1. **Full Title of the Project**

   The Development Study on Water Resources Development and Management for Lake Kyoga Basin in the Republic of Uganda

2. **Type of Study**

   Master plan

3. **Categorization and Its Reason**

   3.1 Categorization

   B

   3.2 Reason

   The results of preliminary scoping of “the master plan for rural water supply” included 4 items rated as “B” (Local economy, Water usage or water rights and communal rights, Sanitation, Groundwater) and 19 items rated as “C”. Other plans to be proposed in the Basic Plan on Water Resources Development and Management will be categorized in the Development Study.

4. **Agency (or Institution) Responsible for Implementing the Project**

   - Directorate of Water Resources and Management, the Ministry of Water and Environment
   - Directorate of Water Development, the Ministry of Water and Environment

5. **Outline of the Project**

   5.1 Objectives

   The objectives of the Study are:
   (1) to formulate a Basic Plan on Water Resources Development and Management for Lake Kyoga Basin
   (2) to formulate a master plan for rural water supply in priority areas
   (3) to transfer technology and knowledge to the counterpart personnel through their direct participation into the Study

   5.2 Location

   The Study will cover Lake Kyoga Basin

   5.3 Proposed Activities

   The Study is divided into the following three phases:
(1) Phase-1: Basic study and identification of problems and issues on water resources development and management in Lake Kyoga Basin
  - Collection and review of basic data and information
  - Field survey and investigation
  - Analysis of present conditions
  - Water demand projection, evaluation of water resources potential, evaluation of water balance between demand and potential
  - Survey on water resources utilization
  - Review of environmental conditions
  - Survey on existing control/management system
  - Social/economic Survey
  - Pre-evaluation of water resources potential
  - Review on previous water resources management plan
  - Formulation of basic strategy for water resources development and management in Lake Kyoga Basin including rural water supply.
  - Selection of priority area(s) for formulation of master plan for rural water supply.

(2) Phase-2: Formulation of a Basic Plan on Water Resources Development and Management in Lake Kyoga Basin
  - Water balance study
  - Water allocation among water sectors
  - Study on efficient utilization/demand side management
  - Groundwater Survey (aerial photo interpretation, geo-physical prospection, test drilling, pumping test, etc.)
  - Evaluation of water resources potential
  - Formulation of a Basic Plan on Water Resources Development and Management, including institutional and policy framework
  - Environmental and social consideration

(3) Phase-3: Formulation of a Master Plan for Rural Water Supply in priority areas
  - Water demand forecast
  - Review on previous water supply plan and alternative plan set up
  - Conceptual design on water supply facilities
  - Initial Environmental Examination
  - Formulation of a operation and maintenance plan in priority area(s)
  - Formulation of a master plan for rural water supply in priority area(s)
  - Evaluation of projects
  - Selection of priority projects

6. Description of the project site (maps, environmental and social condition, current issues, etc)

The Lake Kyoga basin is the largest basin in Uganda and occupies 25% of the area in Uganda or 57,233 km². The basin contains 29 regions with the total population of 7.5 million. Its main industry is cattle breeding and agriculture such as cotton and coffee. The annual rainfall is approximately 600 to 1,400mm with relatively rich water resources such as rivers, lakes, and groundwater.

It should be noted that three satellite lakes and its surrounding wetlands placed east
of Lake Kyoga, namely, Lake Bisina, Lake Nakuwa and Lake Opeta, are registered as designated wetlands under the Ramsar Convention. It is not yet decided whether any activities near the Ramsar Wetlands will be formulated in the Study.

7. **Legal Framework of Environmental and Social Considerations**

8. **Provisional Scoping and Monitoring**

8.1 Provisional scoping of master plan for rural water supply

Because the actual content of the Basic Plan on Water Resources Development and Management to be formulated in Phase-2 is to be decided in the Study, categorization and scoping will be conducted during the course of the Study. It is likely that no interventions containing large scale infrastructure construction will be proposed in the Basic Plan.

Provisional categorization and scoping of the Master Plan for Rural Water Supply to be formulated in Phase-3 is as Table 1 below. 2 or 3 priority regions for the Master Plan for Rural Water Supply will be selected in the Study, although it is unlikely that any rural water supply projects which may effect the environment will be formulated directly near the Ramsar Wetlands.

<table>
<thead>
<tr>
<th>Impact</th>
<th>Rating</th>
<th>Description</th>
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<tbody>
<tr>
<td>1</td>
<td>Involuntary resettlement</td>
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<tr>
<td>2</td>
<td>Local economy such as employment and livelihood, etc.</td>
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<tr>
<td>3</td>
<td>Land split</td>
<td>C</td>
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<tr>
<td>4</td>
<td>Social institutions such as social infrastructure and local decision making institutions</td>
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<tr>
<td>5</td>
<td>Existing social infrastructure and services</td>
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<tr>
<td>6</td>
<td>The poor, indigenous and ethnic people</td>
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<td>7</td>
<td>Misdistribution of benefit and damage</td>
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<tr>
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<td>Cultural heritage</td>
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<td>9</td>
<td>Local conflicts of interest</td>
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<td>11</td>
<td>Sanitation</td>
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<tr>
<td>15</td>
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<td>16</td>
<td>Lakes and rivers</td>
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<tr>
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<td>Sea and sealine</td>
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<td>Accidents</td>
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<td>Overall rating</td>
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</tbody>
</table>

8.2 TOR for the study

Phase-1: Information analyzing and surveillance for below items

(1) rivers and lakes
(2) situation of water resources
(3) water supply, irrigation and hydropower facilities
(4) flood control and drainage facilities
(5) natural and social environment
   • water usage by local people and its surrounding environment
   • baseline survey of social and economic conditions
   • household survey
(6) land development and land use
(7) condition of water supply and sanitation facilities

Phase-2: Conduct preliminary scoping for Basic Plan on Water Resources Development and Management, taking into consideration the below items.

(1) development and management of superficial water
(2) development and management of groundwater
(3) monitoring of groundwater and superficial water
(4) watershed management
(5) regulatory framework for water resources development and management
(6) evaluation of priorities
(7) operation and maintenance
(8) water ration under normal/draught conditions
(9) water environment protection
(10) water supply facilities plan
(11) implementation plan
(12) cost estimation

Phase-3: Conduct scoping and necessary environmental and social considerations study for Master Plan for Rural Water Supply under EIA procedures of Uganda, taking into consideration the items listed in 7.1 above.

(end of document)