

### 3. Implementation Process of the Project

#### Project management and progress of activities

Overall, the Project has implemented or been implementing most of the activities as planned. On the other hand, the Project has neither still launched nor completed several activities as per the Plan of Operation (PO) or the DPO. For example, the Project has not fully undertaken activities related to STS collection under the Output 2 and the pilot source separation under the Output 3. In addition, the Project has yet to finalize and distribute the guiding references and the booklet titled “Vietnam Waste at a Glance” under the Output 1.

#### Implementation structure

- The Project established a JCC chaired by the Vice Minister of MOC, comprising 7 members in accordance with the R/D. The members of JCC are: the ATI of MOC, the Department of International Cooperation, the Hanoi DOC, URENCO, the TTH DOC, the JET and JICA Vietnam Office<sup>6</sup>. The Project has organized the JCC meeting basically once a year. The majority of the Project’s stakeholders including the counterparts and the JET interviewed by the Team noted that the JCC was very effective in approving the annual PO, the revised PDM and the selection of the model province, sharing the progress of Project’s activities and discussing the issues arisen and the countermeasures.
- According to the counterparts and the JET interviewed by the Team, most of the activities under the Output 1 and the Output 2 have been discussed and implemented by a small number of stakeholders which include the concerned counterparts who are responsible for the respective activities and the JET in charge. Whenever necessary, the project managers of each Output or the project director have also participated in the meetings for discussion. In the case of the activities in TTH Province under the Output 3, the Steering Committee formed by the Project has worked like the JCC at the provincial level and organized the meetings to discuss the priority projects and share the progress of activities. The TTH DOC has held the individual meetings with the JET whenever they need to consult some issues intensively.

#### Monitoring

- The Project has monitored the progress of activities by various means: (1) JCC meetings once a year; (2) monthly meetings among the MOC, the JET and JICA Vietnam Office; (3) submission of monitoring sheets by the JET to the MOC to share the progress of activities under the Output 2 and the Output 3 every three months; (4) Steering Committee meetings in TTH Province on a quarterly basis; (5) joint monitoring of site visits by the counterparts of each organization and the JET; (6) individual meetings between the counterparts and the JET to confirm the progress of DPO; and (7)

<sup>6</sup> DONRE is the observer of JCC.



the regular reporting by the DOC to the MOC.

- The Project has regularly monitored the activities based on the PO or the DPO. However, it can be inferred that it has rarely monitored the achievement of the Indicators described in the PDM.

#### Communication among Project stakeholders

- As most of the counterparts and the JET pointed out, the communication among the Project stakeholders has been gradually improved through a series of meetings, the joint monitoring activities, the CSS programs and workshops/seminars and the training in Japan. It was sometimes difficult for both the counterparts and the JET to communicate and coordinate with each other, particularly at the initial stage of the Project. It generally takes time to build the common understanding of the Project and the expected roles and responsibilities of stakeholders if it is the first time for the counterparts to take part in a JICA technical cooperation project. Moreover, both parties sometimes faced difficulties in adjusting the schedule because the counterparts were too busy with their regular tasks to find the time to work together during the limited assignment of JET in the second phase.

#### Sharing of knowledge and expertise and technical transfer

- In JICA technical cooperation projects, counterparts are expected to carry out or be involved in the project's activities under the guidance of Japanese experts. This learning by doing process enables the counterparts to gain knowledge, skills, know-how and experiences of certain development issues effectively through technical transfer and knowledge sharing from Japanese experts. In the beginning of the Project, the counterparts of MOC and the JET have held the weekly meetings to share the experiences of the Japanese practices on ISWM, and to discuss the ISWM-related issues as well as the possible measures in Vietnam. ISWM is a relatively new concept in Vietnam. It was difficult for the counterparts of MOC to take the lead in reviewing the existing framework and issues of SWM, and identifying the necessary measures from the viewpoint of ISWM in the Project because they were too busy for their routine works. Under these circumstances, the Project need to change its approach. The JET has taken the lead in preparing the drafts of legal documents and guiding references. Based on the drafts developed by the JET, the counterparts have provided their comments and further discussed with the JET for finalization. In the case of the Output 2 and the Output 3, the JET has also taken initiatives in proposing various ideas, and undertaking activities in consultation with the Hanoi DOC and the TTH DOC.
- Most of the counterparts interviewed by the Team indicated that they have acquired the knowledge and know-how on SWM through the JET and the training in Japan. They highly appreciated the expertise of the JET and the experiences of training in Japan. The concrete examples of improvement of capacities were described in the achievement of the Indicators 2, 3 and 4 of the

A

ff

Project Purpose (See 2.3 Project Purpose).

- The JET noted that the above-mentioned approach in which the JET took the lead in conducting activities was effective in deepening the understanding of counterparts regarding the ISWM including its approaches and techniques which were relatively new for them. Without any proposals and preliminary drafts prepared by the JET, it might be so difficult for the Project to carry out the planned activities. On the other hand, several members of JET acknowledged that the counterparts should have more taken the lead in undertaking the Project activities, but instead, the JET did.

Ownership of implementing agency and cooperating agencies

- All counterparts of MOC, Hanoi DOC and TTH Province have had the sense of responsibility for addressing the ISWM-related issues in the Project because effective ISWM becomes an urgent issue in Vietnam. However, it can be inferred that both the counterparts and the JET have not had a sufficient level of common understanding about the concept and scope of Project's activities in detail and the expected role and responsibilities of counterparts and the JET particularly at the initial stage of the Project. This may have negatively affected the smooth communication and coordination of the Project between both parties to a certain extent. As previously mentioned, that might be because it was the first time for both parties to work together in a JICA technical cooperation project. In accordance with the progress of activities and the participation of training in Japan, most of the counterparts have been more interested in Project's activities and gradually enhanced the willingness to carry out some of them including the data management of SWM statistics, the CSS and the priority projects determined in the Master Plan.

*Handwritten mark*

*Handwritten mark*

#### 4. Results of Evaluation with Five Evaluation Criteria

##### 4.1 Relevance: High

Results are summarized below:

##### Consistency of the policies of the Government of Vietnam and the Government of Japan

- The Project is consistent with the Decree No.59/2007/ND-CP on SWM which stipulates the local governments' responsibility to establish solid waste master plans including development of SWM related facilities. The Project is in line with the National Strategy on ISWM up to 2025 vision to 2050(Decision No.2149/2009/QD-TTg), which aims for establishing the ISWM system. It also sets such goals as to achieve an ordinary waste collection rate of 85% by 2015, to reach a reuse/recycling rate of 35% by 2015, and to formulate SWM master plans in all urban cities. In accordance with the revised Environmental Protection Law (2014), the Decree No.38/NC-CP on waste and scrap management came into force on June 15, 2015, which stipulates the role and responsibilities of MOC. According to this Decree No. 38/NC-CP, MOC's role and responsibilities related to planning of SWM, planning of construction of solid waste treatment facilities and investment and management of SWM facilities are not changed. Therefore, the Project is still relevant with the latest policies of the Government of Vietnam.
- According to Japan's Country Assistance Policy for Vietnam (2012) and the Official Development Assistance Rolling Plan of Japan for Vietnam (2014), "response to the negative impacts brought by economic development" is one of the three priority areas for assistance. The Project is one of the programs of urban environment management. The JICA Country Analytical Paper (2014) focuses the support to improving urban environment management based on Japan's experience, technologies and know-how. Thus the Project is consistent with these Japanese aid policies.
- JICA has consistently provided support and assistance to the SWM sector in Vietnam through undertakings including "Implementation support for 3R initiative in Hanoi City to contribute to the development of a sound material-cycle society", so called "3R project (2006 – 2009)".

##### Necessity of the Project

- It was urgent for the MOC and the Hanoi DOC as well as the TTH PPC to establish the ISWM system at the national and city/provincial levels as per the National Strategy National Strategy on ISWM up to 2025 vision to 2050 (Decision No.2149/2009/QD-TTg) and other relevant legal documents. Thus, the Project meets the urgent needs of these organizations to improve their capacity to establish the ISWM system.

##### 4.2 Effectiveness: Moderately high

##### Achievement of the Project Purpose and contribution of Outputs

- All three Outputs have been almost achieved, which have contributed to the attainment of the

Project Purpose. However, the PDM does not have any Outputs to improve the capacity of staff of TTH Province stated in the Indicator 4 of the Project Purpose.

- The Team was unable to assess the exact extent of achievement of the Project Purpose because all four Indicators of the Project Purpose in the PDM have some drawbacks. However, the substantial purpose of developing capacity of MSWM has been on track.

Effects generated by the Project and Factors that promoted the effectiveness of the Project

- The most significant effect of the Project is that the Project has drafted the new legal documents and amended the existing ones related to SWM by identifying some areas of the overlap and the gaps in legal provisions between SWM-related legal documents. The Project has also contributed to QCVN/07, 2016/BXD (National Technical Regulations on Urban Infrastructure) and the Decree No.38/NC-CP on waste and scrap management by providing comments, which serves as the fundamental legal basis for mandates of MOC in accordance with the revised Environmental Protection Law (2014).
- The Project has brought about other various effects including the following: 1) developing the data management of national SWM statistics; 2) developing the guiding references on waste management including the formulation of ISWM Master Plan; 3) developing the Implementation Plan for Hanoi City; 4) developing the ISWM Master Plan in TTH Province; 5) enhancing the capacity of MOC, the Hanoi DOC and the TTH Province; and 6) sharing the knowledge and know-how of ISWM with other cities/provinces; and 7) providing the platform in which participants of CSS can discuss issues and challenges they encountered as well as possible measures of SWM.
- All of the above has helped enhance the overall effectiveness of the Project. Thus, the effectiveness of the Project was assessed as moderately high.

**4.3 Efficiency: Medium to Moderately high**

- All of the inputs from both the Vietnam and the Japanese sides were provided as scheduled. During the first phase of the Project<sup>7</sup>, the Project has produced various and many deliverables including several drafts of legal documents, the drafts of guiding references covering various areas of ISWM, the Implementation Plan in Hanoi City, the ISWM Master Plan in TTH Province, and the draft of “Vietnam Waste at a Glance”. That is because 14 experts who were assigned for this period have taken the lead in these activities. This has contributed to enhancing the efficiency of the Project.
- However, some of the Project activities have not been fully completed, which affected the achievement of the three Outputs. The Team has identified the several factors which might have affected the efficiency of the Project. First, the less number of experts, i.e., 7 experts were assigned

<sup>7</sup> The Project has two phases: the first phase from March 31, 2014 to March 18, 2016; and the second phase from May 25, 2015 to March 15, 2018.



in the second phase based on the design of the Project<sup>8</sup>. Second, the second phase started two months behind schedule because of the delay in the contract procedures with the JET within the JICA, which forced the Project to postpone the training in Japan from June 2016 to August 2016. Third, the design of the Project in the second phase, which focuses on the implementation of priority projects in the Hanoi DOC and the TTH Province, requires more coordination and cooperation among various stakeholders. Fourth, as several counterparts and the JET pointed out, the communication and coordination problems were sometimes arisen between two parties. This might also affect the efficiency of implementation of activities to some extent (See also 3. Implementation).

- Considering the above, the Project's efficiency as a whole is medium to moderately high.

#### **4.4 Impact (Prospects): Some positive impacts have emerged.**

##### Prospect of achievement of the Overall Goal

- At the time of the Terminal Evaluation, it was too early to predict the achievement of the Overall Goal. That is because the guiding references described in the Indicator 1 has yet to be finalized and distributed. Furthermore, this Indicator alone is not enough to measure whether the ISWM system on municipal solid waste is established in accordance with the National Strategy on ISWM.

##### Ripple effects and positive impacts

By the time of the Terminal Evaluation, the following impacts have already emerged:

- The Project has been involved in drafting or commenting eight legal documents, of which the following four legal documents have already come into force: 1) Decree No.38/2015/ND-CP dated on 24/4/2015 of the Government on Waste and Scrap Management; 2) Circular No.07/2017/TT-BXD dated on 15/5/2017 on guiding the determination of service price for domestic solid waste treatment service; 3) Circular No.08/2017/TT-BXD dated on 16/5/2017 on management of construction waste; and 4) QCVN07:2016/BXD National Technical Regulations on Technical Infrastructure Works.
- The Project has coordinated with and facilitated the TTH PPC and Fukuoka Prefectural Government in Japan to discuss the technical support for construction of a semi-aerobic landfill in Huong Binh. As a result, both parties have exchanged the official letters for this cooperation. The Memorandum of Understanding is expected to be signed after the field surveys in October 2017.

<sup>8</sup> The total person-months were 116.97 M/M for the first phase and 47.95 M/M for the second phase. It should be noted that the first phase was designed to identify issues of SWM, develop the tools including legal documents and guiding references for addressing these issues, and to develop the Implementation Plan in Hanoi City and the ISWM Master Plan in TTH Province. The second phase was planned to disseminate the tools developed and implement the determined activities in the above-mentioned plans. Based on the design of the Project, the number of experts and the person-months were determined.

A

ff

#### 4.5 Sustainability (Prospects): Not predictable

##### Policy aspect: High

- The MOC and the Hanoi DOC as well as the TTH Province have demonstrated a policy commitment with a sense of ownership to aim for establishing the ISWM at the national and city/provincial levels. The Project has largely contributed to establishing the policy and legal framework for effective implementation of ISWM by drafting legal documents on SWM. The current policy is expected to be sustained after the completion of the Project. However, it should be noted that the current scope of work for the MSWM are still overlapped within the central agencies as well as provincial agencies. At the time of the Terminal Evaluation, it was not clear whether the mandate of these agencies including the MOC will be drastically changed. Thus, it is fair to say that the sustainability of the policy aspect is likely to be high if the important assumption is met.

##### Institutional aspect: Not predictable

- Drafting the new legal documents and amending existing ones on SWM in the Project have contributed to strengthening the institutional framework in the field of SWM at the national and provincial levels. Such an institutional framework will be sustained because some of legal documents have already come into force.
- The data system of the national SWM statistics and the dissemination of guiding references on waste management are likely to be sustained because the MOC has just started to consider the institutionalization of these activities. Concerning the CSS, most of the counterparts highly appreciated its effectiveness and had the strong willingness to continue such activities. However, some of them were concerned about its sustainability because the MOC has no exclusive budget line for this. Others pointed out that CSS is less likely to be sustained if it is considered as formal training programs of SWM. That is because the MOC has no mandate of provision of such training.
- As the counterparts of the Hanoi DOC pointed out, the sustainability of the priority projects in the institutional aspect seems to largely depend on the availability of budget.
- The TTH Steering Committee is likely to be sustained even after the termination of the Project because the Vice Chairperson and its members have the strong willingness to keep it in place for the implementation of the Master Plan. However, it was hard to predict the sustainability of priority projects in the institutional aspect because they just started one year ago.
- Given the above, it is hard to predict the sustainability in the institutional aspect at the time of the Terminal Evaluation.

