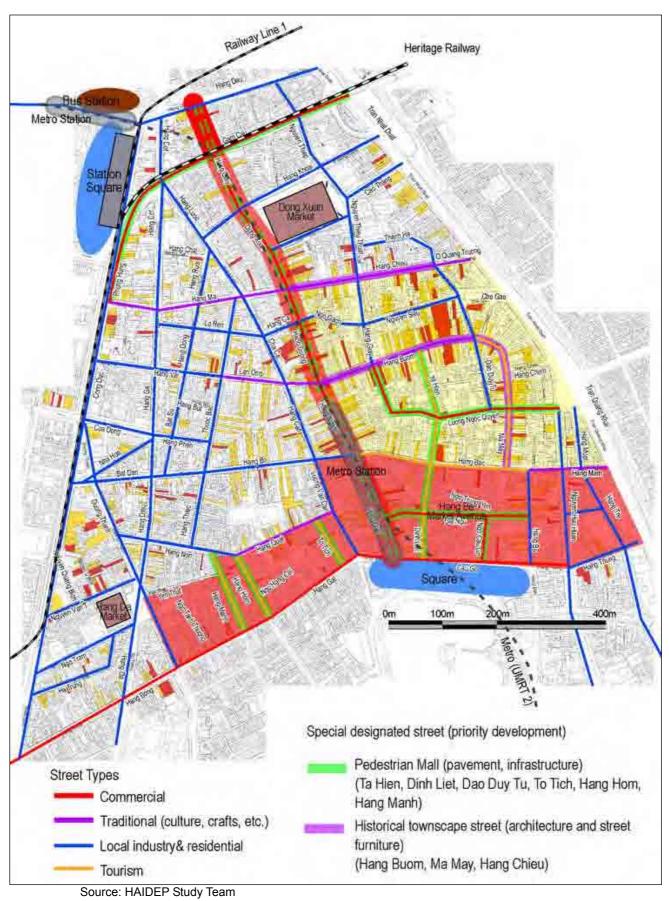


Figure 4.3.2 Proposed Street Development Plan of the AQ

## 4.4 Proposed Transportation Plan

Pressure of increasing traffic volume has many negative effects in terms of traffic safety, pedestrian condition, commercial activities and environmental impacts, etc. The size of the AQ is suitable for pedestrian to walk around (about 1km for whole length). The final goal is to create a pedestrian mall to get rid of motorcycles and cars except for registered vehicles (residents, delivery, etc.). To achieve this goal, the necessary actions for the first stage are: (i) management of parking, (ii) increase in designation of one-way streets as a system and (iii) enhancement of social awareness of traffic safety and driving manner.

The planning approaches for the transportation plan are proposed as below (see Figure 4.4.1):

## (1) Define Ring Roads of AQ

Create Ring Roads to exclude through-traffic and reduce traffic volume from AQ.

#### (2) Develop a Public Transportation Plan to Create Public Transport-Oriented Area

Access from metro stations, secure parking spaces along Ring Roads, operate shuttle bus to connect stations, parking and commercial area, change public bus routes from inside of AQ to Ring Roads.

#### (3) Develop A Priority Action Plan for Preservation of Historical Zone

Designate 1st Preservation Zone as a "Pedestrian Priority Zone", give priority for street improvement.

## (4) Enforce Transport Management Measures to Improve Accessibility, Convenience and Safety

Enforce one-way road system and no entry by time, designate motorcycle parking spaces on carriageway for residents and visitors.

## (5) Create Pedestrian Priority Streets to Enhance Commercial Activities

Designate some streets (narrow width and commercial-based) as "Pedestrian Mall" or "Pedestrian Priority Street" for visitors to create comfortable space for walking and shopping.





Source: HAIDEP Study Team

## 4.5 Proposed Business Model

## 1) Background

While the AQ is the trading and business center of Hanoi, generated benefits have not fully reflected improvement of infrastructure and public services. Though preservation of tangible values is the political issue of ministries and HPC, there are no specific support mechanism to preserve and renovate ancient houses and cultural sites.

Preservation and development of the AQ cannot be achieved by individual efforts, but need a dynamic mechanism to mobilize all related stakeholders and potential business opportunities and financial resources. In addition, a current constraint of the AQ is the lack of organizational network, coordination and financial resource.

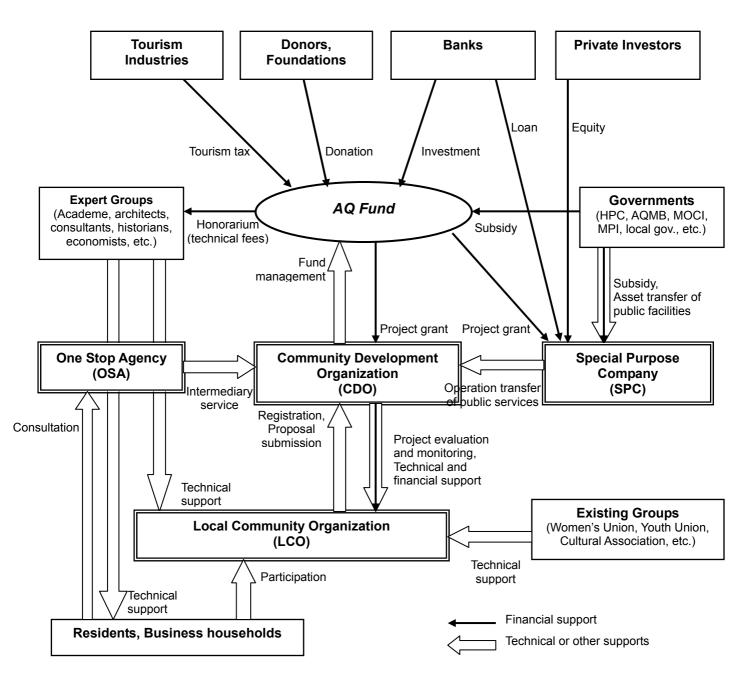
To establish a sustainable preservation and development mechanism of the AQ, it is significant to establish a proper business model which local resources and citizens are the main actors to implement actions and projects.

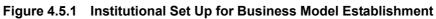
## 2) Objectives

The ultimate purpose of this proposed AQ business model is to generate social values as well as economic profits by way of activation of social, economical and cultural activities by local people. The maximum benefit shall be derived from urban development projects or tourism development. It is necessary to set up financial mechanism to revolve economical profits generated from any urban development projects and tourism industries of the AQ shall contribute to social improvement and community development.

Benefits of this model shall be generated from various aspects as follows

- (i) Economic Activation: Activate and revitalize local economy and create jobs
- (ii) **Social Contribution:** Contribute to improve local society and environment through solving local issues
- (iii) Cultural Preservation: Create new culture as well as preserving traditional culture
- (iv) **Community Empowerment:** Revitalize and recreate local communities while various stakeholders enjoy and offer services
- (v) **Value Improvement:** Whole value of the AQ is improved in balance with economic, social and cultural manner, while economic activation contributes to social improvement and cultural preservation
- (vi) **Sustainable partnership:** Businesses have been developed in sustainable way with participation from government, private sectors and local communities





## 3) Organizational Arrangements

The implementation mechanism for sustainable development of the AQ must be independent, which doesn't solely depend on external capitals and public undertaking. The independent business model to sustain this mechanism shall be composed of wide-ranging of funds, human resources and organizations.

The main components of the proposed business model are (i) AQ Fund, (ii) newly established organizations, (iii) financial support organizations, (iv) technical support organizations, and (v) beneficiaries (see Figure 4.1.1).

#### (a) AQ Fund

As the main engine of this business model, the "Ancient Quarter Fund" shall be established. This fund will be used for any projects and activities which aim to improve social, physical, cultural environments of the AQ. The financial resources of this fund are (i) subsidy from governments, (ii) donation from donors and foundations, (iii) investments from banks, and (iv) special tourism tax from tourism industries (tourism agencies, hotels, souvenir shops, contribution from tourists, etc.).

This fund is used mainly as follows;

- (i) project grants for urban development and physical environment improvement projects managed by Special Purpose Company (SPC)
- (ii) project grants for social, cultural and economical activities proposed by Local Community Based Organization (LCO) and approved by Community Development Organization (CDO)
- (iii) micro finances for supporting individual households and business households with small amount of budget

#### (b) Newly established organizations

As the main implementation bodies of the business model, four (4) organizations shall be newly established.

**Community Development Organization (CDO):** The CDO is the town management organization to promote and manage activities of LCOs. The members will be leaders of business groups and local organizations, local governments, experts of town management. This organization will be operated by financial resources such as administrative cost from governments' subsidy, project grants from AQ Fund, registry fees from LCOs. The main activities of the CDO are as follows;

- (i) Coordination and operation of social, cultural, economic activities conducted by LCOs
- (ii) Management of community facilities which are transferred by SPC or local governments (ancient houses, community centers, etc.)
- (iii) Operation of micro finance
- (iv) Provision of technical supports and advices to LCOs

The CDO will manage public facilities for community service, so it can make profits from revenues from fare-paying services at public facilities, rental fees of public spaces. These profits will not be distributed to the members, but used for operation of the CDO.

**One Stop Agency (OSA):** The OSA is a window organization for consultation, information, coordination for anybody like citizens, private sectors, tourists, who need any services related to the AQ. The OSA will have an office inside of an information center of the AQ (for example, the AQMB office of 38 Hang Dao, the renovated ancient house of 87 Ma May, etc.). The staffs are composed of full-time administrative staffs and voluntary residents, and business consultants and urban planners as a part-time. The main activities of the OSA are as follows;

- (i) Provision of business development service (BDS)
- (ii) Coordination with expert groups and governments
- (iii) Collection and distribution of information (culture, tourism, transport, etc.)
- (iv) Consultation and provision of necessary services (renovation of houses, sanitary improvement, preservation of façade, etc.)
- (v) Coordination and intermediary service among expert groups, governments, private sectors, financial agencies, etc.
- (vi) Carry out for administrative procedures (registration of company, sales of houses, etc.)

Most of the services of the OSA are charge-free, especially information distribution and intermediary service for local residents. But some special services can be charged such as consultation fees by experts, representative services of administrative procedures, etc. In addition, it sells some products like maps, books, crafts, which are produced by LCOs. These charges for paid services are the main profits of the OSA.

**Special Purpose Company (SPC):** The SPC is a project company to implement and manage urban development projects, such as housing development, renovation of public facilities, etc. Since the political orientation of the AQ is more focusing on preservation rather than development, any development activities including physical improvements in the AQ need much budgets, technical assistance, administrative procedure, coordination and consensus building among stakeholders. For smooth implementation of each development project, it is effective to establish the limited SPC. The staffs are private estate agents, developers, etc. The main activities of the SPC are as follows;

- (i) Project management of area redevelopment, construction of public facilities, etc.
- (ii) Coordination with governments, investors and developers
- (iii) Community planning and coordination with residents
- (iv) Cash flow and fund management

To diversify business risks, the SPC subcontracts a property management company for leasing and sales of floors, collecting rent, tenant management, etc.

The projects will be financed (i) equity from the investor, (ii) loan from the bank, (iii) subsidy from governments if necessary. The revenues are mainly sales and rent revenues of floors and used for debt repayment for the first several years.

Local Community Organization (LCO): The LCO is a voluntary organization by local residents to promote social and cultural activities, community businesses, public services, etc. It is organized aimed to conduct any types of local activities to contribute to

socio-economic development and preservation of culture for the AQ. The main activities of the SPC are as follows;

- (i) social activities (cleanup and beautification of street, operation of food security, etc.)
- (ii) cultural activities (cultural festivals and events, oral tradition, renovation of religious sites, etc.)
- (iii) economic activities (tourist guide, sales of AQ brand products, etc.)

Local residents (elderly, retired, jobless, etc.), or community groups of street, trade, craft, food, religion, etc. will initiate these local activities. Some of these activities will be conducted as voluntary acts, while others will be profitable to provide paid-services for tourists, elderly, etc.

## 4) Principles of Business

Various commercial activities with tradition and modern flavor strengthen diversity and vitality of the AQ. Distinctive and original businesses will be welcomed because people like to discover new values as well as traditional one. Commercial and business activities in large scale, which may absorb customers from individual businesses, should be restricted to preserve individual businesses will be promoted further.

Basic principles to develop individual businesses including household business are proposed as follows;

- (i) Space-saving, high added-value, traditional value-basis, service-oriented
- (ii) Managed with small infrastructure and investment
- (iii) Contribute to social development and cultural preservation
- (iv) Obtain participation of local residents to provide local-based services
- (v) Pull in more customers from outside (investors, tourists, etc.)
- (vi) Win acceptance from residents and harmonize with local communities
- (vii) Have no negative social and environmental impacts
- (viii) Formulate new culture and contribute to improve cultural level of AQ
- (ix) Obtain institutional supports from governments, and technical and financial supports from outside organizations

Tangible and intangible local resources such as traditional tube houses, crafts, local food, knowledge of local residents, traditional festivals, etc. have potentials to develop business models. While new business types such as fashion, IT, etc. can attract domestic customers, many foreign tourists prefer any services and commodities with local and traditional flavor. This is an advantage for the AQ to preserve traditional values for socio-economic development.

Based on these principles, some examples of recommended business models are summarized in Table 4.5.2.

	•	
Guide tour by residents	Rest station with tea service	Local information map
Original street bland goods	Traditional craft gallery	Street festival with open café
Experimental renovation	Light up festival with lantern	Ecture about tradition and
houses by volunteer, students		culture by residents
Excursion tour to traditional houses and alleys	Rental room service of renovated tube houses	Cafe in renovated tube house
Source: Various sources		

## Table 4.5.1 Examples of Recommended Business Models

Source: Various sources

## 4.6 Proposed Urban Design Guideline

So far, guiding principle for urban design and building control is the temporary regulation in 1998. There is however a lack of detailed technical guide with incentives to follow as well as penalties of violation. The objectives of the regulation are not clear enough to follow. So the compliance of the regulation only relies on voluntary contribution and self-action.

To improve urban design of the AQ, it is necessary not only to reinforce the regulations but also to raise awareness on improvement of urban design in terms of preservation of traditional values of the AQ.

In this pilot project, the concept of "urban design" is included not only as physical aspects but also intangible elements, since the traditional values are consisted of both of them.

The concepts of urban design of the AQ are defined;

- (i) Preserve and create attractiveness and beauty of townscape and streetscape in harmony with traditional and new values.
- (ii) Create spaces that give priority to pedestrian.
- (iii) Enhance streets' identity by keeping unique housing typologies, architectural styles and encourage traditional business and production of goods typical of the identity of the place.
- (iv) Preserve religious historical buildings and ancient houses which have architectural values.

While we need to preserve the whole atmosphere of the AQ as the core value, it is necessary to preserve and renovate townscape as physical elements of urban design. The guideline of townscape is proposed as follows:

		g s neight
General	Building height shall be controlled in terms of pre- increase of floor area, and provision of sunlight a	
Current Policy		I to height of 12m, and roofed
Proposed Guideline	<ul> <li>To preserve the streetscape and unify the heig structures along the streets should not exceed of mezzanine in the ground floor).</li> <li>To create the floor area, buildings inside the bl line from the street. Maximum height of buildin</li> <li>Height of structures and houses that are next the religious sites should be taken into careful com</li> <li>Height of ground floor: 3.3 – 3.6m and first and</li> </ul>	ght of buildings, building I 3 story or H=12m (exclusive lock should below the vision ngs are 7 story or H=28m. to historical, cultural and nsideration.
Example	<setback block="" in="" the=""></setback>	MĂT CÂT NHA 1 BUILDING I SECTION

Table 4.6.1Guideline for Building's Height

General	Ancient houses shall be preserved as one of the core values of the AQ. Since most of ancient houses have been degraded, financial and technical supports shall be provided. Academic researches shall be promoted to identify valuable architecture and traditional	
Current Policy	<ul> <li>lifestyles.</li> <li>Grades of preservation of structures that have architectural values</li> <li>Preservation and renovation of original form</li> <li>Preservation and renovation of façade</li> <li>AQMB has specific regulations on each of the above grades</li> <li>Maximum restrictions on new construction and extension</li> <li>In the cases of new construction, it is necessary to consult AQMB and seek approval from the Municipal Architecture Planning Council to ensure the original architecture of the structure.</li> </ul>	
Proposed Guideline	<ul> <li>To preserve ancient houses in terms of scholarly approach, update the list of ancient houses that need original preservation and renovation of whole structure or facades and conduct further research.</li> <li>To preserve ancient houses in terms of townscape preservation, ancient houses that need preservation and renovation of façade, it is necessary to maintain the original façade, especially the decorative patterns in windows, main doors and eaves, during renovation.</li> <li>To retain continuity in streetscape, houses that are next to each other and have the same height and architecture shall maintain their original height, architecture and façade.</li> <li>New construction or extension of ancient houses in the original preservation list is prohibited.</li> <li>Traditional lifestyles shall be preserved or recognized while preserving structure of ancient houses.</li> <li>If ancient houses are degraded and minimum amounts of repair and renovation are required for living condition improvement, experts and AQMB shall provide technical consultation service.</li> </ul>	
Example	<facade ancient="" house="" improvement="" of=""></facade>	

### Table 4.6.2Guideline for Preservation of Ancient Houses

General	Façade of buildings is the main element to form image of street. Either unification of façade or mixture of various façade types to enhance the appeal of originality of
	streetscape.
Current Policy	<ul> <li>Architecture of the structures that are renovated or rebuilt should apply the architectural aspects of the existing structures in the area.</li> <li>Reinforced concrete roofs should not be used.</li> <li>Large sheets made of aluminum and glass should not be used on the facade of houses contiguous to the street.</li> <li>Pulling steel doors or rolling aluminum doors should not be used.</li> <li>Traditional materials are encouraged to be used in the facade.</li> <li>Structures contiguous to the street must comply with existing regulation on property line.</li> </ul>
Proposed Guideline	<ul> <li>Facade architecture of renovated or newly built structures should exploit architectural aspects of the existing structures in the area.</li> <li>Imitation of traditional architecture which is harmonious with the surroundings should be encouraged.</li> <li>Corrugated iron, fibro-cement cover-sheets and plastic slates should not be used.</li> <li>Large sheets of aluminum and glass should not be used in façade of building contiguous to the street.</li> <li>Use of wooden panel doors, shutter doors in stead of pulling steel or rolling aluminum doors.</li> <li>Form of balcony, porch roof, lean-to roof must be suitable to the general architecture of the structure.</li> <li>Houses which have balconies, porch roofs renovated improperly should be restored to the original architecture.</li> <li>Construction of houses contiguous to the streets should comply with the existing property line.</li> <li>Street trees shall be preserved as one of the elements of façade.</li> </ul>
Example	<ul> <li>Unification of façade of buildings&gt;</li> </ul>

#### Table 4.6.3Guideline for Preservation of Facades

General	Façade of buildings is the main element to form image of street. Either unification of façade or mixture of various façade types to enhance the appeal of originality of streetscape.
Current Policy	<ul> <li>Light colors are recommended instead of dark colors on brick walls.</li> <li>Roofs should be sloping and covered with traditional tiles.</li> <li>Wooden materials, paddles, pillars, doors, windows, shutters, etc. should be painted brown or light blue or green.</li> <li>Banisters on balcony should have the same color with that of doors.</li> <li>Materials, colors and cover layer materials are prohibited; (i) dark color glass, (ii) aluminum-framed doors, (iii) light-reflecting glass, (iv) reinforced concrete sheets, (v) dark color ceramic tiles, (vi) shining plastic or metal sheets, and (vii) enameled tiles.</li> </ul>
Proposed Guideline	<ul> <li>Walls shall be built by brick or be wooden and glass wattle.</li> <li>The color of walls with bricks, mortar and covered with cover layer materials shall be harmonious with the surroundings (yellow or yellow brown is recommended).</li> <li>Dark color paints are not recommended.</li> <li>Sloping concrete roof structure covered with tiles or wooden/steel roof structure covered with traditional tiles.</li> <li>Wooden materials, paddles, pillars, doors, windows, shutters, etc. should be painted brown or light blue or green.</li> <li>Banisters on balcony could be made of wood or steel with appropriate decorative patterns. Steel flower patterns can be copied from those of colonial architecture or oriental architecture.</li> </ul>
Example	<door and="" design="" material="" traditional="" with="" wooden=""></door>

## Table 4.6.4 Guideline for Materials of Buildings

General maintenance are recommended to create traditional atmosphere.		
Current Policy       - Width of street < 6m: maximum rising height=0m - Width of street: 6 - 12m: maximum rising height=1.2m - Width of street: 12 - 16m: maximum rising height=1.2m         - Width of street: 12 - 16m: maximum rising height=1.4m         - Overhangs of houses are based on the height of sidewalk bed and with of street but should not exceed 1.2 meter.         - Overhangs of houses should be identical in the street.         - Width of street: 6 - 12m: maximum rising height: 0m - Width of street > 6m - maximum rising height: 0.9m - Width of street > 12m: maximum rising height: 1.2m         Proposed Guideline       • Overhangs of pource roofs, pent-roofs must be identical in the street. The maximum overhang of pent-roofs is 2.8 meters.         • Color, size, slope of pent-roofs shall be suitable and harmonious with the surroundings in the street.         • Movable parts must be 2.4 m high from the side walk bed.         • Pent-roofs with light elegant colors with yellow and brown stripes are recommended.         • Dazzling colors like red, orange, etc. are not recommended due to the contrast with very hot summer weather. <b>Cunification of pent roofs in Hang Buom&gt; Cunified building colors in Hang Dao</b> > <b>Framole</b>	General	Materials of buildings affect on the townscape. Traditional materials with proper maintenance are recommended to create traditional atmosphere.
Proposed Guideline       should not exceed 1.2 meter.         Proposed Guideline       • Width of street < 6m – maximum rising height: 0.9m • Width of street > 12m: maximum rising height: 1.2m • Height of other parts: Balconies, leaning roofs are higher than 3m • Overhangs of porch roofs, pent-roofs must be identical in the street. The maximum overhang of pent-roofs is 2.8 meters.         • Color, size, slope of pent-roofs shall be suitable and harmonious with the surroundings in the street.         • Movable parts must be 2.4 m high from the side walk bed.         • Pent-roofs like red, orange, etc. are not recommended due to the contrast with very hot summer weather.          • Unification of pent roofs in Hang Buom>          • Unified building colors in Hang Dao>		<ul> <li>Width of street &lt; 6m: maximum rising height=0m</li> <li>Width of street: 6 - 12m: maximum rising height=0.9m</li> <li>Width of street: 12 - 16m: maximum rising height=1.2m</li> </ul>
Example		<ul> <li>should not exceed 1.2 meter.</li> <li>Overhangs of houses should be identical in the street. <ul> <li>Width of street &lt; 6m – maximum rising height: 0m</li> <li>Width of street &gt; 12m: maximum rising height: 0.9m</li> <li>Width of street &gt; 12m: maximum rising height: 1.2m</li> </ul> </li> <li>Height of other parts: Balconies, leaning roofs are higher than 3m</li> <li>Overhangs of porch roofs, pent-roofs must be identical in the street. The maximum overhang of pent-roofs is 2.8 meters.</li> <li>Color, size, slope of pent-roofs shall be suitable and harmonious with the surroundings in the street.</li> <li>Movable parts must be 2.4 m high from the side walk bed.</li> <li>Pent-roofs with light elegant colors with yellow and brown stripes are recommended.</li> <li>Dazzling colors like red, orange, etc. are not recommended due to the contrast with</li> </ul>
	Example	

 Table 4.6.5
 Guideline for Materials and Colors of Buildings

General Ur General of co ne	dvertisement boards are the present negative elements of townscape. nification of size, design and colors shall create sophisticated image in terms f streetscape and commercial activities. Agreement among business entities to ontrol advertisement boards and other promotion measures at street level are ecessary. Advertisement boards and panels which are smaller than 15m2 and placed at production, business and service establishments and restaurants must
•	at production, business and service establishments and restaurants must
Policy •	<ul> <li>comply with the following regulations.</li> <li>Advertisement boards and panels must not encroach public space. Their maximum width must be half of their length.</li> <li>Advertisement boards for a particular product or service must not be used for another.</li> <li>Advertisement boards and panels must be 10cm far from the signboards and not made of corrugated iron.</li> </ul>
Proposed Guideline • •	<ul> <li>Advertisement boards and panels which is smaller than 15m2 and placed at production, business and service establishments and restaurants shall comply with the following regulations: (i) Advertisement boards and panels must not encroach public space. Their maximum width is 60cm. (ii) Advertisement boards for a particular product or service must not be used for another.</li> <li>Boards and panels must be 10cm far from the signboards and made of wood or plastic covered with paint.</li> <li>Corrugated iron is not recommended for advertisement boards.</li> <li>Advertisement boards must be well designed and suitable to street architecture and street identity.</li> <li>Light-reflecting colors are not recommended for advertisement boards.</li> <li>The location of advertisement boards must be considered so as not to affect the townscape, especially in cultural and religious sites.</li> <li>To attract foreigners, advertisement with bilingual explanations shall be promoted for tourism development.</li> </ul>
Example	Unification of advertisement boards>

