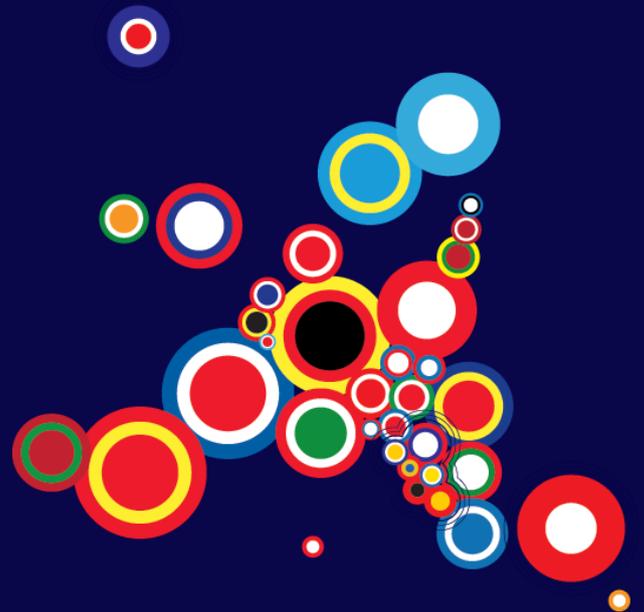




INSTRUMENT FOR PRE-ACCESSION ASSISTANCE (IPA II) 2014-2020

Kosovo*

EU Support to clean air in
Kosovo



Action summary

The main objective of this action is to support the environmental aspects of the energy sector by reducing the environmental impact of the largest power plant in Kosovo – known as Kosovo B. The action will aim at reducing air pollution by replacing/rehabilitating environmental components of Unit B1 of the Thermal Power Plant (TPP) Kosovo B (dust filters, internal ash transport system and Nitrogen Oxides (NOX) emission reduction equipment). Hence, the action will support Kosovo in complying with its legislation plan for reduction of emissions and with the acquis on environment, namely the Large Combustion Plants Directive (LCP) and the Industrial Emissions Directive (IE), as required by the Energy Community Treaty for reduction of emissions.

*This designation is without prejudice to positions on status, and is in line with UNSCR 1244 and the ICJ Opinion on the Kosovo Declaration of Independence'

Action Identification	
Action Programme Title	Annual Action Programme for Kosovo for the Year 2018
Action Title	EU support to clean air in Kosovo
Action ID	IPA 2018 / 041246 / 05/ Kosovo/Energy
Sector Information	
IPA II Sector	Energy
DAC Sector	23070
Budget	
Total cost	EUR 40 000 000
EU contribution	EUR 40 000 000
Budget line(s)	22 02 01 02
Management and Implementation	
Management mode	Direct management
<i>Direct management:</i>	European Union Office in Kosovo
Implementation responsibilities	European Union Office in Kosovo
Location	
Zone benefiting from the action	Kosovo
Specific implementation area(s)	Kosovo
Timeline	
Final date for concluding Financing Agreement(s) with IPA II beneficiary	At the latest by 31 December 2019
Final date for concluding delegation agreements under indirect management	
Final date for concluding procurement and grant contracts	3 years following the date of conclusion of the Financing Agreement, with the exception of cases listed under Article 114(2) of the Financial Regulation
Final date for operational implementation	6 years following the conclusion of the Financing Agreement
Final date for implementing the Financing Agreement (date by which this programme should be de-committed and closed)	12 years following the conclusion of the Financing Agreement

Policy objectives / Markers (DAC form)			
General policy objective	Not targeted	Significant objective	Main objective
Participation development/good governance	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Aid to environment	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Gender equality (including Women In Development)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Trade Development	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Reproductive, Maternal, New born and child health	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
RIO Convention markers	Not targeted	Significant objective	Main objective
Biological diversity	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Combat desertification	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Climate change mitigation	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Climate change adaptation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

1. RATIONALE

PROBLEM AND STAKEHOLDER ANALYSIS

Kosovo has inherited a large number of environmental problems accumulated over decades of uncontrolled use of natural and mineral resources, industrial production coupled with very high levels of pollution. The overall environmental situation in Kosovo has worsened over the past years, with increased constructions, traffic and industrial pollution including the pollution from power plants and household heating during the winter.

The 2018 Kosovo report mentions that measures to improve air quality still need to be adopted. Air quality, particularly in urban areas, continues to pose a major threat to public health.