##### Organizational aspect: Moderately high

- The MOC, the Hanoi DOC and the TTH DOC have the sense of ownership and responsibility for SWM. Most of the counterparts of the Project are likely to keep working for SWM even after the



completion of the Project. As many counterparts mentioned, each agency has the limited number of staff who are in charge of SWM. They need to work other tasks, too. If the budget is available, some tasks are contracted out to local consultants.

- The workload of each agencies in terms of ISWM is highly expected to increase in the future.
- Considering the above, it is fair to say that the sustainability of the organizational aspect is likely to be moderately high.

Financial aspect: Not predictable

- As mentioned before, the MOC does not have any exclusive budget line for CSS. At the time of the Terminal Evaluation, it was unlikely to allocate the minimum budget for this after the termination of the Project. According to the counterparts of MOC, the data management system of the national SWM statistics and the use of guiding references on waste management will not require much budget.
- The budget allocation is a key issue for the sustainability of the implementation and expansion of priority projects in both the Hanoi DOC and the TTH Province. However, it was not clear how much the budget needed to be allocated and how it needed to be secured.

Technical aspect: Not predictable

- By the time of the Terminal Evaluation, about 100 people in total including central and provincial agencies attended the training in Japan. Even after the completion of the Project, they were most likely to apply their knowledge and experiences obtained by these training programs since some of them have already initiated to apply what they learned to the respective works.
- The JET has started to transfer the skills and knowhow of data management of SWM statistics. Several counterparts trained by the JET noted that they were confident of dealing with the data aggregation and analysis after the completion of the Project.
- The counterparts of MOC are likely to acquire the knowledge and know-how of CSS programs to be organized four times by the end of the Project.
- The counterparts of the Hanoi DOC and the TTH Province have steadily enhanced their capacity to manage ISWM through the Project activities. However, whether they can take initiatives in conducting the priority projects after the end of the Project still remains a concern. That is because the JET has taken the lead in undertaking most of activities even during the second phase.
- Overall, the capacity of counterparts of the Project has been gradually enhanced. On the other hand, it was hard to assess and predict the extent of capacity improvement because of no relevant data of capacity assessment.
- Considering the above, it was not possible to predict the sustainability of the Project in the technical aspect.

A

PK



## 5. Conclusion

The Project has drafted both the new legal documents and the amended ones related to SWM, which can be considered as the substantial achievements of the Project. All three Outputs have been almost achieved based on the PDM. The Team was, however, unable to assess all four Indicators of the achievement of the Project Purpose objectively because of some drawbacks of these Indicators.

As for the results of the five evaluation criteria, the Project has a high degree of relevance, while the Project has a moderately high degree of effectiveness, and a medium to moderately high degree of efficiency. At the time of the Terminal Evaluation, some positive impacts such as enactment and enforcement of four legal documents drafted or commented by the Project have been already observed. The Team was unable to predict the overall sustainability of the Project because most of the priority projects in Hanoi City and TTH Province have just started.

Considering the above circumstances, the Team concludes that the Project should be terminated as planned with the prospect of distribution of the guiding reference and of continuity of the priority projects through appropriate technical transfer of the JET by the end of the project.

To implement the remaining activities and make the Project sustainable, it is recommended that the Project and the Vietnamese side duly take into account the recommendations as listed below.

## 6. Recommendations

The Team made the following recommendations to be implemented during the Project period based on the results of evaluation.

### 6.1 Recommendations to be implemented during the Project period

#### (1) Redesigning and undertaking the capacity assessment

It is recommended that the Project identify the capacity of staff of each agency to be sustained or further strengthen for establishing ISWM system on municipal solid waste even after the termination of the Project. The Project also needs to redesign the capacity assessment by setting the evaluation criteria, and to undertake it as soon as possible. The format of capacity assessment is expected to be used during the Ex-Post Evaluation Study.

#### (2) Revising the Indicators of the short-term Overall Goal

To measure the achievement of the short-term Overall Goal objectively during the Ex-Post Evaluation, it is recommendable to set additional indicators such as implementation of data collection and management of national SWM statistics every year.

**(3) Clarifying the methods of dissemination of the guiding references and the booklet titled “Vietnam Waste at a Glance”**

The Project is expected to finalize and distribute the guiding references on waste management and the booklet titled “Vietnam Waste at a Glance”. It is recommended that the Project clarify the effective methods of dissemination of these deliverables even after the termination of the Project.

**(4) Transfer various know-how of major activities of the Project from the JET**

[MOC]

- The MOC needs to fully gain the know-how and skills of the data management of national SWM statistics and management of CSS from the JET to ensure the sustainability of the Project.

[Hanoi DOC]

- The Hanoi DOC, in coordination with the JET needs to discuss the necessary measures for implementing the priority projects with the HPC and establishing ISWM including budget allocation.
- The Hanoi DOC is expected to acquire the know-how of implementation of the priority project of STS.

[TTH DOC/Steering Committee]

- The TTH DOC and the members of the Steering Committee, in coordination with the JET, need to clarify the framework and the plan of operation of the priority projects after the end of the Project. It is also encouraged to compile the good practice of priority projects with the support of the JET.
- The TTH DOC and other members of the Steering Committee need to acquire the know-how of undertaking the priority projects from the JET.

**(5) Sharing knowledge at the workshop**

The Project will organize a sharing workshop to disseminate the guiding references and other outputs by the end of the Project. The counterparts of respective agencies, instead of the JET, are encouraged to present and share their know-how, skills and knowledge gained through the Project activities.

**6.2 Recommendations to be implemented after the termination of the Project**

**(1) Keeping implementing the major activities of the Project**

- The MOC should keep implementing the activities of data management of national SWM statistics, integration of CSS into existing seminars and workshops, and dissemination of guiding references on waste management.
- The Hanoi DOC should carry out the priority projects and revise the Master Plan by using the guiding reference of formulation of the ISWM Master Plan developed by the Project.

A

ff

- The TTH Province should keep undertaking the priority projects and share these experiences and lessons learned with other cities/provinces.

#### 7. Lessons Learned

The Team identified the following lesson learned from the Project.

**(1) The need for designing a capacity assessment carefully to make it a basis for evaluation**

The capacity assessment was designed in this Project to assess the individual, institutional and organizational capacities of implementing and cooperating agencies. The evaluation could have been much more easily and effectively done if it would have been properly designed to provide the relevant data that can serve as the basis for PDM indicators and evaluation. A capacity assessment should be carefully designed and implemented at a proper timing in order to analyze and evaluate the extent of improvement of capacity as well as the interrelation of project activities.

-END-



**ANNEX 1: Project Design Matrix Version 4**

**Project Design Matrix Version 4** (approved in the fourth JCC Meeting on 12 April, 2017)  
**Project Title:** The Project for Capacity Development on Integrated Management of Municipal Solid Waste in Vietnam  
**Implementing Agency:** Ministry of Construction (MOC)  
**Cooperating Agencies:** 1) Hanoi Department of Construction (Hanoi DOC), 2) Urban Environment One Member Limited Company (Hanoi URENCO), 3) Thua Thien Hue (TTH) Province  
**Direct Beneficiaries:** Staff of the implementing and cooperating agencies.  
**Indirect Beneficiaries:** Residents of Hanoi city and TTH Province  
**Target Area:** Hanoi city, other related Provinces including TTH Province  
**Target Waste:** "Municipal Solid Waste" in the Project is defined as 1) Domestic solid waste generated from daily activities in households, institutional (schools, government offices etc), public areas (roads, parks, etc.) and commercial/service entities (shops, offices, restaurants, markets, hotels etc.), 2) construction waste and 3) septic tank sludge  
**Project Period:** From 31<sup>st</sup> March 2014 to 15<sup>th</sup> March 2018

	<b>Narrative Summary</b>	<b>Objectively Verifiable Indicators</b>	<b>Means of Verification</b>	<b>Important Assumptions</b>
<b>Overall Goal</b> Long term overall goal (super goal): Integrated solid waste management (ISWM) is established overall in Vietnam in accordance with the National Strategy on ISWM.		1. By March 2022, at least 3 Cities/Provinces develop/update or are developing/updating "Integrated" Master Plans on SWM	1. List of official letters sending the documents to competent agencies 2. Results of capacity assessment jointly conducted by PMU and JET 3. ditto of item 2 4. ditto of item 2	1. The Vietnamese government mandates the policy of ISWM on municipal solid waste 2. The Vietnamese government allocates budget and mobilize other sources for ISWM on municipal solid waste 3. Cities/Provinces prepare budget for newly development/update implementation including formulation for master plans.
<b>Short term overall goal</b> (5 years after the completion of the project): ISWM system on municipal solid waste is established in accordance with the national strategy on ISWM.		1. By the end of the Project, at least 80 % of the drafts of legal documents on MSWM, developed or revised through the Project, are submitted to the competent agencies by MOC. 2. By the end of the Project, staff of MOC enhances its management capacity comprehensively in terms of the capacity assessment items <sup>(*)</sup> . 3. By the end of the Project, staff of Hanoi DOC enhances its capacity comprehensively in terms of the capacity assessment items <sup>(*)</sup> . 4. By the end of the Project, staff of Thua Thien Hue Province enhances its capacity comprehensively in terms of the capacity assessment items <sup>(*)</sup> . <small>(*) The capacity assessment items were updated in the fourth JCC held in April 12, 2017.</small>	1a. List of guiding references author/accepted 1b. Number of data items aggregated in the database 1c. Date of main book publication	1. Meet counterpart staff conditions working for the Project. 2. The new Law on Environmental Protection does not change the MOC's
<b>Project Purpose</b> Capacity of municipal solid waste management (MSWM) is developed comprehensively in central and local governments.				
<b>Outputs</b> Output 1 Capacity of MOC on management, policy-making, and support system for local governments to execute the National Strategy on ISWM is enhanced, in particular for MSWM				

ANNEX 1-1

BP

ANNEX 1: Project Design Matrix Version 4

Output 2: Capacity of Hanoi DOC on implementation of ISWM is enhanced	of data and its aggregation into the database. 1c. The major aggregated data are compiled in project's documents to be shared with Cities/Provinces in 2016 and 2017. 1d. Domestic seminars on ISWM are organized once per year by MOC during implementation of the Project. 1e. Policy guidance from MOC to the local governments are implemented in the domestic seminars, Co-learning Study Session (CSS), from 2015, utilizing the acquired knowledge and deliverables during implementation of the Project. 2a. By December 2015, implementation Plan of Hanoi Solid Waste Treatment Master Plan, with proposals on 5-year priority projects on domestic waste, construction waste, and septic tank sludge, is developed. 2b. The initial stage of the approved priority projects is implemented by Hanoi DOC from September 2016. 3a. The capacity status of existing SWM in TTH Province is analyzed by MOC during selection 3b. Technical comments on ISWM Master Plan in particular for MSWM sector of TTH Province are provided by MOC during preparation master plan formulation. 3c. Written comments on ISWM Master Plan was provided by MOC to Provincial PC before approval 3d. Progress of pilot trials and preparation for priority projects identified in the ISWM Master plan is monitored by ATI-MOC through a progress report of each project 3e. By the end of the Project, guiding reference for Master Plan for ISWM preparation is issued/accepted by ATI-MOC.	1d. Date, contents, and participants of project seminars 1e. Date, contents, and participants of CSSs 2a. Project report 2b. Progress report 3a. Project reports 3b. Written comments or Record of Task Force meeting 3c. Written comments of ATI provided to TTH DOC&PPC 3d. Progress reports received by ATI-MOC 3e. Date of issue/ acceptance	roles and responsibilities on ISWM.
<p>Output 3: Technical support capacity of MOC for preparation of ISWM Master Plan, in particular for municipal solid waste management sector, is enhanced through model Province</p>	<p>1c. The major aggregated data are compiled in project's documents to be shared with Cities/Provinces in 2016 and 2017. 1d. Domestic seminars on ISWM are organized once per year by MOC during implementation of the Project. 1e. Policy guidance from MOC to the local governments are implemented in the domestic seminars, Co-learning Study Session (CSS), from 2015, utilizing the acquired knowledge and deliverables during implementation of the Project. 2a. By December 2015, implementation Plan of Hanoi Solid Waste Treatment Master Plan, with proposals on 5-year priority projects on domestic waste, construction waste, and septic tank sludge, is developed. 2b. The initial stage of the approved priority projects is implemented by Hanoi DOC from September 2016. 3a. The capacity status of existing SWM in TTH Province is analyzed by MOC during selection 3b. Technical comments on ISWM Master Plan in particular for MSWM sector of TTH Province are provided by MOC during preparation master plan formulation. 3c. Written comments on ISWM Master Plan was provided by MOC to Provincial PC before approval 3d. Progress of pilot trials and preparation for priority projects identified in the ISWM Master plan is monitored by ATI-MOC through a progress report of each project 3e. By the end of the Project, guiding reference for Master Plan for ISWM preparation is issued/accepted by ATI-MOC.</p>	<p>1d. Date, contents, and participants of project seminars 1e. Date, contents, and participants of CSSs 2a. Project report 2b. Progress report 3a. Project reports 3b. Written comments or Record of Task Force meeting 3c. Written comments of ATI provided to TTH DOC&amp;PPC 3d. Progress reports received by ATI-MOC 3e. Date of issue/ acceptance</p>	<p>roles and responsibilities on ISWM.</p>
<p>1-1. Review policies, legislations, institutional framework, and standards for municipal solid waste management in central government and make recommendations if necessary. 1-2. Review and evaluate traditional and modern technologies on treatment and management, and technical regulations on planning and constructing, and then make recommendations on criteria on selection of suitable technologies. 1-3. Develop a guidance for making construction plans for municipal solid waste treatment facilities. 1-4. Develop capacity of MOC to supervise and to monitor the implementation on municipal solid waste management by local governments. 1-5. Collect data and information to be utilized for strengthening</p>	<p>of data and its aggregation into the database. 1c. The major aggregated data are compiled in project's documents to be shared with Cities/Provinces in 2016 and 2017. 1d. Domestic seminars on ISWM are organized once per year by MOC during implementation of the Project. 1e. Policy guidance from MOC to the local governments are implemented in the domestic seminars, Co-learning Study Session (CSS), from 2015, utilizing the acquired knowledge and deliverables during implementation of the Project. 2a. By December 2015, implementation Plan of Hanoi Solid Waste Treatment Master Plan, with proposals on 5-year priority projects on domestic waste, construction waste, and septic tank sludge, is developed. 2b. The initial stage of the approved priority projects is implemented by Hanoi DOC from September 2016. 3a. The capacity status of existing SWM in TTH Province is analyzed by MOC during selection 3b. Technical comments on ISWM Master Plan in particular for MSWM sector of TTH Province are provided by MOC during preparation master plan formulation. 3c. Written comments on ISWM Master Plan was provided by MOC to Provincial PC before approval 3d. Progress of pilot trials and preparation for priority projects identified in the ISWM Master plan is monitored by ATI-MOC through a progress report of each project 3e. By the end of the Project, guiding reference for Master Plan for ISWM preparation is issued/accepted by ATI-MOC.</p>	<p>1d. Date, contents, and participants of project seminars 1e. Date, contents, and participants of CSSs 2a. Project report 2b. Progress report 3a. Project reports 3b. Written comments or Record of Task Force meeting 3c. Written comments of ATI provided to TTH DOC&amp;PPC 3d. Progress reports received by ATI-MOC 3e. Date of issue/ acceptance</p>	<p>roles and responsibilities on ISWM.</p>
	<p>Inputs</p> <p>&lt;Japanese Side&gt;</p> <p>(1) Japanese Experts 1) Chief advisor 2) Project coordinator 3) Institution, organization 4) Solid waste management 5) Database management 6) Financial management 7) Waste treatment technology 8) Environmental education 9) Other experts in specific fields, if needed</p> <p>(2) International Training</p>	<p>&lt;Vietnamese Side&gt;</p> <p>(1) Counterpart and other staff 1) Project director 2) Project managers 3) Counterpart staff in i) MOC ii) Hanoi DOC iii) Hanoi URENCO iv) DOC in model Province 4) Administrative staff for project implementation</p> <p>(2) Project office, equipment and</p>	<p>A. Necessary budget for related activities is secured by concerned agencies. B. Draft master plan of solid waste treatment of Hanoi city is prepared in the beginning stage of the project by HPC.</p>