#### Table 4.6.6Guideline for Advertisement Boards

General	Signboards shall be installed at proper locations to provide information clearly, without negative effects on streetscape.
Current Policy	<ul> <li>Signboards must be well-designed and made of wood or plywood.</li> <li>Canvas is not recommended.</li> <li>The content on the signboard must be clear and understandable.</li> <li>Light colors or light-reflecting colors are not recommended for signboards.</li> <li>Floodlight for signboards must be properly installed.</li> <li>In the case of using foreign languages, they must be smaller than and below the Vietnamese text.</li> </ul>
Proposed Guideline	<ul> <li>Size of signboards must be identical.</li> <li>If the signboard is installed horizontally, its width must be 50cm.</li> <li>If the signboard is installed vertically, it must be 1.2m in length and 50cm in width.</li> <li>The location of signboards must not block the façade of the house or affect the townscape.</li> <li>The content on the signboard must be clear and understandable</li> <li>Vietnamese content on signboard must be legible and in proper font.</li> <li>In the case of using foreign languages, they must be smaller than and below the Vietnamese text.</li> </ul>

### Table 4.6.7Guideline for Signboards

Source: HAIDEP Study Team

Table 4.6.8 Guideline for Sanitary Condit
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General	To improve sanitary condition in public space, raising residents' awareness of cleanliness and beautification is essential. Clean condition can contribute to good health of residents and can attract more tourists.
Current Policy	<ul> <li>Production establishments which potentially pollute the environment must be removed out of the area.</li> <li>Traditional handicraft production in houses is encouraged, but must comply with protection regulations on environment.</li> <li>During construction and renovation process, safety and sanitation measure must be exerted.</li> </ul>
Proposed Guideline	<ul> <li>Production establishments which potentially pollute the environment (discharging poisonous gas, solid disposals, untreated water, noise, and dust or flammable) shall be removed out of the area.</li> <li>Traditional handicraft production in households which does not affect the environment is encouraged.</li> <li>During construction and renovation process, safety and sanitation measure must be exerted.</li> <li>Disposal of garbage out on the street is prohibited.</li> <li>Households which are contiguous to the street are responsible for sanitation issues in front of their houses.</li> <li>Social rules of garbage disposal among community and business entities shall be promoted.</li> <li>Installation of garbage bin shall be promoted.</li> </ul>
Example	<installation bins="" garbage="" of="" on="" sidewalk="" the=""></installation>

General	Urban facilities such as electric wires are negative elements of townscape. Overhanging wires and tangled wires with trees are dangerous for pedestrian. In terms of improvement of townscape and safe condition for pedestrian, these facilities shall be installed properly.
Current Policy	<ul> <li>Locations of telecommunication equipment, antennas, water tanks on roof, water supply and sewerage pipes, air-conditioners, and ventilators are as follows: <ul> <li>Behind balconies so as not to be seen from the street</li> <li>Behind the house</li> <li>On the rear roof or behind another structure that ensure that cannot be seen from the street</li> <li>In the inner yard but should not affect the next door.</li> <li>Water drain pipes from air-conditioners must not lead directly to the street.</li> </ul> </li> </ul>
Proposed Guideline	<ul> <li>Locations of telecommunication equipment, antennas, water tanks on roof, water supply and sewerage pipes, air-conditioners, and ventilators are as follows: <ul> <li>Behind balconies so as not to be seen from the street.</li> <li>Behind the house</li> <li>On the rear roof or behind another structure that ensure that cannot be seen from the street.</li> <li>In the inner yard but should not affect the next door.</li> <li>Water drain pipes from air-conditioners must not lead directly to the street.</li> <li>Waste water pipes from roofs must be attached to the wall or go inside the wall, leading to the public wastewater sewerage system.</li> </ul> </li> </ul>
Example	<designed and="" electric="" generator="" streetlights="" underground=""></designed>

 Table 4.6.9
 Guideline for Telecom, Media Equipment's Location

	For improvement of townscape and safe condition for pedestrian, urban utilities such as
General	electric wires, which deteriorated streetscape and safety for pedestrians, shall be installed properly.
Current Policy	<ul> <li>Sidewalk and carriageway belong to the common traffic system which needs consistent management from the municipal authorities.</li> <li>Sidewalk and carriageway must not be used for displaying and selling of goods or as storage of materials and disposals.</li> <li>Sidewalk is only used for pedestrians; displaying and selling goods or placing advertisement boards or other purposes on sidewalk are prohibited.</li> <li>Lowering sidewalk for the purpose of wheeling motorcycles is prohibited.</li> </ul>
Proposed Guideline	<ul> <li>Quality of sidewalk</li> <li>Re-pavement of sidewalk without permission from competent agencies shall be prohibited.</li> <li>Materials used for sidewalk must be hard enough, not slippery, have simple patterns, and are permitted by the AQMB.</li> <li>Different grade between pavement and the surface of the road shall be suitable to the traffic situation of the street.</li> <li>One slope connecting street surface and sidewalk for every 40m must be provided for disabled people.</li> <li>Culvert covers must not impede pedestrians.</li> <li>Sidewalk utilization</li> <li>Sidewalk and carriageway belong to the common traffic system which needs consistent management from the municipal authorities.</li> <li>Sidewalk is for pedestrians.</li> <li>Encroachment of sidewalk or individual utilization is prohibited.</li> <li>Planting, installation of public facilities, instruction boards, light posts, post offices need specific consideration.</li> <li>In some commercial streets, displaying and selling goods on sidewalks may be allowed during a certain time period, while still ensuring space for pedestrians.</li> <li>In so many narrow streets like Ta Hien, Dong Thai, Hang Giay (in Hang Buom commune), sidewalk and carriageway may be at the same grade and separated by a white line.</li> </ul>
Example	<designed and="" culvert="" pavement=""></designed>

## Table 4.6.10Guideline for Use of Sidewalk and Carriageway

General	Urban public facilities on sidewalks shall enhance attractiveness for pedestrian to walk and rest. Design of street fixtures and their appropriate installation in consideration with commercial activities and traffic volumes, and proper maintenance are important for installation of street fixtures.
Proposed Guideline	<ul> <li>Style and installation of light posts should be permitted by AQMB.</li> <li>Style and locations of public garbage bins in every street must be taken into careful consideration so as not to affect the townscape.</li> <li>Installation of signboard, instruction boards should be permitted by the Department of Culture and Information and AQMB in terms of contents.</li> <li>Their location and size must be appropriate and pedestrian-friendly.</li> <li>Style and location of public post offices must be carefully considered and pedestrian friendly.</li> </ul>
Example	<ul> <li>Unification with designed streetlight&gt;</li> <li>Image: Constraint of the streetlight of the</li></ul>

### Table 4.6.11Guideline for Street Fixtures

## 4.7 **Proposed Institutional Mechanism and Implementation Measures**

While the Ancient Quarter is the center core of Hanoi City as well as Vietnam, there are few policies and support mechanisms for preservation and development. The Ancient Quarter Management Board is the special agency mandated to manage the AQ, but it is mainly in charge with the physical aspects, especially for preservation of architecture.

Roles and responsibility of public sector is to improve social and physical conditions equally, while private sector can invest for economic development for their benefits. For sustainable development of the AQ, residents should be the priority beneficiaries since they are the main actors to preserve traditional values and sustain their traditional livelihood.

The necessary organization to be set up is proposed in Figure 4.8.1.

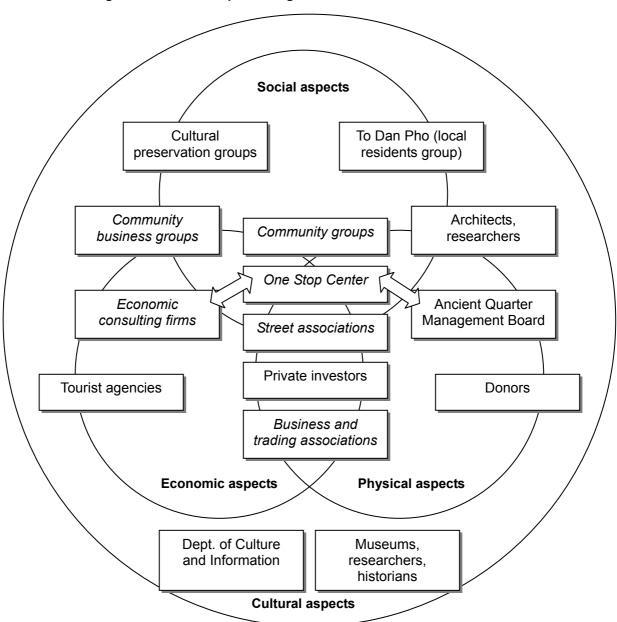


Figure 4.7.1 Proposed Organization Framework for the AQ

Source: HAIDEP Study Team

Note: Organization in Italics is proposed for new establishment

## (1) Establishment of the One Stop Center

It aims to put together all the functions into one organization, since complicated institutional mechanism is a constraint to information access and implementation of projects. The function of this center is (i) to introduce proper institutions, (ii) collect and provide timely information and (iii) coordinate with related agencies. The contents of service are of both public and private sectors. For example, residents can consult with this center if they have any problems of damaged housing structure and need support for improvement; or private investors who seek for adequate land and floor for starting business can access this center to receive introduction of real estate agents and business consulting firms, etc. Staffs of the center will not be experts but coordinators, consultants or experienced residents.

## (2) Promotion of Community Organization Setup

Local residents have shown their willingness to and recognize the potentials for preservation and development of the AQ. Since the retired and elderly are willing to contribute to support any activities related to the AQ, and with them being more familiar with AQ, it is necessary to set up community organization which are recognized by local governments and other stakeholders to maximize their potentials and willingness and to strengthen social networks. If these organizations will be provided necessary external financial and technical supports, they can act as project implementation bodies with a group of experts.

## (3) Promotion of Business Association Setup

Business associations of the AQ existed as traditional trading guilds in ancient days. Since traditional trading culture are rooted in same trading activities in each street, some organizations of street or same trading as units will be established to enhance economic activities and improve street conditions. If individual business entities will pay membership fees, this association can conduct joint events for sales, improve physical conditions of streets, etc. These joint activities will enhance the social and economic values of their businesses and streets.

## (4) Promotion of Community Businesses

Though the definition of community business is not clearly defined, that of the AQ refers to the economic activities which contribute to social improvement, cultural preservation and community empowerment, and mainly conducted by local residents. Worth noting is that residents can get financial benefits from these businesses. For example, a guide tour by local residents is not professional in terms of service level; but participants can get more local information and enjoy communication with local people. If the government secures a commercial space for community business, community groups will lease the space at a reasonable price and do their original business like entrepreneurship1 such as selling traditional crafts, exhibition of ancient photos, opining a café, serving local foods and drinks, etc.

## (5) Holding Cultural Events and Festivals

There are many cultural and historical sites which are degraded and ignored by residents now. To restore these sites, it is necessary not only to renovate them physically but also to

<sup>&</sup>lt;sup>1</sup> In Japan, these business services are called "Challenge Shop", and local governments often provide spaces for entrepreneurs with low rental fee.

revitalize intangible traditional and cultural activities. The revitalization of these sites and events can contribute to enhance attractiveness and charm of the AQ and to strengthen local community.

## (6) Holding Seminars and Meetings for Donors and Researchers

Though there were many studies and projects done already in the past, there are no accumulated information, database and proposals. Support activities by donors and researchers are rather spontaneous because of limited access to information. To coordinate these agencies and share information, seminars and meetings about the AQ shall be organized regularly by different issues in terms of history, culture, architecture, economy, etc. The joint studies among other ancient towns in other countries will contribute to learn the know-how and experiences of preservation and development.

#### (7) Establishment of Micro Finance System for Residents and Business Households

Since the AQ is the clustered area of households and business in small-scale, investment and capital in large scale is not necessary. Micro- finance system which can spread to these units widely and equally is effective to improve living condition and commercial development. This system will be managed by local government (commune PC) or banks.

#### (8) Establishment of the Ancient Quarter Preservation Fund

To preserve traditional values in physical and intangible manner, a certain amount of budget is necessary since there are more than 100 religious sites, 70 streets and blocks and 200 ancient houses that need to be preserved. Establishment of this fund is rather inappropriate and much big scale than micro finance which mainly supports individual households and business entities. The financial resources of this fund are mainly from donors, private sectors, tax income, and revenues from economic activities especially tourism sectors, etc. This fund may even be designed to be the source for micro finance since this needs to revolve and aims to contribute to the preservation of traditional values of the AQ as well as physical improvement.

# 4.8 **Proposed Institutional Mechanism and Implementation Measures**

While the Ancient Quarter is the center core of Hanoi City as well as Vietnam, there are few policies and support mechanisms for preservation and development. The Ancient Quarter Management Board is the special agency mandated to manage the AQ, but it is mainly in charge with the physical aspects, especially for preservation of architecture.

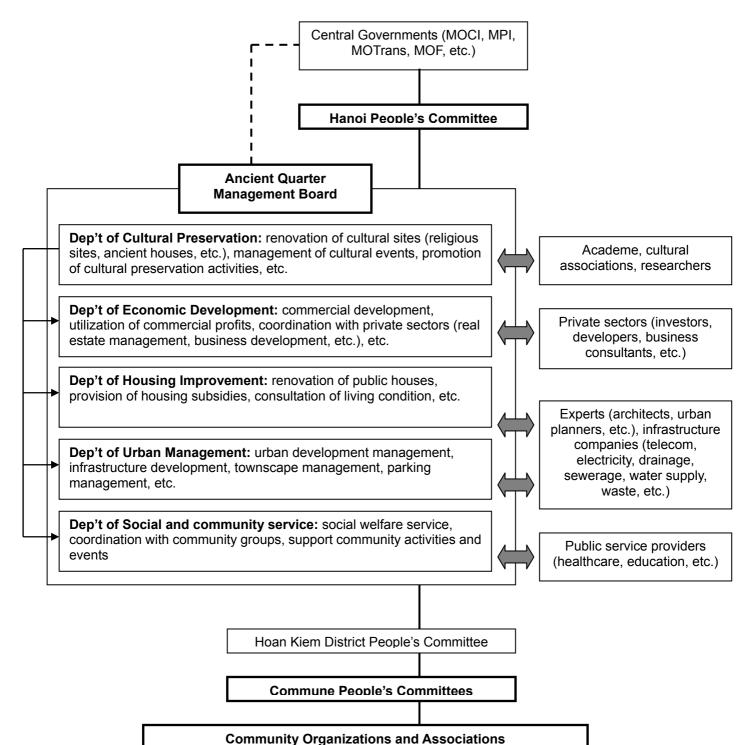
Roles and responsibility of public sector is to improve social and physical conditions equally, while private sector can invest for economic development for their benefits. For sustainable development of the AQ, residents should be the priority beneficiaries since they are the main actors to preserve traditional values and sustain their traditional livelihood.

Implementation of the proposed Master Plan (vision, objectives, strategies and actions) need to involve a wide range of stakeholders from both public and private sectors as well as local partners who are responsible for attending to sectoral and crosscutting issues in a coordinated manner. It is necessary to formulate an appropriate institutional arrangement.

Even though there are a number of stakeholders involved in management of the AQ, it is the private sector that takes charge of fundamental transactions. The private sector stands up to, and is defined by, the urban development and market competition. The Government's role thus is to assist in enhancing the social welfare and competitiveness of stakeholders involved in providing a holistic (e.g. social, cultural, economic, environmental, etc.) and sustainable development of the AQ.

In order for the AQ to remain as a core value toward conservation of the identity and uniqueness of culture, consensual decision on the direction and orientation of the AQ development as well as coordinated activities are necessary. Herein lies the fundamental role of the Government.

The proposed institutional arrangement pointed out the important role of the AQMB. Since only the AQMB is the official designated management agency for the AQ, it is necessary to enhance its roles and responsibilities, not only preservation issues but also development and management. Since there are many stakeholders related to AQ including domestic and overseas, the AQMB shall be a coordinator among various stakeholders. Its major roles will be (i) enforcement, (ii) promotion, and (iii) coordination. It is proposed to set up sectoral department to achieve various objectives. Toward this, increase the staffs and their capacity development is urgently conducted.



# Figure 4.8.1 Institutional Arrangement for AQ management.

Source: HAIDEP Study Team

					Major Roles		
	Stakeholders	Major functions and responsibilities	Preservat ion of culture	Economic developm ent	Living improve ment	Urban space improve ment	Institution and manage ment
gov (MC MC	ntral vernments OCI, MPI, OTrans, VNAT, OF, etc.)	<ul> <li>Policy making</li> <li>Establish institutional framework</li> <li>Technical and financial support</li> <li>Budgeting</li> </ul>	А	В	В	В	В
	noi People's mmittee	<ul> <li>Policy making and implementation</li> <li>Infrastructure development</li> <li>Budgeting</li> </ul>	В	A	В	A	A
	AQ Management Board	<ul> <li>Enforcement of policy/ guidelines and management</li> <li>Coordination among stakeholders</li> <li>Promotion</li> <li>Community support</li> <li>Information provision</li> </ul>	A	В	A	В	A
	trict People's mmittee	<ul> <li>Budgeting</li> <li>Infrastructure development</li> </ul>		Α	В	Α	
Peo	mmune ople's mmittee	<ul> <li>Coordination with local groups/ citizens</li> <li>Formulation of development plans by commune/ block/ street units</li> </ul>			A	В	A
gro	mmunity ups/ local zens	<ul> <li>Organization of community groups/ associations</li> <li>Implementation of action plans/ projects</li> </ul>	А	В	A	В	В
	vate sectors	<ul> <li>Financing/ investment for development</li> <li>Project implementation and management</li> </ul>		A	В	В	
	ademe	<ul> <li>Technical support and consultation</li> <li>Planning support</li> <li>Research</li> </ul>	В		В	В	

 Table4.8.1
 Stakeholders and Roles of AQ Management

Source: HAIDEP Study Team

Note) A: major role, B: minor role, blank: none

# 5 CONCLUSION AND RECMMENDATIONS

# 5.1 Conclusion

The pilot project on block redevelopment shows the integrated approach with the aims of: (i) increasing floor space, (ii) improving living environment, (iii) preserving and revitalizing traditional values, and (iv) strengthening economic competitiveness. Since this project will contribute not only to physical improvement but also to social development, and foster respect for tradition and local culture, this project shall be mobilized with the participation of various stakeholders. The process of this pilot project proved that participatory planning and implementation for preservation and development of the Ancient Quarter is effective to mobilize individual concerns, respects for the AQ and their efforts.

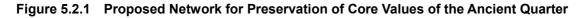
At present, many development activities are rampant and uncontrolled by private sectors. The role of governmental agencies is to establish appropriate management system and organization, and implement proper development control, guidelines. Any conservation measures and development activities will be done by techniques and finance of private sectors. Residential groups can be the one of implementation bodies with technical and financial supports from governments and donors.

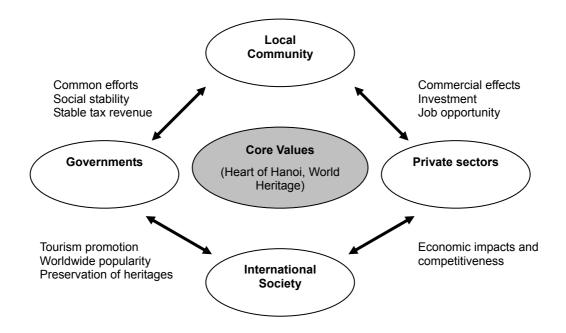
For the effective implementation and replication of the proposal in other areas, this planning approach shall be applied at each commune level, with the participation of residents and local governments and promoted to private investors. In parallel with block redevelopment planning and implementation, social and cultural activities shall be activated to contribute living condition improvement and cultural preservation, with establishment of the proposed institutional mechanism and community participation.

# 5.2 Recommendations

# (1) Establishment of Network for Sharing the Core Values

The values of the Ancient Quarter are not only physical cultural heritages, but also intangible values which are accumulated in a long history such as social network, cultural events, traditional commercial activities, etc. Though physical preservation can be achieved by external technical and financial supports, self-efforts by local society are indispensable to preserve intangible values. Though the government proceeds with the application to the UNESCO World Heritage, the physical and social environment of the Ancient Quarter is still fragile to be affected by both positive and negative impacts. For sustainable development of the Ancient Quarter, an effective implementation mechanism and network among stakeholders shall be established to share common understanding of values and common efforts (see Figure 5.2.1).





#### (2) Institutional Arrangements and Capacity Development

As a result of this pilot project, it is found that individual residents and organizations including private sectors are active and eager to preserve and develop the Ancient Quarter. What is lacking of now is the effective institutional arrangements and capacities of these implementation bodies.

The specific proposals for institutional arrangement and capacity development are as follows;

#### (i) Establishment of the One Stop Center

It aims to put together all the functions into one organization, since complicated institutional mechanism is a constraint to information access and implementation of projects. The function of this center is (i) to introduce proper institutions, (ii) collect and provide timely information and (iii) coordinate with related agencies. The contents of service are of both public and private sectors. For example, residents can consult with this center if they have any problems of damaged housing structure and need support for improvement; or private investors who seek for adequate land and floor for starting business can access this center to receive introduction of real estate agents and business consulting firms, etc. Staffs of the center will not be experts but coordinators, consultants or experienced residents.

#### (ii) Promotion of Community Organization Setup

Local residents have shown their willingness to and recognize the potentials for preservation and development of the AQ. Since the retired and elderly are willing to contribute to support any activities related to the AQ, and with them being more familiar with AQ, it is necessary to set up community organization which are recognized by local governments and other stakeholders to maximize their potentials and willingness and to strengthen social networks. If these organizations will be provided necessary external financial and technical supports, they can act as project implementation bodies with a group of experts.

## (iii) Promotion of Business Association Setup

Business associations of the AQ existed as traditional trading guilds in ancient days. Since traditional trading culture are rooted in same trading activities in each street, some organizations of street or same trading as units will be established to enhance economic activities and improve street conditions. If individual business entities will pay membership fees, this association can conduct joint events for sales, improve physical conditions of streets, etc. These joint activities will enhance the social and economic values of their businesses and streets.

#### (iv) Promotion of Community Businesses

Though the definition of community business is not clearly defined, that of the AQ refers to the economic activities which contribute to social improvement, cultural preservation and community empowerment, and mainly conducted by local residents. Worth noting is that residents can get financial benefits from these businesses. For example, a guide tour by local residents is not professional in terms of service level; but participants can get more local information and enjoy communication with local people. If the government secures a commercial space for community business, community groups will lease the space at a reasonable price and do their original business like entrepreneurship1 such as selling traditional crafts, exhibition of ancient photos, opining a café, serving local foods and drinks, etc.

# (v) Holding Cultural Events and Festivals

There are many cultural and historical sites which are degraded and ignored by residents now. To restore these sites, it is necessary not only to renovate them physically but also to revitalize intangible traditional and cultural activities. The revitalization of these sites and events can contribute to enhance attractiveness and charm of the AQ and to strengthen local community.

#### (vi) Holding Seminars and Meetings for Donors and Researchers

Though there were many studies and projects done already in the past, there are no accumulated information, database and proposals. Support activities by donors and researchers are rather spontaneous because of limited access to information. To coordinate these agencies and share information, seminars and meetings about the AQ shall be organized regularly by different issues in terms of history, culture, architecture, economy, etc. The joint studies among other ancient towns in other countries will contribute to learn the know-how and experiences of preservation and development.

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Since the AQ is the clustered area of households and business in small-scale, investment and capital in large scale is not necessary. Micro- finance system which can spread to these units widely and equally is effective to improve living condition and commercial development. This system will be managed by local government (commune PC) or banks.

