

APPENDIX 3-2

Minutes of the Meetings of The Sixth Steering Committee

MINUTES OF MEETING
OF
THE SIXTH STEERING COMMITTEE
FOR
THE STUDY
ON
THE SOLID WASTE MANAGEMENT
FOR
THE KATHMANDU VALLEY

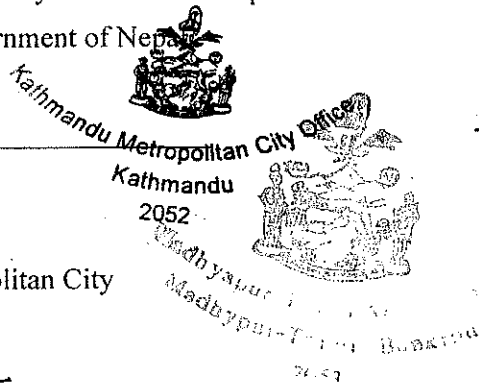
AGREED UPON AMONG
MINISTRY OF LOCAL DEVELOPMENT
AND
FIVE MUNICIPALITIES OF THE KATHMANDU VALLEY
AND
JAPAN INTERNATIONAL COOPERATION AGENCY

S. Subedi

Som Lal Subedi
Joint Secretary, Ministry of Local Development
His Majesty's Government of Nepal

SMM

Rajaram Shrestha
Mayor
Kathmandu Metropolitan City



Bhaktapur Municipality

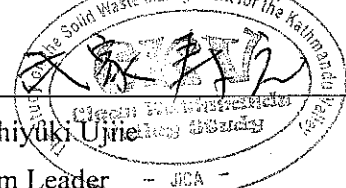
Sumi

Sumitra Madhukarmi
Mayor
Bhaktapur Municipality

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Dhruba Maharjan
Mayor
Kirtipur Municipality

Kathmandu, March 17, 2006



Toshiyuki Ujima
Team Leader - JICA -
JICA Study Team

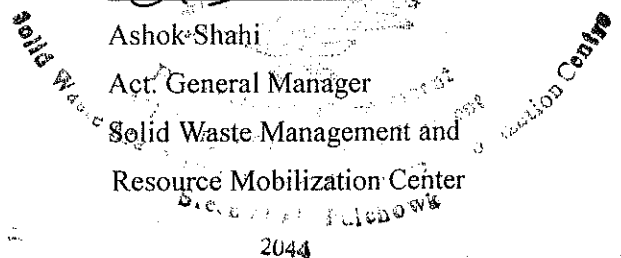
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Prem Lal Maharjan
Mayor
Lalitpur Sub-Metropolitan City

[Signature]
Surya Hari Shankhadev
Mayor
Madhyapur Thimi Municipality

Madhyapur Thimi Municipality

[Signature]
Ashok Shahi
Act. General Manager
Solid Waste Management and
Resource Mobilization Center



1. Introduction

The Japan International Cooperation Agency (hereinafter referred to as "JICA") has organized and dispatched the JICA Study Team (hereinafter referred to as "the Study Team") to the Kingdom Nepal since January 18, 2004, according to the Scope of Work between Ministry of Local Development of His Majesty's Government of Nepal (hereinafter referred to as "MOLD") and JICA signed on September 12, 2003.

This Minutes of Meeting is a record of the Sixth Steering Committee (hereinafter referred to as "ST/C") held on March 17, 2006 for discussion on Progress Report for Monitoring and Follow-up Phase (hereinafter referred to as "P/R") for the Study on the Solid Waste Management for the Kathmandu Valley (hereinafter referred to as "the Study") and other issues related to the Study that have been agreed upon between the Nepalese side and the Japanese side (hereinafter referred to as "Both Sides"). The list of attendants to the meeting is attached in Appendix-1.

2. Progress Report for Monitoring and Follow-up Phase (Phase 4)

The Study Team submitted Forty (40) copies of the P/R to MOLD in March, 2006 and MOLD distributed the P/R to the five municipalities, i.e. Kathmandu Metropolitan City (hereinafter referred to as "KMC"), Lalitpur Sub-Metropolitan City (hereinafter referred to as "LSMC"), Bhaktapur Municipality (hereinafter referred to as "BKM"), Madhyapur Thimi Municipality (hereinafter referred to as "MTM"), Kirtipur Municipality (hereinafter referred to as "KRM")¹, Solid Waste Management and Resource Mobilization Center (hereinafter referred to as "SWMRMC") and other relevant organizations. The Study Team explained the contents of the P/R and Both Sides discussed the contents of the interim results of the monitoring and follow-up activities.

At this ST/C, Both Sides made further clarifications about the P/R. Some of the main issues of the discussions are as follows:

3. Contents of Progress Report

The contents of P/R were discussed as follows:

3.1 Monitoring of Implementation of Action Plan of Each Municipality and SWMRMC

(1) Monitoring and Evaluation of Progress of Activities in the Annual Work Plans (Monitoring)

Both Sides confirmed the progress of the activities in each of the Annual Work Plans (hereinafter referred

¹ Municipalities are placed in order of each population, and this order will be adopted in a series of reports and documents prepared in the Study

to as "AWP") of the fiscal year 2005/2006 (2062/2063 of Nepalese calendar) up to the end of February 2006 based on the results of series of monitoring sessions of the Annual Work Plans with respective Task Forces of the five municipalities and SWMRMC as per attached in Appendix 2. The progresses since the last monitoring sessions in November 2005 are marked in boldface in the columns of status and remarks of the tables. In general, the progresses of some activities have been affected by the unavoidable circumstances and external factors.

(2) Technical Assistance for Activities in the AWP's (Follow-up)

Based on the components of the Follow-up, i.e.: 1) Support for collection and transportation, waste minimization activities and solid waste data management, and 2) Support for environmental and social considerations for facilities development, the discussion was made including explanation of the current situation of the activities by the Nepalese side as follows:

1) Support for Collection and Transportation, Waste Minimization and Solid Waste Data Management

i) Collection and Transportation (in BKM and MTM)

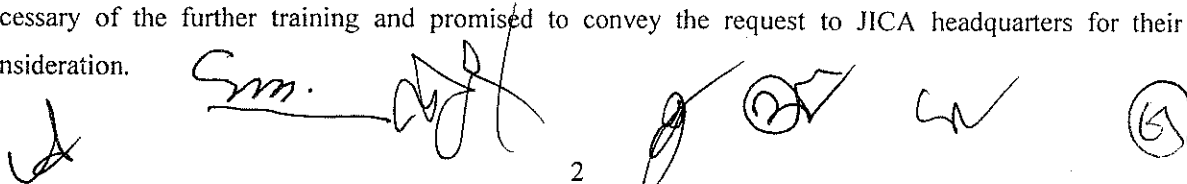
- BKM explained that they had started preparation for extending the source-separated collection areas such as development of the explanation materials to local people with support from the Study Team
- MTM explained that they had sent a letter to KMC regarding the collection vehicle which was agreed to be provided by KMC but still had been waiting for the reply.

ii) Waste Minimization Activities

- SWMRMC explained that they had been discussing with local peoples in Taudaha, Ward 15 of KRM, about the candidate site for a large-scale waste processing facility.
- KMC explained that they had produced a label for promotion of sale of vermi-compost product.
- LSMC explained that they had started promotion of plastic separation collection activities in 22 wards involving 53 women's groups with support from the Study Team.
- KRM explained that they had expanded the plastic separation collection activities to wards 2, 6 and 7 by appointing a motivator.

iii) Solid Waste Data Management

It was confirmed by Both Sides that modification of the data base system in KMC and LSMC had been made with support from the Study Team. However, the Nepalese side requested the Study Team to provide further training to some staff of the municipalities so that even if the responsible person is absent from the office, the other persons can continue the operation of the system. The Study Team recognized necessary of the further training and promised to convey the request to JICA headquarters for their consideration.

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The Study Team emphasized the importance of utilization of the collected data for policy development and/or effective implementation of the Action Plans. The Nepalese side understood the importance of the data utilization as well as collection and SWMRMC promised to play a leading role for continuous data collection.

2) Social and Environmental Considerations for Facility Development

The Study Team again emphasized that environmental studies including social considerations were essential to develop the facilities on solid waste management. Both Sides confirmed that environmental and social considerations for the facility development would be conducted based on the Environmental Protection Act and Rules, the proposed National Environmental Impact Assessment Guideline on Solid Waste Management and the JICA Environment and Social Considerations Guidelines (hereinafter referred to as "JICA ESC Guidelines"). At this time interim results of follow-up and some preliminary recommendations were discussed as listed below:

i) Long-term Landfill Site

a. Progress of EIA

The Nepalese side explained the current progress of EIA for the long-term landfill site, Banchare Danda landfill site, as follows;

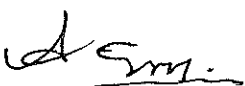
- Public notice: August 8, 2005
- Pasting of public notice in VDCs: August 8, 2005
- Submission of Scoping Report and TOR for EIA to Ministry of Environment, Science and Technology (MOEST): October 31, 2005
- Submission of a letter to Ministry of Forest and Soil Conservation (MOFSC) for the approval: December 8, 2005
- Organization of Review Committee by MOEST: February 27, 2006
- Obtaining of official approval from MOEST: March 3, 2006

The Nepalese side also explained that the tender document for consultancy service of the EIA was being prepared and the tender notice would be made soon. The Nepalese side promised to include the following conditions in the TOR for the consultant procurement.

- Detail description of site selection process for the landfill in the EIA report
- Detail description of public involvement such as public hearings in the EIA report
- Detail description of land acquisition and resettlement procedures and plan in the EIA report
- Incorporation of the results of the follow-up survey into the EIA report
- Close coordination with the Study Team for EIA study

b. Category of the Study under the JICA ESC Guidelines

The Study Team explained that the Study had been categorized as "A" in which strict environmental and social considerations are required under the JICA ESC Guidelines. The Study Team also explained that



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the documents related to the EIA such as TOR for EIA and Draft EIA report as well as reports produced by the Study Team would be reviewed by the Advisory Council of Environmental and Social Considerations Review of JICA (hereinafter referred to as "Advisory Council"). The Nepalese side understood the JICA's system and agreed to provide the Advisory Council with necessary documents for their review including draft of Draft EIA report. The Nepalese side promised to try to incorporate comments that may be made by the Advisory Council into the EIA report.

c. Demarcation of the EIA Study between the Nepalese side and the Study Team

Both Sides confirmed that EIA procedures on Banchara Danda landfill site development would be completed by SWMRMC. Since the Study Team is providing technical supports for topography, soil investigation, geological, hydrological and supplemental environmental surveys, and concept design for going forward with the EIA procedure appropriately as the Follow-up activity, Both Sides also confirmed the demarcation of the EIA study between the Nepalese side and the Study Team as per attached in Appendix 3.

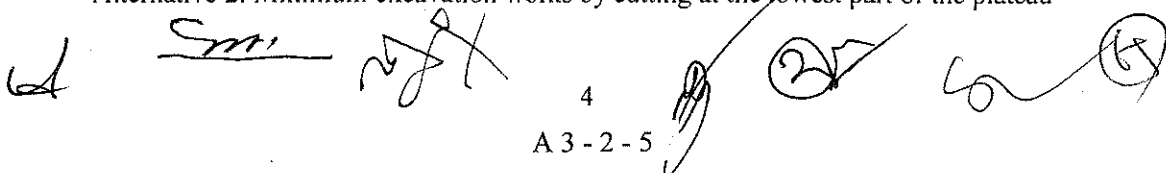
d. Preliminary Concept of Design of Banchara Danda Landfill Site

Based on the results of the field surveys conducted during Phases 3 and 4 of the Study, the principles for the preliminary concept for Banchara Danda landfill site development was discussed and confirmed by Both Sides as follows:

- Sanitary landfill of semi-aerobic type for municipal solid waste
- Application of composite liner to prevent leachate percolation, considering the high permeability of the ground and shallow soil layer above bedrock
- Leachate collection and treatment to prevent pollution of the adjacent river
- Landfill gas collection with possibility for utilization to support operation of the site
- Construction of waste storage dams and gentle waste slopes during operation of not more than 1:4 to prevent against waste collapse due to the height of the waste disposal activities which may exceed 100 meters
- Development of facilities to monitor incoming waste and control site access
- Provision of sufficient buffer zone surrounding the site
- Development of monitoring system for the surrounding environment
- Development of landfill taking into consideration geological conditions of the site
- Development of special area for handling of medical wastes
- Consideration for development of facility for waste recovery

The landfill site development will also require the diversion of the river. In this respect Both Sides considered three alternatives for the river diversion, namely;

- Alternative 1: Minimum bends of the river path by cutting the southern part of the plateau
- Alternative 2: Minimum excavation works by cutting at the lowest part of the plateau

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A 3 - 2 - 5

- Alternative 3: Combining route of alternative 2 with construction of a spillway to control the river flow through the new diversion as a flood protection measure

The geological studies show that the southern flank of the plateau is more prone to instability and much protection works will be required. Therefore Both Sides agreed to further consider Alternatives 2 and 3 based on more study of the flood risks and impact of construction of a reservoir under Alternative 3 on the upstream portion of the river.

ii) Other Facilities

The Study Team explained that identified environmental issues on the planned Balaju and Afadole transfer stations and recommended countermeasures, including concept designs of them. The Nepalese side promised to conduct necessary IEE studies, based on the recommendations to be provided by the Study Team, when the decisions to use these sites on a permanent base are taken.

3.2 Technical Support for Operation of Teku Transfer Station and Sisdol Landfill Site

Sisdol landfill site has been operating now for around nine months while Teku transfer station unloading platform was operated in limited time. At this time interim results of the follow-up and some interim recommendations were discussed as listed below:

(1) Interim Results of Follow-up of Solid Waste Transportation by Secondary Transportation Vehicles (Operation of Teku Transfer Station) and Recommendations for Better Operation

The Nepalese side explained that the progress of preparation of secondary transportation to Sisdol landfill site as follows:

- 21 secondary transportation vehicles and containers including spare parts arrived at Teku transfer station in November and December 2005
- These vehicles were handed over from the Japanese side to the Nepalese side in December 2005
- The registration of vehicles, arrangement of insurance, allocation of drivers have been finished recently

Accordingly, since Teku transfer station will soon be operated with the intention to accept and transfer around 200 tons of waste daily to Sisdol landfill site, KMC was again advised to promptly implement the following measures which were confirmed by Both Sides at the Fifth ST/C.

- Develop the time frame for the operation of the transfer trucks from the Transfer Station in line with the collection system
- Clear the station of any un-necessary equipments in order to be able to operate efficiently within this limited space
- Improve the waste pickers work environment, not only for the waste pickers active in Teku T/S but also taking into consideration the loss of work for them at the Bagmati River dumping site

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once that is closed down. In this regard, KMC informed that registration of waste pickers at Teaku transfer station had been started.

- Prepare the east entrance for use in order to have smooth traffic flow within the site

(2) **Interim Results of Follow-up of Sisdol Landfill Site Operation and Recommendations for Better Operation**

The Study Team offered these interim recommendations to improve the existing operation of the Sisdol landfill, based on the lessons learnt so far as well as to prepare the landfill to receive 3-4 times the present waste amount, once the new transfer trucks commence operation.

