Clean Technology Fund
Loan Agreement

(Ukraine District Heating Energy Efficiency Project)

between

UKRAINE

and

INTERNATIONAL BANK FOR RECONSTRUCTION
AND DEVELOPMENT
acting as an implementing entity of the Clean Technology Fund

Dated May 26, 2014
CTF LOAN NUMBER TF016327

CLEAN TECHNOLOGY FUND LOAN AGREEMENT

AGREEMENT dated , entered into between:

UKRAINE ("Borrower") and INTERNATIONAL BANK FOR RECONSTRUCTION
AND DEVELOPMENT ("World Bank" or "Bank"), acting not in its individual capacity
but solely in its capacity as an implementing entity of the Clean Technology Fund
("CTF").

WHEREAS: (A) The Borrower, having been satisfied as to the feasibility and
priority of the Project described in Schedule 1 to this Agreement, has requested the CTF
to assist in the financing of Part 1(b) of the Project;

(B) by an agreement of even date herewith (the IBRD Loan Agreement), the
World Bank has agreed to make a loan (the IBRD Loan) to the Borrower in the amount
of three hundred and thirty two million Dollars (USD 332,000,000) to assist in financing
Parts 1(a) and 2 of the Project on the terms and conditions set forth in the IBRD Loan
Agreement; and

WHEREAS the Bank has agreed, on the basis, inter alia, of the foregoing, to
extend the Loan to the Borrower upon the terms and conditions set forth in this
Agreement;

The Borrower and the Bank hereby agree as follows:

Article I

Standard Conditions; Definitions

1.01. The Standard Conditions (as defined in the Appendix to this Agreement)
constitute an integral part of this Agreement.

1.02. Unless the context requires otherwise, the capitalized terms used in this
Agreement have the meanings ascribed to them in the Standard Conditions or in
the Appendix to this Agreement.

Article II

Loan

2.01. The World Bank agrees to lend to the Borrower, on the terms and conditions set
forth or referred to in this Agreement, the amount of fifty million United States
Dollars ($50,000,000) ("Loan"), to assist in financing Part 1(b) of the project
described in Schedule 1 to this Agreement ("Project").
2.02. The Borrower may withdraw the proceeds of the Loan in accordance with Section IV of Schedule 2 to this Agreement.

2.03. The Loan is funded out of the resources made available to the World Bank as an implementing entity of the CTF. In accordance with Section 3.02 of the Standard Conditions (as defined in the Appendix to this Agreement), the World Bank’s payment obligations in connection with this Agreement are limited to the amount of funds made available to it from the CTF trust fund, and the Borrower’s right to withdraw the Loan proceeds is subject to the availability of such funds.

2.04. The Management Fee payable by the Borrower, pursuant to Section 4.01(a) of the Standard Conditions, shall be equal to forty-five one-hundredth of one percent (0.45%) of the Loan.

2.05. The Service Charge payable by the Borrower on the Withdrawn Loan Balance shall be equal to three-fourths of one percent (3/4 of 1%) per annum.

2.06. The Payment Dates are June 15 and December 15 in each year.

2.07. The principal amount of the Loan shall be repaid in accordance with the repayment schedule set forth in Schedule 3 to this Agreement.

2.08. The Payment Currency is USD.

**Article III**

**The Project**

3.01. The Borrower declares its commitment to the objectives of the Project. To this end, the Borrower, through Minregion, shall cause Part 1 (b) of the Project to be carried out by the respective Participating DH Companies (Project Implementing Entities) in accordance with the provisions of Article II of the Standard Conditions and each Project Agreement.

3.02. Without limitation upon the provisions of Section 3.01 of this Agreement, and except as the Borrower and the World Bank shall otherwise agree, the Borrower, through Minregion, shall ensure that the Project is carried out in accordance with the provisions of Schedule 2 to this Agreement.

**Article IV**

**Additional Remedies**

4.01. The Additional Event of Suspension consists of the following, namely that a Project Implementing Entity’s Legislation has been amended, suspended, abrogated, repealed or waived so as to affect materially and adversely the ability
of such Project Implementing Entity to perform any of its obligations under the Project Agreement.

4.02. The Additional Event of Acceleration consists of the following, namely that the event specified in Section 4.01 of this Agreement occurs.

**Article V**
**Effectiveness; Termination**

5.01. The Additional Conditions of Effectiveness consist of the following:

(a) At least five Subsidiary Agreements have been executed on behalf of the Borrower, through MOF and Minregion, and five Participating DH Companies.

(b) The Project Operations Manual, in form and substance satisfactory to the Bank, has been finalized and adopted by Minregion and each Participating DH Company.

(c) The IBRD Loan Agreement has been executed and all conditions precedent to its effectiveness and to the right of the Borrower to make withdrawals under it (other than the effectiveness of this Agreement) have been satisfied or waived.