ANNEX 1-2

**ANNEX 1: Project Design Matrix Version 4**

<p>municipal solid waste management in national level, analyze it and identify problems.</p> <p>1-6. Study on investment models and management models to be applied to the investment on construction and management of SWM complex.</p> <p>1-7. Study and make guidance for formulating construction plans on inter-provincial municipal solid waste treatment complexes. (Note: Activity 1-7 is combined with Activity 1-3)</p> <p>1-8. Organize trainings and seminars to enhance proper municipal solid waste management on legal framework, management mechanism, technologies and responsibilities etc. in national level and share experiences of domestic and international practices.</p> <p>1-9. Organize conferences and workshops among experts on technical, legislative and social issues on municipal solid waste management in nationwide (Note: Activity 1-9 is combined with Activity 1-8)</p> <p>1-10. Draft the revision of National Strategy on ISWM based on the review under Activity 1-1 for submission to the Prime Minister</p>	<p>1) Counterpart training will be conducted in Japan 2 times/year, 10-12 materials</p> <p>(3) Equipment and Material</p> <p>1) Based on necessity, equipment and materials which are required for the implementation; such as</p> <p>i) Environmental education &amp; PR</p> <p>ii) Trainings, seminars and public awareness raising activities</p> <p>(4) Project Cost</p> <p>1) General expenditures for the activities of the Japanese experts</p> <p>2) Partial costs which are required for the implementation, such as</p> <p>i) Environmental education &amp; PR</p> <p>ii) Trainings, seminars and public awareness raising activities etc.</p>	<p>materials</p> <p>1) Office space for Japanese experts</p> <p>i) Hanoi DOC</p> <p>ii) Hanoi DOC</p> <p>iii) DOC of model Province</p> <p>2) Equipment and materials which are required, such as trainings, seminars etc.</p> <p>(3) Project cost</p> <p>1) Project costs which are required; such as</p> <p>i) Counterpart budget</p> <p>ii) Trainings, seminars etc.</p>	<p><b>Pre-Condition</b></p> <p>There is no substantial decrease in the budget of MOC, Hanoi DOC.</p>
<p>2-1. Review the results of phase 1 Project from the sustainability point of view and also analyze Hanoi city situation as a whole system on ISWM. Identify lessons learned and make advices and recommendations.</p> <p>2-2. (Deleted)</p> <p>2-3. Make advice and recommendations on the implementation of Hanoi solid waste treatment master plan, including public awareness raising activities.</p> <p>2-4. Make technical advice to select the site for target SWM complexes in accordance with Hanoi solid waste treatment master plan, and conduct a pre-feasibility study for the selected target SWM complex in particular for municipal solid waste part.</p> <p>2-5. Study the investment promotion for the construction of target SWM complex, such as BOT, PFI, PPP etc (Note: Activity 2-5 is combined with Activity 2-4)</p> <p>2-6. Learn the lessons of planning and implementation of Hanoi solid waste treatment Master Plan in particular on MSWM</p> <p>3-1. Implement "Capacity Assessment" for existing SWM in the model Province.</p>			

ANNEX 1-3

PR

**ANNEX 1: Project Design Matrix Version 4**

<p>3-2. Provide technical assistance for the local government of the model Province on the preparation/upgraded of ISWM Master Plan in particular for municipal solid waste management sector, which will be submitted to local government of selected city/ province.</p> <p>3-3. Provide technical assistance for the initiation of implementing ISWM Master Plan in particular for MSWM sector</p> <p>3-4. Formulate the guiding reference for development of Integrated SWM Master Plan based on the experiences from Activities 3-2 and 3-3.</p>			
---	--	--	--

ANNEX 1-4

ff

ANNEX 2: Evaluation Grid  
1. Achievement of the Project

SN	Evaluation Item	Narrative Summary	Indicators	Data Needed	Data Sources	Data Collection Methods
1	Achievement/Prospect of achievement (Short-term Overall Goal)	The extent of achievement or the prospect of achievement of short-term Overall Goal "ISWM system on municipal solid waste is established in accordance with the national strategy on ISWM"	1. By the end of 2022, at least 3 Cities/Provinces develop/update or are developing/updating "Integrated" Master Plans on SWM*1. *1 Based on the guiding reference for master plan formulation	• Cities/Provinces that have plans to develop/revise Integrated Master Plans on SWM • MOC's view on the use of guiding reference for master plan formulation	• Project documents and reports • Counterpart Personnel (C/P) and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
2			1. By the end of the Project, at least 80 % of the drafts of legal documents on MSWM, developed or revised through the Project, are submitted to the competent agencies by MOC*2. *2 Submitted to the competent agencies by MOC means to be sent to other related agencies for their comments.	• List of legal documents drafted by the Project. • List of legal documents which were submitted to other agencies for their comments • Status of these documents • Case examples of MOC's capacity improvement through the development and revision of legal documents on MSWM	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
3			2. By the end of the Project, staff of MOC enhances its management capacity comprehensively in terms of the capacity assessment items *3. *3 The target value is 7.0 points in all capacities.	• Results of the first and second capacity assessments • Case examples of MOC's capacity improvement through the Project activities	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
4	Achievement (Project Purpose)	The extent and the prospect of achievement of Project Purpose "Capacity of municipal solid waste management (MSWM) is developed comprehensively in central and local governments."	3. By the end of the Project, staff of Hanoi DOC enhances its capacity comprehensively in terms of the capacity assessment items *3. *3 The target value is 7.0 points in all capacities.	• Results of the first and second capacity assessments • Case examples of Hanoi DOC's capacity improvement through the Project activities	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
5			4. By the end of the Project, staff of Thua Thien Hue Province enhances its capacity comprehensively in terms of the capacity assessment items *3. *3 The target value is 7.0 points in all capacities.	• Results of the first and second capacity assessments • Case examples of Thua Thien Hue Province's capacity improvement through the Project activities	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders

ANNEX 2-1

fl



ANNEX 2: Evaluation Grid

6	<p>By the end of the Project, 100 % of the draft guiding references, developed through the Project, are accepted by ATI, MOC for policy support to local governments.</p>	<p>1a. List of approved guiding references                  • MOC's view on the use of these guiding references                  • Case examples of MOC's capacity improvement through the development of guiding references                  • Number and kinds of data on MSWM collected in the database                  • MOC's view on the use of the database developed by the Project                  • Case examples of MOC's capacity improvement through the development of database</p>	<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
7	<p>The extent of achievement of Output 1 "Capacity of MOC on management, policy making, and support system for local governments to execute the National Strategy on ISWM is enhanced, in particular for MSWM."</p>	<p>1b. The present conditions of MSWM are monitored nationwide by ATI. MOC annually through collection of at least 40 items of data and its aggregation into the database.                  1c. The major aggregated data are compiled in project's documents to be shared with Cities/Provinces in 2016 and 2017.                  1d. Domestic seminars on ISWM are organized once per year by MOC during implementation of the Project.</p>	<p>• Project documents and reports                  • C/P and Japanese experts                  • Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
8	<p>Achievement (Outputs)</p>	<p>1e. Policy guidance from MOC to the local governments are implemented in the domestic seminars, Co-learning Study Session (CSS), from 2015, utilizing the acquired knowledge and deliverables during implementation of the Project.</p>	<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
9		<p>2a. By December 2015, Implementation Plan of Hanoi Solid Waste Treatment Master Plan, with proposals on 5-year priority projects on domestic waste, construction waste, and septic tank sludge, is developed.</p>	<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
10		<p>2b. The initial stage of the approved priority projects is implemented by Hanoi DOC from September 2016.</p>	<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
11	<p>The extent of achievement of Output 2 "Capacity of Hanoi DOC on implementation of ISWM is enhanced."</p>		<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>
12			<p>• Project documents and reports                  • C/P and Japanese experts</p>	<p>• Review of documents and reports                  • Questionnaire                  • Interview with stakeholders</p>

ANNEX 2-2

ANNEX 2: Evaluation Grid

Achievement (Outputs)	<p>13</p> <p>14</p> <p>15 The extent of achievement of Output 3 "Technical support capacity of MOC for preparation of ISWM Master Plan, in particular for municipal solid waste management sector, is enhanced through model Province."</p> <p>16</p> <p>17</p>	<p>3a. The capacity status of existing SWM in TTH Province is analyzed by MOC during selection.</p> <p>3b. Technical comments on ISWM Master Plan in particular for MSWM sector of TTH Province are provided by MOC during preparation master plan formulation.</p> <p>3c. Written comments on ISWM Master Plan was provided by MOC to Provincial FC before approval.</p> <p>3d. Progress of pilot trials and preparation for priority projects identified in the ISWM Master plan is monitored by ATH-MOC through a progress report of each project.</p> <p>3e. By the end of the Project, guiding reference for Master Plan for ISWM preparation is issued/accepted by ATH-MOC.</p>	<p>• Results of MOC's analysis of capacity of TTH province regarding SWM</p> <p>• MOC's Technical comments on ISWM Master Plan of TTH province</p> <p>• Written comments on ISWM Master Plan of TTH province</p> <p>• Monitoring of priority projects of TTH Province by MOC</p> <p>• MOC's view on the use of monitoring sheet developed by the Project</p> <p>• MOC's view on guiding reference for Master Plan for ISWM preparation</p> <p>• Case examples of MOC's capacity improvement through the development of guiding reference for Master Plan for ISWM preparation</p>	<p>• Project documents and reports</p> <p>• C/P and Japanese experts</p> <p>• Project documents and reports</p> <p>• C/P and Japanese experts</p> <p>• Project documents and reports</p> <p>• C/P and Japanese experts</p> <p>• Project documents and reports</p> <p>• C/P and Japanese experts</p> <p>• Project documents and reports</p> <p>• C/P and Japanese experts</p>	<p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p> <p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p> <p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p> <p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p>
Achievement (Inputs from the Vietnamese side)	<p>18</p>	<p>Actual inputs including comparison with the description of Record of Discussion (R/D)</p>	<p>• List of counterpart personnel</p> <p>• Operational cost borne by the Vietnamese side</p> <p>• Office space and facilities provided by the Vietnamese side</p>	<p>• Project documents and reports</p> <p>• Japanese experts</p>	<p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p>
Achievement (Inputs from the Japanese side)	<p>19</p>	<p>Actual inputs (including comparison with the description of R/D)</p>	<p>• Number of dispatched Experts and professional field</p> <p>• List of equipment</p> <p>• List of training participants</p> <p>• Operational cost borne by the Japanese side</p>	<p>• Project documents and reports</p> <p>• Japanese experts</p>	<p>• Review of documents and reports</p> <p>• Questionnaire</p> <p>• Interview with stakeholders</p>

ANNEX 2: Evaluation Grid

2. Process of Project Implementation

Evaluation Item	Evaluation Question (Main Question)	Evaluation Question (Sub Question)	Data Needed	Data Sources	Data Collection Methods
Project management and progress of activities	1 • Overall project management • Contributing and hindering factors from the operational and technical aspects	• Have the project management and the technical transfer been conducted smoothly? • If they have been smoothly conducted, what are contributing factors? If not smoothly conducted, what are hindering factors?	• Project management system (internal factors) • Divergence between original PDM and current activities • Changes of important assumptions and other external factors that might influence the Project	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
	2 • Progress of activities • Contributing and hindering factors for implementation of activities • Any challenges arisen during implementation of activities	• Have the activities of each output been smoothly conducted? • What are the contributing and hindering factors which might influence implementation of activities? • Are there any activities that have not been completely conducted? If not completely conducted, what is a cause?	• Divergence between original Plan of Operation and current activities • Changes of inputs and important assumptions • Other internal factors such as contributing and hindering factors and countermeasures • Process of modifying activities and relevant documents describing such modification	• Project documents and reports including meeting of minutes • C/P and Japanese experts	• Review of documents and reports • Interview with stakeholders
	3 • Monitoring mechanism	• How have the monitoring activities been conducted? (including methods, frequency.) • How have the PDM indicators been monitored? • How were the results of monitoring fed back to the Project? • Is there any room for improving monitoring methods?	• Whether or not any monitoring tools • Methods of monitoring, and of utilization and feedback of monitoring results	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
Monitoring of progress of activities	4 • Response to changes of Important Assumptions	• Were there any changes of Important Assumptions? If there were any changes, who responded to them and how? • Were there any changes caused by external factors that were not originally described in the PDM as Important Assumptions? If there were such changes, who responded to them?	• Changes of Important Assumptions and countermeasures • Whether or not there are any records, and methods of recording/reporting	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Interview with stakeholders
	5 • Pre-conditions	• Were there any changes of Pre-conditions? If there were any changes, who responded to them and how?	• Views of Project Manager and Chief Advisor about preconditions of the Project	• Project documents and reports • Project Manager and Chief Advisor	• Review of documents and reports • Interview with stakeholders