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# Appendix

Current Condition of Streets Assessment of Streets

## 1. Current Condition of Streets

# (a) Basic Information about Streets

(1/2)

Commune	No.	Street Name	From	То	Old Name (Identity)
	1	Hang Buom	Hang Ngang	Dong Thai	sails
	2	Ngo Gach	Hang Duong	Hang Giay	bricks
	3	Cho Gao	Dao Duy To	Trang Nhat Duat	rice market
	4	Dao Duy To	Hang Chieu	Luong Ngoc Quyen	(personal name)
	5	Nguyen Sieu	Hang Giay	Dao Duy To	(personal name)
	6	Ma May	Dong Thai	Hang Bac	rattan
Hang Buom	7	Hang Chinh	Ma May	Trang Nhat Duat	jars
	•	Tallian	Hang Buom	Luong Ngoc Quyen	
	8	Ta Hien	Luong Ngoc Quyen	Hang Bac	(personal name)
	~		Hang Chieu	Hang Buom	
	9	Hang Giay	Hang Buom	Luong Ngoc Quyen	shoes
	40	Luong Ngoc	Hang Giay	Ta Hien	
	10	Quyen	Ta Hien	Nguyen Huu Huan	(personal name)
	11	Hang Bac	Hang Duong	Hang Be	silver
	12	Hang Be	Hang Bac	Cau Go	rafts
	13	Hang Thung	Hang Be	Nguyen Huu Huan	barrels
Hang Bac	14	Dinh Liet	Hang Bac	Cau Go	
	15	Cau Go	Hang Dao	Hang Be	wooden bridge
	10		Hang Dao	Dinh Liet	
	16	Gia Ngu	Dinh Liet	Cau Go	Fish market
		New years of the second	Luong Ngoc Quyen	Hang Mam	
	17	Nguyen Huu Huan	Hang Mam	Hang Thung	(personal name)
Ly Thai To		riddir	Hang Thung	Lo Su	
	18	Hang Muoi	Tran Nhat Duat	Hang Mam	salt
	19	Hang Tre	Hang Mam	Lo Su	bamboo
	20	Hang Mam	Hang Be	Trang Quang Khai	fish sauce
	21	Dong Xuan	Hang Khoai	Hang Chieu	Dong Xuan market street
	22	Hang Khoai	Dong Xuan	Trang Nhat Duat	potatoes
	23	Hang Giay	Hang Dau	Hang Khoai	paper
	24	Hang Dau	Hang Giay	Nguyen Thiep	beans
	25	Hang Chieu	Dong Xuan	Dao Duy To	rush or sedge floor mats
	26	Gam Cau	Hang Luoc	Nguyen Thiep	below the bridge
	27	Nguyen Thiep	Hang Dau	Hang Khoai	-
Dong Xuan	28	Tran Nhat Duat	Hang Dau	Luong Ngoc Quyen	(personal name)
	29	Cao Thang	Nguyen Thien Thuat	Tran Nhat Duat	(personal name)
	30	Nguyen Thien Thuat	Hang Khoai	Hang Chieu	(personal name)
	31	Thanh Ha	Nguyen Thien Thuat	Hang Chieu	(village name)
	32	Cau Dong	Dong Xuan	Nguyen Thien Thuat	-
	33	O Quan Truong	Dao Duy To	Trang Nhat Duat	Quang Truong Gate

# (2/2)

Commune	No.	Street Name	From	То	Old Name (Identity)
Commune	34	Hang Duong	Hang Ma	Lan Ong	
	35	Lan Ong	Thuoc Bac	Hang Ngang	sugar (personal name)
		v			Silk of the color of a peach
	36	Hang Dao	Hang Bo	Cau Go	flower
Hang Dao	37	Cha Ca	Hang Ma	Lan Ong	fried fish
-	38	Hang Ngang	Lan Ong	Hang Bo	transversal street
	39	Hang Can	Lan Ong	Hang Bo	scales
	40	Hang Ca	Cha Ca	Hang Duong	fish
	41	Luong Van Can	Hang Bo	Le Thai To	(personal name)
	42	Hang Chai	Hang Cot	Hang Ruoi	bottles
	43	Hang Cot	Hang Ma	Hang Luoc	bamboo mats for construction or storage containers
Hang Ma	44	Hang Luoc	Hang Ma	Hang Cot	combs
	45	Hang Ma	Phung Hung	Dong Xuan	votive paper items
	46	Hang Ruoi	Hang Ma	Hang Luoc	sand worms
	47	Phung Hung	Cua Dong	Hang Luoc	-
	48	Hang Dong	Hang Ma	Hang Vai	copper
	49	Lo Ren	Hang Ga	Thuoc Bac	blacksmith furnace
	50	Hang But	Bat Su	Thuoc Bac	caligraphy brush
	51	Thuoc Bac	Hang Ma	Bat Dan	-
Llana Da	52	Hang Bo	Hang Thiec	Luong Van Can	basket
Hang Bo	53	Hang Vai	Phung Hung	Thuoc Bac	fabric
	54	Bat Su	Hang Vai	Bat Dan	ceramic bowls
	55	Hang Ga	Hang Ma	Bat Dan	chicken
	56	Bat Dan	Phung Hung	Hang Thiec	clay or earthenware bowls
	57	Hang Phen	Hang Ga	Thuoc Bac	alum
	58	Hang Dieu	Bat Dan	Duong Thanh	pipes
	59	Hang Da	Hang Bo	Duong Thanh	leather
	60	Nha Hoa	Hang Ga	Duong Thanh	fire house
Cua Dong	61	Duong Thanh	Phung Hung	Hang Bong	road to the Citadel
Oua Dong	62	Nguyen Van To	Phung Hung	Duong Thanh	(personal name)
	63	Cua Dong	Le Nam De	Hang Ga	east gate
	64	Nguyen Quang Bich	Phung Hung	Nguyen Van To	(personal name)
	65	Hang Bong	Phung Hung	Hang Manh	cotton
Hong Pong	66	Ngo Tram	Phung Hung	Duong Thanh	relay station
Hang Bong	67	Ha Trung	Phung Hung	Ngo Tram	-
	68	Phung Hung	Cua Dong	Hang Bong	(personal name)
	69	Hang Gai	Hang Manh	Hang Dao	hemp
	70	Hang Quat	Hang Hom	Luong Van Can	fans
	71	Hang Thiec	Bat Dan	Hang Non	tinsmiths
	72	Hang Manh	Hang Non	Hang Bong	bamboo slat blinds
Hang Gai	73	Hang Non	Duong Thanh	Hang Hom	conical hats
	74	Hang Hom	Hang Non	Hang Bong	lacquer painted trunks and boxes
	75	To Tich	Hang Quat	Hang Gai	plain rush mats
	76	Ngo Tam Thuong	Yen Thai	Hang Bong	-
	77	Yen Thai	Duong Thanh	Hang Manh	-

# (b) Physical Conditions of Streets

# (1/2)

		Street			Width (m)		Interse	ections
Commune	No.	Street Name	Total Length (m)	Carriage way	Sidewalk (one-side)	Total	No. with traffic signals	No. w/o traffic signals
	1	Hang Buom	300	7.0	3.0	13	1	3
	2	Ngo Gach	128	6.0	2.0	10	0	2
	3	Cho Gao	160	6.0	1.0	8	0	3
	4	Dao Duy To	288	6.0	2.5	11	0	5
Hang	5	Nguyen Sieu	180	6.0	3.0	12	0	2
Buom	6	Ma May	286	6.0	2.5	11	0	5
	7	Hang Chinh	130	6.0	3.0	12	0	2
	8	Ta Hien1)	216	10	2	10	0	4
	9	Hang Giay	219	12.0	3.0	18	0	3
	10	Luong Ngoc Quyen	324	6.0	2.0	10	0	4
	11	Hang Bac	280	7.0	2.5	12	1	3
	12	Hang Be	172	6.0	3.0	12	0	3
Hong Boo	13	Hang Thung	216	9.0	3.0	15	1	2
Hang Bac	14	Dinh Liet	180	6.0	2.0	10	0	3
	15	Cau Go	266	8.0	3.0	14	0	5
	16	Gia Ngu	260	6.0	2.0	10	0	4
	17	Nguyen Huu Huan	510	12.0	5.5	23	1	3
Ly Thai Ta	18	Hang Muoi	104	7.0	4.0	15	0	2
Ly Thai To	19	Hang Tre	308	8.0	4.0	16	0	4
	20	Hang Mam	94	7.0	3.0	13	0	4
	21	Dong Xuan	170	10.0	2.5	15	0	3
	22	Hang Khoai	80	8.5	2.5	13.5	0	3
	23	Hang Giay	267	7.0	4.0	15	1	2
	24	Hang Dau	50	11.0	3.0	17	-	-
	25	Hang Chieu	276	8.0	2.5	13	1	2
	26	Gam Cau	340	5.0	1.5	8	1	2
Dong Xuan	27	Nguyen Thiep	193	6.0	3.0	12	0	3
	28	Tran Nhat Duat	-	17.0	4.0	25	0	8
	29	Cao Thang	133	8.0	4.0	16	0	2
	30	Nguyen Thien Thuat	221	6.0	3.0	12	0	5
	31	Thanh Ha	181	6.0	2.0	10	0	3
	32	Cau Dong	160	4.5	1.5	7.5	0	3
	33	O Quan Truong	80	8.0	3.0	14	0	2
	34	Hang Duong	182	8.0	2.5	13	2	1
	35	Lan Ong	180	6.0	3.0	12	2	1
	36	Hang Dao	201	8.0	2.5	13	1	2
Hang Dao	37	Cha Ca	180	8.0	2.0	12	2	2
Tiang Dau	38	Hang Ngang	150	8.0	2.5	13	2	0
	39	Hang Can	158	8.0	2.5	13	2	0
	40	Hang Ca	124	6.0	2.5	11	0	2
	41	Luong Van Can	308	8.0	2.0	12	2	2

(2/2)

		Street			Width (m)		Interse	ections
Commune	No.	Street Name	Total Length (m)	Carriage way	Sidewalk (one-side)	Total	No. with traffic signals	No. w/o traffic signals
	42	Hang Chai	85	5.0	1.0	7	0	2
	43	Hang Cot	138	8.0	4.0	16	2	1
Hong Mo	44	Hang Luoc	234	8.0	2.5	13	1	2
Hang Ma	45	Hang Ma	380	8.0	3.0	14	2	3
	46	Hang Ruoi	108	6.0	3.0	12	0	2
	47	Phung Hung	500	10.0	5.0	20	2	3
	48	Hang Dong	131	6.0	3.0	12	0	3
	49	Lo Ren	130	8.0	3.0	14	0	3
	50	Hang But	68	6.0	2.0	10	0	2
	51	Thuoc Bac	328	6.0	3.0	12	0	4
	52	Hang Bo	272	7.0	3.0	13	0	1
Hang Bo	53	Hang Vai	236	6.0	3.0	12	1	3
	54	Bat Su	207	6.0	3.0	12	0	4
	55	Hang Ga	314	8.0	3.0	14	2	2
	56	Bat Dan	248	8.0	3.0	14	1	3
	57	Hang Phen	110	7.0	3.0	13	0	3
	58	Hang Dieu	286	8.0	3.0	14	1	2
	59	Hang Da	140	8.0	3.0	14	1	1
	60	Nha Hoa	128	6.0	2.0	10	0	2
Cua Dong	61	Duong Thanh	468	9.0	3.5	16	2	4
	62	Nguyen Van To	180	6.0	3.0	12	0	3
	63	Cua Dong	220	12.0	6.5	25	1	1
	64	Nguyen Quang Bich	120	6.0	2.5	11	0	3
	65	Hang Bong	662	9.0	3.0	15	4	0
	66	Ngo Tram	228	5.0	2.0	9	0	3
Hang Bong	67	Ha Trung	207	6.0	2.0	10	1	1
	68	Phung Hung	700	10.0	5.0	20	3	4
	69	Hang Gai	273	11.0	3.0	17	3	1
	70	Hang Quat	200	8.0	3.0	14	0	3
	71	Hang Thiec	144	6.0	3.0	12	0	2
	72	Hang Manh	152	6.0	3.0	12	1	1
Hang Gai	73	Hang Non	216	6.0	3.0	12	1	4
	74	Hang Hom	127	6.0	2.5	11	1	1
	75	To Tich	96	6.0	1.0	8	0	2
	76	Ngo Tam Thuong	150	4.0	None	4	0	2
	77	Yen Thai	140	8.0	None	8	0	3

1) There are no sidewalk at Ta Hien Street from Hang Buom to Luong Ngoc Quyen.

# (c) Building Condition by Streets

(1/2)

	Stre	eet	No.		iilding: ight	s by	Ν	lo. of Buil	dings t	by use	of 1F			f Buildings v ditional Valu		Condition of violation
Commune	No.	Street Name	1-2	3-4	5 or more	Total	Residen -tial only	Commer -cial	Reli -gious	Public	Others		Historical/ cultural sites	Ancient houses designated in 1998	Original ancient houses in 2005	% of violated height
	1	Hang Buom	63	59	4	126	7	107	2	6	4	126	4	43	11	15.1%
	2	Ngo Gach	22	17	1	40	5	33	1	1	2	42	1	3	1	17.5%
	3	Cho Gao	8	12	0	20	1	15	0	1	0	17	0	3	0	5.0%
	4	Dao Duy To	47	34	0	81	18	59	1	4	0	82	0	4	1	18.5%
Hang	5	Nguyen Sieu	30	23	1	54	3	61	0	2	2	68	0	17	5	25.9%
Buom	6	Ma May	64	44	5	113	12	101	0	5	0	118	1	37	8	15.0%
	7	Hang Chinh	9	11	0	20	7	14	0	1	1	23	0	7	1	15.0%
	8	Ta Hien	33	26	0	59	7	54	0	0	1	62	0	5	0	13.6%
	9	Hang Giay	36	46	3	85	13	72	0	0	1	86	0	1	1	29.4%
	10	Luong Ngoc Quyen	35	29	6	70	9	68	0	2	0	79	0	9	1	24.3%
	11	Hang Bac	49	61	3	113	2	91	2	2	1	98	6	20	3	18.6%
	12	Hang Be	49	32	0	81	11	70	0	1	0	82	1	11	2	12.3%
Hang Bac	13	Hang Thung	24	19	2	45	2	43	1	1	0	47	1	5	0	-
riding Duo	14	Dinh Liet	35	30	1	66	2	65	0	2	0	69	0	2	1	19.4%
	15	Cau Go	22	39	1	62	4	93	0	3	0	100	1	4	1	-
	16	Gia Ngu	11	13	2	26	-	-	-	-	-	-	0	1	0	-
	17	Nguyen Huu Huan	43	27	0	70	7	62	0	2	0	71	2	8	3	14.3%
Ly Thai To	18	Hang Muoi	14	19	5	38	6	32	0	0	0	38	0	2	1	36.8%
10	19	Hang Tre	7	17	1	25	3	19	0	3	0	25	0	11	3	24.0%
	20	Hang Mam	8	12	3	23	5	18	0	0	0	23	0	1	0	34.8%
	21	Dong Xuan	8	32	21	61	0	59	0	2	0	61	1	14	4	0.0%
	22	Hang Khoai	13	29	25	67	2	64	0	1	0	67	1	0	0	4.3%
	23	Hang Giay	15	34	38	87	8	80	0	6	2	96	1	4	1	7.4%
	24	Hang Dau	1	37	26	64	2	25	0	2	0	29	2	0	0	12.3%
	25	Hang Chieu	2	56	59	117	7	110	0	3	0	120	0	27	7	2.5%
	26	Gam Cau	7	12	9	28	-	-	-	-	-	-	0	0	0	3.4%
Dong Xuan	27	Nguyen Thiep	5	21	16	42	3	53	2	0	0	58	1	0	0	27.6%
Audii	28	Tran Nhat Duat	33	27	0	60	5	51	0	4	0	60	1	21	1	-
	29	Cao Thang	3	5	15	23	4	27	0	1	2	34	0	0	0	-
	30	Nguyen Thien Thuat	2	16	10	28	1	31	0	3	0	35	0	2	0	20.0%
	31	Thanh Ha	6	8	21	35	15	23	0	1	0	39	1	2	0	10.3%
	32	Cau Dong	0	16	12	28	9	41	0	2	0	52	0	5	0	-
	33	O Quan Truong	0	15	9	24	3	21	0	0	0	24	1	2	0	0.0%
	34	Hang Duong	43	38	0	81	2	76	1	2	0	81	3	31	11	7.4%
	35	Lan Ong	44	31	0	75	3	71	0	1	0	75	0	17	1	5.3%
	36	Hang Dao	77	33	0	110	2	107	1	1	0	111	3	51	6	5.5%
Hang Dao	37	Cha Ca	22	29	0	51	4	48	0	0	0	52	0	0	0	17.6%
Tung Dub	38	Hang Ngang	35	30	0	65	0	63	0	3	0	66	1	16	6	13.8%
	39	Hang Can	29	31	0	60	3	56	1	2	0	62	2	9	2	13.3%
	40	Hang Ca	12	17	1	30	4	14	0	0	0	18	2	0	0	26.7%
	41	Luong Van Can	25	42	1	68	0	68	0	1	1	70	1	4	0	20.6%

# (2/2)

	Stre	eet	No.		iilding: ight	s by	Ν	lo. of Buil	dings l	oy use	of 1F	•		f Buildings ditional Valu	le	Condition of violation
Commune	No.	Street Name	1-2	3-4	5 or more	Total	Residen -tial only	Commer -cial	Reli -gious	Public	Others	Total	Historical/ cultural sites	Ancient houses designated in 1998	Original ancient houses in 2005	% of violated height
	42	Hang Chai	6	9	0	15	7	8	0	0	0	15	0	0	0	40.0%
	43	Hang Cot	63	34	5	102	10	82	2	9	0	103	3	13	1	18.6%
Hang Ma	44	Hang Luoc	39	32	9	80	6	70	3	2	0	81	3	2	1	28.8%
riang wa	45	Hang Ma	55	59	6	120	10	103	0	4	0	117	0	11	1	23.3%
	46	Hang Ruoi	16	11	0	27	5	21	0	0	1	27	1	7	1	7.4%
	47	Phung Hung	65	20	5	90	17	68	0	4	1	90	0	17	5	10.0%
	48	Hang Dong	23	32	0	55	12	39	0	0	4	55	0	5	1	20.0%
	49	Lo Ren	12	29	1	42	8	33	0	1	0	42	1	0	0	19.0%
	50	Hang But	8	8	0	16	8	7	0	1	0	16	0	0	0	37.5%
	51	Thuoc Bac	59	65	0	124	8	112	0	3	0	123	0	19	2	17.7%
Hang Bo	52	Hang Bo	46	51	4	101	5	91	0	6	1	103	1	26	2	21.8%
Fiany bu	53	Hang Vai	42	27	1	70	5	62	0	3	0	70	2	5	3	4.3%
	54	Bat Su	29	37	3	69	12	59	0	1	2	74	0	10	0	23.2%
	55	Hang Ga	51	49	5	105	9	91	1	4	0	105	1	2	1	15.2%
	56	Bat Dan	33	34	1	68	5	57	1	1	4	68	1	9	2	8.8%
	57	Hang Phen	8	22	0	30	5	23	0	1	0	29	0	0	0	20.0%
	58	Hang Dieu	26	61	2	89	4	82	0	3	1	90	1	24	6	28.1%
	59	Hang Da	32	26	3	61	6	54	0	0	2	62	1	3	0	18.0%
	60	Nha Hoa	-	-	-	0	16	15	0	0	1	32	0	2	0	-
Cua Dong	61	Duong Thanh	57	53	5	115	11	95	1	8	5	120	1	16	2	24.3%
oud Dong.	62	Nguyen Van To	31	19	0	50	17	34	0	0	0	51	0	6	2	18.0%
	63	Cua Dong	32	9	5	46	9	36	0	1	0	46	0	5	0	21.7%
	64	Nguyen Quang Bich	17	13	0	30	15	10	0	2	4	31	1	17	8	6.7%
	65	Hang Bong	55	42	4	101	5	91	0	3	3	102	6	0	5	13.9%
Hang	66	Ngo Tram	26	18	0	44	6	34	2	2	0	44	1	3	2	13.6%
Bong	67	Ha Trung	48	54	5	107	5	98	0	1	0	104	0	16	2	24.3%
	68	Phung Hung	35	22	6	63	4	57	0	2	0	63	0	19	1	27.0%
	69	Hang Gai	19	35	1	55	0	54	0	0	0	54	2	2	0	23.6%
	70	Hang Quat	51	32	1	84	3	75	1	6	2	87	3	22	1	13.1%
	71	Hang Thiec	27	44	1	72	3	68	0	1	2	74	0	3	1	31.9%
	72	Hang Manh	14	40	8	62	6	53	0	1	2	62	0	2	0	45.2%
Hang Gai	73	Hang Non	29	52	6	87	4	81	0	0	3	88	3	3	0	34.5%
i lang car	74	Hang Hom	16	37	4	57	2	55	1	0	0	58	1	2	2	29.8%
	75	To Tich	14	16	2	32	2	30	0	0	0	32	1	3	1	21.9%
	76	Ngo Tam Thuong	10	20	0	30	21	8	1	0	0	30	1	0	0	20.0%
	77	Yen Thai	18	26	0	44	21	29	0	0	0	50	0	0	0	9.1%

## 2. Assessment of Streets

# (a) Assessment on Cultural, Socio-Economic Condition

												(1/2)
	St	reet		Culture		Sc	ocial		Econ	omic		Overall
Commune	No.	Street Name		te/ Ancient ses			Community	busi	tional ness		usiness	Assessment in respect to
Commune	NO.	Street Maine	Availability	Conditions	Events	network	integration	Avail -ability	Oppo -rtunities	Avail -ability	Oppo -rtunities	"core value of AQ"
	1	Hang Buom	Α	В	Α	Α	В	В	В	В	В	А
	2	Ngo Gach	Α	В	С	В	В	В	С	С	С	В
	3	Cho Gao	D	-	-	С	С	D	С	С	С	D
	4	Dao Duy To	С	С	С	С	В	С	С	С	С	С
Hang	5	Nguyen Sieu	В	С	С	В	С	Α	С	С	С	С
Buom	6	Ma May	В	С	В	В	С	С	В	Α	А	В
	7	Hang Chinh	С	С	С	С	С	D	С	С	В	D
	8	Ta Hien	С	С	С	С	С	С	В	А	А	С
	9	Hang Giay	С	С	С	С	В	С	С	В	В	С
	10	Luong Ngoc Quyen	С	В	С	С	В	С	В	А	А	В
	11	Hang Bac	С	С	С	В	В	В	В	А	А	С
	12	Hang Be	С	С	С	С	С	В	В	А	А	С
Hang Bac	13	Hang Thung	D	-	С	С	С	С	С	С	В	С
Hally Dac	14	Dinh Liet	С	С	С	С	С	С	В	В	А	С
	15	Cau Go	С	В	С	С	С	С	В	В	А	В
	16	Gia Ngu	D	-	С	В	В	А	Α	С	В	В
	17	Nguyen Huu Huan	С	В	С	С	С	В	В	В	А	В
Ly Thai To	18	Hang Muoi	С	С	С	С	С	С	С	С	С	С
10	19	Hang Tre	С	С	С	С	С	С	В	В	В	В
	20	Hang Mam	D	-	С	В	С	А	В	В	В	В
	21	Dong Xuan	В	В	С	В	В	В	В	В	В	В
	22	Hang Khoai	С	С	С	Α	В	А	В	С	С	С
	23	Hang Giay	С	С	С	В	С	С	В	В	В	С
	24	Hang Dau	D	-	С	В	С	В	С	С	В	С
	25	Hang Chieu	С	В	В	В	В	В	С	В	В	В
	26	Gam Cau	D	-	С	В	В	В	В	С	С	С
Dong	27	Nguyen Thiep	D	-	С	В	В	В	В	С	С	С
Xuan	28	Tran Nhat Duat	С	С	С	В	С	С	В	В	А	С
	29	Cao Thang	D	-	С	В	В	В	В	С	С	С
	30	Nguyen Thien Thuat	D	-	С	С	С	В	С	С	С	С
	31	Thanh Ha	С	С	С	А	В	В	В	С	С	В
	32	Cau Dong	D	-	С	Α	А	А	В	С	В	В
	33	O Quan Truong	Α	Α	В	В	С	С	В	В	В	В

# (2/2)

	St	reet		Culture		So	ocial		Econ	omic		Overall
			Cultural si						tional	New b	usiness	Assessment
Commune	No.	Street Name				Traditional network	Community integration	busi				in respect to "core value of
			Availability	Conditions	LVEIIIS	HELWOIK	integration	Avail -ability	Oppo -rtunities	Avail -ability	Oppo -rtunities	AQ"
	34	Hang Duong	Α	Α	В	В	В	B	B	B	B	А
	35	Lan Ong	С	В	А	Α	В	Α	А	С	В	A
	36	Hang Dao	A	Α	В	В	В	В	В	A	Α	А
	37	Cha Ca	D	-	С	С	С	С	В	В	Α	В
Hang Dao	38	Hang Ngang	Α	Α	В	В	В	В	В	А	Α	A
	39	Hang Can	В	В	С	В	С	В	С	В	В	В
	40	Hang Ca	D	-	С	С	С	С	С	С	С	С
	41	Luong Van Can	С	С	С	В	В	Α	В	В	Α	А
	42	Hang Chai	D	-	С	С	С	С	С	С	С	С
	43	Hang Cot	В	В	Α	В	С	С	С	С	С	В
	44	Hang Luoc	В	В	В	В	В	Α	В	В	В	А
Hang Ma	45	Hang Ma	В	В	Α	А	В	А	Α	С	В	А
	46	Hang Ruoi	С	С	С	В	В	С	С	В	С	В
	47	Phung Hung	В	В	С	С	С	С	С	В	В	С
	48	Hang Dong	С	В	В	А	В	А	В	С	С	А
	49	Lo Ren	D	-	С	А	В	А	С	С	С	В
	50	Hang But	D	-	С	С	С	С	С	С	С	С
	51	Thuoc Bac	В	В	В	Α	В	А	В	С	В	А
Llong Do	52	Hang Bo	С	В	С	В	В	В	В	С	В	В
Hang Bo	53	Hang Vai	В	А	С	В	А	В	В	С	В	В
	54	Bat Su	D	-	С	С	С	С	С	С	В	С
	55	Hang Ga	В	А	Α	В	С	С	С	С	В	В
	56	Bat Dan	С	В	С	В	В	С	В	В	Α	В
	57	Hang Phen	D	-	С	С	С	С	С	С	С	С
	58	Hang Dieu	В	С	С	В	В	А	В	В	Α	В
	59	Hang Da	D	-	С	С	С	С	С	В	В	С
	60	Nha Hoa	D	-	С	С	В	С	С	С	С	С
Cua Dong	61	Duong Thanh	С	В	С	С	С	С	В	В	В	С
	62	Nguyen Van To	С	В	С	А	В	А	В	С	В	В
	63	Cua Dong	D	-	С	С	С	С	С	В	Α	С
	64	Nguyen Quang Bich	А	А	С	С	В	С	С	С	С	А
	65	Hang Bong	В	Α	С	В	В	А	В	В	Α	А
Hang	66	Ngo Tram	Α	Α	В	В	В	В	В	С	В	В
Bong	67	Ha Trung	С	С	С	В	С	А	В	С	В	В
	68	Phung Hung	С	С	С	С	С	С	С	В	В	С
	69	Hang Gai	В	A	С	В	В	А	В	В	A	А
	70	Hang Quat	С	В	В	A	В	А	В	В	В	A
	71	Hang Thiec	С	В	С	A	В	А	С	В	A	A
	72	Hang Manh	D	-	С	С	С	С	В	А	A	В
Hang Gai	73	Hang Non	D	-	С	В	В	А	С	В	A	В
	74	Hang Hom	В	В	С	С	С	С	В	А	A	В
	75	To Tich	В	В	С	В	A	В	A	А	A	A
	76	Ngo Tam Thuong	A	A	В	А	A	В	В	С	С	А
	77	Yen Thai	D	-	С	В	A	В	В	В	В	В

