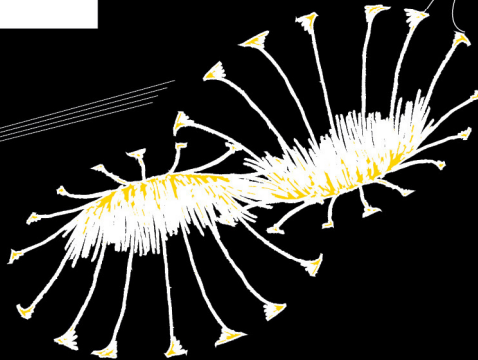


Report on the Application of the Governance  
Tool for the Steering Centre for Urban Flood  
Control (SCFC)

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## Table of Contents

<b>1 INTRODUCTION AND BACKGROUND</b>	<b>3</b>
<b>2 GENERAL CONTEXT</b>	<b>3</b>
2.1 WATER	3
2.2 SCFC	4
2.3 GOVERNMENTAL ADMINISTRATIVE STRUCTURE	6
<b>3 THEORETICAL TOOLS AND METHODS</b>	<b>6</b>
<b>4 THE IMPORTANCE OF UNDERSTANDING GOVERNANCE FOR SCFC</b>	<b>7</b>
4.1 ANALYSIS OF THE RESULTS	8
<b>5 INTERNAL RESULTS</b>	<b>8</b>
5.1 REPORTING	9
5.2 STRUCTURE AND PROCEDURES	9
5.3 COMMUNICATION AND INFORMATION STORAGE AND EXCHANGE	10
5.4 STAFF PLACEMENT	11
5.5 RELEVANT SKILLS	11
5.6 MOTIVATION	11
5.7 STRATEGIC AND MASTER PLANNING	12
5.8 CONCLUDING COMMENTS ON INTERNAL ORGANISATION	12
<b>6.0 EXTERNAL RESULTS</b>	<b>13</b>
6.1 EXTENT	13
6.3 COHERENCE	14
6.5 FLEXIBILITY	15
6.7 INTENSITY	16
<b>7.0 FINAL REMARKS AND CONSIDERATIONS</b>	<b>17</b>

## 1 Introduction and Background

As part of the SCFC Capacity Building Program, the University of Twente accompanied staff from the Water Authority of Regge and Dinkel and Royal HaskoningDHV on two one-week missions to Ho Chi Minh City: from June 23-29 and August 25-29, 2013. The purposes of these missions were to officially kick-off the project between SCFC and the Dutch Water Authorities and to establish an understanding of the governance context within which the SCFC works. This understanding is meant to improve the quality of the trainings that will be provided by the Dutch ambassadors in the year to come. This report contains the results of the interviews undertaken with SCFC as well as external stakeholders. The intention of this report is to provide the Dutch trainers with additional insights into the particular nature of the situation within which the SCFC must achieve its goals. This will allow them to tailor their trainings in a way that best fits the current situation and expectations of the SCFC participants. First we provide our general understanding of the relevant physical and geographical context, the current organisation of SCFC, a summary of relevant Flood and Inundation Management issues, and finally some general issues faced by the SCFC based on their organisational goals. We conclude with a number of important considerations for both SCFC and for the Dutch Water Authorities as they proceed in this project and their collaborations together.

## 2 General Context

### 2.1 Water

Ho Chi Minh City faces many issues related to water. The most urgent being excessive rainfall and concerns related to sea level rise and inundation. The city also has concerns related to adequate wastewater treatment facilities and infrastructure.

HCMC has grown significantly and quickly as an urban area and this has resulted in a high percentage of impermeable surfaces that lead to excess surface water during heavy bouts of rain. It is not uncommon for streets to be filled with between 20-40 cm of water following rain and higher tides. There is a combined sewage and rainwater system and in many cases the physical layout of the infrastructure is unknown. Like many old city centres there is a high level of water loss due to leaky pipes and aging infrastructure. In times of heavy rain, the water cannot be adequately taken away by the sewage system and the houses and buildings which are situated quite low, suffer damages due to the high water levels. These low-lying houses further cause issues by making it difficult to improve the necessary waste water infrastructure (sewer pipes). There are currently 13 water and wastewater plants in HCMC, and they are in various stages of development and repair. As part of the HCMC Master Plan and the MARD Plan there are a number of additional tidal sluice gates and dykes under development to address sea level rises expected to increase in the upcoming years. The most recent tidal sluice gate is designed to support a 75-cm. increase in sea level. It is unknown how long these infrastructure developments are expected to maintain their function. Additional information is available in the brochures provided by SCFC on the current systems in place for Water and Waste Water and sea level protection.

The surface drainage system in HCMC has become narrower as development has occurred and thus provides less room for the water to exit the city. The underground drainage system also undergoes

deformation, which results in the water flowing upstream as opposed to downstream. Land subsidence is also a large concern that impacts the necessary actions related to flood and inundation management.

Additionally, due to the large differences in wealth spread across the city, some wealthier areas attempt to protect themselves through isolated infrastructure improvements, which cause additional issues for those in the surrounding areas.

This situation results in the majority of areas within HCMC being inadequately protected from flood and inundation.