The total estimated economic costs due to health effects of air pollution in Kosovo range from EUR 37 million to EUR 158 million a year, (0.89 to 3.76 percent of GDP). The table below presents the exposed population for 3 defined scenarios:

Category\estimate	Low	Mid	High
Mortality: adults	29,973,823	84,442,006	142,453,784
Mortality: children	232,258	267,514	304,572
Chronic bronchitis	821,763	1,276,667	1,760,920
Hospital admissions	233,932	362,999	500,131
Emergency room visits	455,463	707,595	975,993
Restricted activity days	2,552,296	3,966,004	5,468,837
Lower respiratory illness in children	931,027	1,439,229	1,992,154
Respiratory symptoms	2,031,439	3,156,141	4,353,499
Total cost (€)	37,232,002	95,618,156	157,809,890
Total cost (% of GDP)	0.89	2.28	3.76

Source: Monetary effects of health impacts of the "Environmental and Social Impact Assessment (ESIA)" performed in 2017 as part of the EU financed "Feasibility study for environmental and other measures on Kosovo B Thermal Power Plant"

The European Environment Agency's Report on Air Quality in Europe 2017 shows also health impacts of exposure to fine particulate matter, ozone and nitrogen oxides in Europe. Kosovo ranks the second worst after Bulgaria in premature deaths attributable to dust/particulate matter (PM_{2.5}), NO₂, and O₃ exposure in 41 European countries, with 3000 deaths in 2014 (0,166% of population). Kosovo also ranks the second worst, after Bulgaria in terms of Years of life lost (YLL) attributable to PM_{2.5}, NO₂, and O₃ exposure, with 1824/100,000 inhabitants (Bulgaria 1873, the third is the former Yugoslav Republic of Macedonia with 1578).

The 2018 Kosovo report also points out the lack of enforcement of Kosovo's strategy for air quality and of the law on ambient air quality. Uncontrolled pollution from the energy sector – particularly from the Kosovo B power plant and household heating – but also from industrial complexes, road traffic, and incineration of waste and other toxic materials remains a serious problem.

Kosovo is also lacking enforcement of the EU Environmental Liability Directive and this undermines the effectiveness of environmental protection. The use of environmental and strategic impact assessments needs to be improved considerably, especially in industrial sectors with significant effects on the environment such as energy and transport.

Currently, 97 % of the electricity is generated by two lignite combustion power plants (Kosovo A and B), and the remaining part is generated by small hydro plants. Although Kosovo generates electricity from its own sources, the demand is not fully met by domestic generation and it depends on electricity imports which constitute up to 12% of the overall annual demand.

The existing TPPs, Kosovo A (three available units - total power of 610 MWe (megawatt electrical) and Kosovo B (two units - total power of 678 MWe) are old plants and the source of largescale pollution in Kosovo. They are the main sources of dust, nitrogen oxides (NO_x) and sulphur dioxide (SO₂) emissions.

The TPP Kosovo A has already exceeded its lifetime and large investments would be needed for its rehabilitation and to bring it closer to the required environmental standards. Given its limited operational lifetime, large investments are not considered by the government as economically feasible¹. However, TPP Kosovo A is expected to continue its operation until the planned new power plant "Kosovo e Re" (a privately operated 500 MW KRPP) will be functional.

The TPP Kosovo B is the largest and most important electricity generator in Kosovo with a total installed capacity of 678 Mwe. During the period between 2010 and 2015 TPP Kosovo B generated between 3.5 and 4 million MWh (megawatt hour) of electricity yearly. Moreover, TPP Kosovo B delivers 140 MWt (thermal megawatt) to the district heating system of Pristina (operated by the Distric Heating Company - Termokos).

The EU financed Technical Assistance project "*Feasibility Study for Environmental and other measures on Kosovo B Thermal Power Plant*" completed in May/June 2017 , concluded that in both generation units of Kosovo B TPP, the dust and NO_x emissions are exceeding by far the Industrial Emission Directive (IED) emission limit values. It also points out that the most significant health effects of Kosovo B TPP are caused by particulate matter which are responsible for increases in cardiopulmonary and lung cancer mortality from long-term exposure and for chronic bronchitis and respiratory diseases.

The National Energy Strategy² states that the rehabilitation of TPP Kosovo B is a necessity. The objectives of the National Energy Strategy are to improve the plant reliability, increase its power-generating capacity, and enable its compliance with environmental standards³. Kosovo has ratified the Energy Community Treaty and is a member of the common electricity market of Europe.