5.02. The Additional Legal Matter consists of the following, namely that the five Subsidiary Agreements referred to in Section 5.01(a) above have been duly authorized or approved by the Borrower and the respective Project Implementing Entities and are legally binding upon the Borrower and such Project Implementing Entities in accordance with its terms.

5.03. The Effectiveness Deadline is the date ninety (90) days after the date of this Agreement.

5.04. Any amendment to this Agreement shall be executed by agreement of the parties hereto in accordance with the provisions of Section 10.02 of the Standard Conditions. Such amendment shall become effective as set forth in the amending agreement.

**Article VI**
**Borrower's Representative; Addresses**

6.01. The Borrower's Representative referred to in Section 10.02 of the Standard Conditions is its Minister of Finance.
6.02. The Borrower’s Address referred to in Section 10.01 of the Standard Conditions is:

Ministry of Finance
12/2 Hrushevsky St.
Kyiv, 01008
Ukraine

Facsimile:
(380-44) 425-90-26
(380-44) 277-54-82

6.03. The World Bank’s Address referred to in Section 10.01 of the Standard Conditions is:

International Bank for Reconstruction and Development
1818 H Street, N.W.
Washington, D.C. 20433
United States of America

Cable: INTBAFRAD
Telex: 248423 (MCI) or 1-202-477-6391
Washington, D.C. 64145 (MCI)
AGREED at Kiev, Ukraine, as of the day and year first above written.

UKRAINE

By

[Signature]

Authorized Representative

Name: Aleksandr Shlapak

Title: Minister of Finance of Ukraine

INTERNATIONAL BANK FOR RECONSTRUCTION AND DEVELOPMENT
acting as an implementing entity of the Clean Technology Fund

By

[Signature]

Authorized Representative

Name: Gimiao Fan

Title: Country Director, Belarus, Moldova and Ukraine

- 5 -
SCHEDULE 1
Project Description

The objective of the Project is to improve the energy efficiency and quality of service of selected Ukrainian district heating companies, improve their financial viability and decrease their CO2 emissions.

The Project consists of the following parts:

Part 1: Energy Efficiency Investments

Implementation of Energy Efficiency Investments specified in a Participating DH Company’s Investment Program, through the following interventions:

(a) Rehabilitation of boiler houses, closing of redundant boiler houses, installation of small CHPs, replacement of network pipes with pre-insulated pipes and installation of SCADA management systems, and related EEI Implementation Costs.

(b) Installation of IHSs in residential buildings and installation of building-level heat meters.

Part 2: Technical Assistance and Capacity Building

Support to Minregion for Project management including for establishment of, and training and technical assistance to, the CPMU, supervision of Project implementation, guidance and training in project implementation, monitoring and evaluation to the Participating DH Companies; carrying out of capacity building workshops to the Participating DH Companies, carrying out sector-wide knowledge sharing and project results dissemination workshops, carrying out of surveys among the Participating DH Companies’ customers; preparation of consolidated annual Project audits; preparation of required studies related to the Project and financing of Incremental Operating Costs.
SCHEDULE 2

Section I. Implementation Arrangements

A. Institutional Arrangements

1. The Borrower shall:

(a) ensure that the Project is carried out in accordance with the procedures set forth in the POM and shall ensure that the POM is not amended, suspended, abrogated, repealed and that no provision of the POM is waived, without prior approval of the Bank.

(b) through Minregion, maintain the CPMU within Minregion, throughout the duration of the Project, in a form and with functions, staffing, (under terms of reference, qualifications and scope of responsibilities) and adequate resources, all satisfactory to the Bank and as further set forth in the POM; the CPMU shall be responsible for supervision of Project implementation, including the overall supervision of implementation of Energy Efficiency Investments of a Participating DH Company under Part I of the Project, for data collection, preparation of consolidated Project reports and financial reports, providing support to PIUs on all financial management, procurement and environmental and social compliance matters, monitoring environmental and social aspects of Project implementation, and general oversight of and coordination between the Participating DH Companies.