ANNEX 2-4

ANNEX 2: Evaluation Grid

<p>Communication among project stakeholders</p>	<p>•Communication and common understanding about problems/concerns related to the Project</p>	<p>•Have the Experts and the C/P communicated sufficiently?                  •Have the Experts and the C/P had common understanding about problems/concerns related to the Project?                  •Have the Experts and the C/P communicated sufficiently during the non-assignment period of the Experts?                  •Have the C/P organizations communicated sufficiently?                  •Have the C/P organizations had common understanding about problems/concerns related to the Project?                  •Have the Project, JICA Vietnam Office and JICA Headquarter communicated sufficiently?                  •Have the Project, JICA Vietnam Office and JICA Headquarter had common understanding about</p>	<p>• Whether or not there are any communication tools                  •Frequency of various meetings for project management and methods of recording/reporting                  •Views of JICA, Vietnam Office, Experts and C/P</p>	<p>•Project documents and reports                  •C/P and Japanese experts                  •JICA Vietnam Office and Headquarter</p>	<p>•Review of documents and reports                  •Questionnaire                  •Interview with stakeholders</p>
<p>Knowledge &amp; expertise exchange</p>	<p>•Progress of knowledge &amp; expertise exchange</p>	<p>•What type of knowledge and skills that should be transferred to which level of C/P?                  •Have knowledge and skills that should be transferred to C/P been changed compared to the beginning of the Project?                  •Have such knowledge and skills been transferred to C/P in an appropriate manner?                  •How did the Experts work out to transfer knowledge and skills mentioned above?</p>	<p>•Target groups of knowledge and skills transfer, detailed information on knowledge and skills that should be transferred to C/P                  •Whether or not there are any changes in knowledge and skills that should be transferred to C/P by comparison with the original plan                  •Methods of transfer of knowledge and skills</p>	<p>•Project documents and reports                  •C/P and Japanese experts</p>	<p>•Review of documents and reports                  •Questionnaire                  •Interview with stakeholders</p>
<p>Ownership of implementing organizations</p>	<p>•Progress of nurturing a sense of ownership among the implementing organization and the responsible organization</p>	<p>•Extent of recognition of the Project among MOC, Hanoi DOC and TTH Province                  •Extent of participation of the Project among the above organizations                  •Appropriateness of assignment of C/P                  •Operational costs borne by the Vietnamese side</p>	<p>•Frequency of each meeting, participants of each meeting, and issues discussed                  •Whether or not there are any case examples that might indicate the ownership of implementing agencies has been enhanced.                  •Number and duty position of C/P                  •Project operational costs borne by the Vietnamese side</p>	<p>•Project documents and reports                  •C/P and Japanese experts</p>	<p>•Review of documents and reports                  •Questionnaire                  •Interview with stakeholders</p>

ANNEX 2-5

**ANNEX 2: Evaluation Grid**  
**Evaluation by Five Criteria**

Evaluation Item No.	Evaluation Question (Main Question)	Evaluation Question (Sub Question)	Data Needed	Data Sources	Data Collection Methods
1	Necessity of the Project	Does the Project, focusing on capacity development on MSW/M among MOC, Hanoi DOC and a model province meet the needs of the MOC, Hanoi DOC and TTH Province?	• Perceptions and views of MOC, Hanoi DOC and TTH Province about the Project	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
2	Priority of the Project	Are the Project Purpose and the short-term Overall Goal consistent with the National Strategy for ISW/M and other related policies?	• The National Strategy for integrated management of solid waste up to 2025, with a vision to 2050 • Other related policies	• Project documents and reports • C/P and Japanese experts • Relevant policies and strategies	• Review of documents and reports • Interview with stakeholders
3	Relevance (Are the Project Purpose and the short-term Overall Goal valid for the Project?)	Are the Project Purpose and the short-term Overall Goal consistent with Japanese Government's aid policies for Vietnam?	• Country Assistance Policy for Vietnam (2012) • Rolling plan for Nepal (2014) • JICA Country Analytical Paper (2014)	• Website of Ministry of Foreign Affairs • JICA Vietnam Office	• Review of documents and reports
4	Appropriateness of strategies and approaches of the Project	Are the approaches* adopted by the Project relevant as means for improving the capacity on MSW/M among MOC, Hanoi DOC and TTH Province? Do the approaches meet the Vietnamese national and local needs? (*Project implementation structure including formation of taskforces, selection of Model Province, Co-learning Study, capacity assessment, formulation of guidance references and way of formulation of these references, and capacity development of central and local governments)	• Views of C/P, Japanese experts and other stakeholders	• Project documents and reports • C/P and Japanese experts • Other stakeholders	• Review of documents and reports • Questionnaire • Interview with stakeholders
5	Does Japan have the adequate experiences and know-how of MSW/M?	Does Japan have the adequate experiences and know-how of MSW/M?	• Japan's similar cooperation • C/P's perceptions and views about the Japanese support for MSW/M	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders
6	Achievement of the Project Purpose	Is there a good chance that the Project Purpose would be achieved?	• Achievement Grid	• Achievement Grid	• Achievement Grid
7	Contribution of Outputs	Has the Project Purpose been achieved due to the effect of achievement of each Output?	• Achievement of Outputs • Stakeholders' views	• Project documents and reports • C/P and Japanese experts	• Review of documents and reports • Questionnaire • Interview with stakeholders • Achievement Grid

ANNEX 2-6

ANNEX 2: Evaluation Grid

8	Contribution of Outputs	In order to achieve the Project Purpose, are there any Outputs that were not described in PDM but should be added in PDM?	<ul style="list-style-type: none"> <li>• Comparison between original Plan of Operation and actual performance of activities</li> <li>• Views expressed by the stakeholders</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
9	Influence of Important Assumptions from the Outputs to the Project Purpose	Did the Important Assumptions, i.e. "Most counterpart staff continues working for the Project" and "The new Law on Environmental Protection does not change the MOC's roles and responsibilities on ISWM" influence implementation of activities?	<ul style="list-style-type: none"> <li>• Transfer and retirement of C/P's</li> <li>• Influences of the new Law on Environmental Protection on the MOC's roles and responsibilities regarding ISWM</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
10	What are the contributing and hindering factors that have influenced effectiveness of the Project?	Except for the Important Assumptions, were there any external factors that have influenced the Project positively or negatively?	<ul style="list-style-type: none"> <li>• Identification of external factors that contribute to and impede the achievement of the Project Purpose</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
11	Achievement of Outputs	Is there a good chance that three Outputs would be achieved?	<ul style="list-style-type: none"> <li>• Achievement Grid</li> </ul>	<ul style="list-style-type: none"> <li>• Achievement Grid</li> </ul>	<ul style="list-style-type: none"> <li>• Achievement Grid</li> </ul>
12	Efficiency	Were the number of experts dispatched, their special fields of expertise, and timing of dispatch appropriate?	<ul style="list-style-type: none"> <li>• List of dispatch of experts</li> <li>• Stakeholders' views about the experts</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
13	Efficiency	Were the type, quantity and timing of the procurement of equipment appropriate?	<ul style="list-style-type: none"> <li>• List of equipment provided</li> <li>• Usage and condition of equipment</li> <li>• Stakeholders' views about equipment</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
14	Efficiency	Were the number of trainees of counterpart training in Japan, the training content and the training period appropriate?	<ul style="list-style-type: none"> <li>• List of C/P training in Japan</li> <li>• Stakeholders' views about the C/P training</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
15	Efficiency	Was the project operational cost borne by the Japanese side appropriate?	<ul style="list-style-type: none"> <li>• List of project operational costs borne by the Japanese side</li> <li>• Stakeholders' views about project operational costs</li> </ul>	<ul style="list-style-type: none"> <li>• Project documents and reports</li> <li>• C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>• Review of documents and reports</li> <li>• Questionnaire</li> <li>• Interview with stakeholders</li> <li>• Achievement Grid</li> </ul>
16	Efficiency	Was the project operational cost borne by the Japanese side carried out efficiently?			

ANNEX 2-7

ANNEX 2: Evaluation Grid

17		Were the number of counterparts, their assignment and their capabilities appropriate?	<ul style="list-style-type: none"> <li>List of C/P</li> <li>Stakeholders' views about assignment of the C/P</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
18	Efficiency of the inputs from the Vietnamese side, in terms of quality, quantity and timing, judging from the achieved outputs	Were there any problems related to the land, the buildings and facilities provided by the Vietnamese side in terms of area, quality and convenience?	<ul style="list-style-type: none"> <li>Current state of buildings and facilities provided by the Nepalese side</li> <li>Stakeholders' views about the buildings and facilities provided by the Vietnamese side</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
19		Was the project operational cost borne by the Vietnamese side appropriate?	<ul style="list-style-type: none"> <li>List of project operational cost borne by the Vietnamese side</li> <li>Stakeholders' views about project operational costs</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
20		Were sufficient activities planned to produce the Outputs? Were these activities carried out in a timely manner?	<ul style="list-style-type: none"> <li>Comparison between the Plan of Operation and the actual performance</li> <li>Stakeholders' views</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
21	Contribution of Activities	Were there any activities that were not described in PDM but contributed to the achievement of Outputs? If there were, should such activities have been additionally described in PDM?	<ul style="list-style-type: none"> <li>Comparison between the Plan of Operation and the actual performance</li> <li>Stakeholders' views</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
22		Were there any activities that have not been carried out but need to be added in PDM in order to achieve the Output?	<ul style="list-style-type: none"> <li>Comparison between the Plan of Operation and the actual performance</li> <li>Stakeholders' views</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
23	Influence of Important Assumptions from the Activities to the Outputs	Did Important Assumptions such as "Necessary budget for related activities is secured by concerned agencies" and "Draft master plan of solid waste treatment of Hanoi city is prepared in the beginning stage of the project by HPC" influence implementation of activities?	<ul style="list-style-type: none"> <li>Influences of Important Assumptions</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
24		Was the Pre-Condition "There is no substantial decrease in the budget of MOC and Hanoi DOC" met?	<ul style="list-style-type: none"> <li>Status of Pre-condition</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>
25		What are the contributing and hindering factors that have influenced efficiency of the Project?	<ul style="list-style-type: none"> <li>Identification of external factors that contribute to and impede efficiency of the Project</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> <li>Achievement Grid</li> </ul>

ANNEX 2-8

ANNEX 2: Evaluation Grid

<p>Impacts (Has the Project generated the long-term, indirect and ripple effects? Is there a good chance that the Project would generate these impacts?)</p>	<p>Prospect of achievement of the short-term Overall Goal</p>	<p>Is there a good chance that short-term Overall Goal "ISWM system on municipal solid waste is established in accordance with the national strategy on ISWM" would be achieved?</p>	<p>Achievement of the Overall Goal Indicators • Stakeholders' views</p>	<p>• Project documents and reports • C/P and Japanese experts</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders • Achievement Grid</p>
<p>Influence of Important Assumptions</p>	<p>Are the Important Assumption i.e., "The Vietnamese government mandates the policy of ISWM on municipal solid waste", "The Vietnamese government allocates budget and mobilize other sources for ISWM on municipal solid waste" and "Cities/Provinces prepare budget for newly development/update implementation including formulation for master plans" and other external factors that were not described in PDM likely to influence the achievement of short-term Overall Goal?</p>	<p>Confirmation of Important Assumptions and prospects of their influence</p>	<p>• Project documents and reports • C/P and Japanese experts</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders</p>
<p>Ripple effects</p>	<p>Except for the short-term Overall Goal, were there any positive effects brought about by the Project?  Were there any unexpected and negative effects brought about by the Project?</p>	<p>Identification of other impacts and prospects for their influence  Identification of negative impacts and prospects of their influence</p>	<p>• Project documents and reports • C/P and Japanese experts</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders</p>
<p>What are the contributing and hindering factors that have influenced or will influence the achievement of the short-term Overall Goal?</p>	<p>What are the contributing and hindering factors that have influenced or will influence the achievement of the short-term Overall Goal?</p>	<p>Identification of internal contributing and hindering factors</p>	<p>• Project documents and reports • C/P and Japanese experts</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders • Achievement Grid</p>	<p>• Review of documents and reports • Questionnaire • Interview with stakeholders • Achievement Grid</p>

19



ANNEX 2: Evaluation Grid

31	Policies	Are there any policies on MSWM that can ensure sustainability and expansion of the effects generated by the Project?	<ul style="list-style-type: none"> <li>Stakeholders' views</li> <li>Case examples of sustainability in the policy aspect</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>
32	Institution	Will the various Project's activities including the database on legal documents on SWM, drafted and revised legal documents on SWM, guidance references, database on SWM statistics, Co-learning Study and Certificate program be institutionalized in MOC?	<ul style="list-style-type: none"> <li>Stakeholders' views</li> <li>Case examples of sustainability in the institutional aspect</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>
33	Organization	Will MOC, Hanoi DOC and TTH Province be able to manage MSWM-related activities supported by the Project?	<ul style="list-style-type: none"> <li>Stakeholders' views</li> <li>Case examples of sustainability in the organizational aspect</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>
34	Finance	Have MOC, Hanoi DOC and TTH Province allocated the sufficient budget to sustain the effects of the Project? Will MOC, Hanoi DOC and TTH Province be able to allocate the sufficient budget to manage MSWM?	<ul style="list-style-type: none"> <li>Stakeholders' views</li> <li>Case examples of sustainability in the financial aspect</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>
35	Knowledge/Skills	To what extent, will C/Ps of MOC, Hanoi DOC and TTH Provinces be able to utilize and sustain the knowledge and skills transferred after the completion of the Project? Are there any areas for improvement of capacity development related to MSWM?	<ul style="list-style-type: none"> <li>Stakeholders' views</li> <li>Case examples of sustainability in the technical aspect</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>
36	What are the contributing and hindering factors that have influenced or will influence sustainability of the Project?		<ul style="list-style-type: none"> <li>Identification of internal and external factors, and contributing and hindering factors for sustainability of the Project</li> </ul>	<ul style="list-style-type: none"> <li>Project documents and reports</li> <li>C/P and Japanese experts</li> </ul>	<ul style="list-style-type: none"> <li>Review of documents and reports</li> <li>Questionnaire</li> <li>Interview with stakeholders</li> </ul>