## 2.2 SCFC

*In 2008 the Steering Centre for Urban Flood Control Program (SCFC) was established. The main HCMC objectives for urban drainage, wastewater and sanitation management are also the main objectives of the SCFC:*

- 1) Improvement of urban drainage and wastewater conditions focusing on flood control and operation/maintenance of wastewater system facilities in HCMC*
- 2) Financial and operational sustainability for management of drainage and wastewater services in HCMC*

The SCFC has one Central Office, 7 Divisions and 4 Project Management Units (PMU), each with its own responsibilities, duties and tasks. Decision making within the SCFC is mainly at the level of the Director, who is supported by the Deputy Director. The Heads of the Divisions can make decisions within their authority and tend to direct important decisions up to the Director and Deputy Director of SCFC. Each Division is operated by a Head, who is assisted by Deputy Head(s). The Heads of the Divisions report to the Board of Directors. The staff of the Divisions report to the Deputy Head(s) or Heads of the Divisions. The current organisational structure of the SCFC is as in Figure 1.

This structure is in transition and of particular note is that in the near future, some PMU's may be transferred to the Department of Transport.

Although the SCFC is directly connected to the HCMC PC, they are not at the level of Department. The PC has been discussing the upgrade to a department for nearly a year and a half. There is little indication about how long this change could take or how likely it is to occur. The process involves consultation of other HCMC Departments. If SCFC would become a Department, this may result in changes to the responsibilities of some other Departments. Currently the responsibilities of the SCFC are overlapping with traditional areas of responsibility for other Departments. It is imagined that a normal response by some other Departments would be to protect themselves from losing their responsibilities and so it is possible that their comments were in some cases quite negative due to their conflict of interests (losing their own power).

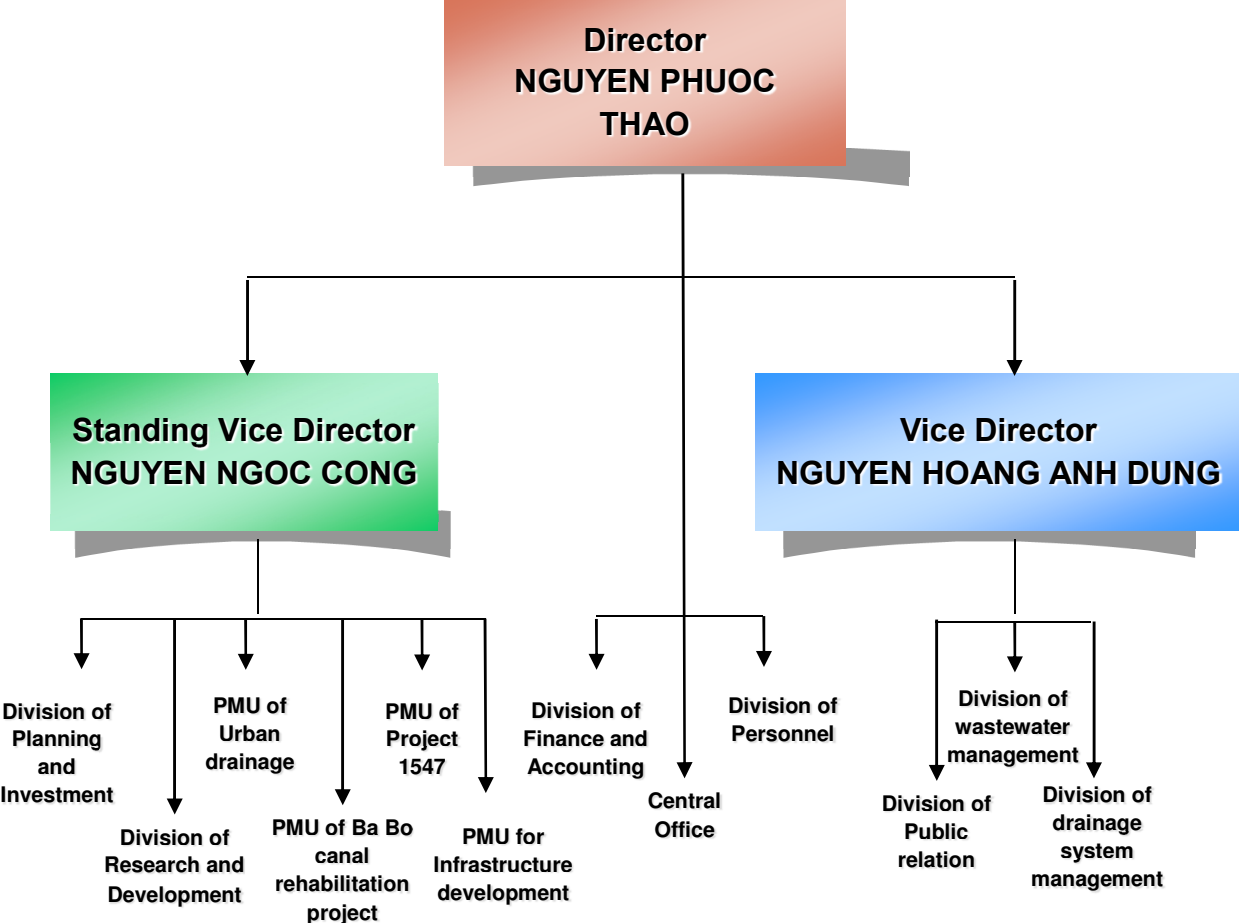


Figure 1. Organisational Model of SCFC

### 2.3 Governmental Administrative Structure

The SCFC works within a complex arrangement of Departments within the HCMC PC as well as other stakeholder and public and private groups. With the help of the SCFC staff, the UT team was able to develop the following diagram which shows the relevant external groups. This diagram is located below:

