



Stakeholders Engagement and Natural Resources Assessment for AES Levant in East Amman

Sustainable Ecosystem Management for Climate Change
Adaptation and Environmental Pollution Control of Al
Manakher and Al Khashafiyah.

Credits:

The designation of geographical entities in this book, and the presentation of the material, do not imply the expression of any opinion whatsoever on the part of IUCN concerning the legal status of any country, territory, or area, or of its authorities, or concerning the delimitation of its frontiers or boundaries.

The views expressed in this publication do not necessarily reflect those of IUCN.

This publication has been made possible in part by funding from the AES Levant Holdings BV under the Stakeholders Engagement and Natural Resources Assessment for AES Levant in East Amman project frequently referred to as AES Levant project.

Published by: IUCN Regional Office for West Asia (ROWA)

Produced by: IUCN Regional Office for West Asia (ROWA)

Copyright: © 2022 IUCN, International Union for Conservation of Nature and Natural Resources

Reproduction of this publication for educational or other non-commercial purposes is authorized without prior written permission from the copyright holder provided the source is fully acknowledged. Reproduction of this publication for resale or other commercial purposes is prohibited without prior written permission of the copyright holder.

Project team:

IUCN team: Dr. Hany al Shaer/ Dr. Laith AlRahaleh/ Suzan Al Kaki/ Emma Kool/ Roaa Abu Azzam

AES Levant Team: Ahmad Alnahr/ Mohammed Al Qudah

Covers photos: IUCN ROWA/ Razan Baqain

Layout and Design by: Razan Baqain

All pictures used in this publication are property of IUCN ROWA.

Acknowledgement from IUCN ROWA

The IUCN is committed to continuing its efforts to develop stronger public-private partnerships, wider stakeholder involvement, and knowledge and skills sharing. The IUCN aims to conserve natural ecosystems and habitats, promote the sustainable use of landscapes, influence, encourage and assist societies to protect their natural resources, and ensure they have the abilities and capabilities to withstand the extreme climate conditions that affect their livelihoods.

The collaboration between the IUCN and AES Levant is strongly aligned with the IUCN's global efforts to overcome global challenges facing the world in nature conservation and influencing government policies. This project was implemented in partnership with local authorities and communities and aimed at achieving the goal of biodiversity conservation and fostering coexistence with local communities.

It is with great pleasure to introduce our sincere appreciation to the AES Levant for the unique and fruitful partnership and the outstanding contribution the AES Levant has made to the local communities in East of Amman. Indeed, public-private partnership is highly recognized by the international community as a pivotal instrument for communities' development, elevating poverty, and assisting vulnerable communities to better adapt to climate change and the associated severe events.

The AES Levant and through its proactive social and environmental responsibility and innovative approaches to tackling local challenges represents a fascinating and long-term form of private sector hand-by-hand stakeholders' participation in achieving the UN sustainable development goals whilst bolstering the role and objectives of international organizations of which the IUCN striving hard to achieve. This unique partnership resulted in implementation several local development projects, innovative clean energy solutions, and small income-generating initiatives based on local needs and through an effective stakeholder participatory approach.

This booklet is a joint effort between the International Union for Conservation of Nature and the AES Levant in the implementation. This partnership was formed as part of the Stakeholders Engagement and Natural Resources Management Project for East Amman. IUCN has designed the project to develop and implement a strategic environmental community action plan for sustainable investment in the area through community involvement and capacity building in the targeted areas in East Amman.

The AES Levant and IUCN together have made an impressive contribution and shall be regarded as a great replicable model for other influential actors in the private sector to achieve bigger goals and implement environmentally friendly and sustainable projects. The project provided a unique opportunity for community members in the two target areas (AL Manakher and AL Khashafiyah-Sahab district) to effectively engage in decision-making and identify local priorities.