# (b) Assessment of Physical Condition

(1/2)

	Stre	eet		Towr	iscape			E	nvironm	ent	Traf	fic Cond	itions
Commune	Serial No.	Street Name	Architecture design	Façade coordination	Trees greenery	Visual obstacles	Overall street image	Air quality	Noise	Sanitary condition		Traffic conflict	Walking condition
	1	Hang Buom	В	С	В	В	В	В	В	В	В	В	С
	2	Ngo Gach	В	С	С	В	С	А	А	Α	Α	Α	А
	3	Cho Gao	С	С	С	С	D	В	В	В	Α	Α	В
	4	Dao Duy To	С	С	С	В	С	В	В	С	Α	Α	Α
Hang	5	Nguyen Sieu	В	С	В	В	С	В	С	В	С	С	С
Buom	6	Ma May	В	С	В	С	В	В	С	В	Α	В	В
	7	Hang Chinh	С	С	С	С	D	С	D	В	В	В	С
	8	Ta Hien	С	В	D	С	С	С	С	С	В	Α	В
	9	Hang Giay	С	С	В	В	С	В	В	С	С	В	С
	10	Luong Ngoc Quyen	В	В	В	С	В	В	С	В	В	С	С
	11	Hang Bac	С	D	Α	С	С	С	С	В	С	D	D
	12	Hang Be	С	С	В	С	С	С	С	С	С	В	С
Hang Bac	13	Hang Thung	В	В	А	В	В	С	С	В	С	С	В
Tiang Dac	14	Dinh Liet	С	С	С	С	С	С	С	D	С	С	D
	15	Cau Go	В	В	В	В	В	С	С	С	С	С	С
	16	Gia Ngu	С	С	С	С	С	С	С	D	В	С	В
	17	Nguyen Huu Huan	В	В	А	В	А	С	С	В	В	А	A
Ly Thai To	18	Hang Muoi	В	С	С	С	С	В	В	С	В	С	С
10	19	Hang Tre	В	С	С	С	С	В	В	С	В	С	С
	20	Hang Mam	С	С	С	С	С	С	С	В	С	С	С
	21	Dong Xuan	В	С	A	С	В	В	В	С	С	В	В
	22	Hang Khoai	С	С	В	В	С	С	С	D	С	С	В
	23	Hang Giay	В	В	В	В	С	С	С	В	В	Α	A
	24	Hang Dau	С	С	A	В	С	С	С	В	С	В	В
	25	Hang Chieu	В	С	A	В	В	В	С	С	В	С	С
_	26	Gam Cau	С	В	D	С	С	С	В	D	Α	Α	В
Dong Xuan	27	Nguyen Thiep	С	С	С	В	С	С	В	С	В	В	В
Audii	28	Tran Nhat Duat	В	В	A	В	В	С	С	В	С	В	В
	29	Cao Thang	С	В	D	С	С	С	В	С	A	A	В
	30	Nguyen Thien Thuat	С	С	D	С	С	С	В	С	Α	Α	В
	31	Thanh Ha	С	С	С	С	В	С	С	D	A	A	В
	32	Cau Dong	С	В	D	С	С	С	С	С	Α	В	С
ļ	33	O Quan Truong		С	В	С	В	В	В	В	С	В	В
	34	Hang Duong	A	A	В	В	A	В	В	В	С	В	A
	35	Lan Ong	В	В	С	С	В	В	В	С	В	В	В
	36	Hang Dao	A	A	В	В	A	В	В	В	С	В	A
Hang Dao	37	Cha Ca	С	С	В	С	С	В	В	В	В	С	С
5	38	Hang Ngang	A	A	В	В	A	В	В	В	С	В	A
	39	Hang Can	C	С	В	C	С	В	В	В	B	С	D
	40	Hang Ca	С	C	С	C	С	В	В	В	B	С	С
	41	Luong Van Can	С	С	В	С	С	В	В	В	В	С	D

# (2/2)

	Str	eet		Towr	iscape			E	nvironm	ent	Traf	fic Cond	itions
Commune	Serial No.	Street Name	Architecture design	Façade coordination	Trees greenery	Visual obstacles	Overall street image	Air quality	Noise	Sanitary condition		Traffic conflict	Walking condition
	42	Hang Chai	В	В	D	С	С	А	Α	Α	Α	Α	Α
	43	Hang Cot	В	В	А	В	Α	В	В	Α	В	С	Α
Llong Mo	44	Hang Luoc	В	С	Α	В	В	В	В	В	В	С	В
Hang Ma	45	Hang Ma	А	В	Α	С	Α	В	В	В	В	В	С
	46	Hang Ruoi	В	В	В	В	С	В	В	В	В	В	В
	47	Phung Hung	В	В	Α	С	В	В	С	В	В	В	В
	48	Hang Dong	В	В	В	В	С	В	В	В	В	В	В
	49	Lo Ren	С	С	С	D	D	С	D	С	В	В	С
	50	Hang But	В	В	С	Α	В	А	А	В	Α	Α	В
	51	Thuoc Bac	В	В	Α	С	В	В	С	С	В	В	С
Llong Do	52	Hang Bo	В	С	В	В	В	В	С	В	В	Α	С
Hang Bo	53	Hang Vai	В	В	А	С	В	В	В	В	В	Α	В
	54	Bat Su	С	С	С	В	С	В	В	С	Α	Α	В
	55	Hang Ga	В	В	Α	В	Α	В	В	Α	В	С	Α
	56	Bat Dan	В	С	В	В	В	В	С	В	В	Α	С
	57	Hang Phen	В	В	С	А	В	Α	Α	В	Α	Α	В
	58	Hang Dieu	В	С	В	В	В	С	С	С	С	С	В
	59	Hang Da	С	В	А	С	В	В	В	В	В	В	В
	60	Nha Hoa	В	С	С	В	С	В	В	В	Α	Α	Α
Cua Dong	61	Duong Thanh	В	В	А	С	В	В	В	В	В	В	Α
oud Dong	62	Nguyen Van To	С	В	В	В	С	С	В	С	В	Α	Α
	63	Cua Dong	В	С	А	А	В	В	В	Α	В	Α	Α
	64	Nguyen Quang Bich	А	А	А	С	А	А	А	Α	А	А	А
	65	Hang Bong	В	С	В	В	В	С	С	Α	С	С	Α
Hang	66	Ngo Tram	В	С	В	С	В	В	В	В	Α	Α	В
Bong	67	Ha Trung	С	С	С	В	С	С	С	В	В	С	С
	68	Phung Hung	В	В	Α	С	В	В	С	В	В	В	В
	69	Hang Gai	А	А	В	С	Α	С	С	Α	С	С	Α
	70	Hang Quat	А	В	В	В	Α	В	В	В	В	С	В
	71	Hang Thiec	В	С	В	D	D	С	D	D	С	С	D
	72	Hang Manh	В	С	В	С	В	С	С	В	С	С	В
Hang Gai	73	Hang Non	С	С	С	В	С	С	D	D	С	С	D
i lung Gul	74	Hang Hom	В	С	В	С	В	С	С	В	С	С	В
	75	To Tich	А	В	В	А	Α	В	В	В	Α	Α	Α
	76	Ngo Tam Thuong	В	В	В	А	В	A	А	A	A	A	А
	77	Yen Thai	С	С	С	В	В	В	В	С	Α	В	Α

# (c) Overall Assessment of Streets

# (1/2)

	S	Street		Tradition	al Values		Phys	sical	Overall
Commune	No.	Street Name	Cultural	Social	Economic	Total core values	Environment	Traffic condition	Street Image
	1	Hang Buom	Α	Α	В	Α	В	С	А
	2	Ngo Gach	В	Α	С	В	В	В	В
	3	Cho Gao	С	D	С	D	В	В	С
	4	Dao Duy To	С	В	D	С	В	А	С
Lisua Duran	5	Nguyen Sieu	С	С	С	С	С	С	С
Hang Buom	6	Ma May	А	В	А	В	В	С	В
	7	Hang Chinh	С	С	С	D	С	В	С
	8	Ta Hien	В	С	Α	С	В	С	В
	9	Hang Giay	С	С	В	С	В	В	С
	10	Luong Ngoc Quyen	С	С	А	В	С	В	В
	11	Hang Bac	В	С	Α	С	С	D	С
	12	Hang Be	С	С	Α	С	С	С	С
Hong Dr.	13	Hang Thung	В	С	В	С	В	В	В
Hang Bac	14	Dinh Liet	С	С	В	С	D	D	С
	15	Cau Go	В	В	Α	В	В	С	В
	16	Gia Ngu	В	В	Α	В	D	С	В
	17	Nguyen Huu Huan	С	В	В	В	В	В	В
	18	Hang Muoi	С	С	С	С	С	D	С
Ly Thai To	19	Hang Tre	С	С	С	С	С	D	С
	20	Hang Mam	Α	В	В	В	С	С	В
	21	Dong Xuan	Α	В	В	В	В	В	В
	22	Hang Khoai	В	В	В	С	С	В	В
	23	Hang Giay	В	В	В	С	С	В	В
	24	Hang Dau	В	В	В	С	С	В	В
	25	Hang Chieu	А	А	С	В	В	С	В
	26	Gam Cau	С	В	В	С	D	С	С
Dong Xuan	27	Nguyen Thiep	С	В	С	С	С	В	С
	28	Tran Nhat Duat	С	С	В	С	В	В	С
	29	Cao Thang	С	В	В	С	С	В	С
	30	Nguyen Thien Thuat	С	В	С	С	С	В	С
	31	Thanh Ha	В	А	В	В	С	В	В
	32	Cau Dong	С	С	В	В	В	В	С
	33	O Quan Truong	А	В	С	В	В	В	В
	34	Hang Duong	А	В	А	А	Α	В	А
	35	Lan Ong	А	В	В	А	В	В	В
	36	Hang Dao	А	В	А	А	Α	В	А
Llong Doo	37	Cha Ca	В	В	В	В	В	С	В
Hang Dao	38	Hang Ngang	А	В	А	А	Α	В	А
	39	Hang Can	В	В	В	В	В	С	В
	40	Hang Ca	В	В	В	В	В	С	В
	41	Luong Van Can	В	А	А	В	В	С	В
	42	Hang Chai	С	В	D	С	В	А	С
	43	Hang Cot	В	В	С	В	А	В	В
Hong Ma	44	Hang Luoc	В	А	В	А	В	В	В
Hang Ma	45	Hang Ma	А	А	А	А	В	В	А
	46	Hang Ruoi	В	А	В	В	В	В	В
	47	Phung Hung	С	С	В	С	В	В	В

Street			Traditional Values			Physical		Overall	
Commune	No.	Street Name	Cultural	Social	Economic	Total core values	Environment	Traffic condition	Street Image
	48	Hang Dong	В	А	В	А	В	В	В
	49	Lo Ren	А	В	С	В	D	В	С
	50	Hang But	В	А	С	С	Α	В	В
	51	Thuoc Bac	Α	В	В	А	С	С	С
Hong Do	52	Hang Bo	Α	В	В	В	В	С	В
Hang Bo	53	Hang Vai	В	А	С	В	Α	В	В
	54	Bat Su	В	В	С	С	В	В	С
	55	Hang Ga	В	В	С	В	Α	В	В
	56	Bat Dan	А	В	В	В	В	С	В
	57	Hang Phen	В	А	С	С	Α	В	В
	58	Hang Dieu	В	В	Α	В	С	С	В
	59	Hang Da	С	В	В	С	С	С	С
	60	Nha Hoa	С	В	С	С	В	В	С
Cua Dong	61	Duong Thanh	В	С	Α	С	В	В	В
	62	Nguyen Van To	С	В	С	В	С	В	С
	63	Cua Dong	С	В	В	С	В	В	С
	64	Nguyen Quang Bich	В	Α	С	Α	Α	А	А
	65	Hang Bong	В	В	Α	А	Α	В	Α
Hang Bong	66	Ngo Tram	С	В	В	В	В	В	В
nany bony	67	Ha Trung	В	В	В	В	D	С	С
	68	Phung Hung	С	С	В	С	В	В	В
	69	Hang Gai	Α	В	А	А	Α	В	А
	70	Hang Quat	Α	А	В	А	Α	А	А
	71	Hang Thiec	Α	В	В	А	С	С	В
	72	Hang Manh	В	В	А	В	В	В	В
Hang Gai	73	Hang Non	В	В	В	В	С	С	С
	74	Hang Hom	В	В	А	В	В	В	В
	75	To Tich	Α	В	Α	В	В	В	А
	76	Ngo Tam Thuong	В	А	С	А	А	А	В
	77	Yen Thai	В	А	В	В	А	В	В

# (2/2)

Pilot Project B: District Planning

## **PILOT PROJECT B**

#### **"DISTRICT PLANNING"**

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# ABBREVIATIONS

BRT	Bus Rapid Transit
DPC	District People's Committee
На	hectare
HPC	Hanoi People's Committee
LURC	Land Use Right Certificate
VND	Vietnam Dong
UMRT	Urban Mass Railway Transit
US	United States
HANDICO	Hanoi Housing Investment and Development Corporation
HIS	Household Interview Survey
HAIDEP	The Comprehensive Urban Development Programme in Hanoi Capital City
SME	Small and Medium Scale Enterprise
HOS	House Ownership Certificate
ROW	Right-of-Way

# 1 INTRODUCTION

# 1.1. Background

Since Hanoi is a large urban area, the management of vast projects at the central level is proving to be difficult. While the General Plan at the city level provides the basic orientation and framework for urban development and project implementation, it does not adequately and precisely reflect local conditions. Hence, under the new Construction Law1, the responsibility and power to carry out the Detailed Plan were transferred from Hanoi People's Committee (HPC) to the District People's Committee (DPC). The DPC is responsible for working out the detailed plan on urban construction in line with socio-economic development demands, construction management requirements, investors' requirements, and ideas of residents in the area.

In addition, the urban land use change has to be managed well both by controlling development on one hand and guiding and promoting urban development on the other. There is a need to set in place a suitable institutional structure to manage this change. To strengthen institutions for effective urban management and capacity building as mentioned in the proposed strategy under the Hanoi City Master Plan, introduction of alternative implementation methods such as land readjustment is significant to carry out urban development effectively.

# 1.2. Objectives

This Pilot project was conducted with the following specific objectives:

- (i) Formulation of District Plan in Compliance with General Plan: The General Plan must be translated into the District Plan to reflect local conditions in more detail and to clarify the necessary institutional framework needed to implement the General Plan's orientation. Urban control plans at district level including community development plan, development structure plan, land-use zoning designation plan, key urban facilities and action areas plan are developed under the proposed statutory district planning system.
- (ii) Establishment of Effective Development Methods: Case studies were conducted for selected development areas/projects to formulate effective development methods which can be replicated in a wider area in Hanoi. Land readjustment method is introduced by taking the proposed New Urban Development Project for example.

# 2 OVERVIEW OF DONG ANH DISTRICT

# 2.1 Historical Background of Urbanization Process

Dong Anh suburban district, being located in old Phong Khe area in the Chinese domination period, was later called "Chau Co Lam", "Phu Thien Duc" in the Ly dynasty and "Phu Dong Ngan" in the Tran dynasty. It was established in 1831 by occupying part of Dong Ngan and Kim Anh suburban districts' land. Dong Anh used to be part of the Bac Ninh province from 1831 to 1905, then Phuc Yen, Vinh Phuc from 1905 to 1954.

At present, Dong Anh is a suburban district, located in the north of Hanoi capital. It was separated with the city by the Red River. In 2003, it has a total population of 276,000 and a land area of 18,230ha, composed of 23 communes and one town. It is bordered by (i) Long Bien district and Red River to the South and South – East, (ii) Soc Son suburban district, Hanoi to the North, (iii) Bac Ninh province to the East, and (iv) Vinh Phuc province to the West.

The terrain of Dong Anh is rather even and flat. The average height is from 7 to 8m, with the highest point at 13m and the lowest point at 4.5m. The terrain becomes lower and lower from the North to the South and from the West to the East.

Dong Anh has the same climate as Hanoi: it is influenced by Red River and Duong River hydrological condition. Besides, there are Ca Lo River, Thiep River, Ngu Huyen Khe River and many lakes, ponds, especially Van Tri Lake of 130ha in Dong Anh.

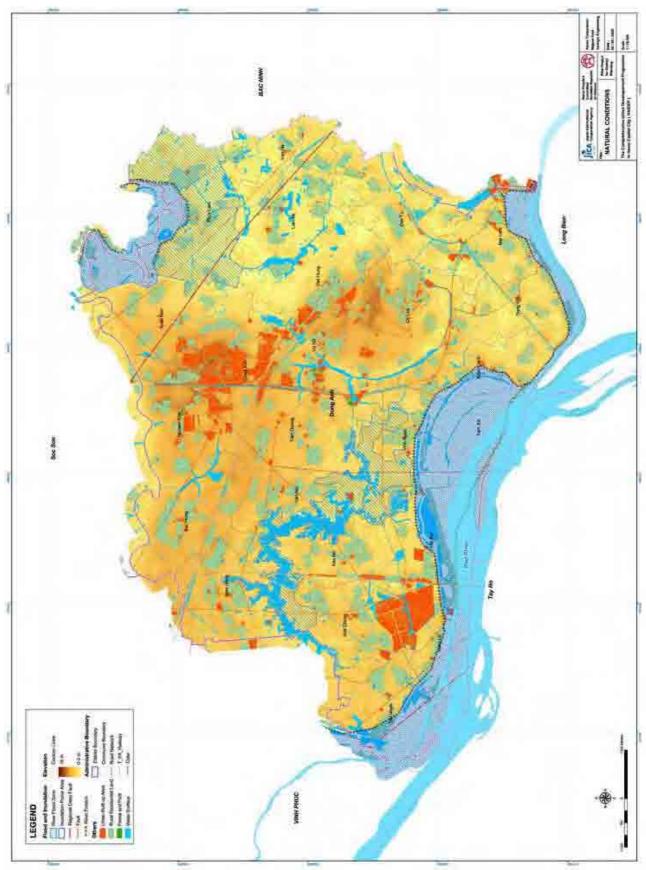
The terrain of this district is higher than the inner of Hanoi; however, it is still located in the area threatened by the flood disaster of Red river. Thus, the whole Duong and Hong dykes are the main barriers against the flood.

Previously, the district depended on agriculture as its major industry providing food/ vegetables to the City. But with the establishment of new factories, industrial and exports processing zones, there is a shift towards the industrial sector.

It can be said that the district maintains a balance of industry and agriculture land uses. The majority of the district's land (67%) is classified as agriculture, fisheries and forestry. There is a large protected water area having a surface area approximate to 10% of total land. Dong Anh has the largest industrial area in Hanoi or a total of 425.4ha. In the district, there are a number of craft villages in wooden furniture, jewelry, rattan/bamboo, and metal works. The industrial sector contributes to 27% of total employment in the district, whereas, the tertiary sector contributes about 29% to total employment. The District has 41.49ha of commercial and business land, the majority of which could be found in Dong Anh Town.

The urbanization process in the district happens relatively slow; therefore the change in land use from agricultural land to residential land is not a vital issue. Total residential land of the district is about 2,067ha and accounts for 11.3% of the whole area of the district. However, the majority of the population is poor and therefore average agricultural land per person is very low compared to that of Red River Delta (only 0.1ha/person). There is still a land fund of 2,400ha in the district that accounts for 13.15% of the whole district area including river, lake and other fallow.





Source: HAIDEP Study Team

	Population (1999)	260,871
	Population (2003)	275,756
Demographic Data	Share in Hanoi Total Population (%) (2003)	9.2
	Ave. Population Growth Rate 99-03 (%/yr)	1.40
	Gross Population Density (no./ha) (2003)	15
	Net Population Density (no./ha) (2003)	17
	Area (ha)	18,230
	Share in Hanoi Total Area (%)	19.8
	Agriculture, Fishery, forestry production (%)	67.0
	Industrial Areas/ Industrial Parks (%)	2.3
	Commercial and Business (%)	0.2
	Institutional, Government, Educational, Health & Security (%)	1.2
Land use (2005)	Religious and Cemetery (%)	0.8
	Urban Residential	0.8
	Rural Residential	12.9
	Transport Facilities and Utilities	2.6
	Environmental: Water and Forest for Protection (%)	10.2
	Parks and Open Space (%)	0.1
	Unused Land (%)	1.9
	Primary: Secondary: Tertiary (%)	44.6:26.6 :28.8
Industry Structure	Share of Population in Employment (%)	49.5
(Employment)	Daytime-Night time Employment Ratio (%)	1.02
	Daytime-Night time Student Ratio (%)	0.91
Household	Average Household Size	4.5
Information	Ave. Monthly Household Income (000VND)	1,993
	Ave. Travel Time (To Home) (min.)	18.7
Transportation	Ave. Travel Time (To Work) (min.)	18.1
	Public Transportation Usage (of all trips)(%)	2.3
Landagana Araga	Water Surface (ha)	813.29
Landscape Areas	Parks and Open Space (ha)	12.00
Compositivity	Household with Telephones (%)	66.9
Connectivity to Urban Services	Household with Mobile Phones (%)	20.7
Urban Services	Household with Internet (%)	2.1

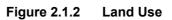
#### Table 2.1.1Profile of Dong Anh District

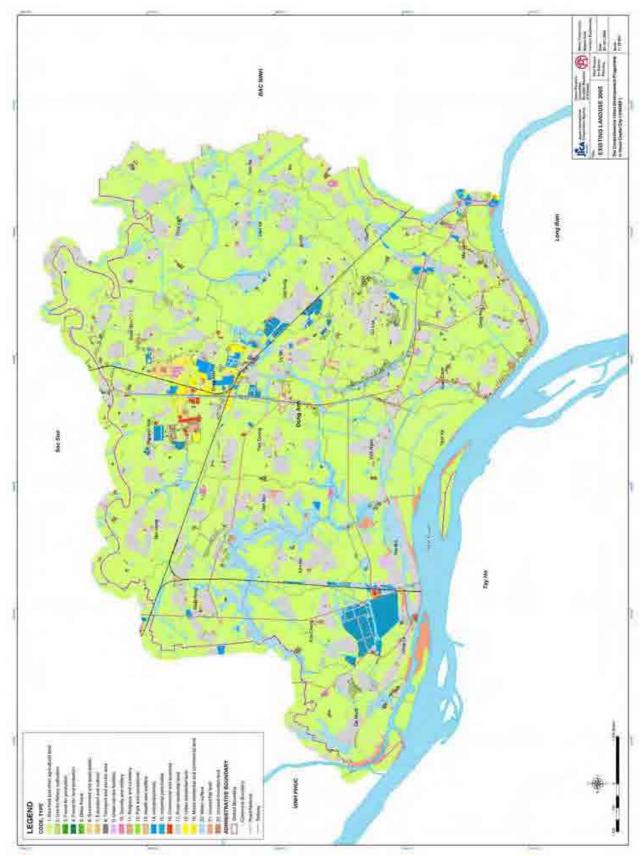
Source: HAIDEP-HIS, 2005

#### Table 2.1.2 Land Use

	Land Type	Hectare	%
1	Agriculture land and forestry	9,988.45	54.79
2	Special use	3,776.74	20.72
2.1	Construction	865.36	4.75
2.2	Transportation	1,153.54	6.33
2.3	Irrigation	1,183.37	6.49
2.4	Historical, cultural heritage	44.44	0.24
2.5	Defense and national security	94.27	0.52
2.6	Cemetery	160.94	0.88
2.7	Other special use	274.82	1.51
3	Residential land	2,067.41	11.34
3.1	Urban residential land	103.12	0.57
3.2	Rural residential land	1,964.29	10.77
4	Unused land	2,397.72	13.15
4.1	Lake, canal, river	1,831.66	10.05
4.2	Other unused land	566.06	3.11
	Total	18,230.32	100.00

Source: Land use data , 2003, DONRE





Source: HAIDEP Study Team

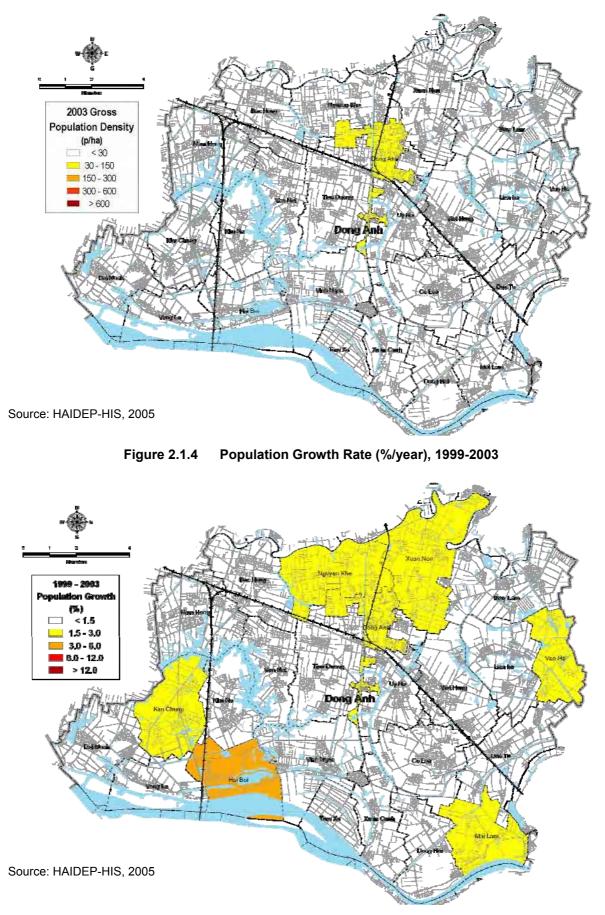


Figure 2.1.3 Population Density (person/ha), 2003

# 2.2 Socio-Economic Condition

Basically, the economic and social condition of Dong Anh is continuously developing, with all sources being exploited successfully. The rate of urbanization is in accordance with planning and is slowly towards the development of economic and social situation, thus improving material and spiritual life of the people. The economic and social exchanges are enhanced, leading to the attraction of investment and contributing to economic development. The political safety and social order are basically maintained. Production value of economic fields (agriculture, service, small scale industry) is on the rise. Besides, the value of production and export value is dramatically increased. In order to improve production relations, several service cooperatives have been newly established, the quantity of companies limited, private enterprises, joint venture companies and business individuals have been increased. The growth of economy will encourage the achievements of cultural and social activities.