The Kosovo Environmental Strategy (KES) and National Environmental Action Plan (NEAP) 2011-2015, have a list of long-term objectives for environmental protection which includes reducing pollutant emissions including environmental degradation and damage, and minimising or prohibiting those economic activities that are dangerous for human health and the environment

During the winter 2017/2018, the Ministry of Environment and Spatial Planning (MESP) prepared a "Plan of measures for improving the quality of air and environment condition". This plan has a clear list of short-term, mid-term and long-term measures that will increase the efficiency of the implementation of legislation and by-laws, the implementation of the Strategy and the Action Plan on air quality. In this plan also the refurbishment of Kosovo B is mentioned as a priority.

¹ Study for Decommissioning of Kosovo-A power plant, Evonik Industries, March 2010

² Kosovo National Energy Strategy adopted by Parliament January 26th 2018

³ Energy Strategy of Kosovo 2009-2018, page 69

The limits required by LCP and IE Directives are less than **20 mg/m³** for dust emission and less than **200 mg/m³** for NO_x emission.

In accordance with the National Emission Reduction Plan (NERP) that Kosovo has prepared in line with the terms of the Energy Treaty, the limits of emissions of dust and NO_x must be fulfilled by 1/01/2023, while the SO_x limits shall be fulfilled by 1/01/2028.

The emissions of dust and NO_x from TPP Kosovo B are well over critical point. The last systematic measurement of emissions of PM/dust and NO_x (conducted in September 2016), recorded the following quantities of PM and NO_x emissions:

- Average dust: Unit B1 - 243.31 and 389.34 mg/m³; Unit B2 - 560.3 and 896.0 mg/m³ (>>200 mg/m³)
- Average NO_x: Unit B1 – 809.67 and 674.27 mg/m³; Unit B2 – 843.2 and 846.9 mg/m³ (>>200 mg/m³)⁴.

Moreover, operation of TPP Kosovo B without necessary investments on upgrading the Electrostatic Precipitators/ESPs (dust filters) and constructing the De-NO_x plant to ensure its compliance with LCPD/IED within timeframe of Energy Community Treaty, may lead to early termination of operations due to breach of Kosovo environmental legislation and legal international commitments. In that case, Kosovo would face grave problems with its security of supply considering that Kosovo B supplies more than half of the current domestic electricity demand.

The proposed action aims at initiating the improvement of the environmental performance of Kosovo B reducing the dust and NO_x emissions in line with the mentioned National Emission Reduction Plan (NERP) and fundamentally improving the air quality in Kosovo.

The measures for reduction of dust and NO_x emissions on the first unit are planned to be implemented during April - October 2020. As per government planning, the second unit should be improved in a second stage during the period April – October 2021. This planning was decided by the government and the Kosovo Energy Corporation J.S.C. (KEK) in close cooperation with the EU Office in Kosovo in order to harmonise all the activities in the TPP Kosovo B. The proposed action is in line with Kosovo strategies and maintenance activities to be conducted by KEK on both generation units.

The timing of the implementation of the works is of crucial importance due to the need for energy supply for citizens. Particular attention needs to be given to the already planned outage period mentioned above by the government and KEK and therefore every change of this outage period will be costly reflected in Kosovo's and KEK budget.

In order to be in line with the above-mentioned planning this action is programmed to cover the works in Kosovo Unit B1 (in 2020). The unit B2 will be refurbished in 2021 and the identification of the financing is at present in progress. The present action however will cover the supervision for both units. The main stakeholders are MESP, the Ministry of Economic Development (MED) and KEK. As stated in the National Energy Strategy, these two main stakeholders are expected to take the necessary measures to retrofit TPP Kosovo B, the largest electricity generator in Kosovo and the most important in terms of security of supply.

⁴ Table containing min, average and max values is attached in Annex

The City of Pristina and the Municipalities of Obiliq/Obilić and Fushe Kosova/Kosovo Polje are also direct stakeholders.

OUTLINE OF IPA II ASSISTANCE

The present action addresses the immediate need of reducing the environmental impact of the Kosovo B power plant.

Considering Kosovo's energy sector challenges, the overall objective of IPA II support in the energy sector is to help Kosovo in ensuring a reliable and clean energy supply and align its legislation to EU energy standards. Priorities identified for IPA support are in accordance to the strategic objectives established in the Kosovo Energy Strategy and the Indicative Strategy Paper/ISP Objectives. Taking into consideration the described problems and challenges, the present action will contribute in improving the environmental performance of the Kosovo B TPP. In this context, this project regards the first stage of the process of making Kosovo B compliant with the LCP and the IE.