ANNEX 2-10

PK

### ANNEX 3: List of the Vietnamese Counterparts

#### (1) Project Management Unit

	Name	Position in the Project	Position / Organization	Project Assignment Period	Remarks
1	Ms. Mai Thi Lien Huong	Acting JCC Chairperson	Director General, Administration of Technical Infrastructure (ATI), Ministry of Construction (MOC)	May 2017-present	New Director General
2	Mr. Nguyen Hong Tien	Acting JCC Chairperson	Director General, Administration of Technical Infrastructure (ATI), Ministry of Construction (MOC)	May 2014 – May 2017	Retired
3	Dr. Tran Anh Tuan	Project Director	Deputy Director General, ATI, MOC	May 2014 - present	
4	Ms. Dang Anh Thu	Project Manager 1	Head, Solid Waste Management Division, ATI, MOC	May 2014 - present	
5	Mr. Do Anh Tuan	Project Manager 2	Director, Urban Technical Infrastructure Works Maintenance Unit (Unit A), DOC Hanoi	May 2014 – Sep 2016	Moved to other assignment
6	Mr. Nguyen Duy Cuong	Project Manager 2	Deputy Director, Urban Technical Infrastructure Works Maintenance Unit (Unit A), DOC Hanoi	Sep 2016 – April 2017	Moved to another department
7	Mr. Tran Anh Tuan	Project Manager 2	Deputy Director, Urban Technical Infrastructure Works Maintenance Unit (Unit A), DOC Hanoi	April 2017 - present	
8	Dr. Nguyen Dai Vien	Project Manager 3	Vice Director, DOC, Thua Thien Hue Province	Dec 2014 - present	

#### (2) Central (MOC)

	Name	Position /Organization	Project Assignment Period	Age	Academic Background	Relevant PDM Activities	Remarks
1	Ms. Le Thu Thuy	Vice Head, Solid Waste Management Division, ATI, MOC	Jan. 2016 - present	41	Environmental Science.	1-6, 3-2, 2	
2	Mr. Nguyen Khanh Long	Vice Head, Solid Waste Management Division, ATI, MOC	June 2015 – present	40	Chemical Organic, Environmental Economic	1-1, 1-5, 1-10	
3	Mr. Phung Anh Duc	Staff, Solid Waste Management Division, ATI, MOC	May 2014 - present	33	Environmental management	3-3	
4	Ms. Tran Kieu Anh	Ditto	May 2014 - present	34	Environmental Engineering, Science in Environmental Sanitation	1-1, 1-5, 1-8, 1-9, 0	
5	Mr. Hoang Manh Hiep	Ditto	May 2014 - present	29	Solid Waste Management, Urban management	1-1, 1-4 3-4	
6	Mr. Nguyen Thanh Hung	Staff, Solid Waste Management Division, ATI, MOC	July 2015 – June 2016	36	Infrastructure Management	General	Moved to other division
7	Mr. Nguyen Xuan Bach	Ditto	June 2016 - present	26	Business management	2	
8	Mr. Phan Hong	Staff, Solid Waste	May 2014 -	n/a	n/a	n/a	Left MOC

ANNEX 3-1

*A*

*PR*

### ANNEX 3: List of the Vietnamese Counterparts

	Name	Position /Organization	Project Assignment Period	Age	Academic Background	Relevant PDM Activities	Remarks
	Thai	Management Division, ATI, MOC	April 2015				
9	Mr. Luong Ngoc Khanh	Vice Head, Solid Waste Management Division, ATI, MOC	May 2014 - June 2015	n/a	n/a	n/a	Moved to other division

#### (3) Hanoi

	Name	Position /Organization	Project Assignment Period	Age	Academic Background	Relevant PDM Activities	Remarks
1	Mr. Doan Thuan Long	Vice Director, Unit A, DOC Hanoi	June 2014 – Aug 2016	60	Civil Engineering	n/a	Retired
2	Ms. Hoang Mai Huong	Deputy Head, Environment Infrastructure and Underground Works Management Division (Environmental Division), DOC	June 2016 - present	46	Environmental Technology	2-3, 2-4, 2-5 In charge of DSW and Septic tank sludge	
3	Mr. Nguyen Van Quy	Deputy Head of Technical Infrastructure Division, DOC	August 2016 - present	41	Road construction	2-3, In charge of construction waste and the focal person	
4	Ms. Vuong Ngoc Anh	Deputy Head of Planning and General Affairs Division, DOC	August 2016 -March 2017	39	Finance		Moved to another assignment
5	Mr. Nguyen Hai Ninh	Manager, Unit A, DOC Hanoi	June 2014 – present	36	Water supply and drainage	2-3 (mainly implementation plan)	
6	Mr. Tran Hong Nhat	Officer, Planning Division, Unit A, DOC Hanoi	June 2014 - present	37	Information technology	2-3 (mainly implementation plan)	
7	Ms. Ha Phuong Hoa	Vice Manager, Monitoring Division, Unit A, DOC Hanoi	June 2014 - present	54	Economics	2-3 (mainly construction waste)	
8	Mr. Nguyen Tuan Viet	Team leader Construction Waste Landfill, Unit A, DOC Hanoi	June 2014 - March 2017	51	Commercial Economy	2-3 (mainly construction waste)	
9	Mr. Vu Cuong	Vice General Director, URENCO	Nov. 2014 - present	52	Mechanical manufacturing.	General	
10	Ms. Luong Thi Mai Huong	Head, International Cooperation Department, URENCO	Nov. 2014 - present	43	Environmental Technology and Management	2-1, 2-3 (mainly collection system, septic tank sludge) and 2-4 and 2-5	
11	Ms. Nguyen Thi Thanh	Official, Technical Department, URENCO	Nov.2014 - present	34	Environmental Technology	2-1	

#### (4) Thua Thien Hue Province

	Name	Position /Organization	Project Assignment Period	Age	Academic Background	Relevant PDM Activities	Remarks
1	Mr. Ho Van	Manager of Technical	December	56	Construction	General	

ANNEX 3-2

A

ff

**ANNEX 3: List of the Vietnamese Counterparts**

	Name	Position /Organization	Project Assignment Period	Age	Academic Background	Relevant PDM Activities	Remarks
	Nhan,	Infrastructure Department, DOC	2014 - present		Engineering		
2	Mrs. Mai Thi Minh Thuy	Vice Manager of Technical Infrastructure Department, DOC	December 2014 - present	49	Civil engineering and industry	General	
3	Mr. Doan Si Son	Vice General Director, Hue Urban Environment and Public Works State-owned Co (HEPCO)	December 2014 – April 2017	59	Economics – Planning	General	Retired
4	Mr. Tran Trung Khanh	Vice General Director, Hue Urban Environment and Public Works State-owned Co (HEPCO)	April 2017-present	54	Chemical engineer		New Vice General Director of HEPCO

ANNEX 3-3

*Handwritten mark*

*Handwritten mark*

#### ANNEX 4: Cost borne by the Vietnamese Side

Amount (VND)

	Item	Year 2014	Year 2015	Year 2016	Year 2017 (estimated)	Total
1	Renting Japanese expert team's office	0	360,000,000	240,000,000	264,000,000	864,000,000
2	Equipment *1	70,000,000	61,367,000	120,000,000	135,000,000	386,367,000
3	Workshop *2	125,000,000	134,196,000	157,000,000	157,000,000	573,196,000
4	Joint Coordinating Committee meetings, expert workshops, etc. *3	30,000,000	100,000,000	100,000,000	200,000,000	430,000,000
	Total	225,000,000	655,563,000	617,000,000	756,000,000	2,253,563,000

Note\*1: Equipment includes costs for air-conditioner, computer, printer, document, cabinet, and office chair.

Note\*2: Workshop includes costs for airplane tickets, accommodation, presentations, document printing, interpreters, interpretation equipment and sending invitation letters.

Note \*3: JCC meeting, expert workshops includes costs related to tea, fruit and allowance for Vietnamese participants.

Note 4: There are miscellaneous expenses other than the above costs such as costs for internal meetings in MOC with other department's experts about products of project, business trip to some provinces including Dak Lak, Gia Lai and Thua Thien Hue.

ANNEX 4-1

*AS*

*SV*

## ANNEX 5: List of the Japanese Experts

As of September 30, 2017

### (1) List of the Japanese Experts

S.N.	Name	Position	Assignment in Vietnam and Japan (Man Month)		
			Phase 1 April 2014 to Feb. 2016	Phase 2 Mar 2016 to Sep 2017	Total** (As of Sep.30, 2017)
1	Hideki Wada	Chief advisor/Integrated Solid Waste Management	14.28	8.80	23.08
2	Tamotsu Suzuki	Solid Waste Management and treatment technology	7.03	0	7.03
3	Norihisa Hirata	Institution, organization and financial management	16.07	10.5 (0.37*)	26.57
4	Tomoya Fukuda	Waste collection and transport planning	5.97	0	5.97
		Planning and management of procurement	3.00	0	3.00
5	Hideo Sato	Waste collection and transport planning	-	4.07	4.07
6	Ikuo Mori	Intermediate treatment and recycling	15.93	0	15.93
7	Soji Kurasawa	Sludge Disposal	1.80	1.47	6.27
		Construction waste treatment and recycling	3.00		
8	Susumu Shimura	Industrial waste management and planning	0.63	0	0.63
9	Ichiro Kono	Hazardous Waste management and planning	1.13	0	1.13
10	Shingo Arai	Final disposal management and planning	7.50	7.50	15.00
11	Ai Sawayama	Environmental and social consideration	4.00	0	4.00
		Coordinator/Management of waste surveys	14.70	0	14.70
12	Ngoc Minh Le (Living in Vietnam)	Database management	6.83	3.80 (20.9*)	16.63
		Environmental education	6.00		
13	Hideaki Kuzuhata	Planning and cost estimation of waste treatment facilities	2.30	0	2.30
14	Hironori Koyama	Financial planning	6.80	9.40	16.20
15	Makoto Hirabayashi (Working in Japan)	Study tour in Japan	0	2.00	2.00
Total**			116.97	47.54 (**)	164.51 (**)

Source: Data obtained from the Project

Note: \*The personal costs were borne by the consulting firm.

\*\*The personal costs borne by the consulting firm was not included.

ANNEX 5-1

*[Handwritten mark]*

*[Handwritten mark]*

## ANNEX 5: List of the Japanese Experts

### (2) List of the Japanese Technical Advisors

S.N.	Name	Position	Assignment in Vietnam (Man Month)		
			Phase 1 April 2014 to Feb. 2016	Phase 2 Mar 2016 to Sep 2017	Total (As of Sep.30, 2017)
1	Kawai Kosuke	Waste separation	0.33		0.33
2	Yoshifumi Fujii	Integrated solid waste management and public participation	0.63		0.63
3	Keizo Shimada	Policy on construction waste	0.33		0.33
4	Masato Yamada	Waste treatment technology	0.13	0.37	0.5
5	Konosu Kazumi	Cement feeding of incineration ash		0.17	0.17
6	Masayuki Hirota	Cement feeding of incineration ash		0.17	0.17
	Total				2.13

Source: Data obtained from the Project

Total (Man Month)	
Japanese Experts	164.51
Academic Advisors	2.13
Total	166.64

ANNEX 5-2

*Handwritten mark*

*Handwritten mark*

## ANNEX 6: Costs borne by the Japanese side

Cost of operation in Vietnam (as of September 2017)

Japanese FY 2014	Japanese FY 2015	Japanese FY 2016	Japanese FY 2017	Total	Remarks
JPY 17,565,251	JPY 26,409,867	JPY 16,378,992	JPY 6,910,103(*)	JPY 67,284,203 (*)	Including salary of project staff, employment costs of local consultants, transportation costs, site surveys and others.

(\*) As of the end of September estimated based on the data until 31 August 2017

ANNEX 6-1



## ANNEX 7: Equipment provided by the Japanese side

### List of Equipment for the JICA Experts (as of September 2017)

No	Item	Qn	Unit Price (VND)	Total Price (VND)	Total Price (JPY)	Location	Frequency of Use*1	Condition *2
<b>Japanese Fiscal Year 2014</b>								
1	Projector	1	18,490,000	18,490,000	90,601	Hanoi DOC (Unit A)	C (Unit A was the counterpart in 2014 and 2015.)	B
2	Laser printer	2	3,400,000	6,800,000	33,320	Project Office	A	A
3	Inkjet printer	1	5,000,000	5,000,000	24,500	Project Office	A	A
4	UPS	2	3,800,000	7,600,000	37,240	Project Office	A	A
5	Laptop PC	3	22,889,000	68,667,000	338,468	Project Office	A	A
6	Projector	1	-	-	77,325	Project Office	B	B
7	Scanner	1	-	-	16,317	Project Office	A	A
8	Projector	1	-	-	96,371	TTH-DOC	B	B
<b>Japanese Fiscal Year 2015</b>								
1	Laser printer	1	2,999,000	2,999,000	16,794	Project Office	A	A
2	Laser printer	2	3,500,000	7,000,000	37,800	Project Office	A	A
3	Inkjet printer	2	7,150,000	14,300,000	77,220	Project Office	A	A
<b>Total costs of procurement of equipment</b>					<b>845,956</b>			

Note\*1: A-Frequently (almost every day), B-Sometimes (1-3 a week), C-Use concentrated on particular period, D-rarely (1-3 times a year), E-No use due to particular reasons

Note \*2: A-Always possible to use with sufficient maintenance, B-Almost no problem in use, C-Possible to use if repaired, D-Difficult to use

Note \*3: No equipment was procured in Japanese Fiscal Year 2016 and 2017.