1) Site Management

- The site manager needs to spend more time at the landfill in order to make full use of operating the site and learning from this experience.
- KMC and LSMC need to prepare for the transport of all their waste to Sisdol landfill by provision of the necessary heavy equipment and staff, including allocation of a mechanic permanently at the site.
- More consideration on sharing of responsibilities and their demarcation between KMC, LSMC and the local committee is required.

2) Waste Placing

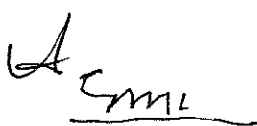
- The present method of preparing the waste placing plan by the KMC officers should be continued.
- Once the waste is placed and spread, a number of passes by the bull dozer is required in order to provide compaction. Compaction should be done separately of the spreading of the soil cover materials.
- Soil cover should be applied daily *without fail*

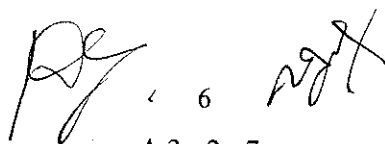
3) Leachate Treatment System

- The aerator in the leachate pond should be operated for at least 5 - 6 hours daily.
- The leachate from the retention pond should be pumped into the new re-circulation pond to reduce the leachate volume in the leachate retention pond and for enhancement of the treatment.
- A submerged pump should be installed in the pond to pump leachate through a rigid pipe attached to the valley 1 west side and running up to the northern part of the site where a sprinkler should be installed.

4) Monitoring of Operations

- The leachate, groundwater and river should be monitored minimum on a bi-monthly basis and the results should be understood by the Operator
- The complaints and remarks received from the general public and the local committee should be recorded and dealt with.











5) Site Operation Records

- Operation records, waste arrival records and visitors logs should be maintained on a real time basis.
- Weighbridge at the site should be operated as soon as possible
- Explanatory materials for the landfill, as posters, panel boards and brochures should be prepared

6) Construction Works (possibly to include in Valley 2 construction)

- Site internal access road should be developed as an all weather road
- Site fence, especially in the leachate pond area should be completed soon
- Areas should be prepared for stocking of excavated materials from Valley 2 construction to be used as cover materials

(3) **Other Important Issues relating to Operation of Teku Transfer Station and Sisdol Landfill Site**

For the appropriate operation of Teku transfer station and Sisdol landfill site, the important issues to be conducted by the Nepalese side were explained by the Nepalese side as follows:

- The operation manual of Sisdol landfill site prepared by the Study Team had been translated into Nepalese by SWMRMC.
- Sisdol landfill site operation review committee meetings had been organized periodically
- Members of the Environmental Coordination Committee had been appointed by SWMRMC and the kick-off meeting would be held soon.
- Detailed design of valley 2 of Sisdol landfill site was completed and the tender evaluation process for the construction had started.
- The termination process of the contract with the current contractor on the iron grids in the windows and a fence and gate at the site had started in order to proceed these remaining works. As for electricity supply, electric poles had been installed at the site, but it would take more time to start the electricity supply.

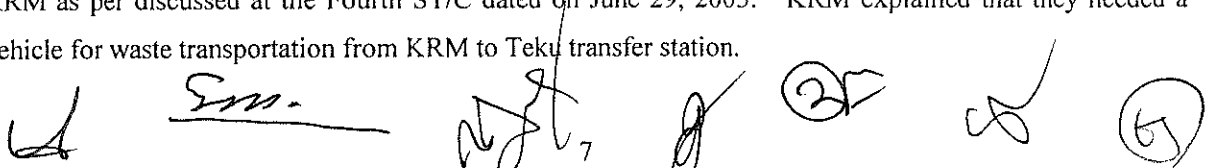
4. Important Issues Relating to the Study

4.1 **Continuity of the Study Results and Outputs**

Both Sides again confirmed importance of continuity of the Study. The Nepalese Side promised to follow-through the results of the Study and to obtain official approval for each of the Action Plans by respective Municipality Boards and the Executive Board of SWMRMC as one of measures.

4.2 **Waste Transportation from KRM to Teku Transfer Station**

It was confirmed that the Nepalese side would discuss the waste acceptance at Teku transfer station from KRM as per discussed at the Fourth ST/C dated on June 29, 2005. KRM explained that they needed a vehicle for waste transportation from KRM to Teku transfer station.

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4.3 Progress of Development of a Landfill Site of Zone B

The Nepalese side explained that they had been trying to make necessary arrangements for development of a landfill site of Zone B (BKM, MTM) such as proceeding of strong efforts for public consensus building and that HMG/N had allocated necessary budget for development of the landfill site. The Nepalese side also explained that they had conducted site visits to alternative sites (Gundu, Ryale-5 Ranikot, Sipadol, Aashapuri-Nasika, etc.) jointly by SWMRMC, BKM and MTM.

4.4 Human Resource Requirements of SWMRMC

The Study Team expressed their concern about human resources requirements of SWMRMC for conducting their various tasks, especially necessary staff attachment for design and development works of long-term landfill sites. The Nepalese side promised to try to assign necessary staff for fulfill the tasks of SWMRMC.

4.5 Assignment Schedule of the Study Team Members

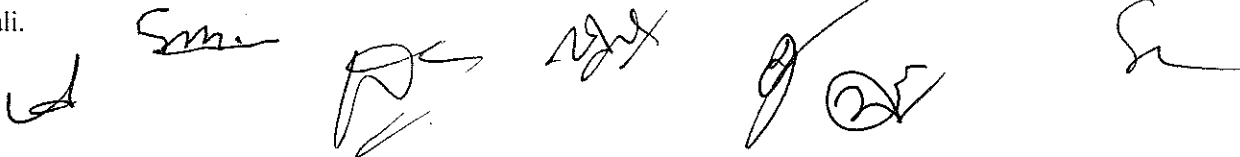
Based on the change of categories under the JICA ESC Guidelines, the assignment schedule of the study team members are planned to be changed as per attached in Appendix 4. The Nepalese side promised to take necessary measures for official visa application for the study team members when needed.

4.6 Medical Waste Management

As confirmed at the Fifth ST/C, the Study Team asked the Nepalese side to explain the progress of policy development regarding medial waste management. The Nepalese side explained that they were still developing the policy and promised to outline it soon.

4.7 Video Documentary

The Nepalese side requested the Study Team to produce the video documentary on solid waste management with Nepali narrations. The Study Team explained that they had developed a video documentary of the Study without narration. The Nepalese side expressed their willingness to provide necessary supports for the documentary production such as translation of the narration from English to Nepali.

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Appendix-1: List of Attendants

Ministry of Local Development

Mr. Som Lal Subedi, Joint Secretary
Mr. Babu Ram Gautam, Under Secretary

Solid Waste Management Resource Mobilization Center

Mr. Ashok Shahi, Act. General Manager
Mr. Ram Sharan Maharjan, Engineer
Mr. Nirmal Darshan Acharya, Engineer

Kathmandu Metropolitan City

Mr. Rajaram Shrestha, Mayor
Mr. Padma Raj Regmi, CEO
Mr. Rajesh Manandhar, Chief, Solid Waste Management Section/ Environment Department
Mr. Purusotam Shakya, Mechanical Engineer/Mechanical Section
Mr. Deepak Ratna Kansakar, Engineer (Sisdol landfill site manager), Solid Waste Management Section/
Environment Department

Lalitpur Sub-Metropolitan City

Mr. Prem Lal Maharjan, Mayor
Mr. Prem Raj Joshi, CEO
Mr. Pradeep Amatya, Chief, Environment and Sanitation Section

Bhaktapur Municipality

Ms. Sumitra Madhukarmi, Mayor
Mr. Hem Sharma Pokharel, CEO
Mr. Dinesh Rajbhandari, Sanitation Engineer / Environmental Section
Mr. Moti Bhakta Shrestha, Social Welfare Officer

Madhyapur Thimi Municipality

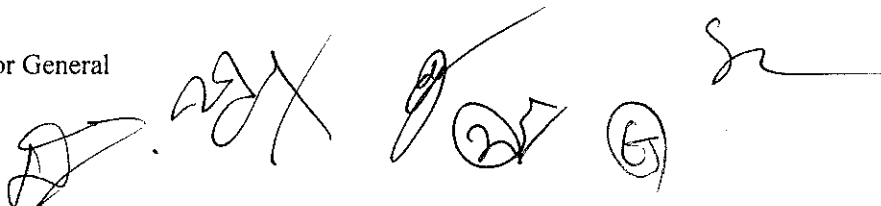
Mr. Surya Hari Shankhadev, Mayor
Mr. Bishnu Dutta Gautam, CEO
Mr. Keshab Silwal, Legal Officer
Ms. Krishna Kumari Shrestha, Assistant, Community Development and Sanitation Section

Kirtipur Municipality

Mr. Dhruba Maharjan, Mayor
Mr. Tulsi Nath Gautam, CEO
Mr. Anuj Pradhan, Chief, Solid Waste Management Unit
Mr. Gyan Bazra Maharjan, Assistant, Solid Waste Management Unit

Ministry of Physical Planning and Works

Mr. Ishwar Man Tamrakar, Deputy Director General



Ministry of Agriculture and Cooperative

Ms. Bidya Panndey, Training Officer, Department of Horticulture Development

Japan International Cooperation Agency (JICA) Nepal Office

Mr. Yoshinobu Kinoshita, Assistant Resident Representative of JICA Nepal Office

Mr. Sourab Rana, Program Officer of JICA Nepal Office

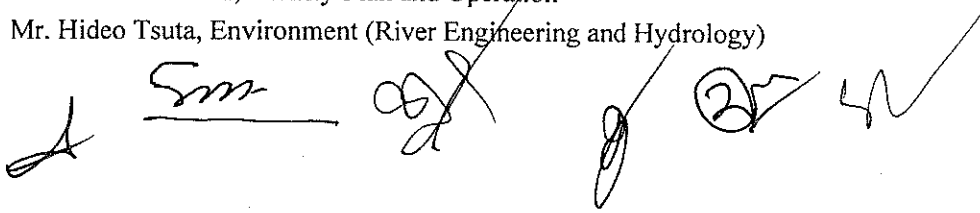
JICA Study Team

Mr. Toshiyuki Ujiie, Team Leader / Solid Waste Management Policy / Environment

Mr. Shungo Soeda, Deputy Team Leader/Collection and Transportation / Recycling System

Mr. Mahmoud Riad, Facility Plan and Operation

Mr. Hideo Tsuta, Environment (River Engineering and Hydrology)

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Appendix-2: Situation of Annual Work Plans of FY 2005/2006 (as of February 28, 2006)

Activities of the respective AWP's had been reviewed by the Study Team together with each TF and the activities had been basically categorized into the following headings:

- Completed : those activities which had been completed
- Continued: those activities which had been continued from the last fiscal year.
- Started : those activities which have been started since this fiscal year.
- Not started : those activities which are not started yet.
- Canceled: those activities which are not necessary to implement because of changes of situations
- Postponed: those activities which are impossible to implement this fiscal year because of lack of budget or equipment or human resource.

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KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
A-1-S1	Establishment of rules for private sector collection and its monitoring system		In total NRs 400, 880, 075 is approved for SWM activities. Almost all activities of the AWP is approved by the Council.			
1	Preparation of agreement and TOR for PPP	SWMS/Rajesh Manander		Started		Agreement and TOR have been prepared
A-1 S2	Promotion of private sector participation in door to door collection for 25% of HHs					
1	Agreement with private sector	SWMS/Rajesh Manander		Started	Needed consensus from authorities and SWM workers	
A-1-S3	Preparation of equipment replacement plan and pilot test for a few types collection vehicles and commencement of replacement of tractors (for 25% collection)					
1	Preparation of an equipment replacement plan	MS/Purusotam Shakya		Not started		Rescheduled to Chitra
2	Procurement of a Compactor Truck or Tipper with cover	Environment Dept./MS		Canceled		
3	Replacement of tractors purchasing 4 vehicles	Environment Dept./MS		Canceled		
A-1-S6	Introduction of GIS System for waste collection plan					
1	Preparation of an inventory of sweeping areas	SWMS/Rajesh Manander		Completed		Started in two Wards
2	Time and Motion survey of core areas	SWMS/Rajesh Manander	Completed			
3	Record data of sweeping areas inventory into the GIS system	SWMS/Rajesh Manander	Completed			
4	Record data of Time and Motion survey of core areas	SWMS/Rajesh Manander	Completed			
A-1-S7	Improvement of collection and transportation system taking into consideration waste transportation to Sisdol landfill site					
1	Plan and implement direct collection system in 2 Wards as pilot basis	SWMS/Rajesh Manander	Started		With support from the JICA Study Team	
2	Preparation of new collection plan (core areas)	SWMS/Rajesh Manander	Not started		Rescheduled to Jestha	
A-2-S1	Establishment of effective operation system of Teku transfer station					
1	Preparation of an effective operation plan of Teku transfer station	SWMS/Rajesh Manander	Started			
2	Construction and laying RCC of 1,000 sq meter	SWMS/Rajesh Manander	Completed			
3	Infrastructure for night time operation (lighting system)	SWMS/Rajesh Manander	Completed			
4	Drainage management	SWMS/Rajesh Manander	Completed			
5	Upgrading servicing situation (vehicle washing)	SWMS/Rajesh Manander	Completed			
6	Weight bridge operation	SWMS/Rajesh Manander	Completed			
A-2-S2	Plan (design), construction and operation of Balaju transfer station (including necessary revision of primary collection route)					
1	Preparation of a plan together with design of Balaju transfer station	SWMS/Rajesh Manander	Started		With support from the JICA Study Team	
2	Implementation of public consultation	SWMS/Rajesh Manander	Postponed		Rescheduled to Falgum	
3	Implementation of IEE study	SWMS/Rajesh Manander	Postponed			
A-3-S1	Renovation of existing mechanical workshop including replacement of old equipment and establishment of efficient parts stock system					
1	Renovation of mechanical workshop	MS/Purusotam Shakya	Completed		Painting and cleaning	
2	Procurement of office facilities (computer and steel racks)	MS/Purusotam Shakya	Completed			
3	Store database software package and management training	MS/Purusotam Shakya	Continued		Data entry has started	
4	Mechanics training	MS/Purusotam Shakya	Not started		Rescheduled	