However, in addition to the above achievements, there still exist several shortcomings. The targets on the increase of production value of the district economy, agriculture, small scale industry, on the quantity of "New-rural" communes, and the issuance of land use right certificate, have not been attained. The agricultural structure transference is low. The reoccupation of land and illegal construction still occur without effective preventive measures. Several key officers are not qualified enough and sometimes make mistakes that need to be corrected.

Dong Anh has 156 villages which were formed and developed a long time ago and are evenly distributed in the district. The old villages locate along the bank of Ca Lo, Duong, Ngu Huyen Khe River, and Co Loa Citadel; a fact that proves that the early settlers maximized the advantages of the terrain to form the villages.

As like the other countryside areas in Vietnam, Buddhism and ancestor-worship religion have deeply affected the people here with the development of communal houses, pagodas and temples of forefathers in the whole villages. However, some were destroyed by the war and time. After the large-scale restoring at the end of 19th century, almost all existing communal houses and pagodas were considered as the architectural heritages of the district and the country. Besides, there still exist the traditional houses which were mainly built at the beginning of the 20th century.

Commune		Population (1000 person)	Increase d rate (%)	Agri labour ('000 person)	Agri labour ratio (%)	Agri-land area (ha)	Agri-land average (ha/per)	No of house- holds	Residential land area (ha)	Residential land average (m <sup>2</sup> )
1	Dong Anh town	23.2				50.7		5146	109.1	212.1
2	Bac Hong	9.9	1.5	5.1	94.1	429.4	0.084	2281	102.9	451.2
3	Viet Hung	12.9	1.3	5.6	82.5	527.6	0.094	2962	110.7	373.7
4	Tam Xa	3.9	1.5	2.1	96.5	218.1	0.106	849	19.5	229.6
5	Kim No	9.9	1.1	4.8	95.9	275.5	0.058	2085	72.9	349.4
6	Van Noi	9.0	1.5	3.8	79.3	337.5	0.088	2033	108.0	531.1
7	Mai Lam	10.0	1.6	2.8	51.7	312.7	0.114	1989	57.5	289.2
8	Nam Hong	10.0	1.5	4.5	87.9	526.7	0.116	2381	98.1	411.9
9	Xuan Non	11.0	1.7	5.2	91.1	598.3	0.114	2468	137.1	555.5
10	§ong Hoi	8.6	1.7	3.7	77.8	376.4	0.102	2076	63.7	306.9
11	Uy No	12.0	2.0	4.5	69.2	366.8	0.081	2873	74.6	259.7
12	§ai Mach	9.0	1.4	4.4	93.3	456.9	0.105	1917	75.1	392.0
13	Xuan Canh	9.0	1.2	3.7	77.4	369.6	0.099	2171	74.5	343.2
14	Kim Chung	8.0	1.5	4.1	92.6	405.1	0.1	1828	77.6	424.7
15	Nguyen Khe	11.0	1.6	4.8	83.0	438.1	0.092	2420	123.0	508.2
16	Co Loa	14.0	1.3	6.7	88.0	494.7	0.074	3191	105.9	332.0
17	Thuy Lam	15.0	1.9	7.5	96.0	679.5	0.09	3344	123.1	368.0
18	Van Ha	8.6	1.7	3.8	92.0	352.8	0.093	187	42.7	236.3
19	Lien Ha	13.9	1.5	6.4	91.8	553.4	0.086	2656	76.0	286.1
20	Duc Tu	12.6	1.8	6.5	93.5	576.7	0.089	3194	73.7	230.7
21	Vinh Ngoc	9.2				537.4		193	76.8	403.4
22	Hai Boi	10.0	1.5	3.7	71.6	298.4	0.081	2229	77.2	346.4
23	Tien Duong	13.6	1.3	6.7	90.1	631.2	0.094	3070	128.4	418.3
24	Vong La	6.0				175.0		1157	59.3	512.3
	Total	260.1				9988.0		5830	2067.4	

 Table 2.2.1
 Current Situation of Labor and Population

Source: HAIDEP-HIS, 2005

Based on the HIS results, coverage of urban facilities such as sustainable water supply, sanitation facilities, solid waste collection, etc. are lower than the average of Hanoi City. Bus service coverage is quite low. On the other hand, amenities such as greens, water area and cultural facilities are sufficient.

Indicators	Dong Anh	Hanoi	Vietnam
CONVENIENCE	-0.25	0.13	
Access to Electricity (%)	99.0	99.6	76.0
Primary & Secondary School Enrolment (%)	94.7	95.1	86.2
Road Area Ratio (%)	1.3	1.7	N/D
"To Work" Travel Time (min.)	17.9	19.8	20.0
"To Work" trips by Public Transport (%)	3.1	3.5	N/D
Bus Service Coverage (%)	5.9	61.5	N/D
TV Sets per 1000 Population (#)	217	230	N/D
Telephone per 1000 population (#)	150	191	35
SAFETY & SECURITY	-0.50	-0.33	
Police Service Coverage (%)	41.7	65.4	N/D
Flood Vulnerable Area Coverage (%)	2.4	3.7	N/D
Household with Secure Tenure (%)	97.7	91.5	N/D
Emergency Response Capacity Coverage (%)	2.2	28.7	N/D
Motorcycles per 1000 population (#)	243	296	N/D
Traffic Injury per 100,000 population (#)	2,244	2,805	1,156
HEALTH & WELLBEING	-0.67	-0.50	
Accessibility to Sustainable Water Supply (%)	6.0	61.6	50.0
Coverage of Toilet/ Sanitation Facility (%)	55.5	79.8	41.0
Accessibility to Solid Waste Collection (%)	71.4	84.0	N/D
Vehicle Concentration (#)	540	1,754	N/D
Medical Personnel per 1000 Population (#)	6	15	N/D
Hospitals per 1000 Population (#)	0.06	0.03	N/D
AMENITY	0.33	-0.17	
Cultural Facilities per 1000 Population (#)	0.67	0.27	N/D
Water Area per 1000 population (ha)	6.38	2.65	N/D
Parks / Open Spaces per 1000 Population (ha)	0.04	0.08	0.10
Green Area per 1000 Population (ha)	40.70	16.37	N/D
Average Living Space per Capita (m <sup>2</sup> )	9.3	10.5	9.0
Gross Population Density (person/ha)	15	33	2.4
CAPABILITY	-0.50	-0.50	
Average Annual Income (US\$)	1,529	2,035	N/D
Vehicles (4&2-wheel) per 1000 Population (#)	62	105	N/D
Internet Connection per 1000 Population (#)	9	61	24
Mobile Phone per 1000 Population (#)	46	100	23

#### Table 2.2.2Living Condition Assessment

Source: HAIDEP-HIS, 2005, Population Census, 1999

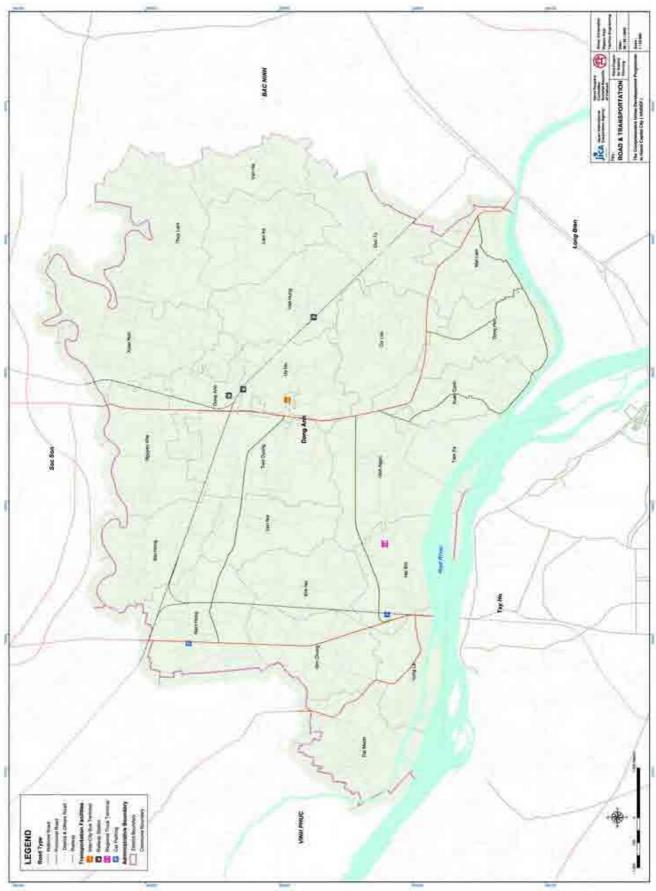
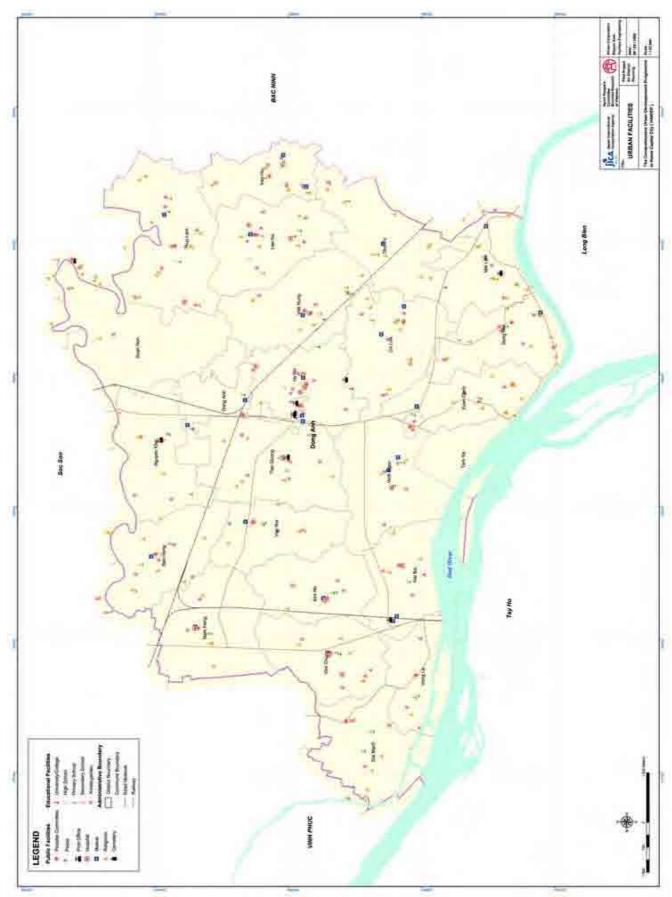


Figure 2.2.1 Existing Road and Transport Condition

Source: HAIDEP Study Team





## 2.3 Current Spatial Development Policies and Projects

Main development principles of the district are in conformity with development orientations of Hanoi City as proposed in the HAIDEP Master Plan. It includes 7 strategies:

# (1) Strategy 1: Create a spatial axis including "water surface", "green" and "culture" to guarantee the environment sustainability and strengthening the characteristics of Hanoi.

Water surface in Dong Anh should be organized as a continuous system which can be used for boat trip tourism and with Van Tri Lake as the center. This water surface system can also serve as irrigation and drainage system during the rainy season.

It is proposed that Co Loa be designated as the center of the green system of the district and become the large green area combined with cultural and historical heritage of Co Loa. From that green area, it could create a huge green area of the city. Other green areas in combination with water surface create tourism and recreational areas. Besides, green area can be considered as the insulation with main transportation routes, railways and the buffers between industrial zones and residential areas.

## (2) Strategy 2: Public transport oriented urban development to guarantee traveling ability of people and encourage social development in balance with environment protection.

Public transport routes in the district include Urban Mass Railway Transit (UMRT) and Bus Rapid Transit (BRT). Organizing principle is to locate high-density population near those routes to take full advantage of its service capability. Stations and transit points are located at a fixed distance and in the transportation hubs.

## (3) Strategy 3: Improve and revitalize built areas in the center of the city as well as outskirt areas.

In Dong Anh district, it should be focused in Co Loa area, center area of District, North Thang Long industrial zone, some villages and residential areas which need to be preserved.

## (4) Strategy 4: Develop new, modern and competitive urban centers to attract diversified and high quality investment for more job opportunities.

The center of Dong Anh will be determined as 2 main areas. The administrative area is the improvement of the current area. New commercial and service center will be built near the intersection of the National road No 5 extension and city railway from the center of Western West Lake.

# (5) Strategy 5: Develop effective infrastructure and service system to guarantee convenient and competitive socio-economic activities as well as provide affordable service for the people.

Infrastructure system should be planned in accordance with the city's general plan. The public service building system should be located down to the neighborhood level, the urban area that is outside of the city's overall system. The cultural, tourism and recreational buildings in Co Loa area and Van Tri Lake should also be given adequate attention.

## (6) Strategy 6: Prepare prevention and protection against natural and man-made disasters.

The major issues that should be paid attention to in Dong Anh are flooding in Red River banks and possible pollution from industrial zones.

## (7) Strategy 7: Strengthening institutional condition for urban management and effective management capacity.

Institutional issue is very important in the district plan and it should be examined and combined with land use planning.

## 2.4 Issues of Urban Planning and Development

## 1) Urban Planning

At present, Dong Anh district already has a detailed plan for the whole district (scale of 1/10,000) which was approved by the Hanoi People's Committee (HPC) and made public through mass media. This plan is the legal basis for further construction planning and land management activities in the district. The content of this plan focused on the physical aspects of urban development which are mainly land use distribution and infrastructure and transportation system. The following detailed plans are prepared for new urban areas on the portion of land which had a change in its designated function (land fund for urbanization): (i) Kim No golf and recreational project (128ha), (ii) Thang Long residential area project (275ha), (iii) Thang Long industrial zone project (294ha), and (iv) infrastructure investment and development project in North Thang Long – Van Tri (50ha). Thus, the rural area and old traditional villages are now urbanized completely and are located in the new urban areas. This was an oversight during construction planning, probably due to lack of funds or just lack of appropriate attention.

## 2) Land Management

A total of 81% of agricultural land and 37.5% of rural residential land are now provided with Land Use Right Certificate (LURC). In addition, the district administration has submitted a request to the HPC to grant House Ownership Certificate and LURC for 73% of the households. It is observed that land management activities in the district are not highly effective which result in land encroachment, re-encroachment and construction without permission, major problems which do not have appropriate solutions.

## 3) Conservation of Cultural Heritages

Besides the achievements attained for the conservation and improvement of the listed historical cultural heritages, there are still deficiencies in the management, improvement and repair activities in these cultural heritages. Utilization and development of cultural heritage are still ineffective, and level of socialization of heritage conservation is still low. Likewise, the level of people's awareness on heritage preservation and conservation is low and the investment is still very small as compared to the actual requirements.

## 2.5 Objectives and Planning Principles

## 1) Proposed Objectives

Socio-economic development plan of Hanoi for the period 2006-2010 encourages the development of a competitive city with sound living environment which can be shown in the following development objectives:

- (i) Speeding up of industrialization, modernization as well as regional and international integration.
- (ii) Promoting the socio-economic and cultural development in a comprehensive and sustainable manner.
- (iii) Strengthening regional stability of security and politics.
- (iv) Promoting infrastructure and superstructure development that makes solid foundation for city development.
- (v) Improving living condition and living standards for the people.

## 2) Key Planning Principles

- (i) Conformity and coordination with current planning
- Spatial development planning is in conformity with socio-economic development direction of Hanoi
- Regional planning direction
- General planning direction in 1998
- (ii) Regional and international integration
- (iii) Connect with residential areas of Hanoi and urban areas of neighboring provinces
- (iv) Connect other residential areas in Hanoi
- (v) Urban development and infrastructure, transportation development
- (vi) Urban-rural connection

The above planning objectives and principles of Hanoi are also the planning objectives and principles of districts, including Dong Anh.

## **3** STATUTORY DISTRICT PLANNING IN DONG ANH DISTRICT

## 3.1 **Principles on District Planning**

1) Conformity with Spatial Structure of General Plan

Dong Anh district will be formed in the following structure: District – Sub-district – Neighborhood.

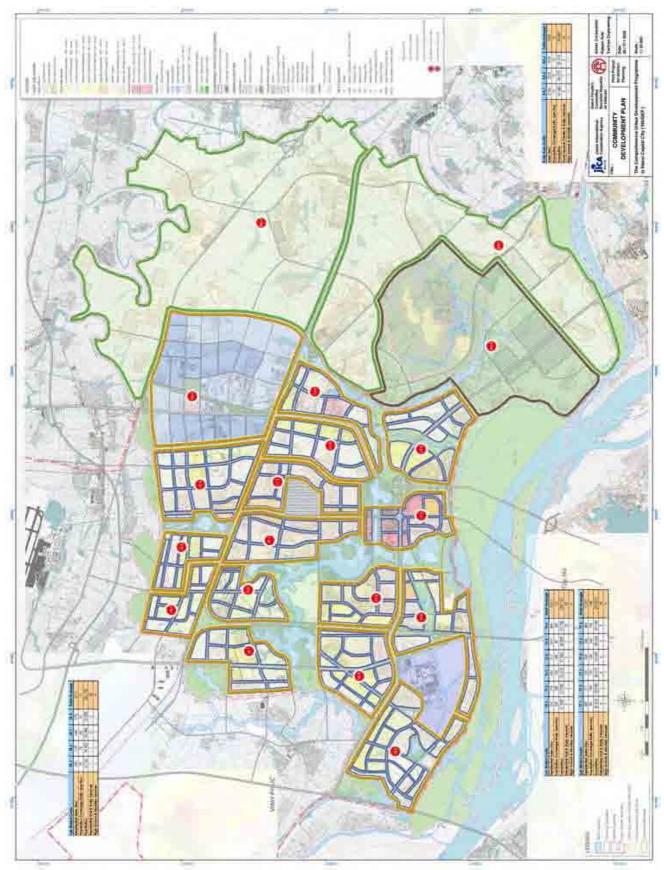
In the urban area, Neighborhood Units will be located with Elementary & Lower Secondary Schools and Daily Services; Secondary Schools & Sub-district Services will be located in the Sub-district.

In the rural area, it is formed in the structure with the smallest administrative unit or commune, and the three inter-commune areas with Secondary Schools & Sub-district Services in the center.

Sub-district Code	Residential Area (ha)	Population Coverage Ratio (per/ha)	Population	Neighborhood Unit & Daily Services	Secondary School & Sub-district Services
16.1	370	100	37,00	6	1
16.2	274	100	27,400	3	1
16.3	423	125	52,875	7	1
16.4	317	180	57,060	9	1
16.5	563	80	45,040	7	1
16.6	465	150	69,750	10	1
Sub Total / Average	2,412	123	289,125	42	6
17.1	409	90	36,810	4	1
17.2	311	180	55,980	7	1
17.3	363	125	45,375	6	1
17.4	305	120	36,600	6	1
17.5	306	160	48,960	6	1
17.6	465	150	69,750	9	1
Sub Total / Average	2,159	138	293,475	38	6
18.1	239	70	16,730	7	1
18.2	210	70	14,700	7	1
18.3	530	80	42,400	13	1
18.4	1,292	25	32,300	3	1
Sub Total / Average	2,271	61	106,130	30	4
Total / Average	6,842	113	688,730	110	16

 Table 3.1.1
 Proposed Community Development Plan of Dong Anh District

Rural Area Cod	Area (ha)	Population Coverage Ratio (per/ha)	Population	Rural Service Centre & Daily Services	Secondary School & Services
RA.1	2,156	15	32,340	6	1
RA.2	3,225	15	48,375	7	1
RA.3	1,958	15	29,370	5	1
Total / Average	7,339	15	110,085	18	3





Source: HAIDEP Study Team

2) Application of Proposed Statutory Spatial Control Measures

High-density population is located near the urban rapid railway and bus routes. Low rise building areas will be planned near green area and water surface.

Center area is planned in combination with residential area that makes the area livable, especially at night. At some location in the center, the building can be located near the water surface to create landscape for the area.

Residential areas may be located in the small and medium industrial clusters, with appropriate insulation distance.

- 3) Development Visions and Direction Establishment
- (1) Development Visions
  - (i) Eco-life Town to realize environmental-friendly new urban development in combination with attractive water-green nature conservation and convenient urban facilities development.
  - (ii) Innovative Urban Centre enabling to function advanced urban services for knowledgebased working place and fully self-sustaining urban service to support livable living place.
  - (iii) International Gateway Town encouraging competitive business service taking full advantage of efficient access to Noi Bai International Airport, industrial parks and Hanoi city center.
  - (iv) Livable Community Life to create a high quality living environment and sustainable community development by stimulating stewardship of local communities.
- (2) Development Opportunities
  - (i) International and regional wide business and industrial activities
  - (ii) Attractive rural environment and cultural resources should be enhanced
  - (iii) Existing rural villages need to be retained as "Urban villages"
  - (iv) Preventive urban development for natural hazard
- (3) Development Direction
  - (i) Strategic urbanization in conjunction with public transportation development
  - (ii) Compact urban development and land management
  - (iii) Integrated neighborhood formulation
  - (iv) Housing development
  - (v) Water and green area conservation and development
  - (vi) Co Loa Historical Centre as a special district area
- 4) Setting Spatial Development Framework (Population, Employment, Etc)
- 5) Development Issues and Policies

Dong Anh should be developed to be a modern urban area with complete facilities. It should be planned comprehensively and with flexibility, and in conformity with spatial planning and institutional planning.