Abbreviation: TTH: Thua Thien Hue Province, DOC: Department of Construction, Unit-A: A division of Hanoi DOC

ANNEX 7-1

A

ff

## ANNEX 8: List of Participants of Training in Japan

### 1. Training Program in Japan on Integrated Management of Municipal Solid Waste (Management Course) from November 2 to 8, 2014

No.	Name	Agency	Position
1	Mr. Tran Anh Tuan	Ministry of Construction	Vice director, Administration of Technical Infrastructure
2	Mr. Luong Ngoc Khanh		Deputy head of Solid Waste Management Division, Administration of Technical Infrastructure
3	Ms. Ma Thi Luan		Head of General Affairs Division, Ministry's Office
4	Ms. Tran Kieu Anh		Official of Solid Waste Management Division, Administration of Technical Infrastructure
5	Mr. Duong Nghia	Office of Government	Deputy Director General, Department of Economic Sectors
6	Mr. Nguyen Viet Thinh		Deputy Director General, Legal Department
7	Mr. Ha Thanh Tung	Hanoi Department of Construction	Head of Planning Division, Urban Technical Infrastructure Works Maintenance Unit
8	Mrs. Nguyen Thi Xuan Yen		Head of Organization and Administration Division, Urban Technical Infrastructure Works Maintenance Unit
9	Mr. Nguyen Dinh Vinh	Hanoi Urban Environment Company Ltd.	Head of Operation and Quality Control Division of Ba Dinh Branch
10	Mr. Nguyen Duc Dung		Head of Organization and Administration of Hai Ba Trung Branch
11	Mr. Le Quang Dung	Thua Thien Hue Department of Construction	Vice director,
12	Mr. Nguyen Huu Quyet	Thua Thien Hue Department of Natural Resource and Environment	Vice director,

Note: Position as of November 2014  
Source: Provided by the Japanese expert team

### 2. Training Program in Japan on Integrated Management of Municipal Solid Waste (Practical Course) from November 16 to 29, 2014

No.	Name	Agency	Position
1	Ms. Mai Thi Lien Huong	Ministry of Construction	Assoc. Prof., Dr., Deputy General Director of Administration of Technical Infrastructure
2	Ms. Dang Anh Thu		Head of Solid Waste Management Division, Administration of Technical Infrastructure
3	Ms. Quach Thi Hue Linh		Principal Official of Department of Science and Technology
4	Mr. Phung Anh Duc		Official of Solid Waste Management Division, Administration of Technical Infrastructure
5	Mr. Hoang Manh Hiep		Official of Solid Waste Management Division, Administration of Technical

ANNEX 8-1

*Handwritten mark*

*Handwritten mark*

### ANNEX 8: List of Participants of Training in Japan

6	Ms. Tran Thi Phuong Lien	Ministry of Justice	Infrastructure Legal Official, Department of Civil - Economic Legislation,
7	Mr. Nguyen Hai Nam	Ministry of Science and Technology	Official of Department of Science and Technology,
8	Mr. Nguyen Hai Ninh	Hanoi Department of Construction	Deputy Head of Planning Division, Urban Technical Infrastructure Works Maintenance Unit,
9	Mr. Chu Dang Nghia		Team leader of Xuan Son landfill, Urban Technical Infrastructure Works Maintenance Unit
10	Mr. Phan Duc Nhan		Team leader of Nam Son landfill, Urban Technical Infrastructure Works Maintenance Unit
11	Mr. Dao Thanh Tung	Hanoi Urban Environment Company Ltd.	Head of Business Division of Dong Da Branch
12	Ms. Bui Dieu Huong		Staff of International Cooperation Department
13	Ms. Mai Thi Minh Thuy	Thua Thien Hue Department of Construction	Deputy Head of Technical Infrastructure Division Hue

Note: Position as of November 2014  
Source: Provided by the Japanese expert team

#### 3. Training Program in Japan on Integrated Management of Municipal Solid Waste (Facility Development Course) from July 1 to 11, 2015

No.	Name	Agencies	Position
1	Mr. Tran Anh Tuan	Ministry of Construction	Vice director of Administration of Technical Infrastructure
2	Ms. Dang Anh Thu		Head of Solid waste management division, Administration of Technical Infrastructure
3	Mrs. Dinh Thi Hong Van		Staff of Solid waste management division, Administration of Technical Infrastructure
4	Mr. Nguyen Van Lan		Staff, Organization and Personnel Department
5	Mrs. Nguyen Chi Lan	Ministry of Justice	Deputy Director, Department of Civil Law
6	Mr. Doan Thuan Long	Hanoi Department of Construction	Vice Director of Urban Technical Infrastructure Works Maintenance Unit
7	Mr. Nguyen Tuan Viet		Staff of Environment Division, Urban Technical Infrastructure Works Maintenance Unit
8	Ms. Tran To Uyen	Hanoi Department of Planning and Investment	Staff of International Cooperation and Donation Division
9	Mr. Dao Duc Khanh	Hanoi Urban Environment Company Ltd.	Vice Director of Ba Dinh Branch
10	Mr. Nguyen Minh Dung	Thua Thien Hue Department of Construction	Director
11	Mr. Ho Van Nhan		Head of Urban Technical Infrastructure Division

ANNEX 8-2

*Handwritten mark*

*Handwritten mark*

## ANNEX 8: List of Participants of Training in Japan

12	Mrs. Nguyen Kim Hoang	Can Tho Department of Construction	Head of Technical Infrastructure Division
13	Mr. Nguyen Minh Dung	Khanh Hoa Department of Construction	Deputy Director
14	Mrs. Tran To Chinh	Hoa Binh Department of Construction	Deputy Director

Note: Position as of July 2015  
Source: Provided by the Japanese expert team

### 4. Planning and Implementation through Public Participation in 3R Projects (Sub topic: Construction Waste Management in Japan) from October 13 to 31, 2015

No.	Name	Agency	Position
1	Mr. Nguyen Khanh Long	Ministry of Construction	Deputy Head of Solid waste management Division, Administration of Technical Infrastructure
2	Mr. Nguyen Thanh Hung		Staff of Solid waste management Division, Administration of Technical Infrastructure
3	Ms. Phan Thi Huong Giang		Staff of Management Board of Technical Infrastructure Development Project, Administration of Technical Infrastructure
4	Mr. Pham Danh Thuan	Hanoi Department of Construction	Staff of Environmental Technical Monitoring Division, Urban Technical Infrastructure Works Maintenance Unit
5	Ms. Le Thi Bich Hang		Staff of General Planning Division, Urban Technical Infrastructure Works Maintenance Unit
6	Mr. Pham Ngoc Hai	Hanoi Urban Environment Company Ltd.	President
7	Mr. Hoang Gia Bao	Hanoi People's Committee	Vice Manager, Natural Resources and Environment Department
8	Mr. Pham Van Khanh	Hanoi Department of National Resources and Environment	Vice Director
9	Mr. Nguyen Dai Vien	Thua Thien Hue Department of Construction	Vice Director
10	Mr. Doan Si Son	Hue Urban Environment and Public Works State Company	Deputy General Director
11	Mr. Lau Duc Tai	Ninh Binh Department of Construction	Vice Director
12	Ms. Vu Thi Tuoi	Nam Dinh Department of Construction	Manager, Technical Infrastructure and Urban Development Department
13	Mr. Nguyen Kim Tien	Lang Son Department of Construction	Vice Director
14	Mr. Pham Quoc Anh	Quang Binh Department of Construction	Vice Director
15	Mr. Dang Duc Hoang	Tay Ninh Department of Construction	Vice Director

ANNEX 8-3

*Handwritten mark*

*Handwritten mark*

## ANNEX 8: List of Participants of Training in Japan

Note: Position as of October 2015  
Source: Provided by the Japanese expert team

### 5. Treatment Technologies for Domestic Solid Waste Management from August 27 to September 4, 2016

No.	Name	Agency	Position
1	Mr. Tran Anh Tuan	Ministry of Construction	Deputy Director - Administration of Technical Infrastructure
2	Mr. Nguyen Khanh Long		Deputy Head – Department of Solid Waste Management
3	Mr. Nguyen Ngoc Khanh		Staff of Administration of Technical Infrastructure
4	Mr. Nguyen Xuan Bach		Staff of Department of Solid Waste Management
5	Mr. Nguyen Thanh Tung		Staff of International Cooperation Department
6	Ms. Vu Hong Nhung		Deputy Head – Department of Planning and Finance
7	Mr. Nguyen Van Hung	Lam Dong Department of Construction	Head of Urban Development and Technical Infrastructure
8	Mr. Nguyen Phong	Quang Ngai Department of Construction	Director
9	Mr. Nguyen Van Tam	Ben Tre Department of Construction	Vice Director
10	Mr. Dam Dinh Hien	Vinh Phuc Department of Construction	Vice Director
11	Ms. Luong Thuy Hang	Ha Noi Department of Construction	Staff of Infrastructure Management and Underground Work Division
12	Ms. Mai Thi Minh Thuy	Thua Thien Hue Department of Construction	Vice Manager of Technical Infrastructure Department

Note: Position as of August 2016  
Source: Provided by the Japanese expert team

### 6. Domestic solid waste management in Japan focusing on facility development from November 28 to December 2, 2016

No.	Name	Agency	Position
1	Mr. Nguyen Hong Tien	Ministry of Construction	Director, Administration of Technical Infrastructure
2	Ms. Dang Anh Thu		Head of Solid waste management Division, Administration of Technical Infrastructure
3	Mr. Do Manh Trieu		Vice Manager – Project Management Board of Technical Infrastructure Works (ATI)
4	Mr. Phung Anh Duc		Official – Solid waste management division (ATI)

ANNEX 8-4

*Handwritten mark*

*Handwritten mark*

### ANNEX 8: List of Participants of Training in Japan

5	Ms. Nguyen Thu Dung		Chief Accountant – ATI
6	Ms. Dong Thi Kim Chung		Official – General Affair Department – MOC
7	Mr. Dao Quy Tieu	Binh Dinh Department of Construction	Director
8	Mr. Nguyen Duy Cuong	Unit A, Hanoi Department of Construction	Vice Manager
9	Mr. Nguyen Minh Huan	Thanh Hoa Department of Construction	Vice Director
10	Mr. Tran Hoai Hiep	Vinh Long Department of Construction	Vice Director
11	Mr. Pham Van Duc	Hanoi Urban Environment One Member Limited Company	Vice Director

Note: Position as of November 2016  
Source: Provided by the Japanese expert team

#### 7. Domestic solid waste management including tourism areas from April 16 to April 22, 2017

No	Name		Position, Agency
1	Mr. Nguyen Quoc Tuan	Ministry of Construction	Vice General Director - ATI
2	Mr. Quach Van Thanh		Vice manager of Technical Infrastructure Management Division – ATI
3	Ms. Le Thu Thuy		Vice manager of Solid waste management Division – ATI
4	Ms. Tran Kieu Anh		Officer – Solid waste management Division – ATI
5	Mr. Hoang Manh Hiep		Officer – Solid waste management Division – ATI
6	Mr. Tran Quoc Hung		Cabinet (Office)
7	Mr. Tran Huu Loi	Kien Giang Department of Construction	Manager of Economic and construction material division
8	Mr. Pham Van Nhan	Vinh Phuc Department of Construction	Officer of New urban and Infrastructure Projects Management Unit
9	Mr. Ha Van Hoai	Cao Bang Department of Construction	Director

ANNEX 8-5

*Handwritten signature*

*Handwritten signature*

### ANNEX 8: List of Participants of Training in Japan

10	Mr. Nguyen Khanh Toan	Hanoi Department of Construction	Officer of Environment Monitoring Division – Urban Technical Infrastructure Maintenance Unit
11	Mr. Nguyen Quoc Cuong	An Giang Department of Construction	Manager of Technical Infrastructure and Urban Development Division
12	Mr. Nguyen Van Trang	Long An Department of Construction	Manager of Technical Infrastructure and Urban Development Division
13	Mr. Vu Cuong	Urban Environment One member limited Company Hanoi	Vice General Director
14	Mr. Dinh Minh Tri	Hanoi Department of Construction	Officer – Technical Infrastructure Division

Note: Position as of April 2017  
Source: Provided by the Japanese expert team

ANNEX 8-6

## 1.6 The sixth JCC (tentative)

MINUTES OF THE SIXTH JOINT COORDINATING COMMITTEE (JCC) MEETING  
FOR  
THE PROJECT FOR CAPACITY DEVELOPMENT ON INTEGRATED MANAGEMENT OF  
MUNICIPAL SOLID WASTE IN VIETNAM

In line with the Record of Discussions signed between the Government of the Socialist Republic of Viet Nam and the Japan International Cooperation Agency (hereinafter referred to as "JICA") on 17<sup>th</sup> June, 2013, the Vietnamese side and the Japanese side held the sixth Joint Coordinating Committee (hereinafter referred to as "JCC") Meeting for the Project for Capacity Development on Integrated Management of Municipal Solid Waste in Vietnam (hereinafter referred to as "the Project") in Hanoi on 7 February 2018.

The JICA Expert Team (JET) and the Project Management Unit (PMU) of the Project were working together to revise the Project Designed Matrix (PDM).

Consequently, the revised PDM was completed, submitted to this JCC Meeting and agreed by the JCC Meeting.

Hanoi, 7 February 2018

\_\_\_\_\_  
Mr. Naoki Kakioka  
Senior Representative  
Viet Nam Office  
Japan International Cooperation Agency  
JAPAN

\_\_\_\_\_  
Ms. Mai Thi Lien Huong  
JCC Chairperson  
General Director  
Administration of Technical Infrastructure  
Ministry of Construction  
SOCIALIST REPUBLIC OF VIET NAM

*witnessed by*

\_\_\_\_\_  
Mr. Hideki Wada  
Leader of JICA Expert Team  
JAPAN

\_\_\_\_\_  
Mr. Dong Phuoc An  
Deputy Director  
Department of Construction, Hanoi City  
SOCIALIST REPUBLIC OF VIET NAM

\_\_\_\_\_  
Mr. Vu Cuong  
Vice General Director  
Urban Environment One Member Limited  
Company, Hanoi City  
SOCIALIST REPUBLIC OF VIET NAM

\_\_\_\_\_  
Mr. Nguyen Dai Vien  
Vice Director  
Department of Construction, Thua Thien Hue  
Province  
SOCIALIST REPUBLIC OF VIETNAM



## I. Introduction

The contents of the sixth JCC meeting were:

- Sharing of the Final Report
- Discussion on the revised PDM
- Sharing of the Capacity Assessment Result

The participants of the sixth JCC meeting are listed in Appendix 1.

## II. Major Points Discussed

### 1. Sharing of the Final Report

The Final Report developed by being reflected the comments on the Draft Final Report was confirmed by the participants.