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KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
B-1-S1	Cooperation with SWMRMC to proceed development of a central level WPF (50-100 t/d) at appropriate place					
1	Final site selection	SWMS/Rajesh Manandhar		Started		Together with SWMRMC
2	Site surveys	SWMS/Rajesh Manandhar		Not started		
3	Concept design	SWMS/Rajesh Manandhar		Not started		
4	Feasibility study including market study	SWMS/Rajesh Manandhar		Not started		
5	EIA	SWMS/Rajesh Manandhar		Not started		
B-2-S1	Review of the existing home and community composting and recycling activities					
1	Implementation of reviewing activities	CMU/Shriju		Completed		Reports have been prepared
B-2-S2	Production of home compost bins and home vermi-compost kits and their distribution					
1	Compost bin set distribution	CMU		Started	Delay in administrative process	Tendering process is going on. CKV experiences to be utilized.
2	Vermi-composting kits development and provision of subsidy	CMU		Continued		
3	Recycling sets for Nature Clubs	CMU		Completed		Distributed at last part of FY.
B-2-S3	Operation of Community Recycling Center (CRC) in Ward 21 and its extension to other Wards (with support from NEREPA)					
1	CRC-supporting activities	CMU		Continued		CRC is operated well & other program is onward.
2	CRC-establishment in 5 Wards	CMU		Started		
B-3-S1	Operation and expansion of medium-scale vermi-composting					
1	Operation of medium-scale vermi-composting	CMU		Continued		Labels have been developed for product sale
B-3-S2	Implementation of sales campaign together with marketing study					
1	Implementation of marketing study	CMU		Completed		Packaging and marketing under the name of "Healthy Grow"
2	Preparation and Implementation of sales campaign including review and evaluation	CMU		Not Started		Rescheduled to Chitra
C-1-S1	Operation of Sisdol sanitary landfill site					
1	Procurement of heavy equipment and vehicles (1 wheel loader, 1 supervision vehicle, 1 mobile maintenance vehicle w/ tools)	MS/Purusotam Shakya		Continued		
2	Monitoring daily LF management	SWMS/Rajesh Manandhar		Continued		
3	Extension of gas venting pipes	SWMS/Rajesh Manandhar		Continued		
4	Intermediate leachate collection	SWMS/Rajesh Manandhar		Continued		
5	Maintenance of leachate collection and treatment facilities	SWMS/Rajesh Manandhar		Continued		One time conducted
6	Building maintenance	SWMS/Rajesh Manandhar		Continued		
7	Operation of pump	SWMS/Rajesh Manandhar		Continued		
8	Vehicle and equipment hiring including rental trucks for 3 months (mid-July-end-Sept)	SWMS/Rajesh Manandhar		Completed		
9	Arrangement of fuel for equipment within the site	SWMS/Rajesh Manandhar		Continued		
C-2-S1	Conducting of survey for possible long-term landfill sites					
1	Site selection survey and public consultation	SWMS/Rajesh Manandhar		Continued		Coordination with SWMRMC

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KMC-2

KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
C-2-S2	Cooperation with SWMRMC to proceed establishment of a long-term landfill site					
1	Site surveys	SWMS/Rajesh Manandhar		Started		
2	Concept design	SWMS/Rajesh Manandhar		Not started		Coordination with SWMRMC
3	Feasibility study including market study	SWMS/Rajesh Manandhar		Not started		
4	EIA	SWMS/Rajesh Manandhar		Started		Coordination with SWMRMC
C-3-S1	Rehabilitation and landscaping works of the Bagmati (Balkhu) dumping site					
1	Planning for rehabilitation works for Balkhu	SWMS/Rajesh Manandhar		Continued		On schedule
2	Selection of contractor for rehabilitation and landscaping	SWMS/Rajesh Manandhar		Not started		Rescheduled
3	Rehabilitation works and landscaping (500-1,000m per year)	SWMS/Rajesh Manandhar		Continued		
D-1-S1	Establishment of 50 more Nature Clubs					
1	Establishment of 50 Nature Clubs	CMU/Shriju		Continued		Three new Nature Clubs have been established, 10 additional will be established.
D-1-S2	Development of training packages on					
1	Solid Waste Management, Greenery Promotion, Cultural Heritage Conservation, Communication,	CMU/Shriju		Completed		
2	Nature Club management	CMU/Shriju		Completed		
D-1-S3	Training for Nature Clubs members on the above five areas					
1	Workshop for Guide Teachers	CMU/Umesh		Completed		
2	Workshop for Principals	CMU/Umesh		Completed		
3	Workshop for Nature clubs	CMU/Umesh		Completed		
4	Handover Nature clubs	CMU/Umesh		Completed		
5	Eco-Yatra for observation visits	CMU/Shriju		Started		Two tours (Yatra) are done. Rest will be conducted in Ashad
D-1-S4	Regular interaction between Nature Clubs and local communities to reach out to society as a whole					
1	Regular interaction between Nature Clubs and local communities	CMU/Shriju		Started		5 local groups conducted
D-2-S1	Development of a database of community groups, NGOs/CBOs and private sector, and selection of the best ones for long-term work					
1	Development of a database	CMU/Shriju		Postponed	Arrangement of a computer & mobilize of city volunteers are needed.	
D-2-S2	Review and evaluation of the existing Ward Environmental Committee (WEC) and formation of active WECs in 10 Wards					
1	Review and evaluation of the existing WECs	CMU/Shriju		Completed		Concept paper preparation & meeting with 2 WECs have been done.
2	Form active WECs in 5 Wards	CMU/Shriju		Not started		Rescheduled to Ashad
D-2-S3	Provision of training on SWM and community mobilization for WECs					
1	Training for WECs	CMU/Sanu		Started		
2	Coordination and networking of WECs	CMU/Sanu		Started		
3	Conduct community cleanup	CMU/Sanu		Started		

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KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
D-2-S4	Provision of technical and financial assistance to best community initiatives of WECs					
1	Training for NGOs/CBOs	CMU/Sanu		Completed		12 trainings have been conducted.
D-2-S5	Provision of annual award to best WEC					
1	Provision of annual award	CMU/Sanu		Started		
D-3-S1	Mobilization of City Volunteers (CVs) to support BABA program					
1	Mobilization of CVs	CMU/Shriju		Started		3 days training will be done from Dec '05
D-3-S2	Implementation of closed camps for capability building and raising team spirit of each batch					
1	Capability training camp	CMU/Shriju		Started		Rescheduled
2	City Volunteers training	CMU/Shriju		Completed		
D-4-S1	Production of CMU's promotional materials (flyers, brochures, posters, stickers, etc.)					
1	Promotional materials	CMU/Shriju		Completed		
D-4-S3	Setting up of self-explanatory displays on SWM at CMU and other key locations for wider publicity					
1	Self-explanatory displays in KMC's prime location	CMU/Shriju		Completed		
D-4-S4	Regular featuring and reporting on SWM on TV program "Hamro Kathmandu"					
1	Radio Jingles	CMU/Shriju		Continued		Covers in KMC's TV program every month.
2	Media Promotion	CMU/Shriju		Continued		ditto
D-4-S5	Design and maintenance of the web page on SWM					
1	Web page design	CMU/Shriju		Postponed		
2	Web page maintenance	CMU/Shriju		Postponed		
D-4-S6	Implementation of community exhibition and event regularly					
1	Community Exhibition on Environment and Earth day	CMU/Shriju		Not started		
D-5-S1	Recruiting of a BABA coordinator					
1	Recruiting of a BABA coordinator	CMU/Shriju		Postponed	Not on KMC priority	
D-5-S2	Recruiting of assistant level staff for administration					
1	Recruiting of assistant level staff for administration	CMU/Shriju		Postponed	Not on KMC priority	
E-1-S1	Implementation of the reorganization plan of the Environment Department					
1	Obtain approval from the Municipal Board/ Council on the new organization structure	Environment Dept./Mr.Indraman		Started		Submitted to KMC for approval
2	Conducting of sharing session to disseminate information about the new organization structure	Environment Dept./Mr.Indraman		Not started	New organization structure is not approved yet officially	
E-2-S1	Establishment of a monitoring and evaluation system in alignment with the Action Plan					
1	Preparation of plan of operation of monitoring and evaluation	SWMS/Rajesh Manandhar		Continued		
2	Conducting of monitoring and review of the Annual Work Plan	Environment Dept./Mr.Indraman		Started		1st monitoring is going on
3	Formulation of Annual Work Plan of FY2063/64	Environment Dept./Mr.Indraman		Not started		Will be done in Falgun

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KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
E-2-S2	Mainstreaming of program-based budgeting system and expenditure monitoring for a more efficient use of resources					
1	Conducting of expenditure monitoring of the Annual Work Plan	Environment Dept./Mr.Indraman		Started		
2	Formulation of program-based budget of FY2063/64	Environment Dept./Mr.Indraman		Not started		Will be done in Falgun
E-2-S3	Improvement of information flow and management by encouraging regular coordination meetings and sharing of experiences					
1	Implementation of regular coordination meetings	Environment Dept./Mr.Indraman		Started		
E-2-S4	Introduction of systematic collection and analysis of SW data by database					
1	Waste record database	SWMS/Robert		Completed		
2	Budget database	SWMS/Robert		Not started		Rescheduled
3	Store database	SWMS/Robert		Started		
E-3-S1	Preparation of TORs for each unit delineating tasks and responsibilities to be undertaken during Action Plan implementation					
1	Review of existing tasks and responsibilities of each unit	SWMS/Rajesh Manandhar		Postponed		
2	Series of meetings among related units	SWMS/Rajesh Manandhar		Postponed		
3	Preparation of TORs for each unit	SWMS/Rajesh Manandhar		Postponed		
E-3-S2	Reassignment of necessary staff (Taking into consideration future resource demands such as for facilities development)					
1	Development of reassignment plan	SWMS/Rajesh Manandhar		Continued		
2	Reassignment of necessary staff	SWMS/Rajesh Manandhar		Continued		
E-4-S1	Development of a staffing plan based on HRD program and its application					
1	Development of a staffing plan	Environment Dept./Mr.Indraman		Not started		
E-4-S2	Assignment of a Learning Manager for HRD and maintain an inventory of staff skills and knowledge, training history					
1	Assignment of a learning manager	SWMS/Rajesh Manandhar		Not started		
2	Development of database	SWMS/Rajesh Manandhar		Continued		
3	Collection of necessary data from each staff	SWMS/Rajesh Manandhar		Postponed		
E-4-S3	Strengthening of knowledge-sharing mechanism and peer-training sessions for full utilization of existing human resources					
1	Development of plan of knowledge-sharing mechanism and peer-training sessions	SWMS/Rajesh Manandhar		Not started		
2	Implementation of knowledge-sharing meeting and peer-training session	SWMS/Rajesh Manandhar		Not started		
F-1-S1	Dissemination of Medical Waste Management Guidelines					
1	Obtain of official approval from the municipal board on the Medical Waste Management Guidelines	SWMS/Rajesh Manandhar		Started		Guideline is not approved yet
2	Planning of medical waste management system	SWMS/Rajesh Manandhar		Started		
F-1-S2	Operation of a medical waste treatment facility at Teku					
1	Public consultation	SWMS/Rajesh Manandhar		Started		
2	Conducting a test run	SWMS/Rajesh Manandhar		Completed		

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KMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/2063	Responsible Person (Department, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
F-1-S3	Procurement of additional equipment (auto.clave)					
1	Procurement of an auto.clave	SWMS/Rajesh Manandhar		Started		Request to the other sources
F-1-S4	Training for staff of KMC, private sector, and medical institutions					
1	Training for KMC staff operators	SWMS/Rajesh Manandhar		Postponed		
2	Training for health care staff by national dental hospital (USAID funds)	SWMS/Rajesh Manandhar		Continued		
F-3-S1	Review of working conditions of the sweeper population and provision of measures to improve their performance.					
1	Establishment of a day care center	SWMS/Rajesh Manandhar		Postponed		
2	Provision of health care services to sweeper population and their children (supported by World Vision)	SWMS/Rajesh Manandhar		Postponed	Due to delay in signing process	

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LSMC: Progress of Annual Work Plan of FY 2062/63 (As of February 2006)

SN	Short-term Activities to be Conducted in FY 2062/63	Responsible Person (Division, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
A-1-S1	Review of existing policy of LSMC and establishment of strong bylaws (and rules) interacting with all stakeholders and its publication					
1	Study of private sector involvement in SWM and paying system	ES/Pradeep Amatya	50,000	Not started		Rescheduled
A-1-S2	Preparation of standard TOR and agreement for PPP concept					
1	Preparation of individual agreement for PPP with the existing private sector who are presently involved the waste collection services.	TDD/Prabin Shrestha	-	Started		Discussion started with community of W. No 3
2	Review meeting with private operators	TDD/Prabin Shrestha		Started		
3	Preparation of PPP operation guideline in SWM	TDD/Prabin Shrestha	-	Not started		Discussion at individual level
4	Signing on the agreement in 4 wards	TDD/Prabin Shrestha		Not started		Rescheduled
A-1-S3	Introduction of a new pilot project for waste collection from shops by private sector					
1	Rikshaw collection system - 6 rikshaws	ES/Pradeep Amatya	90,000	Completed		Purchase order issued
2	Distribution of buckets	ES/Pradeep Amatya	-	Postponed		
3	Increase handcarts	ES/Pradeep Amatya	-	Canceled		Rickshaw takes place instead
A-1-S4	Newly introduction of door to door collection for 25% houses at the outside the city core area by private sector					
1	Develop networking system with private partners	TDD/Prabin Shrestha	-	Postponed		
2	Set up the target area and its introduction schedule (Preparation of planning report)	ES/Pradeep Amatya		Started		Discussion is on going in Wards Nos 2 and 3.
A-2-S1	Implementation of Time and Motion study					
1	Computer training for 5 staffs	ES/Pradeep Amatya	30,000	Not started	Budget for 2 staff	Rescheduled to Chitra
2	Detail Time and Motion survey of all existing routes	ES/Pradeep Amatya	-	Postponed		
3	Preparation of survey report	ES/Pradeep Amatya	-	Postponed		
4	Improve collection route and street cleaning activities based on the report	ES/Pradeep Amatya		Postponed		
A-2-S2	Introduction of new collection routes					
1	Improvement of collection routes and collection points by using GIS Map and GPS	ES/Pradeep Amatya		Started		
2	Development of backup system of the collection route	ES/Pradeep Amatya		Postponed		
A-2-S3	Implementation of transportation and maintenance cost analysis					
1	Implementation of cost analysis	ES/Pradeep Amatya		Started		In planning phase
A-2-S4	Implementation of vehicle capacity analysis and plan for procurement of new vehicles					
1	Capacity analysis	ES/Pradeep Amatya		Postponed		
2	Preparation of procurement plan	ES/Pradeep Amatya		Postponed		
A-3-S1	Arrangement for a temporary transfer station (in Afadole) and commencement of temporary transferring					
1	30 days notification for the preparation of T/S	PWD/Rudra Gautam		Not started		
2	Public consultation meetings	PWD/Rudra Gautam		Started		Key persons list preparing process
3	Hire consultants for IEE	PWD/Rudra Gautam		Not started		Rescheduled
4	Hire a supervisor for topography survey	PWD/Rudra Gautam	432,000	Completed		With support from the JICA Study Team

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LSMC: Progress of Annual Work Plan of FY 2062/63 (As of February 2006)