The full process of the environmental improvement of the plant can be described as follows:

1. Measures for reducing dust and NO_x emission limits will be implemented for Unit B1 and will be financed by the present action : the works will be carried out in 2020
2. Measures for reducing dust and NO_x emission limits will implemented for Unit B2 through the works that will be carried out in 2021. The identification of the financing is at present in progress.
3. Measures for reducing SO_x emissions limits will be implemented in the period 2023-2027. The financing will be identified in 2020-21.

At the end of the full process the Kosovo B plant will be fully compliant with both Directives mentioned above. The present action is the first important step of this complex process.

This project is focused on the execution of the environmental measures identified in the Feasibility Study mentioned above and regards the replacement of dust filters (Electrostatic Precipitators/ESPs) , the related internal ash transport system and the construction of De-NO_x facilities for reduction of NO_x emissions in unit B1 to be implemented in 2020. When completed, this action will result in dust emissions of less than 20 mg/Nm³ which currently is estimated at 316 mg/Nm³ on average, and NO_x emissions less than 200 mg/Nm³ which is currently is estimated at 740 mg/Nm³. These results are both in line with the LCP and IE Directives requirements.

For the works, the best available technology will be used. The de-NO_x facilities will include an optimal set of primary measures (to avoid negative effects like increased fuel consumption) and a Selective Non-Catalytic Reaction (SNCR) facility, which is the Best Available Technology for ignition. As part of the project, the existing Continuous Emission Monitoring System (CEMS) installed at Kosovo B TPP will be upgraded and maintained in order to be fully operational Information regarding emissions should be continuously and transparently available.

Overall, the impact of this action will be reflected in several domains with the aim to improve the life of the citizens. The improved air quality will have an immediate effect in the health indicators and the related health costs for the citizens living nearby and in the surrounding municipalities. The most important benefit of this action for the citizens of Kosovo will be secure and reliable power supply for the households and the businesses which will have an immediate effect in their wellbeing as well as the economic prosperity.

RELEVANCE WITH THE IPA II STRATEGY PAPER AND OTHER KEY REFERENCES

The Indicative Strategy Paper (ISP) clearly identifies the energy sector challenges for Kosovo, with the overall objective of IPA II in the energy sector to help Kosovo ensure a reliable and clean energy supply, and align its legislation to EU energy standards. In this context, in the revised Indicative Strategy Paper, “environment and climate change” has been added as one sector among the priority areas for IPA support in Kosovo.

Under the EU strategy for Western Balkans, the European Commission announced six flagship initiatives that are specific actions that the EU will take over the next years to support the transformation efforts of the Western Balkans in the area of mutual interest where expanding the EU Energy Union to the Western Balkans belongs. Strategy also underlines the need for the EU to be prepared to welcome new members once they have met the criteria including those related to the Energy Sector.

Regarding these problems and challenges, the ISP states that IPA II will support Kosovo in the approximation of the EU acquis in the field of energy, environment, climate change and nuclear safety, in particular by supporting the closure and decommissioning of the TPP Kosovo A, reducing emissions from Kosovo B TPP in lines with the limits fixed by the EU directives, increasing the energy efficiency in district heating systems and public buildings, and promoting the increase of renewable energy share in energy consumption. Also, it should be mentioned that one of main objectives of IPA II regarding the energy production is to contribute to the reduction of its environmental and health impact.

This Action also will contribute to the implementation of the EU Gender Action Plan II (GAP II), objective 16; “Equal access and control over clean water, energy, transport infrastructure, and equitable engagement in their management, enjoyed by girls and women”, among others.

LESSONS LEARNED AND LINK TO PREVIOUS FINANCIAL ASSISTANCE

Key to the implementation of such a complex and high value investment is the supervision, management capacity and future sustainability. Training of the staff in handling responsibilities regarding the implementation of such complex action is necessary for all direct beneficiaries of this action such as MED, MESP and KEK`s management including the Kosovo B TPP's management.

In the past, the EU has provided similar support to Kosovo B TPP in improving the environment, including upgrading the existing dust filter (ESP) on the generation unit B1. This action (financed by IPA I) was implemented during the period 2003 and 2006. Therefore, the experience amongst some of the existing staff members has already been gained. However, the Kosovo B TPP staff lack experience related to the construction, operation and maintenance of De-NOx facilities that Kosovo B TPP did not have in the past. Appropriate training will be provided to KEK staff in order to have a smooth process in the handover of the new facilities.