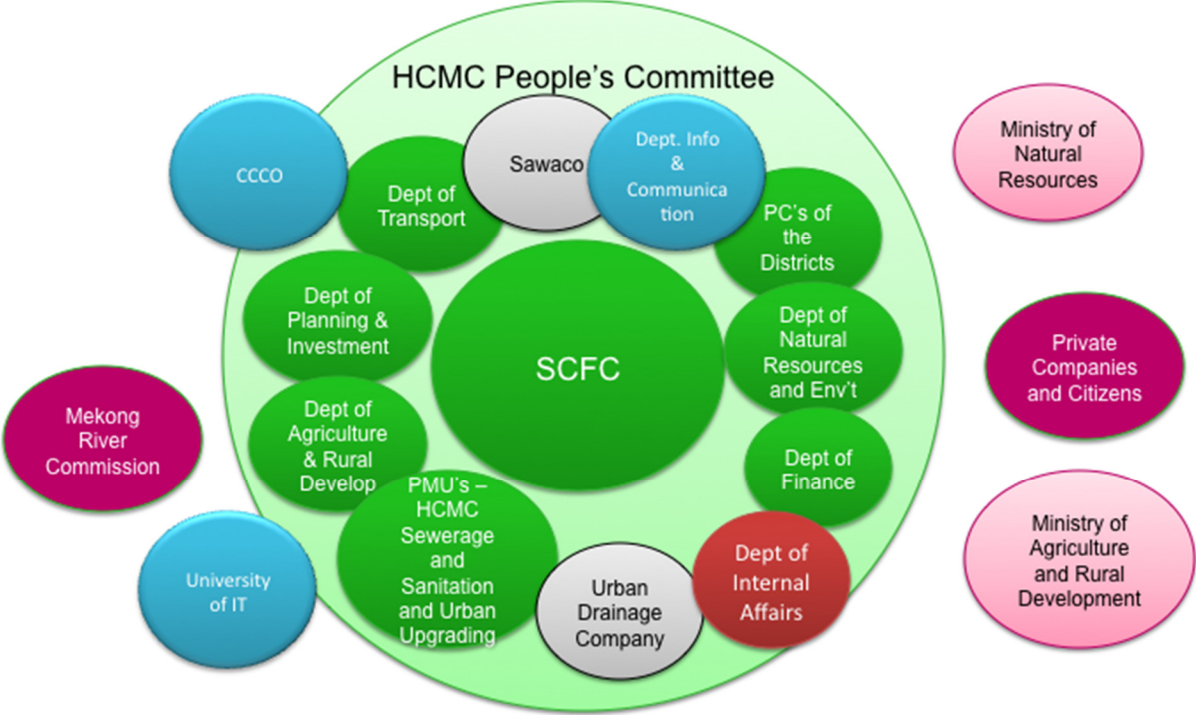


Figure 3: SCFC Relationship with External Partners

The colours in the above diagram group similar types of groups together. For instance the light pink are Ministries of the Vietnam PC. The Department of Internal Affairs is particularly relevant (and is as such highlighted) due to its role in determining what type of position the SCFC takes with the HCMC government.

### 3 Theoretical Tools and Methods

According to the theoretical tools used by the University of Twente (see De Boer 2012 and Kuks et al. 2011), various groups of factors form a governance context for the operation of SCFC. These factors and their influence on the operations of the SCFC can be categorised into four different groups: extent, coherence, flexibility and intensity. Each of these categories is important for understanding how the governance operates in a holistic manner apart from looking at individual influences from each of these different groups. We use this tool in a very pragmatic approach to uncover elements of interest for the SCFC and the Dutch Water Board staff and as such pay attention to both the external

context and internal organization of the SCFC. In the later section on the external context, these categories are used. Why the Water Governance Tool uses these four quality criteria of the water regime can be understood through the following questions:

- a. Extent: are all relevant aspects for the sector or project that is focused on taken into account?
- b. Coherence: are the elements of the dimensions of governance reinforcing rather than contradicting each other?
- c. Flexibility: are multiple roads to the goals, depending on opportunities and threats as they arise, permitted and/or supported?
- d. Intensity: how strongly do the regime elements urge changes in the status quo or in current developments?

There is little official potential to influence the general structure of government outside of the SCFC. It is important to note the benefits of the current system that are helpful for the SCFC as they are searching for ways to improve how they operate within it. The top-down implementation processes are hard-wired into the culture of the Vietnamese and so the tasks of the SCFC are influenced by this system. Staff (from SCFC as well as other HCMC departments) are held personally responsible for their statements and so their actions related to their work need to be undertaken in accordance with the regulatory structure. There is little tolerance for those who act not in accordance with the current decisions of the PC. There are significant consequences for this type of behaviour.