### 2. Revising of the Project Design Matrix

Based on the comments from the Joint Terminal Evaluation Study Team, a revision of the Project Design Matrix was proposed and the participants discussed and concluded the revision attached in Appendix 2. Four Objectively Verifiable Indicators for the Overall Goal were added.

### 3. Sharing of the Capacity Assessment Result

The new version of the Capacity Assessment Check Sheet was made by the Project Team based on the suggestion of the JICA's Technical Advisor of the Terminal Evaluation Team. The Capacity Assessment using the new version was conducted at the event of the Project closing. The results attached in Appendix 3 were shared with the participants.

## III. Conclusions

- The Participants shared the Final Report.
- The revised Project Design Matrix was approved in the JCC Meeting.
- The Participants shared the result of the Capacity Assessment.

## IV. Appendix list

- Appendix 1. Participants List in the Sixth JCC Meeting
- Appendix 2. Revised Project Design Matrix
- Appendix 3. Result of the Capacity Assessment

## Appendix 1. Participants List in the Sixth JCC Meeting

Category	No.	Name	Position, Organization
Vietnamese Counterparts	1	Mai Thi Lien Huong	General Director, Administration of Technical Infrastructure (ATI), Ministry of Construction
	2	Trần Anh Tuan	Vice General Director, ATI
	3	Dang Anh Thu	Vice Project Director/ Head of Solid waste management Division (SWMD), ATI
	4	Nguyen Khanh Long	Deputy Head, SWMD, ATI
	5	Le Thu Thuy	Ditto
	6	Hoang Manh Hiep	Official of ATI
	7	Tran Kieu Anh	Ditto
	8	Phung Anh Duc	Ditto
	9	Nguyen Xuan Bach	Ditto
	10	Ngo Quoc Toan	Chief officer, ATI
	11	Pham Khanh Toan	Vice Director, International Cooperation Department, Ministry of Construction
	12	Nguyen Vu Bao Minh	International Cooperation Department, Ministry of Construction
	13	Dinh Minh Tri	Official, Technical Infrastructure Division, Department of Construction (DOC) of Hanoi
	14	Nguyen Danh Thuan	Official, Planning Division, Hanoi Urban Technical Infrastructure Maintenance Unit, Hanoi DOC
	15	Vu Cuong	Deputy Director General, URENCO Hanoi
	16	Luong Thi Mai Huong	Head of Foreign Affairs Department, URENCO Hanoi
	17	Nguyen Dai Vien	Vice Director of Thua Thien Hue DOC
	18	Bach Minh Tuan	Centre for Information, MOC
JICA	19	Naoki Kakioka	Senior Representative of JICA Vietnam
	20	Yuko Kanto	Project Formulation Advisor, JICA Vietnam
	21	Dao To Cam	Program Officer, JICA Vietnam
JICA Expert Team	22	Hideki Wada	Team Leader
	23	Norihisa Hirata	Vice Team Leader
	24	Nguyen Huong Giang	National staff
	25	Le Minh Ngoc	Ditto
	26	Ngo Thi Lan Phuong	Ditto

## Appendix 2. Project Design Matrix (As of 7 February 2018)

**Project Title:** The Project for Capacity Development on Integrated Management of Municipal Solid Waste in Vietnam  
**Implementing Agency:** Ministry of Construction (MOC)  
**Cooperating Agencies:** 1) Hanoi Department of Construction (Hanoi DOC), 2) Urban Environment One Member Limited Company (Hanoi URENCO), 3) Thua Thien Hue (TTH) Province

**Direct Beneficiaries:** Staff of the implementing and cooperating agencies.

**Target Area:** Hanoi city, other related Provinces including TTH Province

**Target Waste:** "Municipal Solid Waste" in the Project is defined as 1) Domestic solid waste generated from daily activities in households, institutional (schools, government offices etc), public areas (roads, parks, etc.) and commercial/service entities (shops, offices, restaurants, markets, hotels etc.), 2) construction waste and 3) septic tank sludge  
**Project Period:** From 31<sup>st</sup> March 2014 to 15<sup>th</sup> March 2018

**Indirect Beneficiaries:** Residents of Hanoi city and TTH Province

Overall Goal	Narrative Summary	Objectively Verifiable Indicators	Means of Verification	Important Assumptions
<p><b>Long term overall goal (super goal):</b>                      Integrated solid waste management (ISWM) is established overall in Vietnam in accordance with the National Strategy on ISWM.</p> <p><b>Short term overall goal (5 years after the completion of the project):</b>                      ISWM system on municipal solid waste is established in accordance with the national strategy on ISWM.</p>	<p><b>Narrative Summary</b></p> <ol style="list-style-type: none"> <li>By March 2022, at least 3 Cities/Provinces develop/update or are developing/updating "Integrated" Master Plans on SWM<sup>(*)</sup></li> <li>The database on national DSWM is updated annually.</li> <li>Cities/Provinces are guided to use Guiding References of the Project by activities under the functions and tasks of MOC.</li> <li>Legal documents related to domestic waste and construction waste are reviewed<sup>(**)</sup> in Hanoi City by March 2022.</li> <li>At least two treatment facilities for reducing domestic waste are constructed in Hanoi City by March 2022.</li> </ol> <p><sup>(*)</sup> As far as the basic policies on solid waste management of Vietnam is not changed.  <sup>(**)</sup> "Review" means that DOC Hanoi consults HPC annually for the necessity to revise or newly issue.</p>	<ol style="list-style-type: none"> <li>Record kept by ATL, MOC (for OVI 1, 2, 3)</li> <li>Record kept by DOC, Hanoi (for OVI 4, 5)</li> </ol>	<ol style="list-style-type: none"> <li>Record kept by ATL, MOC (for OVI 1, 2, 3)</li> <li>Record kept by DOC, Hanoi (for OVI 4, 5)</li> </ol>	
<p><b>Project Purpose</b></p> <p>Capacity of municipal solid waste management (MSWM) is developed comprehensively in central and local governments.</p>	<ol style="list-style-type: none"> <li>By the end of the Project, at least 80 % of the drafts of legal documents on MSWM, developed or revised through the Project, are submitted to the competent agencies by MOC.</li> <li>By the end of the Project, staff of MOC enhances its management capacity comprehensively in terms of the capacity assessment items<sup>(*)</sup>.</li> <li>By the end of the Project, staff of Hanoi DOC enhances its capacity comprehensively in terms of the capacity assessment items<sup>(*)</sup>.</li> <li>By the end of the Project, staff of Thua Thien Hue Province enhances its capacity comprehensively in terms of the capacity assessment items<sup>(*)</sup>.</li> </ol> <p><sup>(*)</sup> The capacity assessment items were updated as attached.</p>	<ol style="list-style-type: none"> <li>List of official letters sending the documents to competent agencies</li> <li>Results of capacity assessment jointly conducted by PMU and JET</li> <li>ditto of item 2</li> <li>ditto of item 2</li> </ol>	<ol style="list-style-type: none"> <li>List of official letters sending the documents to competent agencies</li> <li>Results of capacity assessment jointly conducted by PMU and JET</li> <li>ditto of item 2</li> <li>ditto of item 2</li> </ol>	<ol style="list-style-type: none"> <li>The Vietnamese government mandates the policy of ISWM on municipal solid waste</li> <li>The Vietnamese government allocates budget and mobilize other sources for ISWM on municipal solid waste</li> <li>Cities/Provinces prepare budget for newly development/update implementation including formulation for master plans.</li> </ol>
<p><b>Outputs</b></p> <p><b>Output 1</b> Capacity of MOC on management, policy-making, and support system for local governments to execute the National Strategy on ISWM is enhanced, in particular for MSWM</p>	<ol style="list-style-type: none"> <li>By the end of the Project, 100 %<sup>(*)</sup> of the draft guiding references, developed through the Project, are accepted by ATL, MOC for policy support to local governments</li> <li>The present conditions of MSWM are monitored nationwide by ATL, MOC annually through collection of at least 40 items of data and its aggregation into the database.</li> </ol>	<ol style="list-style-type: none"> <li>List of guiding references authorized/accepted</li> <li>Number of data items aggregated in the database each year</li> <li>Date of data book publication</li> </ol>	<ol style="list-style-type: none"> <li>Most counterpart staff continues working for the Project.</li> <li>The new Law on Environmental Protection does not change the MOC's</li> </ol>	

<p>Output 2 Capacity of Hanoi DOC on implementation of ISWM is enhanced</p> <p>Output 3 Technical support capacity of MOC for preparation of ISWM Master Plan, in particular for municipal solid waste management sector, is enhanced through model Province</p>	<p>1c. The major aggregated data are compiled in project's documents to be shared with Cities/Provinces in 2016 and 2017.</p> <p>1d. Domestic seminars on ISWM are organized once per year by MOC during implementation of the Project.</p> <p>1e. Policy guidance from MOC to the local governments are implemented in the domestic seminars, Co-learning Study Session (CSS), from 2015, utilizing the acquired knowledge and deliverables during implementation of the Project.</p> <p>2a. By December 2015, Implementation Plan of Hanoi Solid Waste Treatment Master Plan, with proposals on 5-year priority projects on domestic waste, construction waste, and septic tank sludge, is developed.</p> <p>2b. The initial stage of the approved priority projects is implemented by Hanoi DOC from September 2016.</p> <p>3a. The capacity status of existing SWM in TTH Province is analyzed by MOC during selection</p> <p>3b. Technical comments on ISWM Master Plan in particular for MSWM sector of TTH Province are provided by MOC during preparation master plan formulation.</p> <p>3c. Written comments on ISWM Master Plan was provided by MOC to Provincial PC before approval</p> <p>3d. Progress of pilot trials and preparation for priority projects identified in the ISWM Master plan is monitored by ATI-MOC through a progress report of each project</p> <p>3e. By the end of the Project, guiding reference for Master Plan for ISWM preparation is issued/accepted by ATI-MOC.</p>	<p>1d. Date, contents, and participants of project seminars</p> <p>1e. Date, contents, and participants of CSSs</p> <p>2a. Project report</p> <p>2b. Progress report</p> <p>3a. Project reports</p> <p>3b. Written comments or Record of Task Force meeting</p> <p>3c. Written comments of ATI provided to TTH DOC&amp;PPC</p> <p>3d. Progress reports received by ATI-MOC</p> <p>3e. Date of issue/ acceptance</p>	<p>roles and responsibilities on ISWM.</p>
<p><b>Activities</b></p> <p>1-1. Review policies, legislations, institutional framework, and standards for municipal solid waste management in central government and make recommendations if necessary.</p> <p>1-2. Review and evaluate traditional and modern technologies on treatment and management, and technical regulations on planning and constructing, and then make recommendations on criteria on selection of suitable technologies.</p> <p>1-3. Develop a guidance for making construction plans for municipal solid waste treatment facilities.</p> <p>1-4. Develop capacity of MOC to supervise and to monitor the implementation on municipal solid waste management by local governments.</p> <p>1-5. Collect data and information to be utilized for strengthening municipal solid waste management in national level, analyze it and identify problems.</p> <p>1-6. Study on investment models and management models to be applied to the investment on construction and management of SWM complex.</p> <p>1-7. Study and make guidance for formulating construction plans on inter-provincial municipal solid waste treatment complexes. (Note: Activity 1-7 is combined with Activity 1-3)</p>	<p><b>Inputs</b></p> <p>&lt;Japanese Side&gt;</p> <p>(1) Japanese Experts</p> <ol style="list-style-type: none"> <li>1) Chief advisor</li> <li>2) Project coordinator</li> <li>3) Institution, organization</li> <li>4) Solid waste management</li> <li>5) Database management</li> <li>6) Financial management</li> <li>7) Waste treatment technology</li> <li>8) Environmental education</li> <li>9) Other experts in specific fields, if needed</li> </ol> <p>(2) International Training</p> <ol style="list-style-type: none"> <li>1) Counterpart training will be conducted in Japan 2 times/year, 10-12 personnel</li> </ol> <p>(3) Equipment and Material</p> <ol style="list-style-type: none"> <li>1) Based on necessity, equipment and materials which are required for the implementation, such as</li> <li>i) Environmental education &amp; PR</li> <li>ii) Trainings, seminars and public awareness raising activities</li> </ol> <p>(4) Project Cost</p>	<p>&lt;Vietnamese Side&gt;</p> <p>(1) Counterpart and other staff</p> <ol style="list-style-type: none"> <li>1) Project director</li> <li>2) Project managers</li> <li>3) Counterpart staff in             <ol style="list-style-type: none"> <li>i) MOC</li> <li>ii) Hanoi DOC</li> <li>iii) Hanoi URENCO</li> <li>iv) DOC in model Province</li> </ol> </li> <li>4) Administrative staff for project implementation.</li> </ol> <p>(2) Project office, equipment and materials</p> <ol style="list-style-type: none"> <li>1) Office space for Japanese experts             <ol style="list-style-type: none"> <li>i) MOC</li> <li>ii) Hanoi DOC</li> <li>iii) DOC of model Province</li> </ol> </li> <li>2) Equipment and materials which are required, such as trainings, seminars etc.</li> </ol>	<p>A. Necessary budget for related activities is secured by concerned agencies.</p> <p>B. Draft master plan of solid waste treatment of Hanoi city is prepared in the beginning stage of the project by HPC.</p>

<p>1-8. Organize trainings and seminars to enhance proper municipal solid waste management on legal framework, management mechanism, technologies and responsibilities etc. in national level and share experiences of domestic and international practices.</p> <p>1-9. Organize conferences and workshops among experts on technical, legislative and social issues on municipal solid waste management in nationwide (Note: Activity 1-9 is combined with Activity 1-8)</p> <p>1-10. Draft the revision of National Strategy on ISWM based on the review under Activity 1-1 for submission to the Prime Minister</p> <p>2-1. Review the results of phase 1 Project from the sustainability point of view and also analyze Hanoi city situation as a whole system on ISWM. Identify lessons learned and make advices and recommendations.</p> <p>2-2. (Deleted.)</p> <p>2-3. Make advice and recommendations on the implementation of Hanoi solid waste treatment master plan, including public awareness raising activities.</p> <p>2-4. Make technical advice to select the site for target SWM complexes in accordance with Hanoi solid waste treatment master plan, and conduct a pre-feasibility study for the selected target SWM complex in particular for municipal solid waste part.</p> <p>2-5. Study the investment promotion for the construction of target SWM complex, such as BOT, PFI, PPP etc (Note: Activity 2-5 is combined with Activity 2-4)</p> <p>2-6. Learn the lessons of planning and implementation of Hanoi solid waste treatment Master Plan in particular on MSWM</p> <p>3-1. Implement "Capacity Assessment" for existing SWM in the model Province.</p> <p>3-2. Provide technical assistance for the local government of the model Province on the preparation/upgraded of ISWM Master Plan in particular for municipal solid waste management sector, which will be submitted to local government of selected city/ province.</p> <p>3-3. Provide technical assistance for the initiation of implementing ISWM Master Plan in particular for MSWM sector</p> <p>3-4. Formulate the guiding reference for development of Integrated SWM Master Plan based on the experiences from Activities 3-2 and 3-3.</p>	<p>1) General expenditure for the activities of the Japanese experts 2) Partial costs which are required for the implementation: such as i) Environmental education &amp; PR ii) Trainings, seminars and public awareness raising activities</p>	<p>(3) Project cost 1) Project costs which are required, such as i) Counterpart budget ii) Trainings, seminars etc.</p>
<p style="text-align: center;"><b><u>Pre-Condition</u></b> There is no substantial decrease in the budget of MOC, Hanoi DOC.</p>		

(1) MOC

Respondent (Name & Position) +	Grade scale (1-5)					Remarks (if any)
Capacity Assessment Item	1. Existence of the Guiding References is known by more than 80% staff of Solid Waste Management Division of ATI.	2. Contents of the Guiding References are known by more than 80% staff of Solid Waste Management Division of ATI.	3. The Guiding References are utilized for guiding Cities/Provinces at least once a year.	4. The Guiding Reference are utilized for guiding Cities/Provinces more than a few times a year.	5. The Guiding References are revised by ATI basically every year based on guiding experiences to Cities/Provinces.	Remarks (if any)
1. Guiding References						
Utilization of the Guiding References (Please enter any numbers or letters in the corresponding cell.)						
2. Data management	1. Data are not collected every year.	2. Data are collected every year, but not aggregated.	3. Data are aggregated every year, but not published.	4. The aggregated data with analysis are compiled and published annually.	5. The analysis on data is utilized for monitoring and planning policies.	Remarks (if any)
Data collection, aggregation and publication (Please enter any numbers or letters in the corresponding cell.)						