2. INTERVENTION LOGIC

LOGICAL FRAMEWORK MATRIX

OVERALL OBJECTIVE	OBJECTIVELY VERIFIABLE INDICATORS (*)	SOURCES OF VERIFICATION	
To support the energy sector by reducing the environmental impact of the largest power plant in Kosovo – known as Kosovo B	<ol style="list-style-type: none"> 1. Progress made towards meeting Copenhagen criteria. 2. Air pollution level. 	<p>Kosovo Report from the European Commission</p> <p>Different reports prepared by the MED, MESP, KEK, TPP Kosovo B</p>	
SPECIFIC OBJECTIVE	OBJECTIVELY VERIFIABLE INDICATORS (*)	SOURCES OF VERIFICATION	ASSUMPTIONS
To replace/rehabilitate environmental components of Unit B1 of TPP Kosovo B (dust filters, internal ash transport system and Nitrogen Oxides (NOx) emission reduction equipment) in compliance with Large Combustion Plant/LCP Directive and Industrial Emission/IE Directive.	Dust (particles) and NOx emissions levels.	Continuous Emission Monitoring System/CEMS installed in TPP Data from MED, MESP and KEK	Reliable technology is selected, and works are properly done, supervised and verified.
RESULTS	OBJECTIVELY VERIFIABLE INDICATORS (*)	SOURCES OF VERIFICATION	ASSUMPTIONS
<p>Dust emissions reduced.</p> <p>Nitrogen Oxides (NOx) emissions reduced.</p>	<p>Compliance with LCP and IE Directives measurement for:</p> <ul style="list-style-type: none"> • Dust emissions: < 20 mg/Nm³, and • NO_x emissions: < 200 mg/Nm³. 	Continuous Emission Monitoring System/CEMS installed in TPP Data from MED, MESP and KEK	Timely completion of the works in accordance with technical specifications.

DESCRIPTION OF ACTIVITIES

The Action is focused on the reduction of dust/PM and NO_x emissions from TPP Kosovo B 1 Unit in order to meet the norms determined by LCP and IE Directives.

Activities:

1. Replacement of Electrostatic Precipitators/ESPs) on generation unit B1 of Kosovo B TPP including the internal ash transport system.

2. Construction of De-NO_x facilities on generation unit B1 of Kosovo B.

- Preparatory activities:
 - Completion of the Tender Dossier including the preliminary design, functional specification, the budget breakdown and all other necessary documents in line to PRAG procurement rules and conditions.
 - Tendering of the works and signature of the works contract/s.
- Upgrading activities (only main activities are listed):
 - Necessary engineering works including a detailed design as per "Design and Build" requirements;
 - Equipment procurement, manufacturing and factory testing;
 - Repairing and strengthening existing concrete dust filters (Electrostatic Precipitators/ESPs) foundation structure and extend it to fit with the enlarged new dust filters;
 - Replacement of the existing dust filters including the internal ash transport system;
 - Implementation of the system for reduction of NO_x emissions including all necessary modifications needed;
 - Commissioning and acceptance testing and handing over to the final beneficiary;
 - Post implementation activities, i.e. activities in Defect Notification Period;
 - Implementation of on-the-job training by the works contractor in operation and maintenance of the facilities installed.

RISKS

Potential risks that are identified at the initialization of the Action are:

- Lack of timely coordination between the relevant institutions in the implementation of the assistance.
- Lack of sufficient professional capacities for specific projects.
- Reluctance of specialised companies to participate in the implementation of projects.
- Poor cooperation between stakeholders.

- Poor coordination between the Contractor/s and stakeholders.
- Traditional behaviors among women and men, resistant to changing their way of living towards energy efficiency.

These risks can be mitigated by increased communication, better management and a proper training and capacity building program.

Potential risks that are identified for the implementation process of the Action are Health & Safety risks and risks of changes:

- Lack of engineering control system.
- Functional safety.
- Accidents, injuries and death.
- Changes of scope, schedule, costs, quality, etc.

It is recommended that before the Action implementation starts, appropriate H&S Plan, Quality Plan, and Risk Management Plan are prepared, reviewed, and approved.

The following assumption is considered: KEK and TPP Kosovo B should ensure the implementation of other environmental measures in line Energy Community Treaty/ECT requirements.

CONDITIONS FOR IMPLEMENTATION

All relevant specific institutional frameworks exist. Kosovo is a member of the Energy Community, and starting from 01st January 2018 all international regulations are applicable.

The preconditions that have to be fulfilled include:

- Kosovo's commitment stipulating that Kosovo B power plant will remain under the public ownership for a period of at least 10 years,
- The Preliminary Action timeline is prepared, and KEK should develop the overhaul plan for TPP Kosovo B (and other electricity generators) harmonised with the timing of the present action.
- KEK-Kos B TPP coordination team set-up, properly briefed and in charge of the follow-up of the operations

3. IMPLEMENTATION ARRANGEMENTS

ROLES AND RESPONSIBILITIES

Main stakeholders responsible for the implementation of this action are MED and KEK as the main beneficiaries of the project. Other institutions that will also be involved include MESP, the Ministry of European Integration (MEI), Ministry of Labor and Social Welfare (MLSW), Ministry of Health (MH), Ministry of Finance (MF) and Energy Regulator Office (ERO).