## **4 The Importance of Understanding Governance for SCFC**

The SCFC works alongside a number of other parties that each have their own responsibilities and resources that influence and guide water management and governance in Vietnam. Understanding how their own and others' decisions and the following implementation processes interact with other sectors in society is important in order to determine where the hurdles and opportunities lie for increased resilience of their water resource systems. An improved understanding of SCFC's own role in the overall water governance processes can support effective collaboration across currently separated groups, responsibilities and capacities. The activities associated with this component will enable water leaders within the SCFC to understand more clearly the inter-relationships between water management and other sectors and thus help them to make strategic decisions that will have a high rate of success. By better understanding how context and policy instruments interact through implementation processes, improvements in goal realisation can be achieved. Water governance is a term that is used to recognize the many different types of instruments and actors that have an influence on the general management and sustainability of water resources in a given area. These actions can take place in a coherent or coordinated manner, though more often they influence the resource from completely fragmented and separate sectors of government and society. The resulting inefficiencies that result from this (sometimes) unchangeable structure can be minimized through a better understanding of the interconnections between the various actors. The governance assessment creates a basis for strengthening water leadership at the SCFC. This review enables the training needs of the SCFC to be oriented to areas that are likely to have the highest benefit to themselves and enable them to perform well within the given governance structure.



The results of the first mission interviews with the different relevant parties and stakeholders were instrumental in helping the researchers to understand the interactions between the various staff and stakeholders.

#### 4.1 Analysis of the results

The results are not intended to take on a normative of politically sensitive nature, though this is always difficult given the nature of governance. The results are intended to identify the nature of the relationship between the government and stakeholders in a way that enables the SCFC and the consortium to develop the training options in a manner that is most likely to improve the overall functioning of the SCFC within the water management framework of Vietnam.

The draft report was presented to SCFC staff in the second workshop. The findings of the report were discussed, and finalized. These findings complete the analysis and the recommendations are included for the Water Authorities of the Dutch Consortium.

The following section includes a summary of the information collected from the various interviews and workshops that have been conducted.

### 5 Internal Results

In the final workshop SCFC staff provided a number of aspects that they experience to work very well within the internal organisation. These are included below first to give some general perspective about the various potential of the SCFC as a group. The list format is used to highlight the different elements that were mentioned by SCFC. There is additional information related to many of them in the sections that follow.

- The scale and range of functions of SCFC is new and includes recognition of the integrated nature of water management. The SCFC has a very clear and integrated mission that provides its basis to develop activities and to encourage staff
- SCFC goals are in the public interest and this provides good motivation and incentive for SCFC staff, they feel like they are taking care of people and feel supported by the people
- SCFC has many young and motivated staff who are highly educated, dedicated to the mission, work hard and are ready to learn; they keep updated on new information and have a high awareness of issues and developments
- SCFC has a core team of experts who came from HCMC PC Departments that have brought their experience, expertise and contacts
- The international collaboration experience of SCFC is very good, they work on ODA projects (mostly from Japan and the Netherlands); they enjoy this and would like to do more of it
- SCFC strives for an integrated approach, which they see as necessary to achieve their mission. This is why they are interested in receiving international assistance.

The interview questions related to the internal functioning of the SCFC are collected below under a number of headings: Reporting, Structure and Procedures, Communication and Information Storage and Exchange, Staff Placement, Relevant Skills, Motivation, Strategic and Master Planning, and General Comments. Based on the interview questions and process, the following aspects are mostly related to the opportunities for improvement within the SCFC.

## 5.1 Reporting

The Planning and Investment (P&I) Division plays an important role in reporting. There are 3 kinds of reports that divisions should be able to prepare:

- Internal report within SCFC (mostly used)
- General external reports, requested/required by regulations of HCMC Departments – managed by Central Office
- Emergency or specific requirement reports to external departments (DART, PC, Ministry etc.)

Frequency of reporting depends on the specific regulations; this can be monthly, quarterly or yearly.

There are 4 steps to prepare a report. The P&I Division collects the information from the different Divisions or PMUs. P&I then assembles a draft report. This draft is sent back to the Divisions/PMUs to comment/review. It is then completed by P&I and submitted to the Director Board of the SCFC. The main issue with reporting is experienced as being the lack of sufficient information that is submitted to them. Reports are expected to include:

- 1) Description of Activities: Generally written twice per month and includes a summary of the monthly scheduled activities
- 2) Progress of each activity: what has been completed and what still needs to be done
- 3) Result of the activity.
- 4) Evaluation of the results.
- 5) Comments.

Most Divisions/PMUs only report on the 3rd and the 5th components. It was suggested that templates could be helpful by the UT staff and this comment was accepted as a good idea.

In the Drainage PMU the current process for turning individual reports from the drainage (or other Divisions) into team reports begins with every individual making their own report. They then send it to the vice manager to reveal/revise any comment on the report. Then the staff in the divisions will complete the report that is sent to the staff member that is in charge of collection all individual reports in order to make a team report. Afterwards, it is sent to the manager in order to get approval. Then it is sent to the division of Planning and Investment (Mr. Khuong).

Except under emergency situations, information flows slowly through the reporting system.