(2) DOC Hanoi

Respondent (Name & Position) →	Grade scale (1-5)					Remarks (if any)
Capacity Assessment Item	1. No incinerator construction project (more than 1000 t/d) is formulated.	2. An incinerator construction project (more than 1000 t/d) is formulated.	3. More than two incinerator construction project (more than 1000 t/d) is formulated.	4. At least one incinerator (more than 1000 t/d) is under construction or operated already.	5. Some incinerators (more than 1000 t/d) are under construction or operated already.	Remarks (if any)
1. Domestic solid waste						
Regular scale incinerator construction (Please enter any numbers or letters in the corresponding cell.)						
2. Construction waste	1. No action is taken for construction waste.	2. Less than five big construction (except individual houses) sites are monitored and controlled by DOC.	3. All big construction sites (except individual houses) are monitored and controlled by DOC regularly.	4. A recycling plant for construction waste are under construction or operated.	5. More than one recycling plant for construction waste are under construction or operated.	Remarks (if any)
Policies for construction waste (Please enter any numbers or letters in the corresponding cell.)						
3. Septic tank sludge	1. DOC has not talked with private collectors	2. DOC has periodical meetings with private collectors.	3. Septic tank sludge treated in the Cau Dien Treatment Plant is more than 150 t/d (half of the capacity).	4. The Cau Dien Treatment Plant is fully used and new treatment facilities are claimed.	5. Hanoi City introduces a comprehensive policy for -proper management of septic tank sludge.	Remarks (if any)
Improvement of septic tank sludge management (Please enter any numbers or letters in the corresponding cell.)						

(3) Thua Thien Hue Province

Respondent (Name & Position) →	Capacity Assessment Item					Remarks (if any)
	Grade scale (1-5)					
	1. The committee is not held every year.	2. The committee is held every year.	3. The committee monitors the implementation of the Prioritized Projects.	4. How to improve the Prioritized Project is actively discussed in the committee and the committee can instruct the direction appropriately.	5. The revision of the Master Plan is discussed in the committee based on the implementation of the Prioritized Projects.	
1. Steering Committee ("SW Integral Committee") for Master Plan implementation						
Roles of the Steering Committee (Please enter any numbers or letters in the corresponding cell.)						
2. Required treatment facilities	1. The key points for calling, selecting and supervising investors and for establishing a financial system for securing enough amount of waste to be treated are understood by less than 50% staff of departments in charge.	2. The key points for calling, selecting and supervising investors and for establishing a financial system for securing enough amount of waste to be treated are understood by more than 50% staff of departments in charge.	3. Calling, selecting and supervising investors with a financial system for securing enough amount of waste to be treated are being tried at least in one facility.	4. Calling, selecting and supervising investors with a financial system for securing enough amount of waste to be treated are done at least in one facility.	5. The know-how and procedures to call, select and supervise investors with a financial system for securing enough amount of waste to be treated are shared among related departments.	Remarks (if any)
Progress of the developments of required treatment facilities (Please enter any numbers or letters in the corresponding cell.)						
3. Databook	1. No databook is developed every year.	2. Databooks are developed every year.	3. Databooks are published every year.	4. Databooks are utilized for people's awareness raising at least once a year.	5. Databooks are fully utilized for people's awareness raising more than once a year.	Remarks (if any)
Utilization of Databooks (Please enter any numbers or letters in the corresponding cell.)						



### Appendix 3. Results of Capacity Assessment

(1) MOC

Respondent (Name & Position) +	Ms. Dang Anh Thu Manager of Solid waste management Division - Administration of Technical Infrastructure (MOC) Manager of Output 1 - Vietnam Waste Project					Remarks (if any)
Capacity Assessment Item	Grade scale (1-5)					Remarks (if any)
1. Guiding References	1. Existence of the Guiding References is known by more than 80% staff of Solid Waste Management Division of ATI.	2. Contents of the Guiding References are known by more than 80% staff of Solid Waste Management Division of ATI.	3. The Guiding References are utilized for guiding Cities/Provinces at least once a year.	4. The Guiding Reference are utilized for guiding Cities/Provinces more than a few times a year.	5. The Guiding References are revised by ATI basically every year based on guiding experiences to Cities/Provinces.	
Utilization of the Guiding References (Please enter any numbers or letters in the corresponding cell.)				+		
2. Data management	1. Data are not collected every year.	2. Data are collected every year, but not aggregated.	3. Data are aggregated every year, but not published.	4. The aggregated data with analysis are compiled and published annually.	5. The analysis on data is utilized for monitoring and planning policies.	Remarks (if any)
Data collection, aggregation and publication (Please enter any numbers or letters in the corresponding cell.)				+		

(2) DOC Hanoi

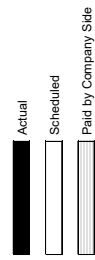
Respondent (Name & Position) →		Mr. Nguyen Van Quy Vice Manager of Technical Infrastructure Division - Hanoi Department of Construction				
Capacity Assessment Item		Grade scale (1-5)				
1. Domestic solid waste	1. No incinerator construction project (more than 1000 t/d) is formulated.	2. An incinerator construction project (more than 1000 t/d) is formulated.	3. More than two incinerator construction project (more than 1000 t/d) is formulated.	4. At least one incinerator (more than 1000 t/d) is under construction or operated already.	5. Some incinerators (more than 1000 t/d) are under construction or operated already.	Remarks (if any)
	Regular scale incinerator construction (Please enter any numbers or letters in the corresponding cell.)	+				
2. Construction waste	1. No action is taken for construction waste.	2. Less than five big construction (except individual houses) sites are monitored and controlled by DOC.	3. All big construction sites (except individual houses) are monitored and controlled by DOC regularly.	4. A recycling plant for construction waste are under construction or operated.	5. More than one recycling plant for construction waste are under construction or operated.	Remarks (if any)
	Policies for construction waste (Please enter any numbers or letters in the corresponding cell.)		+			
3. Septic tank sludge	1. DOC has not talked with private collectors.	2. DOC has periodical meetings with private collectors.	3. Septic tank sludge treated in the Cau Dien Treatment Plant is more than 150 t/d (half of the capacity).	4. The Cau Dien Treatment Plant is fully used and new treatment facilities are planned.	5. Hanoi City introduces a comprehensive policy for proper management of septic tank sludge.	Remarks (if any)
	Improvement of septic tank sludge management (Please enter any numbers or letters in the corresponding cell.)	+				

**(3) Thua Thien Hue Province**

Respondent (Name & Position) →		Mr.Nguyen Dai Vien Vice Director of Department of Construction - Thua Thien Hue Province Manager of Outlot 3 - Vietnam Waste Project					
Capacity Assessment Item		Grade scale (1-5)					
1. Steering Committee ("SW Integral Committee") for Mater Plan implementation	1. The committee is not held every year.	2. The committee is held every year.	3. The committee monitors the implementation of the Prioritized Projects.	4. How to improve the Prioritized Project is actively discussed in the committee and the committee can instruct the direction appropriately.	5. The revision of the Master Plan is discussed in the committee based on the implementation of the Prioritized Projects.	Remarks (if any)	
Roles of the Steering Committee (Please enter any numbers or letters in the corresponding cell.)				+			
2. Required treatment facilities	1. The key points for calling, selecting and supervising investors and for establishing a financial system for securing enough amount of waste to be treated are understood by less than 50% staff of departments in charge.	2. The key points for calling, selecting and supervising investors and for establishing a financial system for securing enough amount of waste to be treated are understood by more than 50% staff of departments in charge.	3. Calling, selecting and supervising investors with a financial system for securing enough amount of waste to be treated are being tried at least in one facility.	4. Calling, selecting and supervising investors with a financial system for securing enough amount of waste to be treated are done at least in one facility.	5. The know-how and procedures to call, select and supervise investors with a financial system for securing enough amount of waste to be treated are shared among related departments.	Remarks (if any)	
Progress of the developments of required treatment facilities (Please enter any numbers or letters in the corresponding cell.)				+			
3. Databook	1. No databook is developed every year.	2. Databooks are developed every year.	3. Databooks are published every year.	4. Databooks are utilized for people's awareness raising at least once a year.	5. Databooks are fully utilized for people's awareness raising more than once a year.	Remarks (if any)	
Utilization of Databooks (Please enter any numbers or letters in the corresponding cell.)				+			



Position	Name	Company	Class	Plan/ Actual	Flight Times	Year 2014												Year 2015		Year 2016		MM (Men-Month)	
						Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Jan.	Feb.	Jan.	Feb.	International	Domestic		
12. Database management	Ngoc Minh Le	SSDI	5	Plan	0																	2.00	
			5	Actual	0																		0.20
13. Env. Education	Ngoc Minh Le	SSDI	5	Plan	0																	1.33	
			5	Actual	0																		0.10
14. Equipment procurement planning and management	Tomoya Fukuda	KCC	4	Plan	2																	3.00	
			4	Actual	2																		3.00
15. Solid waste treatment facility planning and estimation	Hideaki Kuzuhata	KCC	4	Plan	2																	3.00	
			4	Actual	2																		0.47
16. Financial planning	Hironori Koyama	SSDI	3	Plan	6																	6.00	
			3	Actual	5																		6.73
17. Project coordinator/ Solid waste survey	Ai Sawayama	KCC	5	Plan	6																	12.00	
			5	Actual	5																		11.77
																						101.83	
																						98.81	
1. Chief advisor/ Integrated solid waste management	Hideaki Wada	SSDI	2	Plan	0																	0.15	
			2	Actual	0																		0.15
12. Database management	Ngoc Minh Le	SSDI	5	Plan	0																	4.50	
			5	Actual	0																		6.52
13. Env. Education	Ngoc Minh Le	SSDI	5	Plan	0																	5.00	
			5	Actual	0																		5.95
15. Solid waste treatment facility planning and estimation	Hideaki Kuzuhata	KCC	4	Plan	0																	0.00	
			4	Actual	0																		1.85
18. Study tour in Japan	Ai Sawayama	KCC	5	Plan	0																	4.50	
			5	Actual	0																		2.70
																						14.15	
																						17.17	
																						101.83	
																						98.81	





### Appendix 3. Equipment list

Device		Purchased date	Price (VND)	Present place	Transfer to (tentative)
Lazor printer (B/W, A3)	CanonLBP3500	2014/12/5	14,299,000 VND	JET in Hanoi	MOC
Lazor printer (B/W, A4)	Brother 2270DW	2014/4/16	3,400,000 VND	JET in Hanoi	Hanoi DOC
Lazor printer (B/W, A4)	Brother 2270DW	2014/4/16	2,999,000 VND	JET in Hanoi	Hanoi DOC
Lazor printer (B/W, A4)	Brother L2366DW	2016/2/3	3,500,000 VND	JET in Hanoi	MOC
Lazor printer (B/W, A4)	Brother L2366DW	2016/2/3	3,500,000 VND	JET in Hue	Thua Thien Hue Province
Lazor printer (B/W, A4)	Brother 2270DW	2015/6/1	3,400,000 VND	JET in Hanoi	MOC
Multi function printer (Color)	Brother MFC-J6510DW	2014/4/16	5,000,000 VND	JET in Hanoi	MOC
Multi function printer (Color)	Brother MFC JW33520	2016/2/3	7,150,000 VND	JET in Hanoi	MOC
Multi function printer (Color)	Brother MFC JW33520	2016/2/3	7,150,000 VND	JET in Hue	Thua Thien Hue Province
Note PC	UX32VD-R3001H	2014/4/23	22,889,000 VND	JET in Hanoi	MOC
Note PC	UX32VD-R3001H	2014/4/23	22,889,000 VND	JET in Hanoi	MOC
Note PC	UX32VD-R3001H	2014/4/23	22,889,000 VND	JET in Hanoi	MOC
Projector	VPL-DX140	2014/4/14	18,490,000 VND	Hanoi DOC (Unit A)	Hanoi DOC
Projector	EB-1751	2014/6/24	15,443,379 JPY	JET in Hanoi	MOC
Projector	EB-1761W	2014/9/17	19,247,254 JPY	JET in Hue	Thua Thien Hue Province
Stand Scanner	Sanwa Supply	2014/6/25	3,258,838 JPY	JET in Hanoi	MOC
UPS	Upselect 1500VA	2014/4/16	3,800,000 VND	JET in Hanoi	MOC
UPS	Upselect 1500VA	2014/4/16	3,800,000 VND	JET in Hanoi	MOC