The project created a platform to foster informed local dialogue bringing together public and private sectors, civil society, environmental experts, and local communities in a unique collaboration. Accordingly, stakeholders identified their local environmental and socioeconomic priorities as a first step to designing joint interventions that tackle investment in biodiversity conservation and supporting livelihoods. We would like to extend our deepest gratitude to the AES Levant company represented by the AES Levant Holdings BV Managing Director in Jordan Mr. Peter Kuijs, and the Manager of Health, Safety, Security, and Environment Mr. Mohammad Al Qudah and Eng. Ahmad ALNahar for supporting and overseeing the implementation of the project.

My deep appreciation also goes to the project team from IUCN (International Union for the Conservation of Nature) Regional Office for West Asia (ROWA), namely Dr. Laith Al Rahleh, Suzan Al Kaki, Roaa Abu Azzam, and Emma Kool, for all their help, guidance and logistic support during this mission, and most importantly, a special appreciation goes to our colleague Amer Meadat (RIP) who dedicated his time to the success of the project.

I take this opportunity to introduce my sincere appreciation to all who participated in the implementation of this project, with hopes that this excellent partnership continues to prosper and grow.

Sincerely yours,

Dr. Hany El Shaer
IUCN West Asia Regional Director



Acknowledgement from AES

AES is a global power company. We provide affordable and sustainable energy to 15 countries through our diverse portfolio of distribution businesses as well as thermal and renewable generation facilities. We know how to generate energy from different sources and our deep knowledge in the field made us to be aware that the most valuable energy is the one that people bring. I hope that the energy of the local community will continue transforming the region converting it in an even better place to live and do business and we will be honored to support this transformation!

AES Jordan is a values-oriented company working to improve the life of the communities we serve and we constantly work toward enhancing the way of living of the local communities. . And for our relatively long presence in Jordan, we have clearly showed our commitment to the needs of the people. We are happy to be involved in projects that make difference and truly benefit the way our friends, living near the energy facilities we are operating, are shaping the future. Nowadays the responsibilities of every business have changed significantly, and the success is measured not only by the financial and operational results, but also, if not more, by the positive impact it has on the local communities and the Corporate Social Responsibility programs it implements.

Projects aim at engaging stakeholders in seeking solutions to social and environmental challenges affecting the east Amman area in Jordan. These solutions are built on the stakeholders' decisions on what social and environmental issues matter most to them to improve decision-making and accountability.

The projects were designed to develop and implement a strategic environmental community action plan for sustainable investment in the area through community involvement and capacity building in the targeted areas in East Amman.

I am glad that this project shows on a very clear way the importance of the cooperation between the government, IUCN ROWA our businesses. Our joint efforts could enhance the level of services for the local population and to provide better life.

The projects provided a unique opportunity for members of the community in the target areas to effectively engage in decision-making and participate in identifying local priorities. An impartial analysis of the baseline conditions was conducted to allow for participatory planning for sustainably managing the community's natural resources.

Finally, I would like to thank and appreciate IUCN ROWA and all parties who participated in those projects and We all the time look forward to more success and achievements in this field.