B. Subsidiary Agreement

1. To facilitate the carrying out of each Participating DH Company’s Respective Part of the Project under Part 1 (b) of the Project, namely in each Participating DH Company’s case the Participating DH Company’s Investment Program’s Energy Efficiency Investments falling within Part 1(b) of the Project, the Borrower, through MOF, shall make the respective part of the proceeds of the Loan available to each Participating DH Company under a Subsidiary Agreement, under terms and conditions approved by the Bank, which shall include the following:

(a) The principal amount of the Loan made available under the Subsidiary Agreement (“Subsidiary Loan”) shall be: (i) in an amount equivalent to the Energy Efficiency Investments under the Participating DH Company’s Investment Program to be supported by Part 1(b) of the Project, as reflected for the relevant Participating DH Company in Category I of the table set forth in Section IV. A. 2 of Schedule 2 to this Agreement, as such amounts may be adjusted from time to time with the prior consent of the Bank upon the request of the Borrower; (ii)
denominated and repayable in Dollars; (iii) charged interest on the principal amount withdrawn and outstanding from time to time at the rate applicable to the Loan from time to time under Section 2.05 of this Agreement, and charged a fee, to be deducted from the Subsidiary Loan principal amount, at a rate that equals the rate applied to the Loan under Section 2.04 of this Agreement and charged a fee of 0.01 percent on the amount of the Subsidiary Loan principal amount; and (iv) repayable over a period not exceeding the maturity of the Loan, inclusive of a grace period not exceeding 10 years.

(b) The Participating DH Company shall be responsible for implementing its Energy Efficiency Investments in accordance with the POM, PLESA, including the RPF, and shall maintain its PIU throughout the duration of the Project for this purpose, in a form and with functions, staffing, (under terms of reference, qualifications and scope of responsibilities) and adequate resources, all satisfactory to the Bank and as further set forth in the POM. The Participating DH Company shall not amend, suspend, abrogate, repeal or waive any provision of the POM without prior approval of the Bank.

(c) The Participating DH Company shall submit, each year, its annual Investment Program to such Borrower agency or agencies as required pursuant to the Borrower’s applicable legislation, for approval by such agency or agencies.

(d) The Participating DH Company shall obtain any necessary legal or administrative permissions, licenses, permits, usage rights, authorizations and any other consents as may be required for the implementation and maintenance of the Energy Efficiency Investments under the Borrower’s legal framework.

(e) The Participating DH Company shall comply with the financial covenants and all other provisions set forth in its respective Project Agreement and its respective Subsidiary Agreement.

2. The Borrower, through MOF and Minregion, shall exercise its rights under the Subsidiary Agreement in such manner as to protect the interests of the Borrower and the Bank and to accomplish the purposes of the Loan. Except as the Bank shall otherwise agree, the Borrower shall not assign, amend, abrogate or waive the Subsidiary Agreement or any of its provisions.

3. (a) Except as the Bank shall otherwise agree, the Borrower shall take all necessary measures to establish tariffs in the district heating sector at a level that will ensure that each Participating DH Company shall be able to produce for each of its fiscal years, during Project implementation, after its fiscal year ending on
December 31, 2016, total revenues equivalent to not less than the sum of its (i) total operating expenses; and (ii) the amount by which debt service requirements exceed the provision for depreciation; for purposes of this Section 1.B.3, the terms "total revenues", and "total operating expenses" and other terms used in this Section shall have the meanings set forth in the Participating DH Company’s Project Agreement.

(b) If the Borrower has failed to comply with paragraph (a) above, the Bank may, without limitation to Article VII of the Standard Conditions, in its sole discretion, reallocate the amounts of the Unwithdrawn Loan Balance allocated to a non-performing Participating DH Company to another Participating DH Company.

C. Anti-Corruption

The Borrower shall ensure that the Project is carried out in accordance with the provisions of the Anti-Corruption Guidelines.

D. Safeguards

1. The Borrower, through Minregion, shall ensure, and cause each Participating DH Company to ensure, that the Project is carried out in accordance with the PLESA, including the RPF, and shall not amend, suspend, abrogate, repeal or waive any provision of the PLESA, including the RPF, without prior written approval of the Bank.

2. The Borrower, through Minregion, shall: (a) prior to the commencement of any works for Energy Efficiency Investments on each proposed site, submit to the Bank for its approval (i) the proposed site for said measures and the related site-specific EMP or checklist and/or, if required pursuant to the RPF, a RAP, said site-specific plan or checklist or RAP to be prepared in accordance with the requirements of the PLESA (including the RPF) and in form and substance satisfactory to the Bank, and to be duly included in the proposed contracts for said measures; (ii) evidence that such EMP or checklist and/or RAP, as applicable, has been disclosed locally and that adequate and meaningful consultations have been carried out on said EMP, checklist and/or RAP, as applicable; and (b) ensure that such measures are carried out in accordance with the EMP and/or RAP, as applicable.

Section II. Project Monitoring, Reporting and Evaluation

A. Project Reports; Completion Report

1. The Borrower, through Minregion, shall monitor and evaluate the progress of the Project and prepare Project Reports in accordance with the provisions of Section 2.06 of the Standard Conditions and on the basis of the indicators acceptable to
the World Bank. Each Project Report shall cover the period of one calendar quarter, and shall be furnished to the World Bank and the Borrower’s Ministry of Economic Development and Trade not later than forty-five (45) days after the end of the period covered by such report.