SN	Short-term Activities to be Conducted in FY 2062/63	Responsible Person (Division, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
5	Prepare a concept plan	PWD/Rudra Gautam		Completed		ditto
6	Detail design, estimate and drawings	PWD/Rudra Gautam		Not started		Rescheduled
7	Arrangement of budget for the construction in next fiscal year	PWD/Rudra Gautam		Not started		
B-1-S1	Cooperation with SWMRMC and KMC for development of WPF					
1	Concept plan preparation	PWD/Rudra Gautam	-	Not started		Due to delay of the initiated by SWMRMC
2	Candidate site investigation	PWD/Rudra Gautam	-	Started		
3	Research previous reports and data	PWD/Rudra Gautam	-	Not started		
4	Prepare site selection criteria, list up potential sites, field visit, preparation of report and public discussion/meetings	PWD/Rudra Gautam	-	Not started		
B-2-S1	Distribution of 1,200 home composting bins					
1	Procurement of compost bins	PWD/Rudra Gautam	360,000	Started		80 bins have been procured
2	One day training on home compost bin for community and 100 municipal staff	CDS/Sabina	175,000	Not started		Rescheduled to Falgun
3	Follow-up household composting program by hiring motivators and resource persons	ES/Pradeep Amatya	36,000	Started		
4	Survey report preparation	ES/Pradeep Amatya	-	Started		
5	Procurement of vermi-composting kits	CDS/Sabina	200,000	Not started		Rescheduled
6	Two days training on vermi-composting	ES/Sabina		Not started		Rescheduled
7	Follow-up of vermi-composting	ES/Pradeep Amatya		Not started		On schedule
8	Survey report preparation	ES/Pradeep Amatya		Not started		On schedule
B-3-S1	Promotion of 3Rs practices by local people					
1	Plastic separation	CDS/Sabina		Continued		
2	Paper recycling	CDS/Sabina		Postponed		
3	Introduction of cotton bags	CDS/Sabina	50,000	Not started		On schedule
4	Support to introduce second hand shop	CDS/Sabina		Not started		On schedule
C-1-S1	Operation of Sisdol SF with KMC					
1	Dispatch staff and loader	ES/Pradeep Amatya		Completed		
2	Regular visit to Sisdol LF operation	ES/Pradeep Amatya	500,000	Continued		
C-1-S2	Cooperation with SWMRMC and KMC for development of a long term landfill site					
1	Site surveys	PWD/Rudra Gautam		Completed		
2	Concept design	PWD/Rudra Gautam		Not started		
3	Feasibility study and market study	PWD/Rudra Gautam		Not started		
4	EIA	PWD/Rudra Gautam		Not started		
C-1-S3	Closure of Bagmati dumping site					
1	Closure works in cooperation with KMC	ES/Pradeep Amatya		Started		Mud filling is going on
D-1-S1	Implementation of public awareness/education activities					
1	Implementation of exhibition as Public Event (1 time)	CDS/Sabina	100,000	Not started		On schedule
2	Implementation of wall painting as Public Event	ES/Prabin Shrestha	50,000	Not started		Rescheduled
3	Clean up campaign (provision of materials) before Earth Day	CDS/Sabina	50,000	Not started		On schedule
4	Rally for celebrating Environment Day	CDS/Sabina		Not started		On schedule
5	Award Ceremony on Earth Day	CDS/Sabina	25,000	Not started		On schedule

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LSMC: Progress of Annual Work Plan of FY 2062/63 (As of February 2006)

SN	Short-term Activities to be Conducted in FY 2062/63	Responsible Person (Division, Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
D-2-S1	Formation and mobilization of Ward Environment Conservation Committee (WECC) on a pilot basis					
1	Identification of pilot wards	CDS/Sabina		Completed		Wards Nos 5 and 20
2	One-day training for selected members (about 15 people) of pilot wards	CDS/Sabina	15,000	Not started		Rescheduled
3	Formulation of WECC by providing seed money	CDS/Sabina		Not started		Rescheduled
D-2-S2	Formation and mobilization of Nature/Eco Clubs among children					
1	Workshop for target school teachers (5 schools*2 people+10 staffs)	CDS/Sabina	15,000	Started		
2	Camp for target school students and form Nature/Eco Clubs (3-day)	CDS/Sabina	60,000	Not started		Rescheduled
3	Support of Nature/Eco Clubs by providing seed money	CDS/Sabina	25,000	Not started		Rescheduled
4	Various activities (competition, clean up, field visit, capacity building training)	CDS/Sabina	20,000	Not started		On schedule
D-2-S3	Mobilization of youth as City Volunteers (CVs)					
1	Sharing program with KMC twice a year	CDS/Sabina	-	Not started		Rescheduled
2	Refresher training (2 day training)	CDS/Sabina	-	Started		12 volunteers selected
3	Regular monthly meetings	CDS/Sabina	-	Started		2 meetings conducted
D-2-S4	Strengthening of women groups for SWM					
1	One month training on reuse/recycling (30 people)	CDS/Sabina	40,000	Not started		
E-1-S1	Plan for HRD and monitoring including municipal staff/NGOs/CBOs/TLOs					
1	Development of HRD plan for SWM	Task Force	-	Not started	It should be a part of municipal HRD plan	Better to prepare municipal HRD plan
E-2-S1	Announcement of SWM overall yearly plan of LSMC at beginning of each fiscal year					
1	Annual workplan monitoring	Task Force	-	Continued		1st monitoring completed
2	Mid-term Review	Task Force		Not started		On schedule
3	Annual Workplan Evaluation	Task Force		Not started		On schedule
4	Annual Workplan Formulation for FY2063	Task Force		Not started		On schedule
5	Annual SWM Budget Formulation for FY2063	Task Force		Not started		On schedule
E-3-S1	Review of SWM organization (Environment Dept.) and appoint responsible persons as focal points to coordinate all dimensions of SWM with motivating environment					
1	Review of SWM organization (Environment Dept.) and appoint responsible persons	CEO		Not started		
E-5-S1	Collection and arrangement of solid waste data in database					
1	Waste quantity & quality survey (Wet season)	ES/Pradeep Amatya	-	Started		Daily report is preparing but yet to be compiled
2	Waste quantity & quality survey (Dry season)	ES/Pradeep Amatya	-	Postponed		On schedule
3	Input of solid waste data to database	ES/Pradeep Amatya		Not started		On schedule
4	Establishment of reporting system	ES/Pradeep Amatya		Not started		Rescheduled
			Total	2,323,000		

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BKM: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

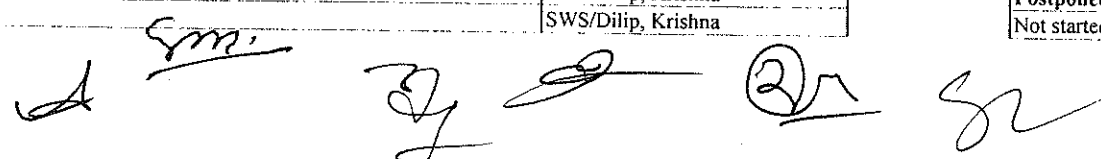
SN	Short-Term Activities to be Conducted in FY 2062/63	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks	
A-1-S1	Procurement of Garbage Tipper and Tricycles						
1	Procurement of Tricycles - 5 nos	PPWS/Dinesh	NRs 100, 000 is proposed in draft budget to implement AWP.	Postponed	Budget is not approved		
2	Procurement of 1.5 m3 capacity small garbage Tipper - 2 nos	PPWS/Dinesh		Postponed			
A-2-S1	Promotion of source separation and collection of organic kitchen waste by formulating users groups at local household level		But the municipal council has authority to change the budget.				
1	Planning of source separated collection system	PPWS/Dinesh, SWS/Moti		Continued		Pilot project in W No 14 and 17	
2	Explanation to the public	PPWS/Dinesh, SWS/Moti		Started		Explanation materials have been prepared.	
3	Selection of model areas and preparation (distribute buckets)	PPWS/Dinesh, SWS/Moti		Not started		Rescheduled	
4	Implementation of collection	PPWS/Dinesh, SWS/Moti		Not started		On schedule	
5	Evaluation	PPWS/Dinesh, SWS/Moti		Not started		On schedule	
A-2-S2	Promotion of source separation and collection from hotels and restaurants						
1	Preparation of a plan	PPWS/Dinesh, SWS/Moti		Not started		Rescheduled	
2	Explanation to the concerned hotels, restaurants and stakeholders	PPWS/Dinesh, SWS/Moti		Not started		Rescheduled	
3	Preparatory works for collection	PPWS/Dinesh, SWS/Moti		Not started		Rescheduled	
4	Implementation of activities	PPWS/Dinesh, SWS/Moti	Not started		On schedule		
5	Evaluation and preparation for further planning	PPWS/Dinesh, SWS/Moti	Not started		On schedule		
B-1-S1	Procurement of a 10 t/d capacity excavator or backhoe loader, and waste sorting device						
1	Study of market for mini excavator	PPWS/Dinesh		Postponed	Budget is not approved		
2	Finalization of type of excavator	PPWS/Dinesh		Postponed		ditto	
3	Procurement of excavator	PPWS/Laxman		Postponed		ditto	
4	Operation of excavator	PPWS/(TBN)		Postponed		ditto	
B-1-S2	Land acquisition of extension area						
1	Preparation of plan	PPWS/Laxman		Not started			
2	Land acquisition	PPWS/Laxman		Not started			
B-1-S3	Infrastructure development (open trussed shade, garage, parking area, weighbridge, sorting area, screening area, etc.)						
1	Design and estimate for shade	PPWS/Laxman		Not started		Rescheduled	
2	Construction of shade	PPWS/Laxman		Postponed	Budget is not approved		
3	Operation of shade for composting and recycling	PPWS/(TBN)		Postponed		ditto	
4	Establishment of non recyclable materials disposal mechanism	PPWS/(TBN)		Postponed		ditto	
B-2-S1	Promotion of waste minimization by making people well known with various methods of waste reduction at sources (e.g.. home compost bins and vermi-composting, gift and educational training tools for school children from waste)						
1	Preparation for source separation	PPWS/Dinesh		Not started		Rescheduled	
2	700 no of bags procurement and distribution	PPWS/Dinesh		Not started		Rescheduled	
3	Organizing of core group	PPWS/Dinesh		Not started		Rescheduled	
4	Operation of source separation	PPWS/Dinesh		Not started		On schedule	

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BKM: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-Term Activities to be Conducted in FY 2062/63	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
C-1-S1	Topographical survey and soil investigation					
1	Preliminary studies (topographical survey, soil survey)	PPWS/Laxman, Dinesh		Postponed		Previous study report will be used
C-1-S2	Completion of EIA procedure					
1	Completion of EIA procedure	PPWS/Laxman, Dinesh		Continued		Scoping report was approved
C-3-S1	Establishment of local committee for social consensus for the development of the site					
1	Interaction program with local people	PPWS/Laxman, Dinesh, SWS/Moti		Not started	Due to opposition of local people	Rescheduled
2	Interaction program with media	PPWS/Laxman, Dinesh, SWS/Moti		Not started		Rescheduled
3	Interaction program with DDC, MTM, VDCs, SWMRMC, MOLD	PPWS/Laxman, Dinesh, SWS/Moti		Not started		Rescheduled
4	Demarcation of the boundary	PPWS/Laxman, Dinesh		Not started		
5	Formation of a basket fund	PPWS/Laxman, Dinesh		Not started	Budget is to be allocated by HMG	
6	Notification	PPWS/Laxman, Dinesh		Not started		
D-1-S1	Development of training tools/materials for community participation					
1	Drafting and design of flex and OHP sheets	SWS/Dilip, Krishna		Not started		Rescheduled
2	Production of OHP sheets	SWS/Dilip, Krishna		Not started		
3	Procurement of OHP	SWS/Dilip, Krishna		Canceled	OPH of Khopa Collage can be used	
D-1-S2	Dissemination of information regarding SWM inclusive collection system (leaflets, brochures, calendars, advertisements in halls before starting of film show)					
1	Follow-up programs for house wives in Ward no. 14, 15 and 17 (4 times)	SWS/Dilip, Krishna		Not started		On schedule
2	School based orientation program	SWS/Dilip, Krishna		Postponed	Budget is not approved	
D-1-S3	Implementation of mass communication and education program (distribution of stickers & posters, drama play, competition among children group-drama, original stage drama during Gaijatra festival, drawing wall paintings, cleansing at the local community)					
1	Publication of promotional materials	SWS/Dilip, Krishna		Not started		On schedule
2	Cleanup campaign	SWS/Dilip, Krishna		Postponed	Budget is not approved	
3	Drawing competition	SWS/Dilip, Krishna		Postponed	Budget is not approved	
4	Essay competition	SWS/Dilip, Krishna		Postponed	Budget is not approved	
5	Drama	SWS/Dilip, Krishna		Postponed	Budget is not approved	
6	Award program	SWS/Dilip, Krishna		Postponed	Budget is not approved	
7	Rally	SWS/Dilip, Krishna		Not started		On schedule

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BKM: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-Term Activities to be Conducted in FY 2062/63	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
D-2-S1	Promotion of Interpersonal Communication and Education program with arrangement of agreement with NGO such as selection of target communities, orientation workshop, baseline information survey in regard to existing knowledge, attitude & practices on SWM,					
1	Promotion of waste minimization by making people well known with various methods of waste reduction at sources			Not started		Rescheduled
1a	Refresher training on composting	SWS/Dilip, Krishna		Not started		Rescheduled
1b	Reuse training	SWS/Dilip, Krishna		Not started		Rescheduled
2	Expansion of Nature Clubs			Not started		Rescheduled
2a	Follow-up meetings with existing Nature Clubs	SWS/Dilip, Krishna		Not started		Rescheduled
2b	Follow-up activities for existing Nature Clubs	SWS/Dilip, Krishna		Not started		Rescheduled
2c	Workshop for target school teachers	SWS/Dilip, Krishna		Not started		Rescheduled
2d	Training for target school children and from 5 Nature Clubs	SWS/Dilip, Krishna		Not started		Rescheduled
2e	Provide seed money and stationary for 5 Nature Clubs to conduct activities (Rs 2,000 for seed money and Rs 500 for stationary)	SWS/Dilip, Krishna		Postponed	Budget is not approved	
2f	Field visit (2 times with vehicles: 2 groups, 3 times without vehicles: 2 groups)	SWS/Dilip, Krishna		Postponed	Budget is not approved	
E-1-S1	Implementation of training on SWM based on the TNA					
1	Conduct training program as TNA	PPWS/Laxman		Not started		On schedule
E-1-S2	Finalization of organizational restructuring for SWM					
1	Establishment of Environment Section	CEO		Completed		
2	Transfer of staff	CEO		Continued		
3	Provide TOR to the staff	CEO		Completed		
4	Physical improvement	CEO		Continued		
5	Approve Task Force TOR	CEO		Completed		
6	Drafting SWM guideline (By laws)	Environmental Sec./(TBN)		Postponed	Budget is not approved	
E-2-S1	Collection of relating data for SWM					
1	Collection of relating data for SWM	ES/(TBN)		Started		
E-2-S2	Arrangement of the collected data in the database					
1	Arrangement of the collected data in the database	ES/(TBN)		Started		

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MTM: Progress of Annual Work Plan of FY 2062/63 (As of February 2006)