## 5.2 Structure and Procedures

The Board of Directors and the Central Office work together to assign tasks to different Divisions or PMUs. These tasks are written on paper and delivered to the relevant Division/PMU along with the name of who is responsible in the office. Time and training is needed to upgrade information systems and reporting procedures since this is an important aspect for increasing efficiency and transparency. The Vice Director has a lot of influence and takes care of the technical issues of the institution. He manages most of the projects.

Project feasibility studies are done by SCFC but then they need the cooperation and agreement with the HCMC Departments, before sending it for approval to the PC. When an external donor is interested in contributing to flooding or inundation issues for example, they contact SCFC directly with a letter of interest. This is then communicated to the HCMC PC and they then sit down together to determine which departments should take the lead.

When an external bidder gets a contract, this can have more flexibility in compensating staff and contract types. Often contractor companies are paid for the task and all that is required to fill it and it is up to the company to complete it how they want (for example they could be paid per kilometer for maintaining drainage pipes).

### **5.3 Communication and Information Storage and Exchange**

The Central Office has the main role in information transfer. All documents related to task assignment are scanned and uploaded to the information centre of SCFC. The document is tracked through the information centre (managed by mister Nam/manger of the Central Office) until it is completed.

When emails, news items or phone calls are received they go to the Central Office and Mister Nam processes them (e.g. read the newspaper, scan the article and then add some formal extra sheet to it to give it to the division/PMU). These informal documents and information are not uploaded to the information centre.

Process documents for collaboration are not available, as they are project related. If there is a foreign collaboration project, the English letters of the partners will be translated by the central office and then processed through to the PMUs or divisions.

The Public Relations Division collects different information from internal and external (including HCMC and UDC) Departments and PMUs related to flood and inundation management. This information is uploaded to the website or broadcasted to the radio. There is still no formal library for relevant technical information.

PR has made a draft plan to broadcast the information based on the program of the HCMC PC about flood management from now until 2015. They would like to increase the amount of time they spend providing radio broadcasts to public (currently 12 minutes once a week). A plan to inform people about the problems has been sent to the Board of Director for funding approval. There is also a desire to work more closely with citizens groups and engage in more innovative ways of communication.

When the PR Division wants to collect different information from Divisions/PMUs they make a questionnaire/survey via the intranet (i.e. they ask for the opinion of staff; e.g. what do you think about the management of the SCFC and how could that be improved?; what is the facility of our office?) that is sent to the Divisions/PMUs. After the analysis, a report is submitted to the Board of Directors. Then the Board of Directors will make comments and suggestions on the report, which is then sent back to the Divisions and PMUs in order to inform them about the results. The last survey consisted of 29 questions. The PR Division does not provide internal communication support.

Each Division can communicate with the city's relevant department of interest (i.e. Division of Finance and Accounting with the Department of Finance). However the SCFC Board of Directors, Central Office and Drainage System Management were ranked as very important internal

players/Divisions to communicate with by the survey that they filled out in the initial workshop. R&D and PR Divisions were ranked much less highly. It is unclear why the PR and R&D Divisions are not seen as important to communicate with. Staff of the SCFC are located in many different buildings and areas based on their jobs and divisions/PMUs. It is unknown what influence this has on collaboration across Divisions/PMUs.

#### **5.4 Staff Placement**

There is no internal or external outsourcing outside of SCFC. Internally, staff are loaned to other Divisions to help out when necessary, but tasks are not moved to a different Division if there is not sufficient capacity.

There are many procedures for working together from PMU's & Divisions. The presence of these procedures provide on the one hand clarity, and on the other hand can be seen as inhibiting more informal collaboration. It was noticeable that PMUs do make more use of the opportunities to combine resources than do the Divisions.

Staff start with 1-3 months' probation contracts, then they receive a 1 year temporary contract and thereafter a long-term contract (if they are positively evaluated). The SCFC can hire retired experts to train new staff, as well as international or university advisors. The very strict government payments scheme still applies to these contracts.

#### **5.5 Relevant Skills**

Hydrology and Water Management training is needed for all levels, as most do not have this training. With this training they can provide better strategic advice to PC related to flood management.

The SCFC are missing someone with legal expertise to help assist with addressing disputes related to land. This was seen as important to address given the desired increased collaboration with private stakeholders.

There is a training budget to send employees to courses offered by the Department of Internal Affairs. The choice of employees is based solely on their position and their need for the training as is determined by the HR plan. There is little room to use training opportunities as a reward for motivated or talented employees. These opportunities do serve as motivation for those who can receive them.

#### **5.6 Motivation**

SCFC has a number of young and motivated staff. Some have the potential to learn about water resources, but overall the staff members are at junior professional level (i.e. recently completed university). They are quite limited in flood management experience but there is potential for great improvement. SCFC staff are evaluated by peers and managers, however what the criteria are for this is uncertain.

There are efforts both by the HCMC PC and the SCFC to address the issues of losing talented individuals due to lower salary levels. The way that people are paid is highly regulated by the HCMC PC and Vietnamese government in general. There is little opportunity to reward highly talented or hardworking people through this scheme. Salaries are based on experience and education.