2. The Borrower, through Minregion, shall prepare the Completion Report in accordance with the provisions of Section 2.06 of the Standard Conditions. The Completion Report shall be furnished to the World Bank not later than six (6) months after the Closing Date.

B. Financial Management; Financial Reports; Audits

1. The Borrower, through Minregion, shall ensure that a financial management system is maintained in accordance with the provisions of Section 2.07 of the Standard Conditions.

2. Without limitation on the provisions of Part A of this Section, the Borrower, through Minregion, shall ensure that interim unaudited financial reports for the Project are prepared and furnished to the World Bank as part of the Project Report not later than forty-five (45) days after the end of each calendar quarter, covering the quarter, in form and substance satisfactory to the World Bank.

3. The Borrower, through Minregion, shall have its Financial Statements for the Project audited in accordance with the provisions of Section 2.07 (b) of the Standard Conditions. Each such audit of the Financial Statements shall cover the period of one fiscal year of the Borrower. The audited Financial Statements for each such period shall be furnished to the World Bank not later than six (6) months after the end of such period.

Section III. Procurement

A. General

1. Goods, Works and Non-consulting Services. All goods, works and non-consulting services required for the Project and to be financed out of the proceeds of the Loan shall be procured in accordance with the requirements set forth or referred to in Section I of the Procurement Guidelines, and with the provisions of this Section.

2. Consultants’ Services. All consultants’ services required for the Project and to be financed out of the proceeds of the Loan shall be procured in accordance with the requirements set forth or referred to in Sections I and IV of the Consultant Guidelines and with the provisions of this Section.
3. Definitions. The capitalized terms used below in this Section to describe particular procurement methods or methods of review by the Bank of particular contracts refer to the corresponding method described in Sections II and III of the Procurement Guidelines, or Sections II, III, IV and V of the Consultant Guidelines, as the case may be.

B. Particular Methods of Procurement of Goods, Works and Non-consulting Services

1. International Competitive Bidding. Except as otherwise provided in paragraph 2 below, goods, works and non-consulting services shall be procured under contracts awarded on the basis of International Competitive Bidding.

2. Other Methods of Procurement of Goods, Works and Non-consulting Services. The following methods, other than International Competitive Bidding, may be used for procurement of goods, works and non-consulting services for those contracts specified in the Procurement Plan: (a) Shopping; (b) Direct Contracting; and (c) National Competitive Bidding, subject to the additional provisions set forth in the Annex to this Schedule 2.

C. Particular Methods of Procurement of Consultants' Services

1. Quality- and Cost-based Selection. Except as otherwise provided in paragraph 2 below, consultants' services shall be procured under contracts awarded on the basis of Quality and Cost-based Selection.

2. Other Methods of Procurement of Consultants' Services. The following methods, other than Quality and Cost-based Selection, may be used for procurement of consultants' services for those contracts which are specified in the Procurement Plan: (a) Selection under a Fixed Budget; (b) Least Cost Selection; (c) Selection based on Consultants' Qualifications; (d) Single-source Selection of consulting firms; (e) Procedures for the Selection of Individual Consultants; and (f) Single-source procedures for the Selection of Individual Consultants.

D. Review by the Bank of Procurement Decisions

1. The Procurement Plan shall set forth those contracts which shall be subject to the Bank's Prior Review. All other contracts shall be subject to Post Review by the Bank.

2. The Borrower, through Minregion, shall:

(a) No later than December 31 of every year during the implementation of the Project, beginning on December 31, 2015, prepare and furnish to the
Bank a procurement progress report (Procurement Progress Report), in form and substance acceptable to the Bank, which shall include, inter alia: (i) a description of issues arising during the full procurement cycle under the Project, from design through planning, bidding, contract implementation and completion; (ii) a list of proposed measures and actions to be taken to resolve the issues identified under (i) above; and (iii) a proposed timeline for the implementation of the said measures and actions.

(b) No later than January 31 of every year during the implementation of the Project, beginning on January 31, 2016, exchange views with the Bank on the results of the Procurement Progress Report completed for the Borrower's previous calendar year and thereafter implement such recommended measures, as agreed with the Bank.

Section IV. Withdrawal of Loan Proceeds

A. General

1. The Borrower may withdraw the proceeds of the Loan in accordance with the provisions of Article III of the Standard Conditions, this Section, and such additional instructions as the Bank shall specify by notice to the Borrower (including the "World Bank Disbursement Guidelines for Projects" dated May 2006, as revised from time to time by the Bank and as made applicable to this Agreement pursuant to such instructions), to finance Eligible Expenditures as set forth in the table in paragraph 2 below.