The European Union Office in Kosovo will play an important role in cooperating with local institutions and other mechanisms established for the implementation of these actions.

A Steering Committee for monitoring and coordinating the execution of project/s will be set up.

Other stakeholders, as the Association of Women in the Energy Sector in Kosovo (AWESK) created in 2017 and the Municipality of Obiliq/Obilić will be involved.

IMPLEMENTATION METHOD(S) AND TYPE(S) OF FINANCING

This Action will be implemented through direct management, through work/s and service/s contracts (including supervision services).

4. PERFORMANCE MEASUREMENT

METHODOLOGY FOR MONITORING (AND EVALUATION)

The European Commission may carry out a mid-term, a final or an ex-post evaluation for this action or its components via: independent consultants, or via an implementing partner. In case a mid-term or final evaluation is not foreseen, the European Commission may, during implementation, decide to undertake such an evaluation for appropriately justified reasons either on its own decision or by the initiative of the partner. The evaluations will be carried out as prescribed by the DG NEAR guidelines for evaluations. In addition, the action might be subject to external monitoring in line with the European Commission rules and procedures set in the Financing Agreement. The aim of external monitoring is to provide an independent view and focuses on problematic actions pinpointed by operational managers in their annual risk assessment exercise. It consists of a quick review, based on standard criteria, designed to give a brief snapshot of the quality of a project/programme and recommendations for EUDs/HQ services on how to improve it.

INDICATOR MEASUREMENT

Indicator	Baseline (2016) (2)	Target 2020 (3)*	Final Target (2025) (4)	Source of information
CSP indicator (impact/outcome)...(1)				
Compliance with LCP and IE Directives**	Average dust emission: 243.31–389.34 mg/Nm ³ Average NO_x emission: 890.67-674.27 mg/Nm ³	Average dust emission: 243.31–389.34 mg/Nm ³ Average NO_x emission: 890.67-674.27 mg/Nm ³	Dust B1 emission: < 20 mg/Nm ³ NO_x emission: < 200 mg/Nm ³	<ol style="list-style-type: none"> 1. Testing of ESPs and De-NO_x facilities after the completion of the Action. 2. Final reports submitted by the Supervisor/Engineer and by the Contractor. 3. Continuous Emission Monitoring System/CEMS of TPP Kosovo B. 4. Reports published by MED and KEK. 5. Regular measurements of periodic emissions required by Law.

*The value of 2020 does not reflect any progress for this indicator because only in 2020 the actual works under the action will begin.

**MED and KEK have taken the necessary measures for initiating the refurbishment of TPP Kosovo B and the reduction of the emissions of pollutants to the level that satisfies requirements of LCP and IE Directives. TPP Kosovo B, with two units, has the total power of 678 MWe. Unit B1 operates from 1983; Unit B2 from 1984 year. In spite of the fact that TPP Kosovo B is relatively old, it is still the main electricity generator in Kosovo's Energy System, producing more than half of the electricity. However, TPP Kosovo B emits large quantities of pollutants. Reducing emissions of dust/PM and NO_x to the levels required by LCP and IE Directives are the main results that are expected by this Action.

5. SECTOR APPROACH ASSESSMENT

Kosovo is committed to ensure qualitative and reliable energy supply and environment protection.

MED is the main institutions to exercise drafting the legislation, policies, strategies and plans for Kosovo's energy sector, as well as oversee their implementation always considering the environment protection.

The key strategies to develop the energy sector are the Energy Strategy 2017-2026 and National Development Strategy 2016-2021, aiming the security of energy supply and environmental protection. They both provide an ambitious range of policy initiatives.

The sector strategy objectives are drafted and identified with the cooperation of the Energy Community Secretariat in order to reform the energy sector in Kosovo in line with best EU experiences, directives, and EU standards 20/20/20 that need to be achieved by 2020.

In the context of the Energy Treaty Kosovo has prepared the National Emission Reduction Plan (NERP) fixing among other things the deadlines for emission limits that are regulating the functioning of power plants.

This Action has a direct link with the EU strategy for Western Balkans, where the European Commission announced six flagship initiatives as specific actions for Western Balkans for developing of energy sector.