## 3.2 Formulation and Applicability of District Plan

1) Spatial Development Concept

In the proposed Spatial Development Plan, the following planning factors shall be determined:

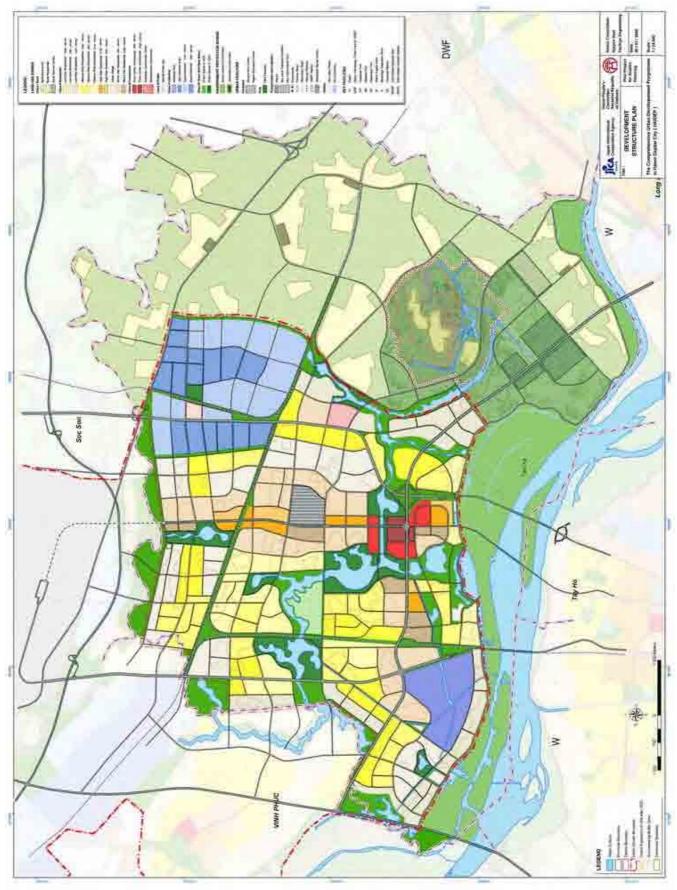
- (i) Land use (residential, commercial, industrial, etc)
- (ii) Urban function and activities centers
- (iii) Transportation and road
- (iv) Environment (green, water surface, historical conservation)
- (v) Landscape

In accordance with the land use zoning allocation principles, a "Land Use Plan" shall be developed as a part of Socio-Economic Development Plan with the following features:

- (i) Maximize land use purpose toward sustainable urban and rural development and conservation.
- (ii) Support Land Use Plan aimed at contributing and guiding public transportation oriented urban development.
- (iii) Formulate a compact city with high density settlement and mixed use land allocation to serve communities in a package of urban services.
- (iv) Establish an environmental-friendly city to minimize emission and negative impacts on living environment.
- (v) Allocate spatial structure by land use to sustain and improve existing community structure and environment.

Effective and rational land use control by zoning as the statutory plan shall be defined.

- (i) Zoning classes need to formulate best mix in order to establish similar or harmonized relationship among classes.
- (ii) Formulate good living environment in consideration with adequate density and spatial composition of zones and urban facilities.
- (iii) Formulate rational commercial and business areas in consideration with hierarchical function and activities in the district.
- (iv) Formulate adequate environment for industrial area by necessary buffer green and acceptable zone adjacent to it according to spatial structure of General Plan which sets spatial frame of economic corridor for industry.





## 2) Zoning According to Proposed General Plan

Land-use zoning class type for urban activities control shall be categorized as follows:

- (i) Commercial service center
- (ii) Politics administrative center
- (iii) Historical cultural heritage area (Co Loa)
- (iv) Golf area, sports area and recreation area (Van Tri)
- (v) Professional education and research area
- (vi) Industrial zone
- (vii) Small and medium industrial cluster
- (viii) New Urban area
- (ix) Improved traditional villages in the urban area
- (x) Rural residential area
- (xi) Infrastructure hub
- (xii) Agricultural production area
- (xiii) Water surface, green park
- (xiv) Special area for environment protection (riverside green, roadside, historical heritage, etc.)

In addition, spatial development control zoning measures (Floor Area Ratio, Building Coverage Ratio, Height control, Setback, etc.) shall be adopted.

This shall be determined in the land use plan, in accordance with the General Plan. The detailed table of land lot will be attached.

	Whole District		
Zoning Code	Area (ha)	Ratio (%)	Ratio in Urban (%)
Agricultural Land	4660.41	25.6	0.0
CD	1745.26	9.6	0.0
E-R Center	91.23	0.5	1.1
Residential Area	3252.40	17.8	37.7
Mix Used Area	855.43	4.7	9.9
Industrial Area	1469.38	8.1	17.1
Town Center	176.15	1.0	2.0
RR	1029.90	5.7	0.0
RSC	58.93	0.3	0.0
OG - NE	1080.37	5.9	12.5
Water	551.39	3.0	6.4
Urban Traffic	1143.70	6.3	13.3
Rural Traffic	316.17	1.7	0.0
Others	1799.62	9.9	0.0
Total	18230.33	100.0	100.0
Urban Area	8620.04	100.0	47.3

Table 3.2.1Proposed Land Use

3) Review and Designation of Key Public Facilities

Key infrastructure and public facilities plans shall be determined in line with the General Plan framework.

- (i) Road and transportation facilities (primary, secondary and key tertiary, bus terminal, truck terminal)
- (ii) Key utilities (water supply station, sewerage treatment plant, power substation)
- (iii) Research and education center
- 4) Review and Designation of Action Area

Development plan of block shall be proposed with identification and designation of priority blocks for urban development and conservation.

Classification	Sub-classification	Code
	1-1 Agricultural	AGL
Class I: Rural	1-2 Rural Residential	RR
	1-3 Rural Service Center	RSC
	2-1 Low-rise Residential	LR
	2-2 Medium-rise Residential	MR
Class II: Residential	2-3 High-rise Residential	HR
	2-4 Mixed Use Residential	MX
	2-5 Urban Village Area	UV
Class III: Commercial and	3-1 Town Center Commercial	TC
Business	3-2 Neighborhood Commercial	NC
Class IV: Public Use	4-1 Institution and Special Public Use Zone	SPU
	5-1 Industrial Park	IP
Class V: Industrial	5-2 Light Industrial Area	LI
	5-3 Quasi-industrial Area	QI
Class VI: Green and Open	6-1 Green Space in UCA	GS1
Space	6-2 Green Space in UDA	GS2

Table 3.2.2 Proposed Land-Use Zone Classes for District Plan

										(Bu	ildin	g Us	se) F	Perm	nissiv	ve G	Guide	eline	;					
			Re		Shop	os,	E	Busir		5/		Tou	rism		P	ublio	c Fa	cilitie	es	Fa	ctori	ies		
		house, dormitory, etc)		et	íc (E	over 1000 sq m)		offi	200 under 1000 sq m)			etc)	Karaoke, Massage, etc)			Other religious Facilities, cemetery,	Cultural Center, Museum		etc)				ing, Terminal, Repair Shop)	aste Disposal, Disposal, etc)
	sification -use Zoning	Residential (house, apartment, cooperative house,	Retail shops, Small Storage (e.g. floor area under 50 sq m)	Retail shops, Small Storage (e.g. floor area over 50 under 200 sq m)	Retail shops, Small Storage (e.g. floor area over 200 under 1000 sq m)	Retail shops, Small Storage (e.g. floor area	Office Government, etc (e.g. floor area under 50 sq m)	Office Government, etc (e.g. floor area over 50 under 200 sq m)	Office Government, etc (e.g. floor area over		Hotel, Other Accommodation Facilities	Entertainment, Leisure Facilities (e.g. Cinema, Theater, Dance, Hall,	Night Entertainment Facilities (Night Club, I	Sports and recreation Facilities. (Stadium, gymnasium, outdoor sports	Public Facilities. (Administration Police, Fire Station, Post Office, etc)	Religious Facilities (Temple, Church, Other	Education (pre-School, I, II, III class). Library,	High Education, Research & Development institution	Health, Social Welfare (Hospital, Daycare, Old age Home,	Wholesale, Large Storage, Distribution Facilities	Non-pollution light industry (e.g. Bakery, Traditional Handicraft, Agro-	Heavy and light and industry (metal, chemical, garment, electronics. etc)	Transportation and Services (Parking Building, Terminal, Repair Shop)	Special Utilities Facilities (Water-Sewer, Waste Disposal, Disposal,
	Agricultural Use Rural	-	-	-	-	-	0	-	-	-	-	-	-	-	-	0	-	-	-	0	0	-	0	0
I. Rural	Residential	-	-	-	-	-	•	-	-	-	-	-	-	-	-		-	-	0	-	-	-	-	-
	Rural Service	0	•	٠	•	0	•	•	0	0	0	0	0	0	•	•	•	0	•	-	-	-	-	-
	Low-rise	•	•	0	-	-	•	0	-	-	-	-	-	-	•	٠	•	-	0	1	-	-	-	-
П.	Medium-rise	•	•	•	0	-	•	0	-	-	-	-	-	0	•	•	•	•	•	-	-	-	-	-
Residential	High-rise	•	•	•	•	0	•		0	-	-	-	-	0	•	•	•	•	•	-	-	-	-	-
Residential	Mixed Use	•	•	•	•	0	•	•	•	0	•	-	-	-	•	٠	•	•	•	-	•	-	0	-
	Urban Village	•	•	0	-	-	•	0	-	-	-	-	-	-	•	٠	•	-	0	1	-	-	-	-
III.	Town Center	•	٠	٠	•	٠	•	•	•	•	٠	•	•	0	•	٠	٠	•	•	٠	0	-	0	-
Commercial/ Business	Neighborhood	•	٠	•	•	0	•	•	•	•	•	-	-	0	•	•	•	•	•	-	0	-	0	-
IV. Public Use	Institution and Special Public Use	-	о	-	-	-	-	0	0	0	-	-	-	•	•	-	-	•	-	•	-	-	•	•
	Industrial Park	-	0	-	-	-	•	•	•	0	-	-	-	-	0	0	-	٠	0	•	•	٠	0	•
V. Industrial	Light industry	-	0	0	-	-	•	•	•	0	-	-	-	-	0	0	-	٠	0	•	•	٠	0	•
	Quasi-industry	-	٠	0	0	-	•	•	•	0	•	•	0	0	•	٠	0	٠	0	٠	•	•	0	•
VI. Green	Green space in UCA	-	•	0	-	-	•	0	-	-	-	-	-	•	0	-	-	-	0	-	-	-	0	0
and Open Space	Green space in UCA	-	ο	-	-	-	0	-	-	-	-	-	-		-	-	-	-	-	-	-	-	0	ο

## Table 3.2.3 Development Limits by Land Use Class for Planning Permission

	Propos
Sub-Classification	Proposed Land-use Zoning
'●' 1 Residential	0
o o ' 2 Private business / School	Civil Area
• ' ' 3 Urban center / public service	
• ' ' 4 Entertainment, green	Cons
• ' • 5 industry and storage	Construction Law Non-Civil
' ' 6 Transportation area	Non-Civil Area
' ' 7 Administrative area for infra	Civil
' ' 8 Nuisance facilities (cemetery, etc)	Area
' ' 9 Special areas (military, etc)	
' ' 10 Special green areas (water)	
' ' <sup>O</sup> 11 Reserved area for future expansion	
' ' 1 Land for cultivation of annual crops	Ag
2 Land for growing perennial trees	Agricultural Land Group
' ' 3 Production forest land	ural
4 Protective forest land	Land
5 Special-use forest land	Gr
	quo
	[5
<ul> <li>8 Other agricultural land</li> <li>9 Residential land</li> </ul>	and I
<ul> <li>o</li> <li>o</li> <li>'</li> <li>10 Land for construction of offices</li> </ul>	Land Law 2003 Non-/
' ' 11 Land u for defense and/or security	v 2003 Non-Agricultural Land Group
o ' ' 12 Land u non-agricultural product or	Agric
o o ' 13 Land used for public-utility purposes,	ültur
• • ' 14 Land used for public-utility	
• • ' 15 Land with work of communal, etc	and (
' ' <sup>o</sup> 16 Land for cemeteries, grave – yards	Grou
' ' 17 Waste surface areas	q
' • 18 Other non-agricultural land	

 Table 3.2.4
 Proposed Land-Use Zoning Classification by Land Use Categories

Urban Planning	Sub Catagory	C	ode	Donaity	Build	ling Contr	ol (max)
Category	Sub-Category	GP	DP	Density	FAR	BCR	Height
Land Use Zoning	Zoning Classification						
Ŭ	Agricultural Use	A	GL				
I. Rural	Rural Residential	F	R		2.0	0.5	16m
	Rural Service Center		SC		2.0	0.5	16m
			LRL	Low		0.5	
	Low-rise Residential	LR	LRM	Mid	2.0	0.6	4 storey
			LRH	High	3.0	0.8	/ 16 m
			MRL	Low	3.0	0.4	0 - 1
	Mid-rise Residential	MR	MRM	Mid	4.0	0.5	8 storey
II. Desidential			MRH	High	5.0	0.7	/ 32 m
II. Residential	Llink rice Desidential		HRL	Low	4.0	0.3	15 stores
	High-rise Residential	HR	HRM	Mid	5.0	0.4	15 storey
	Mixed Llee	MAX	MXM	Mid	4.0	0.5	8 storey
	Mixed Use	MX	MXH	High	5.0	0.7	/ 32 m
		1.11.7	UVL	Mid	2.0	0.5	4 storey
	Urban Village	UV	UVM	High	2.0	0.6	/ 16 m
	Tours Conton	то	TCM	Mid	6.0	0.6	
III. Commercial/	Town Center	тс	TCH	High	10.0	0.8	
Business	Naishbashaad Cararaaraial	NO	NCM	Mid	4.0	0.5	
	Neighborhood Commercial	NC	NCH	High	5.0	0.7	
	Industrial Park		P		2.0	0.3	
	Light Industrial Area		LIL		2.0	0.3	
IV. Industrial	Light Industrial Area	LI	LIM		4.0	0.7	
		0	QIL		2.0	0.5	
	Quasi-Industrial	QI	QIM		4.0	0.7	
VI. Green & Open	GS in UDA	G	S1				
Space	GS in UCA	G	S2				
V. Dublic Llos	Institution and	<u> </u>					
V. Public Use	Special Public Use	5	PU				
Environment Protect	ction and Promotion Zoning			- -			
1. Natural Hazard C	Control Area	N	HA				
2. Historical Heritag	ge Conservation	Н	НС				16m
			AQ		3.0	0.8	16m
			FQ		6.0	0.6	36m
3. Landscape Cont	rol Area	LCA	TAQ		2.0	0.5	16m
			CLT		2.0	0.5	16m
			NS		2.0	0.5	16m
4. Rural Environme	ent Promotion Area	Т	PA				
Key City Facilities	Designated Area						
	Government Center	C	SC				
1. Institution	Higher Education &	E	RC				
	Research Center		KC				
2. Rural Service	Rural Service Center		SC		2.0	0.5	16m
3. Park & Green	Key Park Facilities	F	٣F		1.0	0.05	
	Airport Facilities	ŀ	١F				
	Key Land Transport		/W/Bt				
4. Transportation	Key Inland Water Port	CP/F	P/MP				
and Logistic	UMRT/BRT/Stations						
	Davas and Davad						
	Primary Road						
	Secondary Road						
					 2.0	 0.3	
5. Utilities	Secondary Road	W					

## Table 3.2.5 Proposed Spatial (Building) Control Guideline in District Planning

Source: HAIDEP Study Team

Note:

GP = General Plan D = Depot CP = Container Port W = Water DP = District Plan W = Workshop MP = Material Port S = Sewerage F = Fleet Yard BT = Bus Terminal PP = Passenger Port WDP = Waste Disposal Plant

Catagory	Component	Role	s & Responsib	ilities	Applicable
Category	Component	Public	Partnership	Private	Development Measures
Station Area	Intermodal Transfer Facilities	•			- Expropriation (Ex) - Land Readjustment (LR)
Development	Commercial Business Facilities		0	●	- LR - Land Subdivision (LS) - Urban Renewal (UR)
	Housing Development	0	•	•	- LR - UR
Residential Area Development	Land Subdivision		•	•	- LS
	Urban Village Improvement	•	0		- Infill Development (IND)
	Research Institutions	•	0	0	- Ex or Land Acquisition (LA)
Key Public Facilities	Museum and other cultural facilities	•	0		- LR
Development	Park and Open space facilities	0	0		- Ex - LR - Commune donation
Industrial Area	Industrial Park (FDI)		0	•	- Ex - LA
Development	Other Industrial Area	0	0	•	- LR - LS
Road Corridor	Business & Commercial Facilities			●	- LR - LS
Development	Advertisement	0		•	
Rural Area	Village Living Condition Improvement	0	0	•	- IND
Improvement	Village Economic Development	•	0	0	- IND
Water Management Drainage System De	and	•	0	0	- Expropriation (Ex) - Land Readjustment (LR)
	Transport Service	•		0	
Key Infrastructure Development	Utilities	•		0	- Expropriation (Ex) - Land Readjustment (LR)
	Other Services			0	

Table 3.2.6	Role and Responsibility by Sector for Dong Anh Urban Development

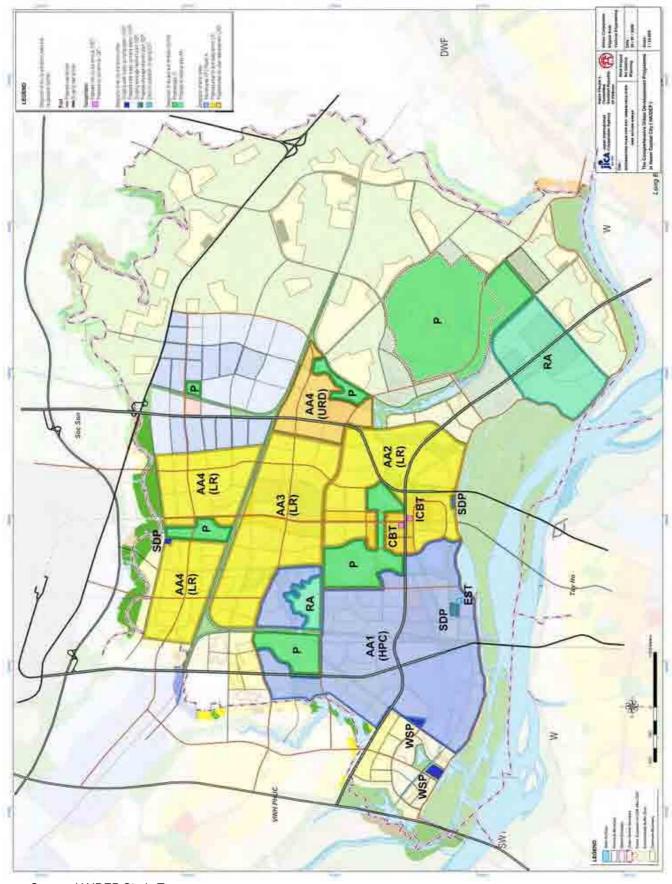
Source: HAIDEP Study Team Note: • = major role,  $\circ$  = supporting role, -- = minor role

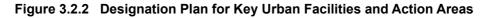
Category	Component	Regulatory	Incentive-based in conditions	Voluntary	Non-regulatory
	Intermodal Transfer Facilities	<ul> <li>Land Use Zoning (transportation facilities)</li> </ul>		 - Floor provision	<ul> <li>ITF Design Guideline</li> </ul>
Station Area Development	Commercial Business Facilities	<ul> <li>Land Use Zoning High density (FAR, BCR, SB)</li> <li>Infrastructure Provision</li> </ul>	a density (FAR, - Transfer of R, SB) development right Istructure - Tax incentives		- Urban Design - Guideline
	Housing Development	<ul> <li>Land Use Zoning</li> <li>High, mid, low density (FAR, BCR, SB)</li> <li>Infrastructure Provision</li> </ul>	<ul> <li>Density bonus</li> <li>Tax incentives</li> <li>Revenue sharing</li> </ul>		- Social Housing Provision
Residential Area Development	Land subdivision	<ul> <li>Land Use Zoning low density (FAR, BCR, SB)</li> </ul>	<ul> <li>Minimum lot area modification</li> <li>Tax incentives</li> </ul>	<ul> <li>Public open space and pedestrian</li> </ul>	<ul> <li>Subdivision</li> <li>Development</li> <li>Guideline</li> </ul>
	Urban Village Improvement	- Infrastructure Provision in conjunction with neighboring residential development	<ul> <li>Transfer of development right</li> <li>Tax incentives</li> </ul>	network	<ul> <li>Urban Village</li> <li>Design</li> <li>Guideline</li> </ul>
Key Public	Research Institutions Museum and other cultural	<ul> <li>Land Use Zoning (public facilities)</li> </ul>		<ul> <li>Public open space and pedestrian network</li> </ul>	<ul> <li>SDEP</li> <li>Public</li> <li>Facilities</li> <li>Design</li> </ul>
Facilities Development	facilities Park and Open space facilities	<ul> <li>Land Use Zoning (green space)</li> </ul>		<ul> <li>Commune         <ul> <li>easement for</li> <li>public</li> <li>Purchase of</li> <li>land use right</li> </ul> </li> </ul>	Guideline - SEDP
Industrial Area Development	Industrial Park (FDI)	<ul> <li>Land Use Zoning (Industrial Park)</li> </ul>	<ul> <li>FDI Investment guarantee</li> <li>FDI Tax exemption</li> </ul>	<ul> <li>Advanced infrastructure for low mission</li> <li>Landscaping</li> </ul>	<ul> <li>Factory Environmental Guideline</li> </ul>
Development	Other Industrial Area	<ul> <li>Land Use Zoning (Quasi-Industrial)</li> </ul>	<ul> <li>New Investment guarantee</li> <li>New Tax incentives</li> </ul>	<ul> <li>Necessary infrastructure and services</li> </ul>	
Road	Business & Commercial Facilities	<ul> <li>Land Use Zoning (Corridor Commercial)</li> </ul>			<ul> <li>Road frontage use Guideline</li> </ul>
Corridor Development	Advertisement	- Regulation			<ul> <li>Facilities</li> <li>Design</li> <li>Guideline</li> </ul>
Rural Area	Village Living Condition Improvement	<ul> <li>Land Use Zoning (Rural Residential)</li> </ul>		<ul> <li>Donation or contributions to common facilities</li> </ul>	- SEDP
Improvement	Village Economic Development	<ul> <li>Land Use Zoning (Agriculture land)</li> </ul>			
Water Manager Drainage Syste	nent and m Development	<ul> <li>Land Use Zoning (water surface/ Green Space)</li> </ul>			<ul> <li>Urban</li> <li>Construction</li> <li>Plan</li> </ul>
Key Infrastructure	Transport Service Utilities	<ul> <li>Land Use Zoning (public facilities)</li> </ul>	- Subsidies, tax incentives		
Development	Other Services	1			1

## Table 3.2.7 Examples of Regulatory and Non-regulatory Support for Urban Development

		R	ole		Location			
Category	Function	Capital Role	Urban Service	Desirable Facilities	Van Tri	Dong Anh	<b>Other</b> :	
	State Management & Politics							
Commercial	International Trade & Communication	•		World Trade Center. Satellite Telecom Center, Airport business service Center	•	0		
and Business	City Trade & Market	0	•	Regional Wholesale Market (commodities)	0	•		
	New Business Center	0	•	Software Development Center, Incubation Center for Local product Promotion Product Design Center	•	0		
Industry	Industry Park and Light Industry	•	0	Export oriented Industrial, Estate, Supporting industrial Park, SME Industrial Village		0	•	
and Logistic	Logistic Services	•	0	Regional Logistic Terminal, Urban Service Logistic Center	0	0	•	
Education	Research and Development	0		Research & Institutions for Light Industry Advanced Technology Training Center	•			
and Culture	Human Resource Development Services	0	0	Management Training Center, Vocational Development Center	0	0		
	Museum and Art & Entertainment	•	0	Modern Art/ Performance Theater/ Amusement Park	•	0		
Tourism	Rural Handicraft Centers	•	0	Handicraft Trade Center, Tourist Information Center	0	0	•	
and Recreation	Sports and Recreation	•	•	Van Tri Lake Resort Area, Golf Course Club, International Tennis Club, Cycling network	•	0	0	
Health and Medical	Regional Health Care	0	0	Regional Health Care, Center, Regional Referral Center	0	•		
Care	Emergency Medical Service	0	0	ER Center, General Hospital	•	0		
	Administration and Civic Services		•		•	•	0	
Basic Urban	Compulsory Education Service		•		•	•	•	
Services	Health and Social Welfare		•		•	•	0	
	Social Security Services (police, fire-station)		•		•	•	0	

Source: HAIDEP Study Team Note: • = major role, ○ = supporting role, -- = minor role





Modification of Land-use Zoning Classes shall be considered, if necessary:

## (1) Park and Green Space zone

<Basic Principles>

- (a) Green and Park system
- (i) City park: important green and park as the capital city level
- (ii) District park: central district park and other sub-district park
- (iii) Green network for recreation
- (iv) Buffer green for mitigation of negative environment and landscape impact

## (b) Green Network

- (i) It should be planned as a part of park system to connect with key parks to be designated, where sports and recreational routes such as cycling and jogging route need to be formulated.
- (ii) It will play an important role in making visual corridor where landscape corridor is required from urban design point of view.
- (iii) It should support water network where existing waterways or proposed one needs to be secured by natural environmental buffer area.
- (iv) Major roads are interpreted as a part of green network with trees on street sidewalk.