SN	Short-term Activities to be Conducted in FY2005/06 (2062/63)	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
A-1-S1	Procurement of collection vehicle (s) and assignment of a driver, collectors and loaders					
1	Arrangement of collection vehicle	PTS/Satya	In total NRs 1,500, 000 is allocated in budget for SWM activities. But there is unallocated budget, which can be utilized in SWM activities.	Continued		Municipality has been waiting for a collection vehicle to be provided from KMC
2	Arrangement of collectors with collection equipment	PTS/Satya		Continued		
A-2-S1	Setting "depo (s)" at new collection areas					
1	Preparation of a plan of depo(s) for collection/transfer	PTS/Satya		Started		
2	Public meeting/consultation with local people to discuss the depo development plan	PTS/Satya		Started		Initial meeting was held
3	Preparation of design drawing of depo(s) including topo/geological surveys	PTS/Satya		Not started		On schedule
4	Tender for construction	PTS/Satya		Postponed		
5	Construction of depo(s)	PTS/Satya		Postponed	Lack of manpower and vehicle	
6	Preparation of operation plan of depo(s) and review	PTS/Satya		Postponed		
7	Operation of depo(s)	PTS/Satya		Postponed		
A-3-S1	Preparation of guidelines for private sector collection					
1	Review of the established general rules of PPP	CDSS/Tulsi		Completed		PPP guideline is prepared
2	Clarification of the existing private collection in Wards 15, 16, and 17	CDSS/Tulsi		Completed		Four groups are working as private collectors
3	Preparation of own guidelines of MTM for private sector collection	CDSS/Tulsi		Started		On discussion phase
4	Preparation of individual agreement paper for PPP with the existing private sector	CDSS/Tulsi		Started		On discussion phase
5	Signing on the agreements	CDSS/Tulsi		Not started		Rescheduled
6	Monitoring of private sector activity	CDSS/Tulsi		Continued		
B-2-S1	Providing of bags and metal strings (suiros) for separation at source					
1	Expansion of plastic recycling (50 bags, 50 strings, etc.)	CDSS/Tulsi		Not started		Rescheduled to Baishak
2	Training for community (2 groups)	CDSS/Tulsi		Not started		Rescheduled to Chitra
B-3-S2	Operating community composting					
1	Conducting a study for composting chamber operation	CDSS/Tulsi		Not started	Lack of fund for operation	Discussion is going on for privatization
2	Trial of operation of composting chamber	CDSS/Tulsi		Not started	Lack of fund for operation	
C-1-S1	Identification and arrangement of a temporary landfill site					
1	Nominating candidates, public consultation and site selection	PTS/Satya		Started		Shdhikali is identified
2	Preliminary engineering survey, pre feasibility study and design	PTS/Satya		Not started		On schedule
3	Land preparation work	PTS/Satya		Not started		On schedule
C-2-S1	Conclusion of agreement with BKM for development and utilization of Taikabu LF					
1	Cooperation and support to BKM/SWMRMC	PTS/Satya, LS/Siva		Continued		Seeking alternative LFS instead of Taikabu

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MTM: Progress of Annual Work Plan of FY 2062/63 (As of February 2006)

SN	Short-term Activities to be Conducted in FY2005/06 (2062/63)	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
D-1-S1	Raising of public awareness through local radio (FM) and miking					
1	Broadcasting on local FM on SWM	CDSS/Tulsi		Continued		
2	Miking regarding SWM	CDSS/Tulsi		Continued		
D-1-S2	Implementation of public events					
1	SWM exhibition (1time for 2 days)	CDSS/Tulsi, Krishna		Not started		To be held on Earth Day
D-2-S1	Development of training tools and promotion materials for community participation					
1	Development of training tools and promotion materials	CDSS/Krishna		Not started		Reschedule
D-2-S2	Formation and mobilization of Eco/Nature Clubs at schools					
1	Four Eco-clubs formation and mobilization with training and fund	CDSS/Krishna		Not started		Will be started very soon
D-2-S3	Formation and mobilization and skills development of community groups for SWM					
1	Household reuse training (2times, 5days)	CDSS/Tulsi		Not started		Rescheduled
2	Community group interaction and feedback collection	CDSS/Tulsi		Not started		On schedule
3	Community groups formation, mobilization and partnership	CDSS/Tulsi		Continued		On schedule
4	Refresher training on SWM for existing groups 10days one time	CDSS/Tulsi		Not started		Rescheduled
D-2-S4	Implementation of community-based clean up program					
1	Clean up program (4 times)	CDSS/Tulsi		Started		
2	Temple and monuments cleaning by mobilizing community and students (3 times)	CDSS/Tulsi		Not started		On schedule
3	Municipal area cleaning works	CDSS/Tulsi		Continued		
D-2-S5	Mobilization of youth as city volunteers for SWM					
1	Selection of 17 city volunteers (to be assigned to each ward)	CDSS/Tulsi		Not started		Rescheduled
2	Three-day camp	CDSS/Tulsi		Not started		Rescheduled
3	Regular activities including meeting	CDSS/Tulsi		Not started		
E-1-S1	Strengthening of SWM Sub-section					
1	Review job descriptions and implement assignments	CEO		Started		Draft JD prepared
E-2-S1	Collection of relating data for SWM					
1	Collection of relating data for SWM	PTS/Satya		Continued		
E-2-S2	Arrangement of the collected data in the database					
1	Arrangement of the collected data in the database	PTS/Satya		Started		On schedule

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KRM: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY2005/06 (2062/63)	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of deviation	Remarks
A-1-S1	Preparation of agreements with private sector (NGOs/CBOs) and conclusion of the contracts (up to two parties)					
1	Review & examine previous agreements and establishment of general rules/guideline	PTS/Bal, SWMU/Anuj, Gyan	In total NRs 700, 000 is approved by the council to implement SWM activities	Completed		
2	Preparation of individual agreement for PPP	PTS/Bal, SWMU/Anuj, Gyan		Completed		
3	Conduct meeting with the potential private operators for identifying zoning areas	PTS/Bal, SWMU/Anuj, Gyan		Completed		
4	Call for the proposal including their planning and work	PTS/Bal, SWMU/Anuj, Gyan		Completed		
5	Review and analysis of proposal and locating sites for collection	PTS/Bal, SWMU/Anuj, Gyan		Not started	Due to delay of tender process	Rescheduled to Chitra
6	Signing on the agreement & contracting the work for SWM services	PTS/Bal, SWMU/Anuj, Gyan		Not started	Ditto	Ditto
7	Monitoring of performance of private activities	PTS/Bal, SWMU/Anuj, Gyan		Continued		
B-1-S1	Selection and arrangement of land for a composting facility					
1	Discussion with NGOs for development of a composting facility	PTS/Bal, SWMU/Anuj, Gyan		Started		Composting site had been decided at the Bagmati River and other candidate sites have been discussed
B-2-S1	Promotion of home composting program (by providing bins, bags)					
1	Planning of extension	SWMU/Gyan		Completed		Ward Nos 2 and 6 have been decided for extension
2	Preparation plan for three trainings	SWMU/Gyan		Started		Training will be conducted in Chitra
3	Development of O&M plan	SWMU/Gyan		Completed		
4	Distribution of 25 bins, 150 bags and 150 suiros	SWMU/Gyan		Started		70 suiros have been distributed
5	Evaluation and improvement	SWMU/Gyan		Started		
B-3-S1	Continuous implementation of separated collection of plastic bags (by providing wires (suiros), etc.)					
1	Agreement with "Kawadi" for plastic collection	SWMU/Anuj, Gyan		Started		Discussion with local Kawadi is going on
2	Planning of extension of collection areas	SWMU/Gyan		Not started	Due to delay of agreement with Kawadi	
3	Operation of a plastic store house	SWMU/Gyan		Continued		
4	Evaluation and improvement	SWMU/Gyan		Not started		On schedule
C-1-S1	Coordination with KMC for utilization of Teku T/S					
1	Conclusion of agreement with KMC for Teku T/S	CEO		Started		Verbal agreement to use Teku T/S
2	Classification of waste quality (Data analysis)	PTS/Bal		Not started		Rescheduled to Ashad
3	Discussion with KMC on duty demarcation and cost sharing	PTS/Bal		Started		Verbal agreement with KMC to Teku T/S without cost in return of Bagmati LFS
4	Discussion with private sector and NGOs on the manner to transport wastes to Teku T/S	PTS/Bal		Started		To be completed in Chitra
5	Procurement of necessary equipment and facilities	PTS/Bal		Canceled	Budget is not approved	Private sector will do the activities instead

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KRM: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY2005/06 (2062/63)	Responsible Person (Section)	Approved Budget (NRs)	Status	Reasons of deviation	Remarks
D-1-S1	Implementation of education program of SWM for school children and households (by promoting home composting, plastic bag separation, etc.)					
1	Collection of school level training demand	SWMU/Anuj		Not started		Rescheduled
2	Conduct 10 training on SWM	SWMU/Anuj		Not started		On schedule
3	Identify and form 5 new groups	SWMU/Anuj		Not started		On schedule
4	Train 5 newly formed groups	SWMU/Anuj		Not started		On schedule
5	Exhibition	SWMU/Anuj		Not started		On schedule
6	Clean up campaign	SWMU/Anuj		Completed		Two campaigns have completed
7	Formation of 10 Nature Clubs	SWMU/Anuj		Not started		On schedule
E-1-S1	Establishment of a section (unit) on SWM					
1	Final approval of TOR and implementation	CEO		Completed		
2	Strengthen SWM Unit (staff selection, provision of physical facilities)	Account Sec/(TBN)		Completed		
E-2-S1	Implementation of staff training on SWM and other related skills					
1	HRD Plan (training on SWM & other skill)	PTS/Bal		Started		Field visit to other municipalities
2	Prepare Annual Work Plan for the coming year	Municipal board/TF		Not started		On schedule
E-3-S1	Collection of related data for SWM from private sector					
1	Arrangement of the collected data collection from private sector	PTS/Bal		Completed		Detail data has been collected
E-2-S2	Arrangement of the collected data in the database					
1	Arrangement of the collected data in the database	PTS/British		Started		
F-1-S1	Coordination with SWMRMC, neighboring municipalities and NGOs/CBOs					
1	Coordination with SWMRMC, neighboring municipalities and NGOs/CBOs	CEO, Task Force		Started		

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SWMRMC: Progress of Annual Work Plan of FY 2062/63 (As of February 28, 2006)

SN	Short-term Activities to be Conducted in FY 2062/63	Responsible Person	Approved Budget (NRs)	Status	Reasons of Deviation	Remarks
S1	Clarification of demarcation between SWMRMC and Local Bodies by issuing a new policy and amendment of the Solid Waste Act	Ashok Shahi	100,000	Started		Legal expert will be assigned and a draft report has been prepared.
S2	Clarification of legal status and change of jurisdictional area by amendment of the Act	Ashok Shahi		Started		
S3	Establishment of a strategic plan for SWMRMC (future organizational and institutional development plan)	Ashok Shahi	-	Not started		
S7	Implementation of Public Relations (PRs) activities (management of web-site and issue of newsletter, etc.)	Nirmal Acharya	100,000	Started		
S1	Development of Sisdol Short-term LF					
S1-1	Development of Sisdol LF Valley 2	Ram Sharan Maharjan	13,200,000	Started		Tender evaluation process has started.
S1-2	Handover Valley 2 to operator	Ashok Shahi	-	Not started		
S1-3	Periodic environmental monitoring	Nirmal Acharya	300,000	Started		Members of Environmental Coordination Committee has been nominated.
S2	Development of Waste Processing Facility (KMC, LSMC, KRM)		to be allocated			
S2-1	Land selection	Ashok Shahi		Started		Discussions with local people for the candidate site has started.
S2-2	Site investigation works	Ashok Shahi		Not started		
S2-3	Land acquisition	Ashok Shahi		Not started		
S2-4	Concept design and feasibility study	Ashok Shahi		Not started		
S2-5	EIA process	Nirmal Acharya		Not started		
S3	Development of Long-term LF (KMC, LSMC, KRM)					
S3-1	Construction of access road	Ram Sharan Maharjan	5,000,000	Started		
S3-2	Identification of the capacity and service areas	Ram Sharan Maharjan	-	Started		
S3-3	Site investigation works	Ram Sharan Maharjan	-	Started		
S3-4	Land acquisition	Ram Sharan Maharjan	-	Not started		
S3-5	Concept design	Ram Sharan Maharjan	-	Not started		
S3-6	EIA process	Nirmal Acharya	900,000	Started		Scoping report and TOR for EIA has been approved by MOEST
S4	Development of Long-term LF (BKM, MTM)					
S4-1	Site investigation works (EIA, Topography survey, Soil investigation)	Topa Ram Acharya	2,000,000	Not started	Opposition of local people	Meetings with local people will be held
S5	Closure of Bagmati River dumping site		17,000,000			
S5-1	Design of Bagmati River dumping site closure plan	Ram Sharan Maharjan		Not started		NRs 900,000 has been spend
S5-2	Implementation of Bagmati closure plan	Ram Sharan Maharjan		Not started		

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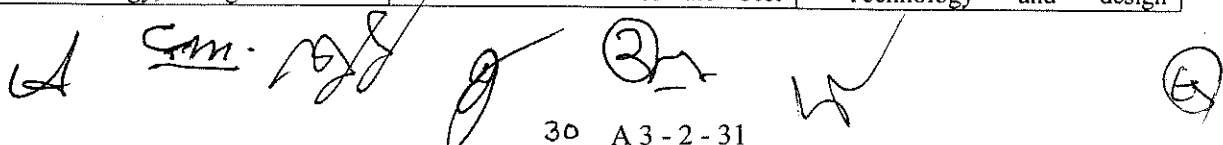
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Appendix-3: Planned Demarcation of EIA Study between the Nepalese Side and the Study Team