2. The following table specifies the categories of Eligible Expenditures that may be financed out of the proceeds of the Loan ("Category"), the allocation of the amounts of the Loan to each Category, and the percentage of expenditures to be financed for Eligible Expenditures in each Category:
<table>
<thead>
<tr>
<th>Category</th>
<th>Amount of the Loan Allocated (expressed in USD)</th>
<th>Percentage of Expenditures to be financed (inclusive of Taxes)</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1) Goods, works, non-consulting services, and consultants' services and EEI Implementation Costs for Part I (b) of the Project:</td>
<td></td>
<td>100%</td>
</tr>
<tr>
<td>i. Public Power-generating Utility &quot;Chernihivska Teploelektrocentral&quot; of Limited Liability Company Firm &quot;TehNova&quot;</td>
<td>4,755,000</td>
<td></td>
</tr>
<tr>
<td>ii. Public Utility &quot;Dniproteploenerho&quot; of Dnipropetrovsk Oblast' Council</td>
<td>4,755,000</td>
<td></td>
</tr>
<tr>
<td>iii. Public Commercial Utility &quot;Donetskmiskteplomerezha&quot;</td>
<td>4,755,000</td>
<td></td>
</tr>
<tr>
<td>iv. State Municipal Utility &quot;Ivano-Frankivskteplokomunenerho&quot;</td>
<td>0</td>
<td></td>
</tr>
<tr>
<td>v. Public Utility &quot;Kharkivski Teplovi Merezhi&quot;</td>
<td>10,755,000</td>
<td></td>
</tr>
<tr>
<td>vi. Municipal Public Utility &quot;Kheronteploenerho&quot;</td>
<td>1,640,000</td>
<td></td>
</tr>
<tr>
<td>vii. Subsidiary Enterprise &quot;Kirovohradteplo&quot; of Limited Liability Company &quot;Center of Scientific and Technical Innovations of Ukrainian Oil and Gas Academy&quot;</td>
<td>4,755,000</td>
<td></td>
</tr>
<tr>
<td>viii. Public Utility &quot;Miskepteplovodenerhia&quot; of Kamianets-Podilskyi City Council</td>
<td>1,990,000</td>
<td></td>
</tr>
<tr>
<td>ix. Oblast' Public Utility &quot;Mykolaivobteploenerho&quot;</td>
<td>2,370,000</td>
<td></td>
</tr>
<tr>
<td>x. Public Utility of Vinnytsia City Council &quot;Vinnysiamiskepteploenerho&quot;</td>
<td>6,720,000</td>
<td></td>
</tr>
<tr>
<td>(2) Management Fee</td>
<td>225,000</td>
<td>Amount payable pursuant to Section 2.04 of this Agreement in accordance with Section 4.01 (a) of the Standard Conditions</td>
</tr>
<tr>
<td>(3) Unallocated</td>
<td>7,280,000</td>
<td></td>
</tr>
<tr>
<td>TOTAL AMOUNT</td>
<td>50,000,000</td>
<td></td>
</tr>
</tbody>
</table>
B. Withdrawal Conditions; Withdrawal Period

1. Notwithstanding the provisions of Part A of this Section, no withdrawal shall be made:

   (a) for payments made prior to the date of this Agreement; or

   (b) under Category (1) for each withdrawal to a Participating DH Company, unless the Subsidiary Agreement related to the relevant Participating DH Company has been executed on behalf of the Borrower, through MOF and Minregion, and the relevant Participating DH Company, and a legal opinion, satisfactory to the Bank, has been provided by counsel acceptable to the Bank, confirming that such Subsidiary Agreement has been duly authorized or approved by the Borrower and such Participating DH Company and is legally binding upon the Borrower and such Participating DH Company in accordance with its terms.

1. The Closing Date is October 30, 2020.
ANNEX

to

SCHEDULE 2

Mandatory Provisions for Procurement under
Bank-Financed Contracts Subject to National Competitive Bidding

The procedure to be followed for National Competitive Bidding ("NCB") shall be the Open Tender Procedure set forth in the Law on Public Procurement No. 1197-VII, dated April 10, 2014 and amendments thereto, provided, however, that such procedure shall be subject to the provisions of Section I and Paragraphs 3.3 and 3.4 of the "Guidelines for Procurement of Goods, Works, and Non-Consulting Services under IBRD Loans and IDA Credits & Grants by World Bank Borrowers" (January 2011) (the "Procurement Guidelines") and the following additional provisions:

(i) Bidding Documents, acceptable to the Bank, shall be used.

(ii) The eligibility of bidders to participate in a procurement process and to be awarded a Bank-financed contract shall be as defined under Section I of the Procurement Guidelines; accordingly, no bidder or potential bidder shall be declared ineligible for contracts financed by the Bank for reasons other than those provided in Section I of the Procurement Guidelines.