## (c) Buffer green

- (i) Along road and railway in case of necessity need to be based on the criteria except places where visual effectiveness or other purpose is required by wider green area than the criteria listed below.
- (ii) Effective width to mitigate noise: Minimum is 20m and Optimum is 50m
- (iii) Industrial corridor where mitigation measures against noise and air pollution will be required by buffer green needs certain level of buffer green along industrial zones (50m).
- (iv) Buffer green should utilize existing green including paddy field and other agricultural land and trees with adequate institutional support if it requires wide and large areas to be designated. Otherwise, it should be minimized in terms of financial issue for investment.
- (v) Buffer green for industrial area should be designated in proper scale and range in order to keep comfortable environment of other zones, especially related zones for living.

<Consideration for Donh Anh District>

- (i) Green and Park system
- City park: Van Tri Lake Recreational Park
- District park: central district park in CBD area and others
- (ii) Thang Long Industrial park needs to take buffer area even if it is narrow strip between IP and other zone including Thang Long - Noi Bai road as model of industry area development for the future.
- (iii) It is necessary to reconsider the greenbelt in Kim No commune along NH5 to maximize road development benefit by corridor use by urban activities except crossing river and green and Co Loa green area.

(iv) Waterway with green network is one key element to realize the strategy of "Green, Water, Culture" concept by sustaining and creating waterways not only for drainage and landscape but water transport route and biological corridor. So all waterways proposed are basically agreeable as they are matching with requirement of green area (16% of total area as required by HPC).

## (d) Urban Village

<Basic Principles>

- (i) An existing village where community and traditional cultural activities are still ongoing should be designated as an Urban Village.
- (ii) Urban village zone requires harmonized zones in its adjacent areas, such as Low-rise Residential zone and medium-rise zone where gradual change of urban design from low-rise to high-rise should be applied.
- (iii) Existing villages in which major road, new business & commercial area (TCC, NC) and high-rise residential area are proposed in adjacent area should designate Mixed use Residential which allows various urban activities and FAR, BCR rather than Urban Village zone.

<Consideration for Donh Anh District>

- (i) Mixed use Residential zone may be appropriately applied to a part of Kim No commune village next to NH5.
- (ii) It may be necessary to change zone class of the village along proposed UMRT Line 2 from Urban Village to Mixed Use Residential zone.
- (iii) Existing villages with the advantage of proximity to primary road or other commercialbusiness use area need to be designated as Mixed Use Residential zone where urban activities will gradually change building use from residential to other use. However, spatial structure of village will be retained with necessary improvement of utilities and access roads.

## (e) Low-rise Residential Area

<Basic Principles>

- (i) This zone is applied to areas adjacent to Urban Village zone including existing villages in principle where village need to be kept for conservation of traditional community environment and creation of harmonized landscape.
- (ii) Low-rise zone having the advantage of little visual obstacle and low population density without heavy negative environmental impact is also fit to areas with natural greenery area or historical heritage area in terms of harmonized landscape and visual access consideration.

<Consideration for Donh Anh District>

- (i) Adjacent areas to major villages which are located in remote areas far from the primary road (NH5, NH3, Thang Long-Noi Bai road) or proposed commercial and business areas are considered for application of this zone.
- (ii) Area surrounding Co Loa historical area is required to apply this zone.
- (iii) Area in waterfront such as Red River, Van Tri Lake and other canals or lakes is ideal to apply this zone.
- (f) Medium-rise Residential Zone

<Basic Principles>

- (i) This zone of which range of FAR and BCR is wider than other residential zones will play a key role in setting population distribution from various planning perspectives: in terms of type of housing type plan (e.g. row house, terraced housing, conventional houses in the city and other collective housing) and density allocation.
- (ii) Medium-rise zone provides intermediate function of residential area between high-rise and low-rise or urban village zone in terms of urban design in combination with building height and density.
- (iii) This zone is desirable to be applied to areas where a new big land area for planned housing development can be prepared or similar type of residential area has been developed

<Consideration for Donh Anh District>

- (i) Area along primary roads (NH3, NH5 and Thang Long-Noi Bai road) is suitable to be applied by this zone as major settlement areas unless existing villages exists.
- (ii) This zone is expected to generate major population settlement areas since it is located in the northern part of the District and is near the industrial area, thus, a convenient commute from residence to work place (industrial area).

## (g) High-rise Residential Zone

<Basic Principles>

- (i) This zone is desirable to be applied to areas where land development effectiveness is required due to high cost of land or sustainable environment development, having the advantage of wider green and open space.
- (ii) This zone will play a key role in providing high density residential area according to the urban development strategy of public transportation-led urban development along UMRT Line 2 Corridor.
- (iii) High-rise residential zone has a considerable function to formulate distinct urban form which generates urban skyline and open space landscape to be introduced strategically.

<Consideration for Donh Anh District>

- (i) Area along proposed UMRT Line 2 is necessary to be applied by this zone, especially in areas near the UMRT station, unless existing villages exist in those areas.
- (ii) Area adjacent to Mixed Use Residential or Medium-rise Residential zones is ideal to be applied by this zone in order to create harmonized urban landscape with gradual change of urban skylines.

## (h) Mixed Use Residential

<Basic Principles>

- (i) Mixed Use Residential zone is one of localized category and tool to achieve "Compact City" for Hanoi where various urban activities will be allowed unless they are industrial related zone or large scale business commercial which is already causing problems to and unsuitable for living environment.
- (ii) Mixed Use zone is applied to areas flexible to cover various ranges of urban activities in order to support solid use zone of commercial business zone and link with other residential related use gradually.

(iii) Mixed Use zone is also applied to areas where medium-high dense area is desirable and suitable to formulate livable commercial and business area.

<Consideration for Donh Anh District>

- Mixed Use residential zone is desirable to be applied to areas beside of Van Tri Town Center, Dong Anh Administrative Center and Neighborhood Center.
- Area along Thang Long-Noi Bai road is considerable area to be applied by this zone, especially due to its proximity to Industrial Park and existing commercial center including Me Linh Plaza and Hotels.
- Existing villages having the advantage of proximity to NH5 and UMRT Line 2.

## (i) Rural Residential

<Basic Principles>

- (i) This zone aims at sustaining existing community socio-economically and spatial structure physically, taking account future expansion of villages in order to support village improvement and development.
- (ii) Rural residential zone is applied compulsorily to existing villages in UCA and will have limits to expand and modify the range of zone in order to avoid disordered settlement and urban sprawl.
- (iii) This zone belongs to one of low-density residential areas to retain population structure of existing villages without expectation of large social migration to villages.

<Consideration for Donh Anh District>

- (i) Rural residential zone is applied to all existing villages in the eastern area of the district as UCA including Co Loa historical center area.
- (ii) Existing villages in the eastern part of Dong Anh district play an important role in producing handicraft and traditional products as handicraft villages. Zoning needs careful consideration for improvement and encouragement of economic development of villages and conservation of traditional environment of villages.
- (iii) Existing villages in Co Loa area are required to give special attention to conservation of historical landscape and environment taking account of "Development Guideline for the Village" to support regulations and incentives of this Zone.
- (iv) Existing villages in the Mai Lam Commune are designated by "Park and Green Space Zone" which allows residential use with conditions of activities will be maintained.

## (j) Rural Service Center

<Basic Principles>

- (i) This zone aims at promoting several services for socio-economic development of existing villages in UCA in terms of improving agricultural business, strengthening commercial business, healthcare and other necessary public services.
- (ii) A rural service center zone is applied to one location which is at the least in proximity to villages within a commune administration and where villagers can conveniently access to.
- (iii) This zone also requires to secure access road to facilities within the zone, such as a link with a commune and arterial roads

<Consideration for Donh Anh District>

- (i) This zone applies to five areas which cover each commune of Dong Hoi, Viet Hung, Lien Ha, Van Ha, and Thuy Lam.
- (ii) Existing handicraft villages in the eastern part of the District should have necessary support by effective services such as communal facilities for improvement of product skills and quality, market information delivery, other product related services.

## 4 INSTITUTIONAL ASPECT FOR URBAN DEVELOPMENT MANAGEMENT

In order to have a foundation for ideas and solutions for Dong Anh District Plan, nine cases were examined in Dong Anh or parts of Hanoi City that may have a similar situation with Dong Anh in the near future. Nine cases were examined involving the following:

- (i) Institutional Aspects of District Plan Making;
- (ii) Managing Land use Development along Le Van Luong (Lang Ha-Thanh Xuan) Road Corridor;
- (iii) Industrial Development Project;
- (iv) Housing Development Project;
- (v) The Compensation and Resettlement of a Road Project;
- (vi) Small Housing Project Involving Agriculture Land;
- (vii) Individual House Construction Involving Subdivision of Land and Building;
- (viii) Change of Building Use from Residential to Commercial; and,
- (ix) Development of a Small and Medium Scale (SME) Industrial Enterprise by a Local Investor.

The results of the studies are summarized as follows;

## Table 4.1.1 Case Study 1: Institutional Aspects of District Plan Making

NAME: Institutional Aspects of District Plan Making         PURPOSE: To evaluate the existing district planning system and see what can be done to improve it.         LOCATION:       Dong Anh District, Hanoi City.	
LOCATION: Dong Anh District, Hanoi City.	
<b>DESCRIPTION:</b> The second tier urban plan in the HAIDEP proposal is the District Plan. Both the physical planning component (form and content) and the institutional framework to support the preparation and implementation of the plan are necessary to establish a viable district planning system.	
KEY ISSUES:	
<ul> <li>An uncompleted, unspecific and impractical legal framework in planning and urban d management;</li> </ul>	evelopment
<ul> <li>Inappropriate planning method cannot meet the demand and speed of urban development. Th been a good and cooperated planning among sectors;</li> </ul>	
<ul> <li>Planning consultation with community and stakeholders during the formulation process of plann is not done in accordance with legal regulations;</li> </ul>	
- The budget allocated for making plans is not sufficient, which leads to the discrepancy in the and appraisal of planning projects;	
<ul> <li>Lack of qualified staff, especially nowadays when urban planning and development manage become technology dependent; and,</li> </ul>	-
<ul> <li>Data systems of sectors and agencies are not linked and shared (not sufficiently collected, n updated for urban planning and environmental management.</li> </ul>	or regularly
SUGGESTIONS:	
(a) For making District Construction Plan	
- To build up and apply an integrated and flexible methodology for construction planning and tes Anh District;	t it in Dong
- To establish and activate a district database applying GIS technology for construction planning;	0.000000
<ul> <li>To increase budget available for conducting construction planning following its activities i. baseline data collection and consultation with stakeholders;</li> </ul>	e. surveys
<ul> <li>To set up the methods, schedules and contents for collecting, processing as well as to collection of stakeholders' ideas/opinions given to the construction plans in compliance with regulations;</li> </ul>	
- To improve the planners and urban managers of district and communes' capability for analysis, a and selection of planning options, and broaden knowledge in protecting environment; and,	assessmer
<ul> <li>To allow the Municipality and the central government in creating a local investment incentives co Anh District.</li> </ul>	ode in Dong
(b) For implementing the District Construction Plan:	
<ul> <li>There should be a complete system of legal documents and decentralization with sufficient and and guidance for preparing, implementing construction plans set up by a flexible method in the commune levels;</li> </ul>	
- Pilot testing on hiring consultants for making, implementing and managing urban construction Dong Anh District;	planning i
<ul> <li>Fully implement the Government requirements on the announcement and public exhibition of or plans which have been approved. Setting up commune level working teams (include experts to representatives of local government and community based organizations) to explain the constri- and/or any project permitted to be conducted in the area. In one hand, to distribute to househ other hand to exhibit all the documents of detail construction plan at commune headquarters. The provision of planning information at the commune headquarters;</li> </ul>	ogether wit ruction pla olds and i
<ul> <li>Setting up landmarks on site according to approved construction plan and announcing the areas construction works are restricted or prohibitive. Assigning the local groups to control the man landmarks according to the regulations of the Commune People's Committee;</li> </ul>	agement c
<ul> <li>Assisting and cooperating with the street community groups and households to clearly identify the existing status on the rights and liabilities in using their land and assets before implement construction plans or projects; and,</li> </ul>	
<ul> <li>Encouraging the street community groups to observe construction licensing and to supervise of works of investors following the construction permits granted, to suggest local authorities in treat the construction field at place.</li> </ul>	

## Table 4.1.2Case Study 2: Managing Land Use Development

**NAME:** Managing Land use Development along Le Van Luong (Lang Ha-Thanh Xuan) Road Corridor.

**PURPOSE:** To evaluate how conflicting and competing landuse development are managed along the road corridor.

**LOCATION:** The road is located southwest of Hanoi City, at Nhan Chinh Ward-Thanh Xuan District and Trung Hoa Ward – Cau Giay District.

**DESCRIPTION:** Le Van Luong Road Corridor is newly developed, in accordance with approved Detail Plan of Lang Ha– Thanh Xuan road corridor at scale of 1/500. It is defined as a local main road, with a 40-53m section and has been constructed simultaneously with the road and its corridor to ensure a civilized and integrated urban landscape.

The whole road corridor was planned and constructed along with Hoa Muc-Nhan Chinh irrigation canal, in which both sides are mix used functions of agriculture land and low density built-up areas, including residence, institutions, industry, cultural heritage, military and cemetery. The model for carrying out this project is as follows:

- The Hanoi City Council selects investor. The Hanoi Housing Investment and Development Corporation (HANDICO) were selected to build the road infrastructures, mobilizing VND 175.5 billion partly from its own capital and partly from city budget. And then HANDICO was given priority to develop land use along the road corridor for Trung Hoa-Nhan Chinh II New Urban Area and other separate projects of apartment and office for rent.
- Project Management Unit of Lang Ha Thanh Xuan Construction and Investment under HANDICO was also established to carry out functions and tasks of project management as the investor.

#### KEY ISSUES:

- Legal documents on regulations for heritage protection, urban tree protection, advertisement permits... have been issued by Government, Ministries and Hanoi People's Committee and brought in force, but ineffectively applied in practice;
- Land use development control instruments, such as FAR, BCR, red line, setbacks are clearly defined in Detail Plan for the Le Van Luong Road Corridor, at scale of 1/500. However, in practice only red line and setback are relatively guarantied, while FAR and BCR values are usually adjusted albeit exceedingly;
- Land use functions conform to statutory plan which might have been slightly changed, but progress of buildings construction along the road corridor is delayed especially for social infrastructures and public services. Some land lots that are waiting for project implementation are fenced and are temporarily used with different uncontrolled functions or left unused;
- Standard procedure in checking the condition for a headquarter or place of business is ignored in business license issuance;
- The monitoring and checking system on development activities in the area are quite effectively operated, although Construction Inspector Force of Cau Giay and Thanh Xuan District still lack staffs and jurisdictions;
- The enforcement procedures for unauthorized development are still complicated. Punishments for administrative violations are strict in legal documents, but lack enforcement in implementation;
- Conflict between the citizen and the City Government on land compensation and clearance for construction investment projects at Hoa Muc Old Village, and also in conservation and economic benefit aspects.

#### SUGGESTIONS:

- HPC should reinforce investment budget for investigating and setting up detail plans for construction and renovation of road and functional urban areas at scale of 1/500, not only outlining the red line, but also examining land use plan along the road corridor, in order to improve planning quality and feasibility. In addition, HPC should speed up bringing planning landmarks to the site for the citizen to know and to conform to approved plan, thereby reducing land encroachment, compensation and clearance;
- As for road construction project, the Government should arrange bidding for right to utilize the advantages brought by road access. The investor who won the bidding will cover the whole project, including infrastructures, and other public facilities and buildings along the road corridor. This bidding will reduce financial burden on the government and create more opportunities for urban renewal. However, the Government should resolutely withdraw from projects, which have been assigned or bid out but delayed by investors who are not able to implement as planned;
- Put in force strict monitoring and checking system on development activities along road corridors. On the other hand, suggest to the Government to continuously allow pilot model of two-leveled Construction Inspection Agency. Empower the Construction Inspection Force at district level and widespread at ward level to thwart unauthorized activities at its early stages; and,
- Include in the procedure of Business Registration issuance the inspection of the condition of a headquarters of company and place of household business, before issuing business license.

## Table 4.1.3 Case Study 3: Industrial Development Project

**NAME:** Industrial Development Project.

**PURPOSE:** Purpose of the research is to examine the processes involved in the approval and implementation of a large industrial project.

LOCATION: Industrial area of Hanoi (in Dong Anh, Gia Lam, Tu Liem, Thanh Tri District).

**DESCRIPTION:** Process involved in the approval and implementation of a large industrial project in Hanoi is regulated using the following steps:

- 1) Location selection: One important issue is choosing an area and arranging industrial zones and clusters in accordance with Hanoi's strategy for development;
- 2) Issuing certificate of planning: Planning Certificate, or architectural agreement can be issued promptly, but the next approval and formalities may take time, thus badly affecting the progress of projects;
- 3) Rental land cost and site-clearing compensation: Regarding land- renting cost in industrial zones, Point B, Item 1, Clause 71 is written based on two side's agreement. In case there are many enterprises renting land in the industrial zone and the price is discussed by themselves, it will lead to unstable price, sometimes the later must pay higher price than the sooner;
- 4) Assessing and selecting investors;
- 5) Assessing investment project;
- 6) Issuing investment permission;
- 7) Environmental impact assessment;
- 8) Planning approval of technical infrastructure system, and other necessary approvals;
- 9) Granting construction permit;
- 10) Examination, supervision during the implementation; and,
- 11) Issue of house ownership certificate.

#### **KEY ISSUES:**

- The coordination between approval and investment functions is not good enough. Many agencies take part in the process, but all of them work separately. The approval formality for construction investment is not clear and takes time;
- There are many doors to come in and enter, but there is no clear direction, leading to misunderstandings for investors;
- The investors are not sure about the approval-stage for their project. They do not know in which stage amending process is needed: whether in the issuance of constructional permission or issuance of land-using right certificate; and,
- Approval process is not really effective due to the lack of coordination in activities; fulfillment is not on time, approval order is not clear, thus, limiting investing opportunities.

#### SUGGESTIONS:

- It is important to apply several "overall policy framework" so that the projects can be easily approved, and more important is more "satellites" services be attached;
- Investors are also interested in obstacles in sector planning. Many investors say that state-owned enterprises can enjoy more favors together with the lack of transparency in protectionism policies, which prevent the attraction of foreign investment;
- Hanoi needs to simplify procedures of project appraisal. For example, it should be regulated that the repetition of appraisal takes place such as environmental hygiene and labor safety, but no repetition of appraisal on feasibility study or technical standards/specifications, However, it's also necessary to improve the effectiveness of planning, its execution and to supervision from the viewpoint of "rapid but strict implementation";
- In case of industrial zones with no potentials, it is consistent to withdraw investment license (of foreign invested enterprises), or to approve a project (of enterprises operating in VN) or to change usage aim;
- The construction of infrastructure in industrial zones, construction of key works, systematic construction and exploitation of infrastructure inside and outside these zones, increase in use of industrial land, settlement of such issues as workers housing, etc. are of much importance;
- Finalization of the system management of industrial zones in the direction of "one-stop, in the spot" can help facilitate activities of enterprises in these zones;
- There should have strong and comprehensive solutions to environmental issues, such as compulsory construction of drainage system in industrial zones in general and in each enterprise in particular; and,
- Training, re-training and human resources should be enhanced to meet and balance the requirement between local force and immigrated force, to gradually increase the intellectual rate in labor.

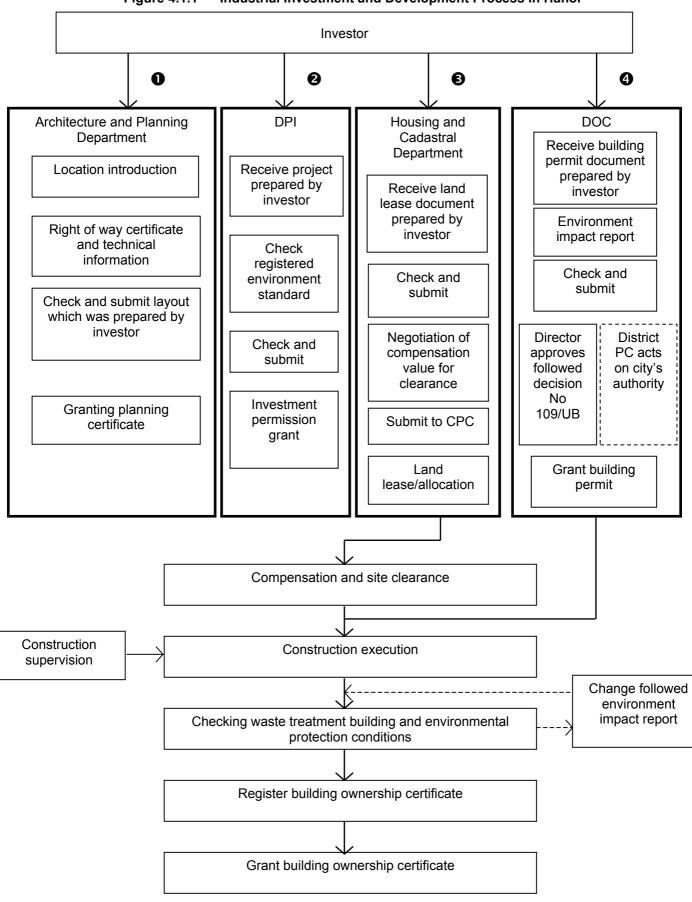


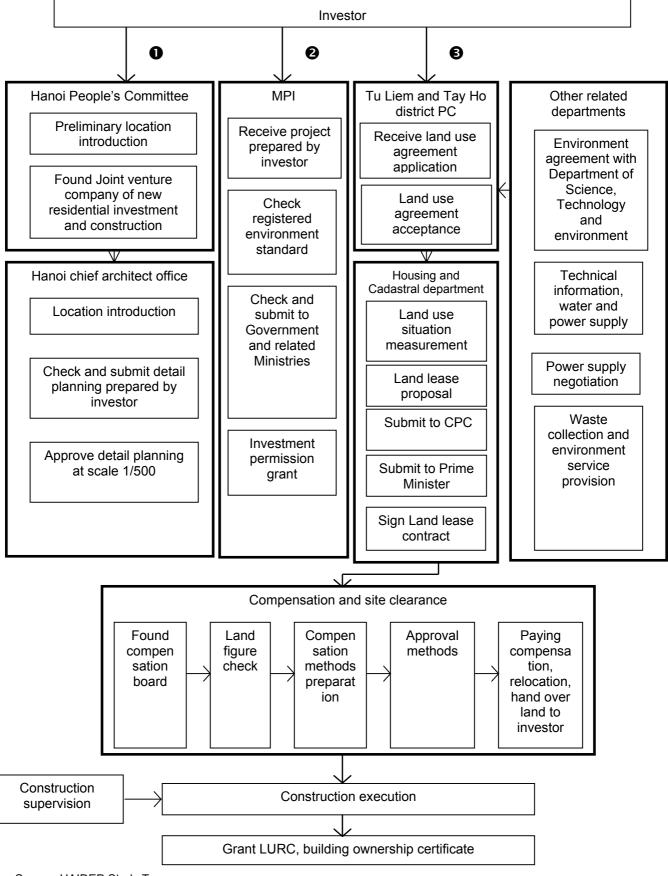
Figure 4.1.1 Industrial Investment and Development Process in Hanoi

Source: HAIDEP Study Team

## Table 4.1.4 Case Study 4: Housing Development Project

	IME: Housing Development Project.
ver	<b>RPOSE:</b> Examine the approval process and implementation of a medium sized Housing Development Project which is done on a joint nture basis.
LO	CATION: South Thang Long New Residential area, Tay Ho District.
DE	SCRIPTION:
-	This is joint venture project between Infrastructure Construction Corporation (Vietnam) and CIPUTRA Corporation (Indonesia). Joint venture enterprise invested in construction of comprehensive infrastructure system, and public services which meet international standards. Based on that, the joint venture will invest in and mobilize fund from domestic and foreign investors to construct housing business center and office center, financial center, hotel, restaurant and small and clean manufacturing industries New residential project of 392. 5ha was conducted in 1993 which followed the steps below:
	• Site Selection (1993-1994);
	Investment License granting (1995-1996);
	Land Rent Define;
	Land Lease Procedure (1995-1997);
	<ul> <li>Negotiations (environment, power, water supply);</li> </ul>
	Detail planning preparing;
	Infrastructure plan preparing;
	Building permit; and,     Site clearance (this is one of the most difficulty tecks)
	<ul> <li>Site clearance (this is one of the most difficulty tasks).</li> <li>As thousands of residents were involved, it was impossible to complete the site clearance work in a short time, especially in a</li> </ul>
-	institutionally changing context like in the 2004 – 2005 period when agricultural land price rose. This benefited the people. Howeve there should have been thorough preparation and study to protect the rights of farmers and to prevent unwanted situations.
	Tendering and Contracting Construction Work
	Construction Supervision
	Land Transfer Registration
	Issuance of LUR Certificate and House Ownership (HOS) Certificate
-	All steps required for tendering, contracting, construction, supervision, ownership registration etc. were done in strict accordance will legal provisions.
KE	Y ISSUES:
-	It has been 12 years since the start of Nam Thang Long Project in 1994. The construction work only started 3 years ago in 2003. Apart from 3 years of delay because of economic crisis, the other 6 years were spent on procedures as required by the laws and regulations of Vietnam, particularly 1994 – 1997 and 2000 – 2003. This was rather long just to complete the procedure for one project. A number of issues that slowed down the whole process were identified particularly the analysis.
-	particularly the prolonged land acquisition. The available mechanisms and policies, despite several revisions, were still considered critical, especially the sensitive land pric compensation rates etc. These issues were easy reasons for complaints and suing, which takes time to handle. Land acquisitic covers different types of land users with different levels of awareness of legal provisions, and mechanisms. Several of them did not ful perceive the regulations related to land acquisition and were hard to convince. Land management was done through historical even with poor filing technology; in addition it was also hard to track legal basis of the lands.
-	The mechanisms, despite several revisions, are not properly integrated and some are neither workable nor practical. There, actuall are no common playgrounds for compensation to ease complaints from the people. Job-changing subsidy has not been attended
	properly for farmers who acquired the land.
SU	GGESTIONS:
-	Prepare an urban network plan using participatory approach in order to identify properly project sites for new town developments ar funding sources for each of the new towns. Prepare detailed plan for the new towns at 1/2000 scale with visions for the next 10-1 years.
-	Complete development of urban infrastructure which should enhance the local landscape. Physical infrastructure development shou be conducted ahead to meet future development demand of the city.
-	To prepare a program for new town development by 2020 based on available plans and, moreover, to provide unified services for housing, working and recreation to serve 2 million people.
-	For major new towns, such as Nam Thang Long New Town, the required procedure should be shortened, based on preparation of ne town plans at 1/2000 scale, land use plan and physical infrastructure plan at 1/500 scale and urban designs for appraisals an approvals.
-	Prepare a streamlined system of legal documents on planning and investment, architecture, land use procedure which are proper integrated. Time limits (appraisals and approvals) for each type of projects and steps of procedures should be clearly indicated.
	nd acquisition and site clearance
-	Campaign and education: Strengthen law education in the local areas via different measures in a regular manner to make sure that the policies, mechanism on land acquisition are understood;
-	Prepare compensation plans prior to land acquisition;
-	Management organization: Amend and supplement existing regulations related to organizational structure for land acquisitio identifying clearly duties and responsibilities of each level, and agencies;

- Establish professional land acquisition units; and,
- Detailed guidance and regulations on land acquisition should be set in order to minimize unexpected uncertainties and dissatisfaction among the people especially on major projects that cover more than one administrative area and more than one period of time.