## 5.7 Strategic and Master Planning

There is a recognition that increased collaboration would be beneficial by most. External advice from Universities was however not seen as a substantial source of support for their planning and implementation processes. This is likely due to a lack of awareness and also lack of established channels for collaboration. Since SCFC is a new organisation and that there is a relatively high turnover rate this may be an inhibiting factor in setting up longer term collaboration. Universities are seen as a source of more training and support for staff however it should be noted that they also have limitations to collaboration. University staff are often overworked and it is not financially possible for them to offer their time freely to external groups. SCFC Managers as well have limited time and capacity for strategic planning within their own organisation.

In its current position the SCFC acts as an administrative agency, however it does provides strategy and solution advice for flooding control for HCMC and surrounding areas. It is up to the HCMC PC how to use this advice in developing Master Plans and city policy and regulations. Under some cases SCFC can provide suggested revisions on new regulations to the HCMC PC.

There are discussions currently taking place about how to effectively set tariffs for water and waste water services that takes into account investments (as well as those for flood control measures). There is a high degree of interest in learning about the procedures used by the Dutch Water Authorities to do this. They would also like to know how the Water Authorities arrange funds to be collected from different origins for different projects.

There is some intention to merge the PMU's into one unit to increase the efficiency of project implementation. The current Divisions of PMUs were set up according to the projects at the time, but once the projects are completed, the PMUs remained and new PMUs are not easily created. This transition may take some time as it also requires approval from the HCMC PC. Also, the new PMU group would require someone with expertise in large topic ranges and they currently are unsure where this expertise would come from.

There is also a plan to make a strategic planning group. They are again challenged to find people within SCFC with the capacity to lead this group as they would need someone with strategic planning experience, something they currently do not have. With respect to strategic planning, currently they view long term planning as 10-20 years, medium term as 5-10 years and short term as 1 year.

## 5.8 Concluding Comments on Internal Organisation

With recognition that all of the above are important, the staff expressed the following as most generally causing the greatest difficulties within SCFC:

- a) A general lack of collaboration, communication and skills/manpower/capacity;
- b) Division heads/directors are too busy and so they have little time to discuss issues with staff;
- c) Lack of manpower in leadership;
- d) Insufficient facilities;
- e) Budget shortcomings;
- f) Lack of a fully integrated master plan & experience

Despite the negative issues mentioned above, every written answer related to the outlook stated that it would become better in the future.

## 6.0 External Results

The next section reports on the main concerns related to the external governance context that were taken from the interviews. They have been organised into the four qualities of governance: extent, coherence, flexibility and intensity. Organising them in this way is helpful for seeing patterns of influence. Following each of the sections we include a number of considerations for the SCFC in terms of addressing the issues raised. This information was provided by internal and external interviews as well as document analysis.

### 6.1 Extent

6.1.1) Public perception of flooding is important to SCFC's status. The public is informed of actions of SCFC through website and radio and has the opportunity to provide feedback via email, phone, etc. This is done by Public Relations Division.

6.1.2) Private companies are desired for support and potential to involve private companies is high, but the legal framework and regulations are incomplete. Pilots are being developed to test partnerships with private companies. These can be used as cases for trainings (maybe next year)

6.1.3) Flooding is affected by upstream areas that are not under HCMC's influence (for example the Saigon reservoir). Communication with the upstream reservoir takes place through different levels since HCMC PC is at the City level and the upstream reservoir is at the Ministry level: there is direct communication under emergency situations however

6.1.4) Many regulations were set prior to the establishment of SCFC and have not been adjusted since. City level plans exist, but they are not integrated and old and not updated enough with hydrological technology and interests or research on climate change

6.1.5) A lack of enforcement (and existence of sufficient) regulations related to drainage related issues: for example, wealthier people often solve their own drainage issues if they can and this has negative consequences for others (examples of raising street high in affluent areas, which causes additional flooding in surrounding areas). How important is this to SCFC? There are rules that limit individual behaviours, but enforcement is low. There is a good environmental law for waste water treatment. However there is a lack of enforcement/implementation of the law.

6.1.6) SCFC is a new pilot in the HCMC PC's structure and communication paths need to be further developed so that the necessary information can be obtained more easily for flood management. While information regarding the operations of external Departments is in theory accessible, in practice it is a very difficult process for many reasons. Sometimes the information does not exist as a whole unit (it is spread across different departments), sometimes it does not exist at all, and sometimes it is not known who to get it from. The internal and upwards focus leads to a lack of awareness of potential opportunities for collaboration, overlap, where gaps are or how one fits into the general plans.

6.1.7) Normally, when the SCFC finishes a project they make a final workshop/report, and they ask other Departments to comment on these reports. If the other HCMC Departments were not really involved from the beginning, the comments are not really in-depth. So, not all departments are included at an early stage during the process of project development. Thus, there is value missing from information exchange across HCMC departments. The other HCMC Departments also do not always have the full technical capacity to understand the reports from the SCFC given their more integrative and holistic tasks.

6.1.8) There is a lack of integrated planning which takes into account the needs of water management, there is a lack of knowledge at the higher levels about how to do this. There is a lack of research on the effects of hydrology regarding the construction plans of the SCFC. Budget allocation is not enough to cover all of the very many topics. There is a general lack of experience in proactive flood management in HCMC. There is an advisory group led by Mr. Ho Long Phi (director: Centre of Water Management and Climate Change; Vietnam National Univ. of HCMC). It is unknown how this group is used in practice.