(iii) After the public opening of the bids, information relating to the examination, clarification, and evaluation of bids and recommendations concerning awards shall not be disclosed to bidders or other persons not officially concerned with this process until the publication of the contract award notice.

(iv) Qualification criteria shall be clearly specified in the bidding documents. Qualification shall be assessed on a "pass or fail" basis, and merit points shall not be used. Such assessment shall be based entirely upon the bidder's or prospective bidder's capability and resources to effectively perform the contract, taking into account objective and measurable factors, including: (i) relevant general and specific experience, and satisfactory past performance and successful completion of similar contracts over a given period; (ii) financial position; and where relevant (iii) capability of construction and/or manufacturing facilities. The availability of equipment, material and technical basis, including owning production facilities and/or service centers within the territory of Ukraine shall not be required as part of qualification requirements.
(v) Government-owned enterprises are eligible to bid only if they (i) are legally and financially autonomous, (ii) operate under commercial law, and (iii) are not dependent agencies of Borrower or Sub-Borrower.

(vi) Evaluation of bids shall be made in strict adherence to the evaluation criteria specified in the bidding documents. Evaluation criteria other than price shall be quantified in monetary terms. Merit points shall not be used, and no minimum point or percentage value shall be assigned to the significance of price, in bid evaluation.

(vii) If required, bid security amount shall not exceed two percent (2%) of the estimated cost of the contract.

(viii) No advance payments shall be made to contractors/suppliers without a suitable advance payment security.

(ix) No domestic preference shall be granted in bid evaluation on the basis of bidder nationality, origin of goods or services, and/or preferential programs. Contracts shall be awarded to the qualified bidder whose bid has been determined: (i) to be substantially responsive to the bidding documents, and (ii) to offer the lowest-evaluated cost. A bidder shall not be eliminated from detailed evaluation on the basis of minor, non-substantial deviations.

(x) No bid shall be rejected on the basis of a comparison with the employer's estimate or budget allocation ceiling without the Bank's prior concurrence.

(xi) All bids (including in the case when less than two bids are received) shall not be rejected, the procurement process shall not be cancelled, and new bids shall not be solicited without the Bank's prior concurrence.

(xii) Restrictions to the contract amendments, as contemplated under Article 40 of the PPL will not apply. With respect to contracts subject to the Bank's prior review, the Borrower shall obtain the Bank's no objection before agreeing to: (a) a material extension of the stipulated time for performance of a contract; (b) any substantial modification of the scope of services or other significant changes to the terms and conditions of the contract; (c) any variation order or amendment which, singly or combined with all variation orders or amendments previously issued, increases the original contract amount by more than 15 percent; or (d) the proposed termination of the contract. A copy of all contract amendments shall be provided to the Bank.

(xiii) The bidding document and contract as deemed acceptable by the Bank shall include provisions stating the Bank's policy to sanction firms or individuals, found to have engaged in fraud and corruption as defined in the Procurement Guidelines.

(xiv) In accordance with the Procurement Guidelines, each bidding document and contract financed out of the proceeds of the Bank financing shall provide that bidders, suppliers, contractors and their subcontractors, agents, personnel,
consultants, service providers, or suppliers to permit the Bank to inspect all accounts, records and other documents relating to the bid submission and performance of the contract and to have said accounts and records audited by auditors appointed by the Bank. Acts intended to materially impede the exercise of the Bank’s inspection and audit rights provided for in the Procurement Guidelines constitute an obstructive practice as defined in the Guidelines.
SCHEDULE 3

Repayment Schedule

<table>
<thead>
<tr>
<th>Date Payment Due</th>
<th>Principal Amount of the Loan repayable (expressed as a percentage)</th>
</tr>
</thead>
<tbody>
<tr>
<td>On each June 15 and December 15, commencing June 15, 2024 to and including December 15, 2033:</td>
<td>5%</td>
</tr>
</tbody>
</table>
APPENDIX

Definitions


2. "Category" means a category set forth in the table in Section IV of Schedule 2 to this Agreement.

3. "CHP" means a combined heat and power plant.


5. "CPMU" means the Central Project Management Unit within Minregion, established pursuant to Minregion's Order Number #558 of November 27, 2013 and referred to in Section I.A. of Schedule 2 to this Agreement.

6. "Environmental Management Plan" or "EMP" means any site-specific environmental management plan, prepared in accordance with the PLESA and the provisions of Section I.D.2 of Schedule 2 to this Agreement and acceptable to the Bank, and giving details the specific actions, measures and policies designed to facilitate the achievement of the objective of the PLESA, setting forth the mitigating, monitoring and institutional measures to be taken during the implementation and operation of an Energy Efficiency Investment to offset or reduce adverse environmental impacts to levels acceptable to the Bank, including the budget and cost estimates, and sources of funding, along with the institutional and procedural measures needed to implement such actions, measures and policies.