## Figure 4.1.2 Investment and Development Process of Housing in Hanoi New Urban Areas

Source: HAIDEP Study Team

#### Table 4.1.5 Case Study 5: Compensation and Resettlement of a Road Project

#### **NAME:** Compensation and Resettlement of a Road Project.

**PURPOSE:** To describe and clarify processes involved in approving and implementing a road project with regards to compensation and resettlement.

LOCATION: Co Loa Relic Area, Dong Anh District, Hanoi City.

**DESCRIPTION:** Due to the densification of the suburban areas in Hanoi, most road construction projects will face land recovery and resettlement of existing population as required under the existing laws. On many occasions road projects are delayed because of compensation and resettlement issues. The study examines the reality of the existing situation of land recovery, site clearance with compensation, supports and resettlement through a road construction project in Dong Anh District. By means of this, difficulties/ problems and experiences are to be shown as well as the ways to better improve them are to be defined with the regards to the Urban General and District Construction Planning in Hanoi.

#### **KEY ISSUES:**

- Insufficient legality of land use and weak management capacity.
- Lack of stakeholders' contributions and specific surveys for planning project. Planning jobs for developments and for site clearance are slow, not been widely and publicly announced. Investment projects are set up and approved before the local construction plans being made.
- Housing reserve units for resettlement is insufficient.
- Big differences between government compensation and market prices. Mechanisms and policies are not yet inclusive and difficult to apply consistently.
- People's understanding and awareness are low.

- Poor coordination between concerning local and city agencies/ authorities.

#### SUGGESTIONS:

- The rights and boundaries of each householder's land use should be legally identified before proceeding to construction plans.
- The housing fund for resettlement should be available as soon as possible.
- Planning consultants should conduct careful surveys and investigation for the feasibility of any plans/ projects.
- Construction plans and investment projects have to minimize site clearance. Construction plans/projects should be flexible for adjustments and/ or alternative alignments due to site clearance.
- There should be a comprehensive plan for site clearance at road intersections to preserve street appearance and landscapes.
- Each detailed construction plan or investment projects should encompass feasible plans for site clearance to be approved as part of the plans or projects.
- To seek for resettlement, job creation within project areas.
- A system of GIS database at districts must be promptly developed, updated, and applied to plan (anticipating financial expenses and social requirements that need to be settled, and land reclamation for clearance in future).
- To publicize approved construction plan, compensation schedules, to mobilize the masses of people in managing landmarks, supervising construction in accordance with the plan.
- To organize sufficiently powerful and well equipped apparatuses with clear mechanism to inspect, handle violations and exercise coercion in plan/ project implementation
- To allow the site clearance consultant firms to execute land acquisition for construction projects with appropriate policy.

## Table 4.1.6 Case Study 6: Small Housing Project involving Agricultural Land

NAME: Small Housing	Project	Involving A	Agriculture Land
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**PURPOSE:** Examine approval and implemented process of small housing projects involving agricultural land carried out by local developers without international funded budget.

LOCATION: Housing Development Project in Ao Dinh, Phu Thuong ward, Tay Ho district, Hanoi City

#### DESCRIPTION:

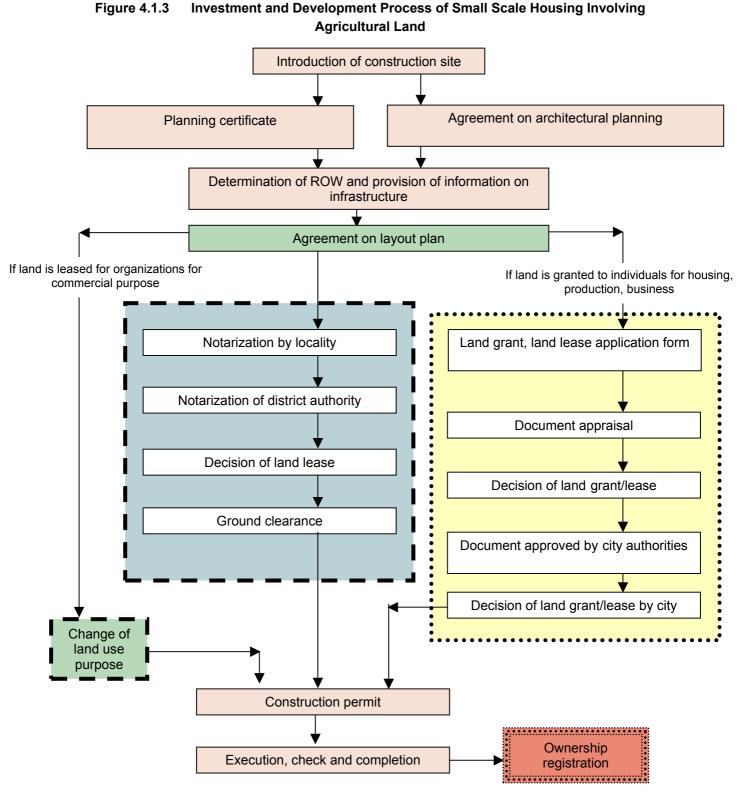
- This land is state owned land (agricultural land) controlled by Phu Thuong Agricultural. Most of the area is water-flooded land and cannot be used for agricultural purposes for long time.
- Investors, which are a limited liability company, completed administrative procedures for land use change based on the planning and other planning and architecture agreement in Department of Planning and architecture of Hanoi. Land clearance and compensation was carried out following the law and policies.
- Process to get the project approval includes the following steps:
  - Site suggestion and selection. Planning and architecture agreement request (because of lacking approval detail planning of the area);
  - · Land allocation filing and procedure completion;
  - · Land price and compensation value determination;
  - · Preparation and evaluation of investment proposals;
  - Investment license granting;
  - · Approval of infrastructure hubs;
  - Other obligatory approvals;
  - Building permit;
  - Construction supervision;
  - · Professional certificate;
  - · Land transfer registration;
  - · Land use right granting; and,
  - Building ownership certificate granting.
- The study also examines the infrastructure done by the investor in the project as well as budget for the project.

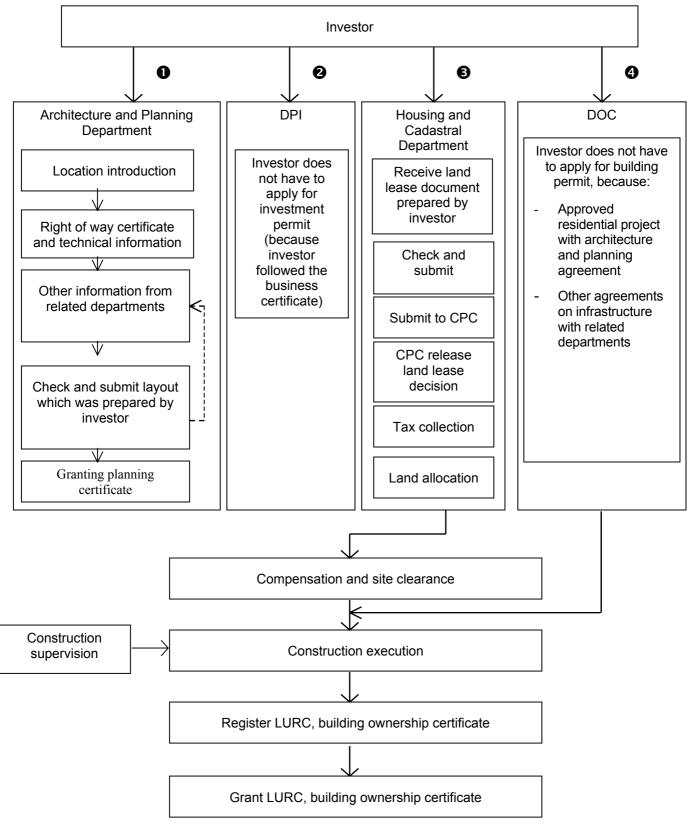
#### **KEY ISSUES:**

- Detail planning at scale 1/5000 or 1/2000 for agricultural land was changed into urban land, but most of it lacks detail planning at scale of 1/500 showing a complete infrastructure system. This is the disadvantage for similar development project.
  - The advantage of this project is that clients prefer to buy houses in the open space;
  - Some policies (e.g. land budget, supporting fund) creating difficulties for enterprises and the administrative process is time consuming that causing ineffectively project and capital stagnancy; and,
  - The small and medium housing development in the small area in the outskirt s will be advantageous and highly effective.

#### SUGGESTIONS:

- Detailed planning for the land changing area should be well prepared to illustrate advantages for investors;
- Continue to improve administrative procedures as well as to amend or abolish the non appropriate documents and policies that affect the early real estate market.





Source: HAIDEP Study Team

## Table 4.1.7Case Study 7: Individual Housing Construction Project Involving Subdivision of<br/>Land and Building

NAME: Individual Housing Construction Project involving Subdivision of Land and Building

**PURPOSE:** Examine the ways that a private owner can divide land and building and sell it to other investors

**LOCATION:** 328m<sup>2</sup> land lot of Mr. Do Luong (who has the land use right certificate - LURC) in the Quan La Xa Village, Xuan La Ward, Tay Ho District ( it was Tu Liem District- outskirt of Hanoi). When the land use plan of Tay Ho District was prepared, his land was included in the new urbanized area of Tay Ho District.

#### DESCRIPTION:

- Mr. Luong owns the LURC but he is using only one part of the lot and he would like to sell the rest to another when the demand in the market was increasing. He kept 142 m<sup>2</sup> and sold the LUR of 187m<sup>2</sup> to Mr. Nguyen Le Hoang in 2001.
- Mr. Hoang sold the lot of 89m<sup>2</sup> (19m long and 4.5m wide) next to Mr. Luong to Mr Nguyen Thanh Tung in 2002 and 6 months after, he kept only 41m<sup>2</sup> in the north-west of the lot and sold the rest of 58m<sup>2</sup> to Mr. Tran Tho Hien with a 1m provided alley.
- The study examines the process to get the necessary agreement for the above selling and buying as well as the time when the deal took place, and the requirement of the administrative levels for that deal.

#### **KEY ISSUES:**

- The land division and provision to many owners cause problems such as in the provision of a pedestrian alley, which makes difficulties in design and results to a disharmonious landscape of the area, as well as its ineffectiveness.
- The deal is carried out without following the State regulation on transactions. The deal is made by two parties to avoid paying tax. The government could not interfere in the process; and,
- When the investors apply for building permit, they have to complete all the legal process that hasn't been done from the beginning of land division and that is time consuming. Households don't have standardized design plan when applying for the building permit,..

#### SUGGESTIONS:

- There should be a guideline and principles to divide the land for people, especially to those who need to sell parts of their land to other investors, and regulations on the provision of a pedestrian alley for each lot.
- There should be regulation on land division in which land should be divided in module and there should be regulation of access to the land. It should be in the detail plan in scale of 1/500. The size of module varies between inner and outer city area.
- Households have to apply for the land division before granting of planning certificate.
- Department of Construction or District People's Committee grants building permit only when it gets planning certificate. It should define ownership and transportation access to each household.
- Commune People's Committee should support households on the proposal of land division and preparation of transportation access. After that, the administrative body should confirm and send it to a higher level for the planning certificate and LURC. This can avoid unclear documents, wherein the government could not grant LURC or this may cause inconvenience to owners as well as new transferred owners.

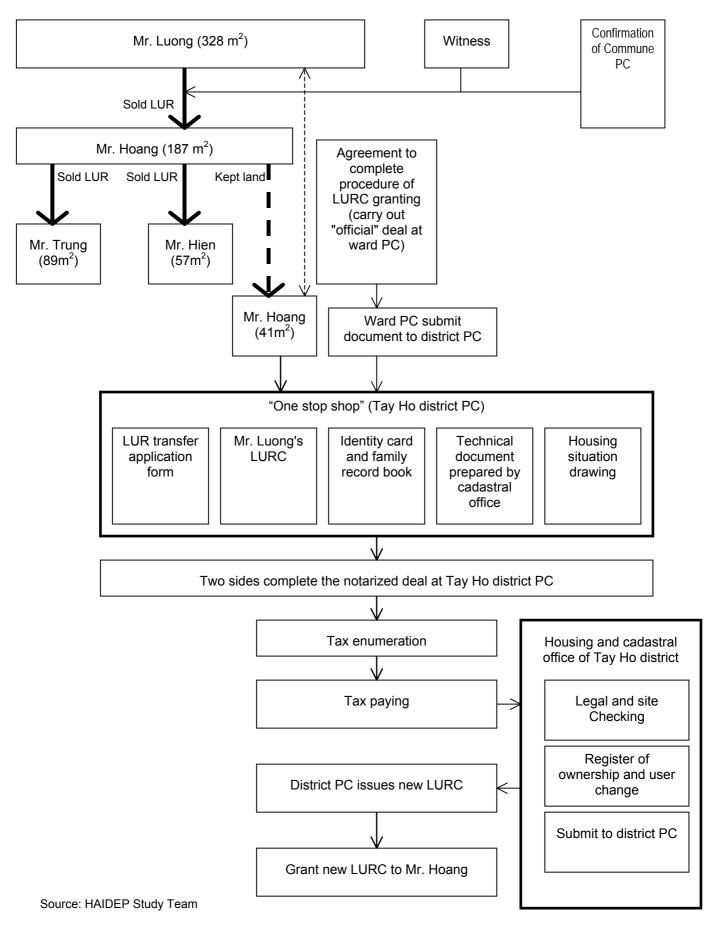


Figure 4.1.4 Land Subdivision and Land Use Right Transfer Process

## Table 4.1.8 Change of Building Use from Residential to Commercial

NAME: Change of Building Use from Residential to Commercial.

**PURPOSE:** To investigate the process of changing one part of building use from residential to commercial (mainly small shop house). This study would evaluate and give recommendations for the planning system that can be used to guide and control the use purposes of the building.

LOCATION: Nghia Do Ward, Cau Giay District, Hanoi City

#### **DESCRIPTION:**

- Process for business license granting at the district level is quite simple. Besides some restricted control businesses which requires approvals from appropriate authorities such as environment, health or fire department, etc., there is only a few type of businesses which must follow the detail planning (e.g. construction material business).
- This research also discovered that there is no connection between business license application processes from detail planning, land use planning (except for the case of construction material business location).

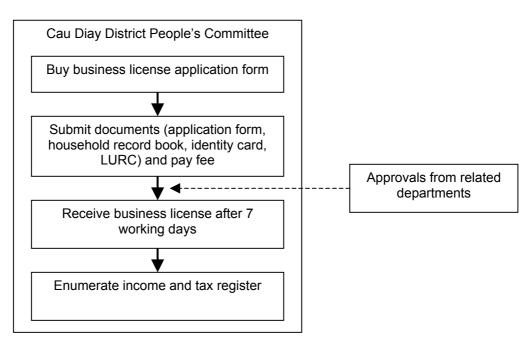
#### **KEY ISSUES:**

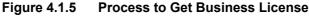
- The changes of building use of ground floor from residential to commercial are spontaneous and do not follow land use planning (except in the case of construction material business location).
- Detail planning reference and inspection are not compulsory when individual households change building use of ground floor and apply for business license.

#### SUGGESTIONS:

- Cau Giay District and Nghia Do Ward should prepare and implement detail planning.
- There should have been a public participation in the process of planning preparation, and implementation. It should have appropriate standards for area development in that period.
- The area needs to improve their attractiveness (living condition and urban image).
- Business development should have specific regulations and there should have inspection process in reference with detail planning when district PC approves for business license.

Source: HAIDEP Study Team





## Table 4.1.9 Development of a Small and Medium Industrial Enterprise by a Local Investor

NAME: Development of a Small and Medium Scale (SME) Industrial Enterprise by a Local Investor.
<b>PURPOSE:</b> To examine how a local developer is able to develop a site for SME enterprises.
LOCATION: Dong Anh, Gia Lam, Tu Liem, Thanh Tri Districts of Hanoi City
DESCRIPTION:
- Process involved in the site approval for SME in Hanoi is regulated using the following steps:
1) Site instruction;
2) Land use function negotiation;
3) Location selecting;
4) Planning and architecture agreement preparing;
5) Land use right granting;
6) Project assessment;
7) Environmental impact assessment; and,
8) Construction permit granting.
<ul> <li>There are two ways of setting up concentrated occupational villages clusters: i) simultaneous development of households followed by transformation into occupational villages clusters; ii) new establishment of occupational villages clusters.</li> </ul>
<ul> <li>Industrial development orientation in Hanoi in the next 5 years is as follows: Put high priority on sectors creating high-technique products such as informatics technology (software and hardware), new-material technology, pattern manufacturing technology, automation technology, and biology technology.</li> </ul>
- Investigate and improve old industrial zones, removal of enterprises causing pollution from urban and inhabited areas.
- Develop industrial zones and clusters including new-established medium and small industrial zones. Encourage the development of medium and small enterprises with personal funds that serve large companies.
KEY ISSUES:
<ul> <li>Acknowledgement on environment and sustainable development is not comprehensive.</li> </ul>
<ul> <li>The law system on environment is not complete and lacks important provisions such as on clean air, safe chemicals and biological variety.</li> </ul>
- The conflicts between economic development and environment preservation are not solved.
- Responsibility of managing boards for investors is not high.
- Managing boards have no income, so they do not have financial source for maintenance of technical infrastructure.
<ul> <li>They are not allowed to do business serving enterprises and labors working in industrial zones.</li> <li>There area no rules against renting enterprises which do not contribute to maintenance cost of the zones;</li> </ul>
<ul> <li>Administrative arrangement of Departments and Sectors is not centralized. Responsibility for solving quickly and exactly investors' requirement is not high. There is still unjust attitude, especially against private economic sector. State function and organization, especially officers' qualification does not meet new requirement as well as enterprises' proper demand.</li> </ul>
SUGGESTIONS:
- Planning of industrial and handicraft cluster should be given attention because it affects the long-term development of the cluster.
<ul> <li>Attention on planning of industrial cluster to combine with: i) industries development planning in long term; ii) socio- economic development plan of locality; iii) land use planning of the district; iv) development planning of industrial zones, cluster in the district.</li> </ul>
- There should be comprehensive solution in planning, technology, waste treatment and policy to minimize environment pollution in handicraft and industrial cluster,.
<ul> <li>Planning: form and develop industrial and handicraft cluster to separate manufacturing area from residential area and create good conditions for further expansion. In each cluster, there should be space for green area.</li> </ul>
<ul> <li>Manufacturing technology: Technology should be improved, applying less polluted technology, for example: using gas instead of charcoal in pottery production.</li> </ul>
<ul> <li>Waste treatment: In industrial cluster, there should be waste treatment enterprises. There should be solutions to improve awareness and duties of labor. Each enterprise should have waste treatment solution with support from the State.</li> </ul>
- Policy: There should have supporting investment policy on waste treatment.
<ul> <li>Improve the institutional framework for development and management of handicraft villages.</li> <li>Incentive and support policies from State to form and develop handicraft village cluster. For example, State supports activity of infrastructure development outside the fence, supply utilities to handicraft village cluster, support 30% of clearance expenses, support detail planning preparing expenses, giving priority to land lease rent, support in training and research activities, support in marketing activities.</li> </ul>
Source: HAIDEP Study Team

## 5 PROPOSALS AND RECOMMENDATIONS

## 5.1. Necessary Institutional Arrangement

Proposed applicable institutional arrangements at district administration are listed below;

## 1) Implementation Process

- (i) Carry out decentralization on urban planning according to Land Law. In particular, there should be capacity strengthening and decentralization in the District People's Committee on land and property appraisal, compensation price application in the site clearance process.
- (ii) Multi-sectoral planning should be applied in the implementation process.
- (iii) Documents should be issued uniformly. It is also important that administrative reform also be performed.

## 2) Organization Arrangement

- (i) In the short term when faced with the lack of professional staffs, it is necessary to ask support from appropriate authorities in the city level. However, in the long term, human resource at district level should be fully sufficient. At district level, there should have enough professional staffs for planning project approval and implementation.
- (ii) Strengthening capacities for the policy makers. There should be refresher course for professional staffs to update their knowledge.
- (iii) Organizing training course and applying a site clearance consultancy system, hiring professional enterprises for site clearance with appropriate finance structure.

## 3) Preservation Aspects

- (i) There should be a clear policy for the historical heritage area of Co Loa, especially for the residential area within the Ancient Citadel Area.
- (ii) Preserve the district characteristics by continuously developing traditional trade and handicraft village clusters.

## 5.2. Conclusion and Recommendations

## 1) Flexible Process with Community Participation

Districts planning of Hanoi are currently prepared in two steps with a defined scale: the general district plan in scale of 1/10,000 and urban detailed plan in scale of 1/5,000. Although land use planning was prepared with fixed standards, the implementation is really difficult because of many reasons, and the biggest of which is lack of fund.

One of the issues that should be paid attention on the district planning process is the rigid standard which causes impossible implementation and leads to delay of other activities. "Planning should be perceived as a Process and not just as a Product". Therefore, district planning should be done in a flexible process adopting community participation.

A model of district planning should be developed, in which rural area should also be paid much attention. Besides urban development, other social issues such as job opportunities, compensation, and community participation encouragement should be carried out in an effective manner. Inflexibility and formalism should be avoided.

## 2) Establishment of a Hierarchical Urban Planning System

In general, urban district planning including spatial plan, land use plan and statutory plan is ineffective. District plans should be according to city general plans as well as regional plans. Experiences learned in the studies are very helpful and worthy. Thus, there should be changes in the implementation process of the planning project.

The control measures should be paid much attention in all periods from planning preparation to implementation, and in all levels, from general plan to detailed plan.

## 3) Multi-Sectoral Planning

District planning process should be flexible and multi-sectors coordinated at all level. Planning process should be done comprehensively with spatial planning and statutory planning.

## 4) Funding and Investment

Economic, finance and investment aspects should also be paid attention in the planning project preparation. There should be appropriate policy for industrial zone development especially with foreign investment including workers houses or dormitories. Administrative procedures should be reduced and there should be encouraging policies on investment. Market research that provides information for organizations and enterprises should be supported.

## 5) Consideration of Social Aspects

Environment and sustainable development issues deserve parallel attention in the planning preparation and implementation. On-site re-habitation is very necessary. There should be a clear and flexible policy on compensation and site clearance.

## 6) Capacity Development

District decentralization according to Construction Law is logical. However, professional staffs should be supplemented with regular training and refresher courses.