## 6.2 Extent Considerations

6.2.1) SCFC is actively working towards integration and it has an integrated mission. There is overlap between their more integrated mission and the other Departments. Since the SCFC is not a regulatory body, there is a lack of official regulation that supports Integrated Water and Flood Management. SCFC could use the lessons from Dutch experience to continue to inspire efforts to improve integration – for example the development of a Strategic Planning Division would help SCFC to work within this structure.

## 6.3 Coherence

6.3.1) Major concern related to organisation within the HCMC PC – the innovative potential within SCFC needs to be reconciled with the top-down structure of the PC. The SCFC is a new and unique organization model, which causes issues in working externally and their ability to become a department. Other Departments do not always have the ability to fully understand the reports written by SCFC. The fragmentation of expertise across Departments limits how well the other Departments can actively incorporate SCFC related information into their programs and planning. There are overlaps between the responsibilities of HCMC and other Departments that already had these responsibilities when SCFC was founded

6.3.2) The Master Plans that are supportive of SCFC's mission are not highly integrated plans and they need updating. The newest plans are from 2008 (MARD, Irrigation) and some are from 2001 (Drainage). Inland flood management and sea inundation protection efforts are as a result sometimes incoherent (the sea is a natural outlet for rainwater, but dykes prevent drainage out to sea). It is unclear how the Master Plan for water resource planning in HCMC that is used by the various Departments is integrated to help them coordinate their actions in a strategic manner. Research is not openly involved in the decision making process. There is however an integrated plan for the Dong Nai.

6.3.3) As a result, flooding issues are not dealt with in a strategic manner with respect the needs of HCMC. Projects are funded and implemented somewhat randomly as the money is available from different funders or Departments (for example: The biggest problem for HCMC is the local rainfall,

yet there is a great deal of emphasis on building dykes – it is possible that the dyke will prevent the water from leaving the city, this necessitates to a greater degree that they build pumping stations to address the rainfall issues.) There are issues with the functioning of existing infrastructure and the wetlands to the east and south of HCMC have been removed which reduces the natural protection received related to tidal. The SCFC does not get consulted about these issues because they are considered land use planning related. Connections with external bodies outside of urban centre are weak related to using natural infrastructure to reduce Climate Change related impacts in HCMC. At a higher level, short term development focused land use planning is in contradiction to proactive flood management interests

6.3.4) Since the other Departments of the PC are not experts in flood control they are less able to fully understand and use the reports from the SCFC, this limits the ability to coordinate and learn from each other. Despite many Departments having an influence on flooding and inundation, there is little coordination about all these opinions and efforts (it is the responsibility of SCFC but they do not have access to it). The structure is extremely hierarchical and the top person always decides. Thus, uncertainty develops about who has the most power currently due to the increased role of external advise from internationals.

## 6.4 Coherence Considerations

Procedures for collaboration are present to address fragmentation between HCMC Departments. In some cases these procedures limit direct linkages between different Departments dealing with similar goals. SCFC should continue to suggest strategies for integrated solutions to the HCMC PC in terms of regulations and Master Planning. Internal collaboration could also be more embedded into the current SCFC procedures.

SCFC can continue to look for possibilities to transfer Dutch Water Authority experiences of integrated planning and project development (where appropriate). Finally they could continue to participate in international projects, yet be very aware of how they fit into the main visions of integrated flood and water management. Prevent the development of an un-integrated flood and wastewater management infrastructure

## 6.5 Flexibility

6.5.1) SCFC is relatively young and synergies with other departments are not yet optimized which can lead to protection of status quo. This newness is a temporary factor that can make it less likely that they will have success in sharing of people, projects, and ideas with HCMC Departments.

6.5.2) There are many procedures involved in collaborating across HCMC Departments. It is possible to share information, but there is an underlying competition for legitimacy (thus there are contradictory motivations for increasing informal collaboration across departments and SCFC). This can reduce the likelihood of developing somewhat risky but innovative solutions and projects.

6.5.3) Collaboration with Ministries directly is not possible, the SCFC must go through HCMC PC through a report, and often there is not a direct line to the right person at the HCMC PC (so there is a chance that the information does not go where it should, or was intended).

6.5.4) Knowledge of integrated issues is difficult to include in strict top down decision-making. On the ground issues and inter-connections between different sectors that affect flood management belong



to different HCMC Departments. Issues of jurisdictional bullying are likely to be present, jockeying for position as being the most important group to address a particular issue, reduces incentives for collaboration and equality in terms of responsibility.

6.5.5) In almost every project most people come from SCFC (if it is assigned for SCFC). They cannot get people from other HCMC Departments to work inside the project. This is because other HCMC Departments pay for other people. It is possible sometimes that external staff attend meetings of the SCFC. If they have a project, they set it up within a PMU, and they can ask other department to assign people to work in the project together (only for a project but not permanently).

## 6.6 Flexibility Considerations

There are opportunities for different Departments to take the lead on different flood related projects and some opportunities to exchange knowledge and expertise. There is less flexibility in the procedural system for project implementation and development to adapt to new technologies, innovations and issues.