However, Kosovo yet needs to increase the security and quality of energy supply, improve the environmental impact of the energy activities, especially by taking advantage of the significant energy efficiency potential primarily in the buildings stock, as well as development of RES based energy capacities as envisaged in the new strategy.

Within the Kosovo Institutions, MEI is responsible for coordinating donor assistance. The Aid Management Platform, established with EU support, is used as a main tool for monitoring donor activities. Sector working groups, aiming at coordinating donor activities, have been revitalised and there is a commitment from Kosovo government to schedule regular meetings with the donor community through sub-sector and sector working groups; those would then report to the High Level Forum. The EU Office regularly participates in the Donor Consultation Meeting (DCM) chaired by MEI and which includes the EU Member States and other bilateral and multilateral donors (USAID, BMZ/GIZ, KFW, World Bank, UN agencies, etc.).

To monitor the implementation of the strategy, the Ministry prepares a three-year strategy implementation program. This program includes all projects/measures envisaged to be implemented in the mid-term period (three years). For each project/measure costs, measurable indicators, and implementing institutions are defined. All relevant stakeholders of the energy and environmental sectors contribute in drafting of this program.

6. CROSS-CUTTING ISSUES

GENDER MAINSTREAMING

Women are not enough represented in the energy sector in Kosovo and around the world. There is a need to bring more women into the energy workforce, to empower them as decision-makers in the sector, and to ensure they have equal access to education, advancement, and professional development.

The Constitution of Kosovo “ensures gender equality as a fundamental value for the democratic development of the society, providing equal opportunities for both female and male participation in the political, economic, social, cultural and other areas of societal life” (Art. 7).

Pursuant to the Kosovo Law on Gender Equality and the Law on Anti-Discrimination, women are encouraged to apply at all levels of employment within the sectors relevant to this project towards achieving an improved gender balance. In line with the Law on Gender Equality, the Ministry will take positive measures to provide internships for, recruit, hire, as well as promote women to higher decision making levels within the Sector.

The Action will involve the integration of a gender perspective into the preparation, design, implementation, monitoring and evaluation with a view to promoting equality between women and men, and combating discrimination. Steps also will be taken in the elaboration of a gender analysis and collecting and analysing sex-disaggregated data towards integrating Gender Responsive Budgeting in budgetary processes.

The activities designed and implemented will ensure that the following regulation and legislation will be applied such as: the UN Convention on the Elimination of All Forms of Discrimination Against Women (Art. 22); The Law on gender Equality 2015; The Recast EU Directive (2006/54/EC) on Equal Opportunities and Equal Treatment of women and men in employment and occupation; the Directive on Equal Treatment of Men and Women in the Access to and the Supply of Goods and Services (2004/113); and “the Joint Staff Working Document on Gender Equality and Women's Empowerment -Transforming the Lives of Girls and Women through EU External Relations 2016-2020” (also known as the EU Gender Action Plan - GAP“ P), particularly objectives 16 and 20.

EQUAL OPPORTUNITIES

Kosovo is fully committed to a policy of equal opportunities. The design and the implementation of the actions will be transparent. All necessary steps will be considered to ensure the equal participation of men and women. It is important to mention that the Kosovo institutions and KEK as beneficiaries - are also particularly sensitive to equal opportunities and gender related issues in regards to supported investment, mainstreaming, and gender impact-assessment approaches in the supported actions.

MINORITIES AND VULNERABLE GROUPS

The interventions will in no way harm the rights of any individuals, including minorities and vulnerable groups; on the contrary, it will support vulnerable community, it will strongly support and facilitate minorities and vulnerable *groups* including both women/men within these groups.

ENGAGEMENT WITH CIVIL SOCIETY (AND IF RELEVANT OTHER STAKEHOLDERS)

Discussions with civil society were pursued throughout the drafting processes of energy strategy, EE and RES plans, and relevant legislation. Civil society will continue to remain included and informed for future policy development, project drafting and implementation through public discussions and campaigns. Women's rights organisations will be more included in the future.

Public discussions will provide means for easier access, review and address of issues of interest for the society. Such discussions will make sure to include diverse women and men. Media will also be part of these activities, in order to adequately inform the diverse women and men on the respective matters and development. All activities related to energy and environmental sector projects will be developed in accordance with relevant and applicable Kosovo legislation, while ensuring close cooperation with relevant municipalities.

ENVIRONMENT AND CLIMATE CHANGE (AND IF RELEVANT DISASTER RESILIENCE)

With regards to environment, this is one of the target sectors of the proposed intervention. All environmental laws, regulations and directives abided by in Kosovo that are directly linked to this action are taken into account in designing the action proposal, i.e. "The Law on Environmental Protection", "Law on Air Protection", "Law on Environmental Impact Assessment", Law on Waste, etc.