7. "EEI Implementation Costs" means a Participating DH Company's PIU's reasonable operational costs related to implementation of the Energy Efficiency Investments financed under the Loan, including on account of vehicle rental; miscellaneous utilities; stationary and office supplies and equipment; operation, maintenance and spare parts of equipment; consumables; transportation; local travel; communication and advertisement costs; salaries of PIU staff, but excluding consultants' services and salaries or honoraria of officials and employees of the Borrower's civil services, as such costs are included in the budget of a Participating DH Company's Investment Program and agreed with the Bank.
8. “Energy Efficiency Investments” means a Participating DH Company’s selected energy efficiency investments at selected sites, included and specified in such Participating DH Company’s Investment Program, and selected in accordance with the criteria and mechanisms set forth in the POM.

9. “IHS” mean an individual building-level heat sub-station.

10. “Incremental Operating Costs” means the CPMU’s reasonable and necessary incremental expenditures related to the management and implementation of the Project, all based on periodic budgets acceptable to the Bank, including on account of vehicle rental; miscellaneous utilities; stationary and office supplies and equipment; operation, maintenance and spare parts of equipment; consumables; transportation; local travel; communication and advertisement costs;, but excluding consultants’ services and salaries or honoraria of officials and employees of the Borrower’s civil services.

11. “Investment Program” means a program setting forth a variety of measures, approved by such Borrower agency or agencies and in accordance with such appropriate procedures as required pursuant to the Borrower’s applicable legislation, to improve reliability and assure efficiency of a district heating system, and including obligations of a Participating DH Company on (i) construction, renovation, rehabilitation, modernization of assets; and (ii) improvement of the quality of service, including necessary calculations and substantiations as well as identifying sources of financing and implementation schedules, and acceptable to the Bank.

12. “Ministry of Finance” or “MOF” means the Borrower’s Ministry of Finance and includes any successor thereto.

13. “Minregion” means the Borrower’s Ministry of Regional Development, Building and Communal Services and includes any successor thereto.

14. “Participating DH Company” means each of the following district heating companies (a) Public Power-generating Utility “Chernihivska Teploelektrocentral” of Limited Liability Company From “TehNova”, established and operating pursuant to the Chernihivska Teploelektrocentral Legislation; (b) Public Utility “Dniproteploenerho”, of Dnipropetrovsk Oblast Council, established and operating pursuant to the Dniproteploenerho Legislation; (c) Public Commercial Utility “Donetskmiskteplomerezha”, established and operating pursuant to the Donetskmiskteplomerezha Legislation; (d) State Municipal Utility “Ivano-Frankivskteplokomunenerho”, established and operating pursuant to the Ivano-Frankivskteplokomunenerho Legislation; (e) Public Utility “Kharkivski Teplovi Merezhi”, established and operating pursuant to the Kharkiv Teplovi Merezhi Legislation; (f) Municipal Public Utility Khersonteploenerho, established and operating pursuant to the
Khersonteploenerho Legislation; (g) Subsidiary Enterprise “Kirovohradteplo” of Limited Liability Company “Center of Scientific and Technical Innovations of Ukrainian Oil and Gas Academy” established and operating pursuant to the Kirovohradteplo Legislation; (h) Public Utility “Miskoteplovodenerhia” of Kamianets-Podilskyi City Council, established and operating pursuant to the Miskoteplovodenerhia Legislation, (i) Oblast Public Utility “Mykolaivobleteploenerho”, established and operating pursuant to the Mykolaivobleteploenerho Legislation; and (j) Public Utility of Vinnytsia City Council “Vinnytsiamiskteploenerho”, established and operating pursuant to the Vinnytsiamiskteploenerho Legislation.

15. “PIU” means a Participating DH Company’s project implementation unit and referred to in Section I.B.1(b) of Schedule 2 to this Agreement.

16. “PLESA” means the program level environmental and social assessment (including the RPF) prepared by the Borrower, through Minregion, for the Project dated November 21, 2013, being the framework setting forth the modalities for site-specific environmental screening and procedures/actions for the preparation and implementation of environmental assessments and EMPs under the Project, setting forth the set of mitigation, monitoring, and institutional measures and procedures required under the Project, in order to eliminate adverse environmental and social impacts, offset them, or reduce them to acceptable levels, as well as actions needed to implement said measures, as the same may be amended from time to time with the agreement of the Bank.

17. “POM” or “Project Operational Manual” means the operational manual adopted by Minregion, and each Participating DH Company and referred to in Section I.A.1(a) and I.B.1(b) of Schedule 2 to this Agreement, setting forth the operational requirements, criteria, institutional arrangements and operational procedures for the implementation of the Project, including, inter alia, procurement, financial management, disbursement, accounting, audit, environmental and social safeguards requirements, monitoring and evaluation arrangements, as amended from time to time with the agreement of the Bank.