Eng Feras Hammad



Eng Feras Hammad

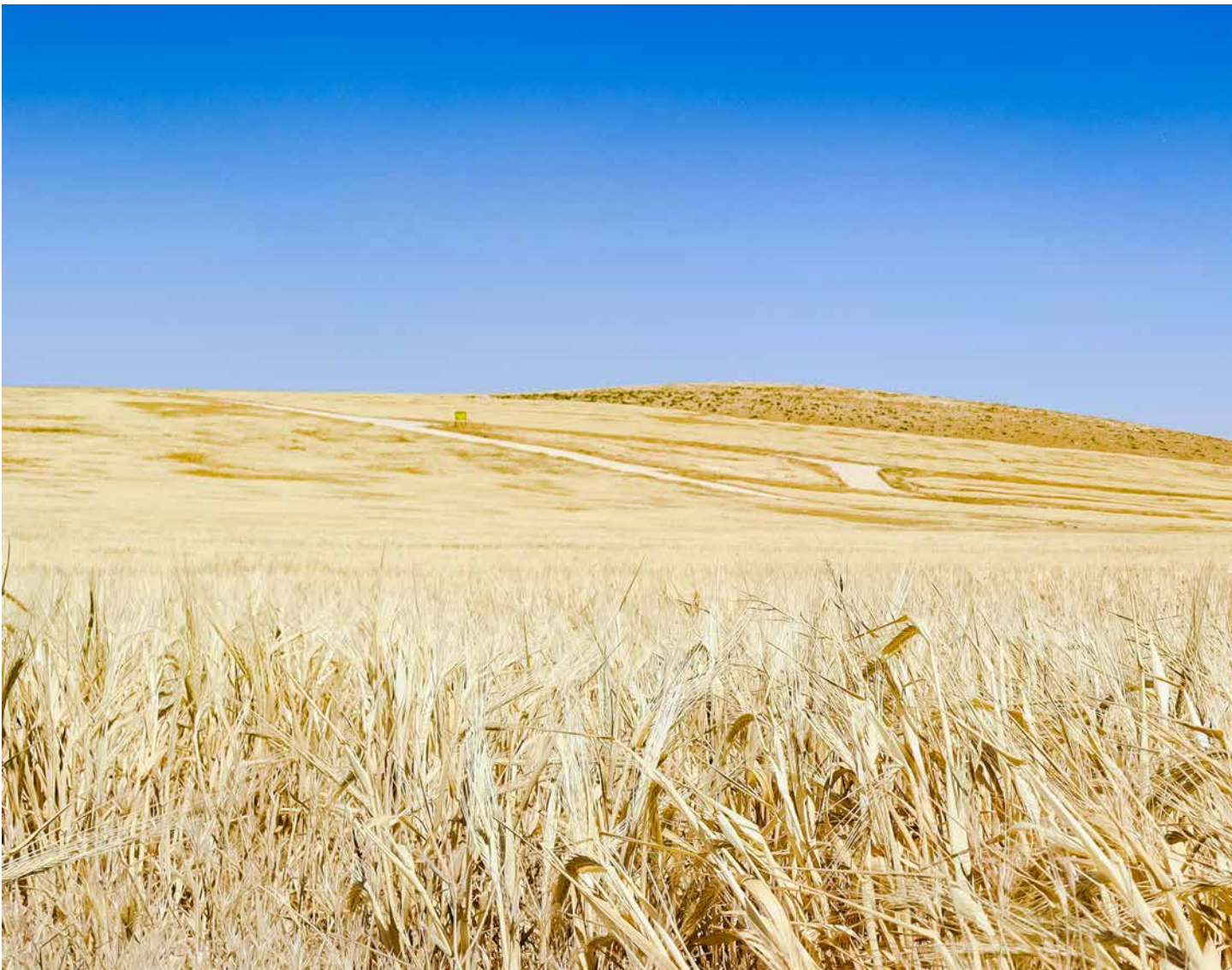
ABOUT IUCN

IUCN is a membership union uniquely composed of both government and civil society organisations. It provides public, private, and non-governmental organisations with the knowledge and tools that enable human progress, economic development, and nature conservation to take place together.

Created in 1948, IUCN is now the world's largest and most diverse environmental network, harnessing the knowledge, resources, and reach of more than 1,500 Member organisations and some 18,000 experts. It is a leading provider of conservation data, assessments, and analysis. Its broad membership enables IUCN to fill the role of incubator and trusted repository of best practices, tools, and international standards.

IUCN provides a neutral space where diverse stakeholders, including governments, NGOs, scientists, businesses, local communities, indigenous people's organisations, and others, can forge and implement solutions to environmental challenges and achieve sustainable development.

Working with many partners and supporters, IUCN implements a large and diverse portfolio of conservation projects worldwide. Combining the latest science with the traditional knowledge of local communities, these projects work to reverse habitat loss, restore ecosystems and improve people's well-being.