After the implementation of the action, the TPP Kosovo B unit B1 compliance with LCP and IE Directive requirements concerning dust/PM and NO_x emissions will be enhanced, and will contribute to improve air quality and reduce pollution of soil and underground waters in the Pristina district, Obiliq/Obilic, and Fushe Kosova/Kosovo Polje municipalities.

The Kosovo's budget devoted to the sector is insufficient, while at the same time environmental and climate change mitigation and adaptation concerns are not mainstreamed into other policies. The lack of human, administrative, and financial capacities to implement EU environmental and climate standards has been also reiterated in the European Commission's Staff Working Document "Commission Communication on a Feasibility Study for a Stabilisation and Association Agreement between the European Union and Kosovo", Brussels, 23 October, 2012.

The first Green House Gases/GHG inventory was prepared in 2012, with support from UNDP, there is still no register of sources and emissions of GHGs and a baseline year, from which GHG emissions will be measured, has not been identified as yet. The results of GHG inventory showed that Kosovo compared to EU has low emissions per capita, but high emissions per unit GDP (per capita t CO₂ equivalent: Kosovo 5.7/EU 9.9; per Euro GDP kg CO₂ equivalent: Kosovo 0.84/EU 0.4).

However, Kosovo has not yet started to submit National Communications to the Climate Change Secretariat in the UNFCCC. In 2014, the first Climate Change Framework Strategy (CCFS) for Kosovo was finalised with the support of the Austrian Development Cooperation, UNDP Bratislava Regional Centre and the United Nations Development Programme (UNDP) in Kosovo. The CCFS consists of two components: Low Emission Development Strategy (LEDS) and National Adaptation Strategy (NAS). It is an initial step in an adaptive management feedback policy process. It is also an opportunity to look for mitigation and adaptation measures that will boost sustainable development. It is crucial for responding and anticipating the impacts of climate change in Kosovo.

7. SUSTAINABILITY

The implementation of activities intended to reduce the dust/PM and NO_x emissions represents a good basis for creating the right policy for implementing future major energy and environmental projects in Kosovo with the aim of fulfilling the environmental criteria in line with the relevant EU Directives.

In the context of the present action, technical assistance is foreseen to support KEK in ensuring the proper handover and management of the new Facility. This is first step of the process of rehabilitation of TPP Kosovo B to proceed towards the full compliance with EU directives. Kosovo and KEK are committed to the maintenance and development of the process, ensuring that sufficient resources are mobilised.

The implementation of the action in TPP Kosovo B will create an opportunity to adequately plan investments into the improvement of environmental standards and technologies, but also improve management capability of the staff to modernise the organisation and implementation of complex projects, which will essentially improve the stability and security of generated electricity. In addition, the action is supporting the implementation of EU environmental and energy policies contributing to long-term sustainable economic and social development.

8. COMMUNICATION AND VISIBILITY

Communication and visibility should be given high importance during the implementation of the Action. The implementation of the communication activities shall be funded from the budget allocated to this Action.

All necessary measures will be taken to publicise the fact that the action has received funding from the EU in line with the EU communication and visibility requirements in force. All stakeholders and implementing partners shall ensure the visibility of EU financial assistance provided through IPA II throughout all phases of the programme cycle.

Visibility and communication actions shall demonstrate how the intervention contributes to the agreed programme objectives, as well as the benefits of the action for the general public. Actions shall be aimed at strengthening general public awareness and support of interventions financed and the objectives pursued. The actions shall aim at highlighting to the relevant target audiences the added value and impact of the EU's interventions and will promote transparency and accountability on the use of funds.

Visibility and communication aspects shall be complementary to the activities implemented by DG NEAR and the EU Delegations in the field.

Furthermore, the installation of two digital information panels displaying the information concerning performances of the rehabilitated TPP Kosovo B including emissions (that are in accordance with LCP and IE Directives) could also be an effective tool for visibility.

Annex I: Table with results of the emissions measurement from September 2016

		Unit B1		Unit B2	
		Ch. 1	Ch. 2	Ch.1	Ch.2
	Min	208.69	321.6	637.5	580.1
Dust/PM (mg/Nm³)	Ave	243.31	389.34	809.67	674.27
	Max	277.93	457.08	902.9	727.5
	Min	542.53	782.86	827.5	763.5
NOx (mg/Nm³)	Ave	560.3	896.0	843.2	806.9
	Max	579.56	1031.9	855.1	835.2