19. “Procurement Plan” means the Borrower’s procurement plan for the Project, dated April 4, 2014 and referred to in paragraph 1.18 of the Procurement Guidelines and paragraph 1.25 of the Consultant Guidelines, as the same shall be updated from time to time in accordance with the provisions of said paragraphs.

21. "Project Implementing Entity's Legislation" means each of the following: (a) Articles of Agreement approved by Protocol of General Shareholders' Meeting of October 14, 2013 pursuant to which Public Power-generating Utility "Chernihivska Teploelektrocentral" of Limited Liability Company Firm "TehNova" was established and operating (Chernihivska Teploelektrocentral Legislation); (b) Decision of Dnipropetrovsk Oblast Council No. 661-22/y, dated December 18, 2009, pursuant to which Public Utility "Dniproteploenerho" of Dnipropetrovsk Oblast' Council was established and is operating (Dniproteploenerho Legislation); (c) Charter approved by Decree of Head of Donetsk City Council No. 1216, dated September 17, 2008 pursuant to which Public Commercial Utility "Donetskmiskteplomerezha", was established and operating (Donetskmiskteplomerezha Legislation); (d) Charter approved by Decision of Ivano-Frankivsk City Council No. VII, dated September 12, 2006, pursuant to which Ivano- State Municipal Utility "Ivano-Frankivskteplokomunenerho", was established and is operating (Ivano-Frankivskteplokomunenerho Legislation); (e) Charter approved by Decision of Kharkiv City Council No. 952, dated September 30, 2003, pursuant to which Public Utility "Kharkivski Teplovi Merezhi" was established and is operating (Kharkiv Teplovi Merezhi Legislation); (f) Charter approved by Decision of Kherson City Council No. 506 dated December 28, 2011, pursuant to which Municipal Public Utility "Khersonteploenerho" was established and is operating (Khersonteploenerho Legislation); (g) Articles of Agreement approved by Protocol of General Meeting No. 20, dated September 28, 2004 pursuant to which Subsidiary Enterprise "Kirovohradteplo" of Limited Liability Company "Center of Scientific and Technical Innovations of Ukrainian Oil and Gas Academy" was established and is operating (Kirovohradteplo Legislation); (h) Charter approved by Decision of Kamyanyets-Podilskyi City Council executive committee No.613, dated May 16, 2013, pursuant to which Public Utility "Miskteplovodenerhia" of Kamyanyets-Podilskyi City Council was established and is operating (Miskteplovodenerhia Legislation), (i) Charter approved by Head of Mykolaiv Regional Administration, dated November 03, 2006, pursuant to which Oblast' Public Utility "Mykolaivobteploenerho" was established and is operating (Mykolaivobteploenerho Legislation); and (j) Decision of Vinnytsia City Council No. 905, dated August 31, 2012, pursuant to which Public Utility of Vinnytsia City Council "Vinnytsiamiskteploenerho" was established and is operating (Vinnytsiamiskteploenerho Legislation).

22. "Resettlement Action Plan" or "RAP" means each site-specific plan relating to land acquisition and/or resettlement or economic displacement of Project-affected persons, as the case may be, prepared under the Project in accordance with the Resettlement Policy Framework and the provisions of Section I.D.2 of Schedule 2 to this Agreement and acceptable to the Bank.
23. "Resettlement Policy Framework" or "RPF" means the framework document adopted by the Borrower, through Minregion, and each Participating DH Company dated November 21, 2013, attached as an Annex to the PLESA and describing the process and procedures to be taken, the plans to be prepared, and the mitigation and compensation measures, and consultation and information processes to be followed in the event of land acquisition or resettlement or economic displacement of persons affected by the Project as a result of implementation of the Project.

24. "SCADA" means a Supervisory Control and Data Acquisition system of hardware and software, monitoring and control generation, transmission and distribution of heat of a district heating system.


26. "Subsidiary Agreement" means each agreement between MOF, Minregion, and each Participating DH Company, referred to in Section I.B.1 and 2 of Schedule 2 to this Agreement pursuant to which the Borrower shall make the respective proceeds of the Loan available to each Participating DH Company.

27. "Training" means Project-related training, and includes Project related study tours, training courses, seminars, workshops and other training activities, not included under service providers' contracts, including costs of training materials, space and equipment rental, reasonable and necessary local and international travel by participants in training activities, reasonable lodging and accommodation, subsistence and local and international per diem of trainees and trainers, registration, tuition and facilitators' fees, translation and interpretation, and other training related miscellaneous costs, all based on budgets acceptable to the Bank.