Increasing the decision-making potential of staff within the SCFC can be used as a way to make effective use of existing structure to support integrated projects and goals. SCFC should consider the various pros and cons of merging PMUs since sometimes larger groups become less effective at addressing complex issues with innovative solutions.

## 6.7 Intensity

6.7.1) SCFC is an “administrative agency” implying it has less control over its own operations than do other Departments. The current status of the SCFC (not being a Department) reduces the likelihood that others see them as important, which thus reduces their ability to affect change. SCFC does not have the ability to generate their own funds or directly influence funding decisions from the HCMC PC or Donor organisations and this causes uncertainty about future projects and work for SCFC. There are few funds or other resources made available to the SCFC for strategic planning or proactive flood management.

6.7.2) Spatial planning for economic development of the city takes priority over flooding related goals (can be due to lack of knowledge of ways to combine projects, lack of perceived funding: this requires more info about how decision making process related to spatial planning is undertaken). Short-term development issues take higher priority when it comes to spatial planning and project decisions; the leadership has some awareness of flooding problem, but not with high priority. Also, opportunities for projects related to external funding can be seen as more important than long-term strategic planning. It is unclear how urgent the population perceives the flooding issue as one that the PC should solve; average awareness is not high although there are some groups or people who are highly aware who are trying to participate (in some cases by sending letters to newspapers). The Metro Master Plan for example has a high priority level and it is unclear how this affects goals related to flooding (although there is support from a Japanese funder). The lack of flood control can cause serious problems for the Metro, and little information was found about the existence of a Hydrological Master Plan that would incorporate this.

6.7.3) The complexity of the flooding situation and the potential solutions reduces the ability of the HCMC PC to suggest strong regulations that are likely to address the real issues. Other Departments

in the PC may not understand the importance of the SCFC. Since they are not a Department, this may make it further unlikely that they will collaborate with the SCFC.

6.7.4) There are very low penalties for poorly functioning water treatment plants: they do not check the working of the WWT for many years and consequently generally do not give any penalties (or low penalties) although the laws/policies exist. Enforcement of regulations related to water treatments, individual behaviours that affect infiltration and safety are weak.

## **6.8 Intensity Considerations**

There is a strong ability in HCMC government to direct and implement clear projects and plans. There is less ability to support integrated plans that are flexible due to the strong sectoral structure.

Continued participation in international projects based on integrated flooding goals can increase the support and expertise related to these goals. Increasing opportunities to communicate with external groups through invitations to join trainings and seminars can increase the awareness about SCFC and its important tasks. SCFC should continue to look for ways to reward talent and motivated individuals. This will increase overall capacity at SCFC and lead to reduced loss of staff to commercial job opportunities.

If the SCFC would become a Department they would likely garner additional strength for achieving their goals. They would have additional respect and power provided to them from the other Departments and PC. There is also a possible push against this by other HCMC Departments since it would lead to a potential reduction in their powers. This could lead to an underestimation of SCFC's capacity due to selective information sharing.

## **7.0 Final Remarks and Considerations**

It is the intent of this report to understand a number of characteristics of the SCFC organisation and what factors in the external governance context most heavily influence the SCFC and its ability to achieve its goals in an efficient and effective manner. This report follows the recently developed report by a consortium of HaskoningDHV and Deltares: the Ho Chi Minh City Flood and Inundation Management (FIM) project. It would be helpful to understand how the resulting FIM report has been adopted or used by the PC as well as reasons why it (or parts of it) may not have been adopted or accepted. We would appreciate any feedback that limits the usability and feasibility of this report for the SCFC. This report is not intended to provide any official function for the SCFC or the Dutch Water Authorities. We recognise however that some information may be of a sensitive nature and it is in no way our intention to judge the internal organisation or the external context as being either overall good or bad. For the SCFC the report solely intends to help to learn how to best manoeuvre within the aspects that are more supportive and those that are less. Every governance context has both of these qualities and it is up to the SCFC to work within its limitations. The main purpose of the report is to help the Dutch Water Authorities and the trainers that they will send to better understand the nature of SCFC and the conditions under which the SCFC has to do its work.

In addition, we include here a number of elements related to the internal organisation and capacity that have opportunities for improvement.

Maintaining and increasing professional capacities is an important yet difficult task. In order to make more time for strategic planning and thinking the already mentioned restructuring of reporting could make additional time available that could be used for employees to take on more needed tasks.

Internal staff at various levels should invest more time for each other for clarification purposes. More communication and conversations have the side effect that confidence is built up.

First actions have been taken by improving (i.e. extending) the weekly radio reporting. There is also considerably room for improvement that includes the own web presence and other print channels, especially because there are not a lot of people that frequently listen to the radio. Awareness rising could cover the whole intended audience, and not just the radio-listening subgroup.

We hope that this report provides suitable support for further discussions and the eventual training sessions and that this leads to a successful capacity training programme and further cooperation between Dutch and Vietnamese water management sectors.

## References

Kuks, Stefan, Hans, Bressers, Cheryl de Boer, Gül Özerol and Joanne Vinke-De Kruijf (2011) *Water Governance Assessment Tool*. University of Twente

de Boer, C. (2012). *Contextual Water Management - A Study of Governance and Implementation Processes in Local Stream Restoration Projects*. Enschede: University of Twente.