The AES Corporation, founded in 1981, is one of the world's largest global power companies.. It provides sustainable, affordable energy to 17 countries worldwide through thermal and renewable energy generation facilities. The facility in Jordan is AES Jordan PSC, AM Solar, and AES Levant Holdings BV, all subsidiaries of AES Corporation in a joint venture with Mitsui Corporation of Japan. AES Jordan strives to reduce reliance on imported oil and achieve a better sustainable energy balance in Jordan.

www.iucn.org

<https://twitter.com/IUCN/>

<https://www.linkedin.com/company/iucn-rowa/mycompany/>

<https://www.facebook.com/IUCNROWA>

https://www.instagram.com/iucn_rowa/

<https://www.aes.com/>



Table of Contents



Introduction

Project Background

- Phase 1
- Phase 2
- Phase 3
- Project target area

Achievements

- Capacity building and gender and youth involvement
- Solar water heaters
- Vet clinic
- Schools more sustainable (eco-schools)
- Environmental monitoring
- Green building
- Nursery
- Landscape/Ecosystem restoration
- Visibility and Public awareness
- Sustainability



2

4

5

6

6

7

9

9

11

12

13

14

14

15

16

17

17

Introduction:

This booklet has been developed to present the achievements and the learned lessons from the project “Stakeholders Engagement and Natural Resources Assessment for AES Levant in East Amman” funded by AES Levant and implemented by IUCN ROWA. The project aims at engaging stakeholders in seeking solutions to local and environmental challenges in two target areas; Al Manakher and Al Khashafyah.

IUCN designed the project to develop a strategic community and environmental action plan for sustainable investment in the area through community involvement to overcome environmental pollution, strengthen biodiversity resilience, and empower local communities by providing the community with the platform to voice their local issues. The strategy assessed the natural, social and economic resources and identified the feasible long-term solutions appropriate to the local context.

The main objective is to improve adaptation and strengthen the efforts toward mitigation of climate change, control environmental pollution, and enhance standards of living for affected communities by strengthening the sustainable management of natural resources. Other objectives include I. Rehabilitation and restoration of the rangeland ecosystem, II. Capacity development of local community III. Reduction of environmental pollution and IV. Knowledge sharing between stakeholders with a focus on women’s role empowerment in sustainable management of natural resources and income-generating activities. To achieve these objectives that are in harmony with the Community Environmental Strategy and Action Plan for Al Manakher and Al Khashafiyah (2018-2025); the proposed activities for each output were developed in a participatory manner through successive workshops and meetings with the stakeholders and the local committee. Successful implementation depends on efficient coordination and commitment of all parties and securing the supporting financing mechanism.

The project focuses on four components that are Nature-Based Solutions driven and are contributing to the implementation of the 16 SDGs of the UN Agenda 2030.



The targeted Sustainable Development Goals

The Goal:

Engaging stakeholders in seeking solutions to local and environmental challenges affecting the east Amman area in two target areas; Al Manakher and Al Khashafyah.

Expected Outputs:

1. Partnerships for project scale-up and implementation
2. Rangeland management plans to establishment
3. Support the local non-governmental organizations while ensuring gender equality
4. Knowledge sharing platform connecting the stakeholders



Project Background:

The International Union for Conservation of Nature designed this project to address the environmental, economic, and social issues related to the Targeted areas. The project established and implemented a community, environmental and strategic action plan for sustainable investment in the region through community integration and capacity building in the targeted areas in East Amman.

Problem statement/core problem:

The AES Levant Jordan and IUCN partnership was formed as part of the Stakeholders Engagement and Natural Resources Management Project for East Amman. IUCN designed the project to develop and implement a strategic community action plan. The main purpose is to start a sustainable investment in the area through community involvement and capacity building in the targeted areas.

The project provided a unique opportunity for members of the community in the two target areas to effectively engage in decision-making and participate in identifying local priorities. The project created a platform to foster informed local dialogue bringing together public and private sectors, civil society, environmental experts, and local communities in a unique collaboration. Accordingly, stakeholders identified their local environmental and socioeconomic priorities as a first step to designing joint interventions that tackle investment in biodiversity conservation and supporting livelihoods.

Box 1: Problems faced by the communities

1. Illegal dumping of municipal and hazardous waste on the roadsides before transport to the nearby Ghawabi landfill.
2. Health impacts related to environmental pollution in the target area.
3. Water shortage due to a decline in rainfall and unreliable water supply.
4. Loss of green spaces and ecosystem functions.
5. Lack of plans for remediation of contaminated sites.
6. Weak ecosystem services.
7. Shortage of livestock and agriculture services and extension programs.
8. Lack of income-generating activities, especially targeting women.
9. Lack of adaptation measures to climate change.