Scope of Work	Descriptions (To be done by SWMRMC)	Support from the Study Team as Follow-up
I. Introduction		
1. Policy, Laws and Institution 2. Site Description 3. Project Description <ul style="list-style-type: none"> ▪ Site selection ▪ Concept design 	<ul style="list-style-type: none"> ▪ Collection and arrangement of secondary data and information ▪ Obtaining basic consensus of the project design among the stakeholders 	<ul style="list-style-type: none"> ▪ Site selection in the Study including <i>No Action</i> option ▪ Concept design
II Baseline Environmental Conditions		
1. Physical Environment 2. Biological Environment 3. Socio-economic and Cultural Environment	<ul style="list-style-type: none"> ▪ Collection and arrangement of secondary data and information ▪ Documentation of baseline environmental condition 	<ul style="list-style-type: none"> ▪ Topography survey ▪ Geological study ▪ Soil investigation survey ▪ Hydrological survey ▪ Water quality survey (surface water, ground water)
III. Environmental Impact Assessment		
1. Physical Issues 1.1 Construction Stage <ul style="list-style-type: none"> ▪ Landscape disturbance, land stability, landslide, soil erosion, etc, due to topographic change ▪ Change in air quality due to dust and exhaust emission, change in water quality due to civil/concreting works sedimentation, and noise level ▪ Location and operation of quarries and borrow pits ▪ Drainage alteration and associated erosion and sediment; hydraulic change and river bank protection due to river diversion works ▪ Safety measures 	<ul style="list-style-type: none"> ▪ Assessment of the physical, biological, socio-economic and cultural impacts on the environment by using standard methods and techniques. ▪ In particular, quantitative assessment of likely impacts, taking into consideration lessons learned from the Sisdol Landfill Site; both during the construction and operational stages. ▪ Documentation of impact assessment using appropriate symbols and definitions with details of the impacts including nature, magnitude (site specific, local, regional), extent and duration (short term, mid term, long term). 	<ul style="list-style-type: none"> ▪ Geological study ▪ Hydrological study of the river diversion including supplemental survey on the land use of the down stream and river works ▪ Other necessary measures to be examined as part of concept design
1.2 Operation and Maintenance Stage <ul style="list-style-type: none"> ▪ Land stability, landslide and soil erosion, including geological hazard ▪ Surface water hydrology ▪ Air quality ▪ Bad Smell ▪ Water quality (both surface and ground water) related to leachate generation and control ▪ Noise and vibration; ▪ Leachate generation and control ▪ Gas generation emission and migration; ▪ Availability of cover material ▪ Human health associated with the change in air quality and 		<ul style="list-style-type: none"> ▪ Ditto

noise level along the road alignment.		
2. Biological Issues 2.1 Construction Stage <ul style="list-style-type: none"> ▪ Loss of forest area as part of land acquisition ▪ Possible impact on flora fauna (biodiversity) ▪ Disturbance to wildlife movement, and possible hunting and poaching; ▪ Use of forest products by the construction workers and construction activities ▪ Community forests and associated issues 		
2.2 Operation and Maintenance Stage <ul style="list-style-type: none"> ▪ Birds hazard Impact on and growth of community forest ▪ Loss of aquatic life ▪ Disturbance to the wild life 		
3. Socio-economic and Cultural Issues 3.1 Construction Stage <ul style="list-style-type: none"> ▪ Loss of agricultural land ▪ Loss of agricultural products ▪ Effect on irrigation schemes ▪ Effect on health, sanitation and safety of local people and workers ▪ Availability of local construction workers, employment opportunities and ▪ Mobilization of local people for construction 		
3.2 Operation and Maintenance Stage <ul style="list-style-type: none"> ▪ Impact on local economy including the issues on the waste pickers ▪ Community infrastructures ▪ Aesthetic values ▪ Public health hazard ▪ Quality of life values 		
4. Management Issues <ul style="list-style-type: none"> ▪ Project execution ▪ Land acquisition and resettlement 	<ul style="list-style-type: none"> ▪ Consideration of management organization ▪ Implementation of preliminary investigation (preparation of cadastral maps) ▪ Preparation of land acquisition notice ▪ Preparation of compensation plan 	<ul style="list-style-type: none"> ▪ Suggestion for the resettlement plan
5. Other Issues	<ul style="list-style-type: none"> ▪ Study of the issues raised during scoping notice 	-
6. Alternative Analysis <ul style="list-style-type: none"> ▪ Project site ▪ Technology, management 	<ul style="list-style-type: none"> ▪ Comparison of the alternatives using cost benefit analysis and recommendation of the best 	<ul style="list-style-type: none"> ▪ Site selection of the Study including <i>No Action</i> option ▪ Technology and design



<p>methods, schedule, required raw materials</p> <ul style="list-style-type: none"> ▪ Design ▪ Acceptability ▪ Other relevant points 	<p>alternative.</p> <ul style="list-style-type: none"> ▪ Proposing of mitigation measures for costs involved. ▪ Comparing the <i>No Action</i> option with modification of the proposed project. 	<p>alternatives analysis as part of concept design</p>
<p>7. Mitigation Measures</p>	<ul style="list-style-type: none"> ▪ Inclusion of mitigation measures against adverse impact in the EIA report. ▪ Suggestion of EPMS (Environment Protective Measures) for both construction and operational stages considering the lessons learned from Sisdol Landfill Site operation. ▪ Discussion of cooperation and consultation mechanism involving the OSLSMCC and local communities as part of the EMP (Environment Management Plan). 	<ul style="list-style-type: none"> ▪ Suggestions based on the mitigation measures examination as part of concept design
<p>8. Costs and Benefits of the Project</p>	<ul style="list-style-type: none"> ▪ Implementation of cost benefits analysis and environmental cost sharing, if any 	<ul style="list-style-type: none"> ▪ Cost estimation as part of concept design
<p>9. Environmental Management Plan (EMP)</p>	<ul style="list-style-type: none"> ▪ Preparation of Environment Management Plan (EMP) including environmental monitoring plan. 	<ul style="list-style-type: none"> ▪ Suggestions based on the filed surveys and concept design
<p>11. Other Information</p>	<ul style="list-style-type: none"> ▪ Inclusion of other relevant information such as references, maps, photos and questionnaires into the EIA report. 	<p>-</p>

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Appendix-4: Planned Assignment Schedule of the Study Team Members

No.	Position	Name	FY 2005					FY 2006							
			11	12	1	2	3	4	5	6	7	8	9	10	11
1	Team Leader / Solid Waste Management Policy / Environment and Social Considerations	Toshiyuki UJIE	■	■	■				■	■		■	■		
2	Waste Management Facility Plan and Operation	Mahmoud RIAD	■		■	■		■		■					
3	Landfill Site Design	Masahiro SAITO						■		■					
4	Deputy Team Leader / Collection & Transportation / Recycling System Analysis	Shungo SOEDA	■		■	■		■		■					
5	Waste Processing Facility Design	Kiyoshi SHIMIZU								■					
5	Environmental and Social Considerations (River Works / Hydrology)	Hideo TSUTA			■	■				■					
	Environmental and Social Considerations (Geology)	TBN						■							
6	Organization and Institution / Human Resources Development	Minako NAKATANI								■					
7	Financial Analysis	Noboru OSAKABE										■			
8	Coordinator / Public Relations	Hideo Tsuta/ Sachiko SUWA							■		■				
1	Team Leader / Solid Waste Management Policy / Environment and Social Considerations	Toshiyuki UJIE	□												
Note		■ : Work in Nepal	△ IC/R					△ P/R			△ DF/R				△ F/R
		□ : Work in Japan	▲					▲			▲				
		Reports													
		Steering Committee													
		Seminar									●				

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APPENDIX 3-3

Minutes of the Meetings of The Seventh Steering Committee

MINUTES OF MEETING
OF
THE SEVENTH STEERING COMMITTEE
FOR
THE STUDY
ON
THE SOLID WASTE MANAGEMENT
FOR
THE KATHMANDU VALLEY

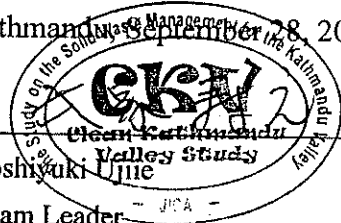
AGREED UPON AMONG
MINISTRY OF LOCAL DEVELOPMENT
AND
FIVE MUNICIPALITIES OF THE KATHMANDU VALLEY
AND
JICA STUDY TEAM

Som Lal Subedi

Som Lal Subedi
Joint Secretary, Ministry of Local Development
Government of Nepal



Kathmandu, Nepal, September 28, 2006



Toshiyuki Ujie
Team Leader
JICA Study Team

Dinesh Kumar Thapaliya
Dinesh Kumar Thapaliya
Chief/Executive Officer
Kathmandu Metropolitan City



Prèm Raj Joshi
Prèm Raj Joshi
Chief/Executive Officer
Palitpur Sub Metropolitan City



Indra P. Karki

Indra P. Karki
Chief/Executive Officer
Bhaktapur Municipality

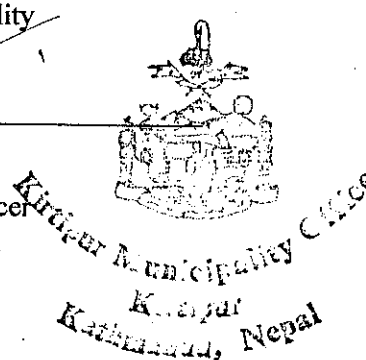
Bhaktapur Municipality

Madhyapur Thimi Municipality

Bishnu Datta Gautam
Bishnu Datta Gautam
Chief/Executive Officer
Madhyapur Thimi Municipality

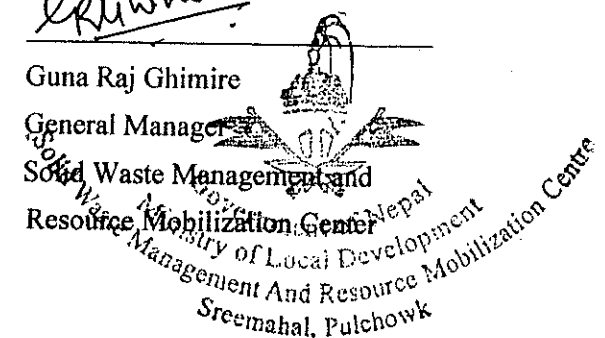
Saroj Guragain

Saroj Guragain
Chief/Executive Officer
Kirtipur Municipality



Guna Raj Ghimire

Guna Raj Ghimire
General Manager
Solid Waste Management and
Resource Mobilization Center



1. Introduction

The Japan International Cooperation Agency (hereinafter referred to as "JICA") has organized and dispatched the JICA Study Team (hereinafter referred to as "the Study Team") to the Nepal since January 18, 2004, according to the Scope of Work between Ministry of Local Development of Government of Nepal (hereinafter referred to as "MOLD") and JICA signed on September 12, 2003.

This Minutes of Meeting is a record of the Seventh Steering Committee (hereinafter referred to as "ST/C") held on September 28, 2006 for discussion on Draft Final Report for Monitoring and Follow-up Phase (hereinafter referred to as "DF/R") for the Study on the Solid Waste Management for the Kathmandu Valley (hereinafter referred to as "the Study") and other issues related to the Study that have been agreed upon between the Nepalese side and the Japanese side (hereinafter referred to as "Both Sides"). The list of attendants to the meeting is attached in Appendix-1.

2. Draft Final Report for Monitoring and Follow-up Phase (Phase 4)

The Study Team submitted sets of the DF/R (sixty copies of Executive Summary, forty copies of Main Report and twenty copies of Supporting Report) to MOLD in September 28, 2006 and MOLD will distribute the DF/R to the five municipalities, i.e. Kathmandu Metropolitan City (hereinafter referred to as "KMC"), Lalitpur Sub-Metropolitan City (hereinafter referred to as "LSMC"), Bhaktapur Municipality (hereinafter referred to as "BKM"), Madhyapur Thimi Municipality (hereinafter referred to as "MTM"), Kirtipur Municipality (hereinafter referred to as "KRM")¹, Solid Waste Management and Resource Mobilization Center (hereinafter referred to as "SWMRMC") and other relevant organizations. The Study Team explained the contents of the DF/R and Both Sides discussed the results of the monitoring and follow-up activities.

At this ST/C, Both Sides made further clarifications about the DF/R. Some of the main issues of the discussions are as follows:

3. Contents of Draft Final Report

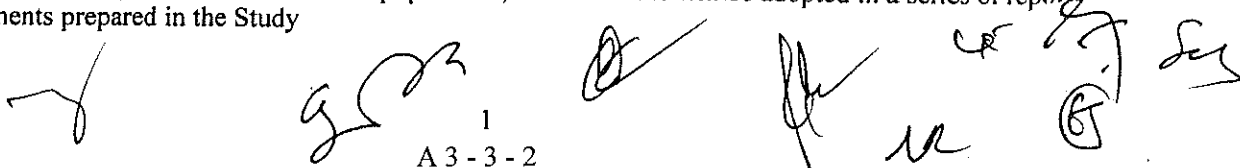
The contents of DF/R were discussed as follows:

3.1 Monitoring of Implementation of Action Plan of Each Municipality and SWMRMC

(1) Monitoring and Evaluation of Progress of Activities in the Annual Work Plans (Monitoring)

Both Sides confirmed the progress of the activities in each of the Annual Work Plans (hereinafter referred

¹ Municipalities are placed in order of each population, and this order will be adopted in a series of reports and documents prepared in the Study



to as "AWP") of the fiscal year 2005/2006 (2062/2063 of Nepalese calendar) up to the end of the fiscal year based on the results of series of monitoring sessions of the Annual Work Plans with respective Task Forces of the five municipalities and SWMRMC as per discussed in the DF/R. Under the circumstances that the progresses of some activities have been affected by the unavoidable circumstances and external factors in general, the following were addressed as the results of the monitoring.

- Due to political instability during this fiscal year and frequent changes in the leaderships, progress of scheduled activities in each of the AWP's had been affected in some municipalities..
- Municipal/SWMRMC staff continued to develop and apply the knowledge and skills on SWM. According to the implementation status of the AWP's, organizational capacity development required more efforts.
- Approved SWM budget continued to increase in FY2062 for all municipalities, however execution rate, especially for newly planned activities, remained limited.
- All municipalities were moving ahead informally in working with private sector and communities /CBO/NGOs. Institutionalization of such arrangements was attempted in KMC, KRM and MTM.
- LSMC, KRM, MTM and KMC have relatively high rate of implementation of community awareness activities (training on home composting, recycling, clean up program, etc.).
- Organizational restructuring and/or official assignment of staff responsible for SWM activities had taken place in BKM, KRM and MTM.
- More systematic planning/budgeting/implementation/monitoring cycle had to be fully established in municipalities.

As it was confirmed effectiveness of development of Annual Work Plan together with program based budget, the Nepalese side promised to continue this approach including monitoring and evaluation of the progress of scheduled activities.

(2) Technical Assistance for Activities in the AWP's (Follow-up)

Based on the components of the Follow-up, i.e.: 1) Support for collection and transportation, waste minimization activities and solid waste data management, and 2) Support for environmental and social considerations for facilities development, the discussions were made as follows:

1) Support for Collection and Transportation, Waste Minimization and Solid Waste Data Management

i) Collection and Transportation (in BKM and MTM)

- BKM explained that they had continued the source-separated collection but extension of the areas remained limited. However, the Study Team suggested that the activity had contributed to reduce the waste at sources too and the areas could be extended taking into consideration of experiences so far and responses from the local people. BKM promised to make efforts to continue and extend

2
A 3 - 3 - 3

activities.

- MTM explained again that they had sent a letter to KMC regarding the collection vehicle which was agreed to be provided by KMC, but still had been waiting for the reply. KMC promised to check availability of the vehicle and response to MTM immediately.

ii) Waste Minimization Activities

- SWMRMC explained that the progress of site selection of a large-scale waste processing facility remained limited. The Study Team emphasized again necessity of the facility and asked the Nepalese side to function the organized working group again.
- KMC explained that they had produced a label for promotion of sale of vermi-compost product and had been selling at the community recycling center.
- LSMC explained that they had started promotion of plastic separation collection activities in 22 wards involving 53 women's groups with support from the Study Team.
- KRM explained that they had expanded the plastic separation collection activities to wards 2, 6 and 7 by appointing a motivator.

iii) Solid Waste Data Management

- The Study Team emphasized again the importance of utilization of the collected data for policy development and/or effective implementation of the Action Plans. SWMRMC promised to play a leading role for continuous data collection and utilization.
- SWMRMC promised to keep and up-date the web-site of the Study as well as SWMRMC.

2) Social and Environmental Considerations for Facility Development

The Study Team again emphasized that environmental studies including social considerations were essential to develop the facilities on solid waste management. Both Sides confirmed that environmental and social considerations for the facilities development would be conducted based on the Environmental Protection Act and Rules, the proposed National Environmental Impact Assessment Guideline on Solid Waste Management and the JICA Environment and Social Considerations Guidelines (hereinafter referred to as "JICA ESC Guidelines"). The results of follow-up and some recommendations were discussed as listed below:

i) Long-term Landfill Site

a. Progress of EIA

The Nepalese side explained that the progress of EIA for the long-term landfill site, Banchara Danda landfill site, had been delayed although the selected local consultant had been working since June 13, 2006. The Nepalese side also explained that Interim Report of the Draft EIA would be available by the middle of December 2006.

b. Advisory Council on EIA under the JICA ESC Guidelines

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As it was discussed at the Sixth ST/C, Scoping and TOR for EIA were reviewed at the Advisory Council of Environmental and Social Considerations Review of JICA (hereinafter referred to as "Advisory Council") on April 10, 2006 because the Study had been categorized as "A" in which strict environmental and social considerations are required under the JICA ESC Guidelines. The Study Team explained comments which were raised at the Advisory Council as follows and the Nepalese side promised to incorporate the comments into the EIA report.

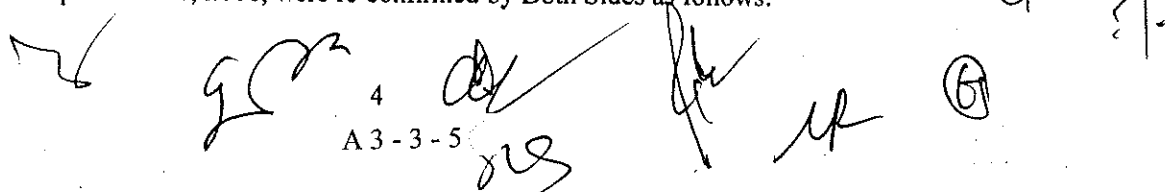
- Process of site selection should be discussed in the EIA
- Management of harmful waste such as medical waste and industrial waste should be considered carefully
- Lessons learnt from Gokaruna landfill site should be taken into consideration in the EIA.
- Careful treatment of leachate should be considered including capacity of treatment considering rainfall intensity
- Water quality survey including heavy metals to obtain current condition should be conducted
- Impact caused by the river diversion should be considered carefully
- Community forest should be taken into consideration from the viewpoint of socio-economy of local people
- As waste pickers are playing important role on recycling too, careful attention should be paid on waste pickers

The Nepalese side also agreed to provide the Advisory Council with necessary documents for their review. For this, the following steps were confirmed by Both Sides.

- Preparation of interim report of Draft EIA by incorporating the results of follow-up survey and comments of the Advisory Council (SWMRMC)
- Sending of interim report of Draft EIA to JICA and the Study team (SWMRMC)
- Reviewing of interim report of Draft EIA by JICA and the Study team, and sending comments to the Nepalese side (JICA Study Team)
- Preparation of draft report of Draft EIA by incorporating comments of JICA and the Study Team (SWMRMC)
- Sending of draft report of Draft EIA to JICA for review by the Advisory Council (SWMRMC)
- Reviewing of draft report of Draft EIA report by the Advisory Council, and sending comments to the Nepalese side (JICA)
- Finalization of Draft EIA Report by the Nepalese side by incorporating comments of the Advisory Council (SWMRMC)
- Continuing of the EIA procedure by the Nepalese side (SWMRMC)

c. Concept of Design of Banchare Danda Landfill Site

The principles of concept for Banchare Danda landfill site development, which were discussed and confirmed at the workshop on June 1, 2006, were re-confirmed by Both Sides as follows:



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- Sanitary landfill of semi-aerobic type for municipal solid waste
- Application of composite horizontal liner to prevent leachate percolation, with a study of applicability of vertical liner construction as an alternative
- Leachate collection and treatment by aeration and re-circulation and construction of ponds of sufficient capacity to prevent discharge of the biologically treated leachate effluent into the adjacent river
- Landfill gas collection and passive venting with possibility for consideration of utilization to support operation of the site at a later stage (although the methane content of the landfill gas is expected to be low due to application of semi-aerobic landfill system)
- Construction of waste storage dams by the soil-cement type and gentle waste slopes during operation of not more than 1:3 to prevent against waste collapse due to the height of the waste disposal activities which may exceed 100 meters
- Development of river diversion as steep slope diversion with chute channel type for the drop section
- Development of facilities to monitor incoming waste and control site access
- Provision of sufficient buffer zone surrounding the site
- Development of monitoring system for the surrounding environment
- Development of landfill taking into consideration geological conditions of the site
- Development of medical waste treatment facility at a different location to prevent disposal of that waste type at Banchare Danda landfill site
- Consideration for development of a facility for waste recovery within the valley or in Sisdol – Aletar area

ii) Other Facilities

It was confirmed that Balaju and Afadole transfer stations should be developed urgently for effective waste transportation. In this connection, as confirmed at the Sixth ST/C, the Nepalese side promised to conduct necessary IEE studies, based on the recommendations provided by the Study Team for their development.

3.2 Technical Support for Operation of Teku Transfer Station and Sisdol Landfill Site

(1) Recommendations for Better Operation of Solid Waste Transportation by Secondary Transportation Vehicles (Operation of Teku Transfer Station)

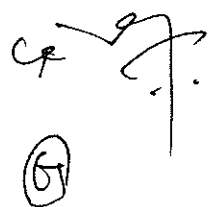
The Nepalese side explained that the collection and transportation of waste in KMC and LSMC had been changed from night time to day time again since August 2006 because of demand of collection workers. KMC was again advised to promptly develop the time frame for the operation of the transfer trucks from the Transfer Station in line with the collection system.

(2) Recommendations for Better Operation of Sisdol Landfill Site




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The Study Team offered the following recommendations to improve the existing operation of the Sisdol landfill, based on the lessons learnt so far as well as to prepare the landfill to receive whole amount of the waste from KMC and LSMC. Some of these activities may be immediately started before the waste disposal operations resumption at Sisdol LF.

1) Site Management

- The site manager needs to spend more time at the landfill in order to make full use of operating the site and learning from this experience.
- KMC and LSMC need to prepare for the transport of all their waste to Sisdol landfill by provision of the necessary heavy equipment and staff, including allocation of a mechanic permanently at the site.
- More consideration on sharing of responsibilities and their demarcation between KMC, LSMC and the local committee is required.

2) Waste Placing

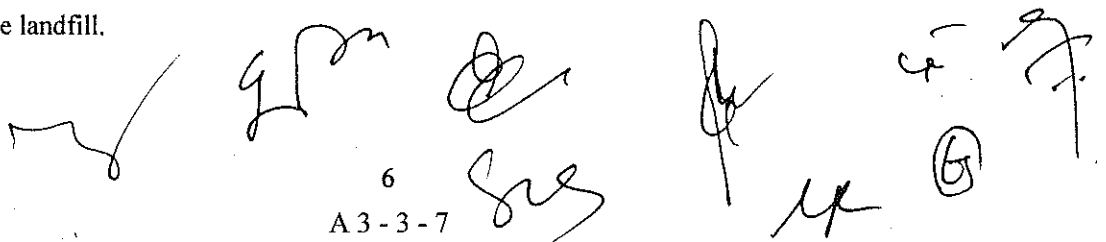
- The operator should continue to improve site internal access to ensure that the waste collection trucks can unload the waste near to the waste disposal area.
- Once the waste is placed and spread, a number of passes by the bull dozer is required in order to provide compaction. Compaction should be done separately of the spreading of the soil cover materials.
- Soil cover should be applied daily at the top level of the waste *without fail*

3) Leachate Treatment System

- The aerator in the leachate pond should be operated for at least 5 - 6 hours daily.
- The leachate from the retention pond should be re-circulated into the waste disposal area
- A submerged pump should be installed in the pond to pump leachate through a rigid pipe attached to the Valley 1 west side and running up to the northern part of the site where a sprinkler should be installed.
- Installation of Trickling Filter System in the waste disposal area to enhance treatment of the leachate and its re-circulation

4) Landfill Gas Vents

- All vertical vents should be checked for blockage and blocked ones should be repaired before the re-commencement of operation
- Installation of vertical vents extensions should be supported by gabions or old oil drums with perforations and surrounded by rocks
- Additional vents connected to the original network should be installed as the waste levels increase, both vertically and horizontally as this is very important to enhance the aerobic areas within the landfill.

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5) Drainage System

- For the completed landfill areas the final cover should be applied and drains should be made to divert the rain water from penetrating within the waste layers.

6) Monitoring of Operations

- The leachate, groundwater and river should be monitored minimum on a bi-monthly basis and the results should be understood by the Operator
- The complaints and remarks received from the general public and the local committee should be recorded and dealt with.
- Activities of the Environmental Coordination Committee have been appointed by SWMRMC should be started including periodical site inspection.

7) Site Operation Records

- Operation records, waste arrival records and visitors logs should be maintained on a real time basis.
- Weighbridge at the site should be operated as soon as possible
- Explanatory materials for the landfill, as posters, panel boards and brochures should be prepared

8) Construction Works (possibly to include in Valley 2 construction)

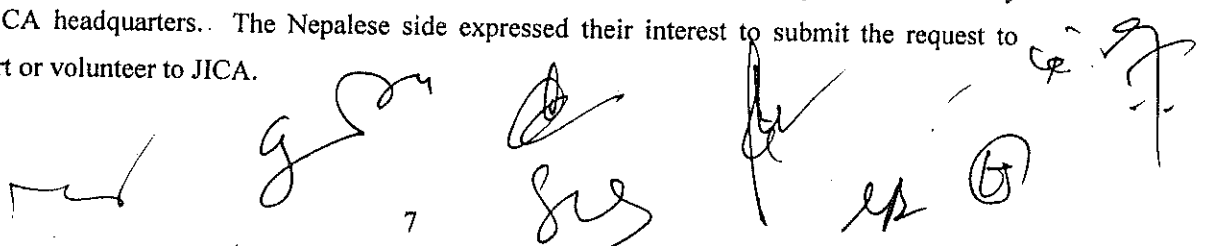
- Site internal access road should be developed as an all weather road
- Site fence, especially in the leachate pond area should be completed soon
- As electric poles have been installed at the site, electricity supply should be started soon
- Areas should be prepared for stocking of excavated materials from Valley 2 construction to be used as cover materials

9) Preparation of Final Closure and Maintenance Plan for Valley 1

- The remaining life of Sisdol Landfill Valley 1 is around 6-8 months and accordingly the detailed design for closure of the Valley 1 should be prepared. Since Valley 1 will be closed in stages as the land filling progresses, the closure should also be implemented in stages. Therefore the operator should refer to the design documents of Valley 1 showing the completion layouts and prepare the final closure and maintenance plan accordingly.

(3) **Further Training of Operation of Teku Transfer Station and Sisdol Landfill Site**

For better operation of Teku transfer station and Sisdol landfill site, the Nepalese side requested the Japanese side to provide a further operation training of the sites, especially for Sisdol landfill site, as long as possible. Although another assignment of landfill operation expert is planned, the Study Team understood necessity of relatively long-term practical operation training at the sites and promised to convey the request to JICA headquarters. The Nepalese side expressed their interest to submit the request to dispatch an expert or volunteer to JICA.



4. Important Issues Relating to the Study

4.1 Waste Transportation from KRM to Teku Transfer Station

The Nepalese side explained that they had been continuing discussions on the waste acceptance at Teku transfer station from KRM as per discussed at the Fourth ST/C dated on June 29, 2005. KRM explained that they still needed an official approval of the waste acceptance of KMC as well as a vehicle for waste transportation from KRM to Teku transfer station.

4.2 Progress of Development of a Landfill Site of Zone B

Various attempts had been made for pushing forward the consultative processes for its development of Taikabu landfill site. However, more efforts are still needed by the concerned municipalities and the central government (MOLD/SWMRMC).

4.3 Management of Medical and Industrial Wastes

As confirmed at the Fifth and Sixth ST/Cs, the Study Team asked again the Nepalese side to explain the progress of policy development regarding management of medical and industrial wastes. The Nepalese side explained that they had been still developing the policy and promised to outline it soon.

4.4 Further Schedule of Monitoring and Follow-up Activities

The Study Team explained that most of the monitoring and follow-up activities were going to finish by the end of September 2006. The remaining assignment of the Study Team members was confirmed for follow-up of EIA on Banchare Danda landfill site and operation of Sisdol landfill site. Accordingly, the next assignments will be determined based on the progress of the EIA and/or Sisdol landfill site operational conditions.

4.5 Country Focused Training

Both sides felt that the exposure *RA* of policy level people and more coverage of the training on solid waste management personnel like the Country Focused Training on Solid Waste Management were needed. The JICA Nepal office explained that further training course on solid waste management might be considered in different ways upon receiving assessment of effectiveness of the five-years Country Focused Training.

4.6 JOCV

A JICA volunteer on environmental education has been assigned in LSMC since August 2006. As requested by other four *RA municipalities RA* for follow-up of environmental education activities which are relating to the Study, she will visit there. For that, all five municipalities and SWMRMC promised to support her visits such as arrangement of appointments with concerned peoples and issue of an entry pass to Durbar Square in BKM.

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4.7 Human Resource Arrangement

The Study Team expressed their concern about human resources arrangement, especially necessary staff attachment in KMC for conducting their various tasks, such as operation of both Teku transfer station and Sisdol landfill site, design and development works of further necessary facilities, and establishment of appropriate collection and transportation system. The Nepalese side promised to assign and try to continue necessary staff, especially those who had training in Japan, for fulfill the tasks for solid waste management.


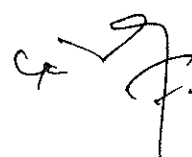

4.8 Continuity of the Study Results and Activities

Both sides again confirmed importance of continuity of the Study. The Nepalese side promised to follow-through the results of the Study and to try to implement activities which are scheduled in the Annual Work Plan of the fiscal year of 2006/07 by allocating necessary budget.

In addition, the Nepalese side promised to hold Technical Working Group (TWG) meetings under the initiative of SWMRMC and CoMoN meetings periodically as per confirmed at the Fourth ST/C.

4.9 Comment on the DF/R

The Nepalese Side promised to review the DF/R carefully and provide the Study Team with their comments by October 31, 2006.

Appendix-1: List of Attendants

Ministry of Local Development

Mr. Som Lal Subedi, Joint Secretary
Mr. Babu Ram Gautam, Under Secretary

Solid Waste Management Resource Mobilization Center

Mr. Guna Raj Ghimire, General Manager
Mr. Ashok Shahi, Engineer
Mr. Ram Sharan Maharjan, Engineer
Mr. Toparam Acharya, Assistant Manger

Kathmandu Metropolitan City

Mr. Dinesh Kumar Thapaliya, CEO
Mr. Deepak Ratna Kansakar, Engineer (Sisdol landfill site manager), Solid Waste Management Section/
Environment Department
Mr. Rabindra Rai, Engineer
Mr. Birendra Malla, Overseer

Lalitpur Sub-Metropolitan City

Mr. Prem Raj Joshi, CEO
Ms. Sabina Maharjan, Chief of Community Development Section
Ms. Masumi Tanaka, JOCV

Bhaktapur Municipality

Mr. Indra P. Karki, CEO
Mr. Laxman Kisiju, Chief, Physical Planning and Works Section
Mr. Dinesh Rajbhandari, Sanitation Engineer / Environmental Section
Mr. Moti Bhakta Shrestha, Social Welfare Officer

Madhyapur Thimi Municipality

Mr. Bishnu Dutta Gautam, CEO
Mr. Keshab Silwal, Legal Officer
Ms. Krishna Kumari Shrestha, Assistant, Community Development and Sanitation Section

Kirtipur Municipality

Mr. Saroj Guragain, CEO
Mr. Anuj Pradhan, Chief, Solid Waste Management Unit
Mr. Gyan Bazra Maharjan, Assistant, Solid Waste Management Unit

Ministry of Physical Planning and Works

Mr. Ranjan Raj Pandey, Senior Divisional Engineer

Japan International Cooperation Agency (JICA) Nepal Office

Mr. Yusuke Tsumori, Assistant Resident Representative of JICA Nepal Office

Mr. Gopal Gurung, Program Coordinator of JICA Nepal Office

JICA Study Team

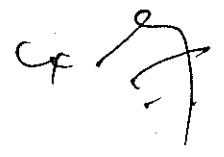
Mr. Toshiyuki Ujiie, Team Leader / Solid Waste Management Policy / Environment and Social Consideration

Mr. Mahmoud Riad, Facility Plan and Operation

Mr. Shigeru Kawanabe, Landfill Operation

Mr. Noboru Osakabe, Financial Plan

Mr. Takahiro Kamishita, Coordinator/Public Relation



APPENDIX 4

Technology Transfer Seminar

APPENDIX 4 TECHNOLOGY TRANSFER SEMINAR

1 Proceedings of 5th Seminar

- Date:** August 2 and 3, 2006
Time: 9:30 - 16:50 (1st day), 9:00-12:50 (2nd day)
Venue: Hotel Malla
Participants: Total 149 people (MOLD, SWMRMC, Other ministries, Five municipalities, Donors, NGOs, Private sectors, Academics, Media, EOJ, JICA)
Distribution
- Handout of each presentation material
- Newsletter (No.7)
- CKV file and memo pad made of recycled paper
- CKV ball pen

2 Agenda

1st Day (2nd August, 2006)

Time	Program	Presenters
9:00- 9:30	Registration	
9:30- 9:35	Welcome Address	JICA Nepal
9:35- 9:45	Speech by Chairperson	MOLD
9:45- 9:55	Introduction of the CVK Study	SWMRMC
9:55-10:10	Follow-up and Monitoring Phase of the CKV Study	JICA Study Team
10:10-10:20	Closing Remarks of Opening Session (Speech by Chief Guest)	MOLD
10:20-10:40	Coffee Break	
10:40-10:55	Presentation 1: Present Community-Based Activities of Recycling and Composting	KMC
10:55-11:10	Presentation 2: Present Community-Based Activities of Plastic Separation	KRM
11:10-11:30	Presentation 3: Introduction of CoMoN (Community Mobilization Network)	CoMoN member (LSMC)
11:30-12:00	Question and Answer	
12:00-13:00	Lunch	
13:00-13:50	Keynote Speech 1: Introduction of Experiences for Community Mobilization for Recycling and SWM in Bangladesh and Other Countries.	Prof. Miyake Univ. of Kitakyushu
13:50-14:20	Question and Answer	
14:20-14:40	Presentation 4: Activities at Sisdol Short-term Landfill and Lessons Learns from the Operation and Secondary Transportation	KMC/LSMC
14:40-15:00	Presentation 5: EIA Study for Banchare Danda Long-term Landfill in Okharpauwa	SWMRMC
15:00-15:20	Coffee Break	
15:50-16:20	Question and Answer	
16:20-16:30	Closing Remarks	MOLD
16:30-16:50	Introduction of 2 nd Day	JICA Study Team

2nd Day (3rd August, 2006)

Time	Program	Presenters
8:30-9:00	Registration	
9:00-9:30	Keynote Speech 2: Suggestions to Sanitary Landfill Management	Dr. Tanaka, Fukuoka Univ.
9:30-10:00	Question and Answer	
10:00-10:20	Coffee Break	
10:20-12:20	Panel Discussion: Capacity Development for SWM (Five municipalities, SWMRMC, JICA Study Team and JICA)	JICA Study Team (Facilitation)
12:20-12:30	Vote of Thanks	SWMRMC
12:30-12:40	Closing Speech by Guests	JICA (Tokyo)
12:40-12:50	Closing Remarks	MOLD
12:50-	Lunch and Good by	

3 Records of the 5th Seminar (1st Day)

3.1 Welcome Address

Resident representative of JICA Nepal Office greeted for the participants as welcome address and express his gratitude towards relevant organization for success of the Study.

3.2 Introduction of the Study

Following welcome address, the general manager of SWMRMC introduced the Study shortly including Action Plan developed by each municipality and SWMRMC, and a series of Pilot Projects implemented. After that, the JICA Study Team explained overall work flow of the monitoring and follow-up activities of the Study.

3.3 Presentations of Follow-up and Monitoring Phase Activities

Total eight Focal Points presented their activities which had been carried out continuously from the Phase 3 of the Study or newly initiated activities in 10-15 minutes by using slides utilizing several photos and/or moving record. Almost all Focal Points tried to explain in English through many times exercises previously.

3.4 Key Note Speech by Prof. Miyake, University of Kitakyushu

Prof. Miyake explained community-based solid waste management which he had been involved in Dhaka, Indonesia and Japan. He also stressed importance to focus on sweepers and waste pickers for better solid waste management. Effectiveness of environmental education was also explained including training course of the JICA Country Focused Training on SWM.

3.5 Discussion Session

During the discussion session of the 1st Day, a variety of questions and opinions especially for community-base activities, Sisdol Short-term Landfill Site and Prof. Miyake presentation on the Introduction of Experiences for Community Mobilization for Recycling and SWM in

Bangladesh and Other Countries were exchanged among the participants, presenters and the CKV Study Team as follows.

Table 3-1 Question and Comments from Participants

Subjects	Question and Comments	Answer from the Presenter, CKV Study Team
Presentation of Municipalities	People living in Gokarna are drinking contaminated water. What is the situation in Sisdol Landfill Site?	Problem of contamination for drinking water for the people living around the Sisdol landfill site has not arisen since commencement of the operation.
	Would it be possible to generate income from the sales of methane at the Sisdol Landfill site as CDM? If yes, there is a possibility of earning a minimum of Rs. 10 million per year.	Semi-aerobic landfill system was adopted for the Sisdol landfill site. This landfill system is recognized as CDM for landfill scheme because of reduction of the methane generation. So the feasibility of installation of power plant using methane gas generated from landfill site should be studied.
Presentation of Prof. Miyake	Is private sector involvement in solid waste management promoted in Japan?	Privatization of municipal sector of SWM has been in progress in Japan.
	How are women's groups formed in Japan? How do women devote their time? What about children's groups?	In the past, relationship of the community group was very strong in Japan. But currently it has been gradually collapsed due to change of social interests.

Source: JICA Study Team

4 Records of the 5th Seminar (2nd Day)

4.1 Key Note Speech by Dr.Tanaka, Fukuoka University

Dr.Tanaka explained the leachate treatment methodologies which have been used in the semi-aerobic landfill system at various countries such as Japan, Malaysia, Iran, and Samoa. She also introduced leachate treatment methods using charcoal filters and coral reef including recirculation system.

4.2 Panel Discussion on Capacity Development for SWM

Following brief explanation of the result of monitoring and follow-up as well as basic concept of capacity development of JICA by the JICA Study Team, the panel discussion on capacity development for SWM which was the last agenda of 5th seminar was held with a facilitator of the JICA Study Team. Total 10 panelists participated from MOLD, SWMRMC, five municipalities, JICA Study Team and Prof. Miyake. At the beginning, each municipality presented lessons learned through the annual action plan implementation and the whole study period.

4.3 Discussion Session

During the discussion session of 2nd Day, questions for the presentation of Dr. Tanaka and the capacity development for SWM were raised and answered as follows.

Table 4-1 Question and Comments from Participants

Subjects	Question and Comments	Answer from the Presenter, Panelists, CKV Study Team
Presentation of Dr. Tanaka	Why are alternate systems not being considered for the long term sanitary landfill site? Can anaerobic system be used as an alternative system in the long term landfill site?	Semi-aerobic system has advantages of acceleration of decomposition of the solid waste dumped, reduction of permeability of leachate generated against anaerobic system.
	What are the possible reasons for very large amount of leachate generation even when there is no rainfall?	It supposed that groundwater constantly flows into the landfill site from surrounding area.
	What is the system currently in place to remove the gas produced on site?	Gas generated from dumped waste is passively ventilated.
	How is the methane gas being managed?	Ditto
Panel Discussion	For waste minimization, the concept of 3R should be extended to include 2 more R's- "Rethink" and "Refuse".	Firstly 3R campaign should be realized and extended to the nationwide.
	Would it be possible to enforce a ban on instant noodle packets (plastic) and candy wraps (plastic)? Is the smoke emitted from transportation vehicles being monitored?	It seems very difficult to enforce the ban of present plastic use for noodle packet and candy wrap. Recycling plastic products should be enforced firstly. Monitoring exhaust gas from transportation vehicle has not been monitored.
	Work done in the field of solid waste management earlier by agencies such as GTZ should not be ignored. Also, the concerned authorities should take steps to give continuity to the private sectors who are currently involved in solid waste management. With many uncertainties and undefined roles, we are bound to lose the ones who are now willingly working in the field of waste collection.	We should study and improve the SWM on the basis of past works done by GTZ. The role of the private sector should be clarified for progress of SWM improvement.
	The problem of solid waste management has become more severe.	It is important that the government and concerned authorities should take closer communication with community.
	CKV has been assisting the five municipalities of the Kathmandu Valley. However, there is no municipal annual budget. Why is it that there are only donor funds?	Activities on SWM in each municipality ha been done under their budget in spite of shortage of the annual budget. Some requirements for purchasing equipments for SWM can be applied to use donor funds.
	Why is not there an emergency plan for solid waste management? Municipalities have started using Tundikhel (Ratnapark) as a site to dump waste.	Tek transfer station can be used for emergency storage of solid waste for short period. But if such administrative confusion sometime takes place in the future, emergency dumping site should be considered.

There were no workshops and trainings for NGOs. Compost bin promotion should have received more priority. There should be an alternate dumping site. During difficult times such as when Sisdol could not be used, municipalities could have informed the public through media requesting them to minimize waste at home. Why is there no transfer station in LSMC?	Before promotion of house compost, the supporting groups should be established in/around the target communities. Transfer station in LSMC should be realized by the municipality in cooperation with SWMRMC, MOLD.
Policies regarding waste management for SWRMC, community and municipalities are not clear.	The policy for SWM of each administration level should be clarified and promoted.
Neighboring VDCs are also in need to solid waste management and therefore should be included.	SWM activities for the VDC level should be extended step by step.
Tourism has been affected much by lack of proper solid waste management. There is 70% organic waste so 20,000 bins should be distributed (for each household?). There should be another R added to 3R- Rethink.	The relationship between SWM and tourism is not directly linked. What is the purpose of rethink?
We should focus more on recycling and composting.	It is correct idea. Firstly system of recycling and composting should be concreted and enforced.
Suggestions from Mr. K. P. Kaphle, Dept. of Mines and Geology (as written by him). a. Social mobilization by making the people aware of house separation of different types waste just to reduce the voluminous waste to real waste. That helps to reduce the voluminous waste in the transfer station and cost of transportation and space in site. b. Please follow the concept of sanitary landfill site but not as waste dumping site. In this way people will be friendly. c. Please go to the real suitable large land fill site as identified by the concerned expert on sanitary landfill site. For this cooperation and coordination among five municipalities is required and they must have sense of real management of unwanted waste for long term basis. d. We should learn from Japanese community, social waste management system, as explained by Prof. Hiroyuki Miyake of Japan.	For realization of the large scale landfill site, present SWM activities should be successfully operated in cooperation among concerned authorities and communities.

Source: JICA Study Team

4.4 Closing

At the closing ceremony, Mr. Shiro AMANO, a leader of JICA Monitoring Mission, addressed a speech and expressed a great impression of Nepalese efforts and a various kinds of activities under the Study. He also spoke the expectation their continuous efforts on SWM for future in order to achieve their vision.

APPENDIX 5

Selected Photos

APPENDIX 5 SELECTED PHOTOS



5th Steering Committee
(December 13, 2005)



6th Steering Committee
(March 17, 2006)



TWG Meeting
(November, 2005)



TWG Meeting on Banchare Danda LFS
(June, 2006)



AWP Monitoring Session
(November, 2005)



AWP Monitoring Session
(February, 2006)

Meetings and Workshops



Source Separated Collection in BKM
(December, 2005)



Recycling Center in Ward No 21 in KMC
(January, 2006)



Plastic Separation Collection in LSMC
(November, 2005)



Plastic Separation Collection in KRM
(January, 2006)



Workshop for SW Data Management
(March 2006)



Workshop for SW Data Management
(March 2006)

Follow-up for Action Plan Implementation



Follow-up Survey at Banchare Danda
(January, 2006)



Follow-up Survey at Banchare Danda
(February, 2006)



Follow-up Survey at Banchare Danda
(February, 2006)



Follow-up Survey at Banchare Danda
(February, 2006)



Planned Balaju Transfer Station Site
(February, 2006)



Planned Afadole Transfer Station Site
(February, 2006)

Follow-up for Environmental and Social Considerations for Facility Development



Landfilling Activities at Sisdol Landfill
(November, 2005)



Operation of Aeration System at Leachate Retention
Pond (November, 2005)



Water Quality Monitoring at Leachate Retention Pond
(January, 2006)



Condition of Sisdol Landfill
(March, 2006)



Condition of Sisdol Landfill
(September, 2006)



Condition of Sisdol Landfill
(March, 2007)

Follow-up for Operation of Sisdol Short-term Landfill Site (1/2)



1st Training for Improvement of Landfill Operation
(September, 2006)



1st Training for Improvement of Landfill Operation
(September, 2006)



2nd Training for Improvement of Landfill Operation
(December, 2006)



2nd Training for Improvement of Landfill Operation
(December, 2006)



3rd Training for Improvement of Landfill Operation
(March, 2007)



3rd Training for Improvement of Landfill Operation
(March, 2007)

Follow-up for Operation of Sisdol Short-term Landfill Site (2/2)



Ceremony of Handing Over of Transportation
Vehicles at Teku T/S (December, 2006)



Loading and Unloading Practices in LSMC
(March, 2006)

Follow-up for Operation of Teku Transfer Station (Secondary Transportation)



Country Focused Training
(December, 2005)



Fukuoka Method Workshop
(December, 2005)



International Conference on SWM
(January, 2006)



Technology Transfer Seminar
(August 2-3, 2006)

Other Relating Activities