Main environmental concerns in the project area

There are more urban and industrial activities in the Sahab District which led to the predominantly rural Al-Manakher and Al-Khashafiye experiencing land conversion at the expense of its agricultural land. The total area has around 4.7% of its land dedicated to industrial activities, while there were no industrial units before 2000.

Crops are under pressure due to biotic and abiotic stresses as local farmers use inappropriate seed varieties and agricultural methods. Climate change is another growing concern to food security as periods of higher temperatures, and fluctuating extreme weather conditions that disturb crop production.

ICARDA-NCARE research predicted that Jordan will be subject to a decrease in rainfall between 10 and 15% and an increase in temperature between 0.5 and 1.5 C by 2040. This will affect the duration of the growing season, between 5 to 15 days, depending on the region.

In these conditions, crops will demand complex tolerances to these extreme pressures of drought, heat, salinity, and pests, as well as improved quality and nutritional traits.

Local and indigenous cultivars that tolerate drought and salinity must be identified to fit these conditions. Moreover, the capacity for local farmers to adopt new land use management plans must be a priority.

The project provided a unique opportunity for community members in Al Manakher and Al Khashafia to actively participate by involving them in the decision-making process and contributing to setting local priorities.

The project has created a platform to promote informed local dialogue that brings together the public and private sectors, civil society, environmental experts, and local communities in a collaboration that is the first of its kind in the region.

Accordingly, stakeholders were able to identify their local environmental, social, and economic priorities as a first step to designing joint initiatives that embrace investment in biodiversity conservation and livelihood support.

Phase 1 of the project:

The foundation of this project is built on various studies using participatory community approaches such as the Rapid Participatory Analysis, Situation Analysis and Socio-economic Analysis. GIS mapping and Civil Society Mapping and Capacity Assessment supported identifying target areas and affected communities. The information gathered from primary and secondary resources all contributed to producing a Community Environmental Strategy and Action Plan which focuses on controlling pollution and strengthening the local communities.

During the process of the local committee formation, IUCN observed the need for focused discussions to better address the needed actions and overcome challenges. The committee includes decision-makers and other stakeholder partners in the area representing different groups within the community.

In this phase, three top priorities were identified:

1. Establishing a Nursery
2. Establishing a veterinary clinic and agricultural extension unit
3. Establishing an environmental monitoring program

Phase 2 of the project:

The project continued with a sharper eye on improving climate change adaptation strategies, controlling environmental pollution, and enhancing the living standards of the affected communities. Community engagement and a participatory approach played a central role in implementing Nature-based Solutions.

At this phase, fruitful training workshops led to building the capacity of the local communities in the project area on several subjects including producing new products (dairy products, soap, and herbal tea) and developing proper marketing plans to reach buyers in local and international markets, in addition to meeting with stakeholders to negotiate and navigate and develop new project ideas.

The main focus areas are:

1. Providing solar panel units for community members, and
2. Establishing educational-environmental school gardens

In addition to these focal targets, establishing Community-Based Associations (CBOs) was a core value. The CBOs implement income-generating and nature-based activities after a series of workshops, training, and capacity building. Women and youth played a vital role in the formation and organization of these activities. Traditional food is now produced, processed, packaged, and marketed. In addition, poultry breeding, home gardening, cultivation of medicinal and aromatic plants, and natural soap production are supported through these CBOs.

Phase 3 of the project:

Change does not come within one day, therefore, as a continuation of phase two, the third phase had a key task to continue the process of the already established activities. The extra support helped the local community to deal with bigger issues such as the setbacks of the COVID-19 pandemic or to better understand the pitfalls of operating as an organization and how to respond to them. The community learned that the AES Levant company is here for a longer period of time and is ready to support the local community through thick and thin.

The main focus areas:

1. Continuation of establishing a Green Building
2. Sustainability of CBOs
3. Implementation of eco-schools

Four Interconnecting Components



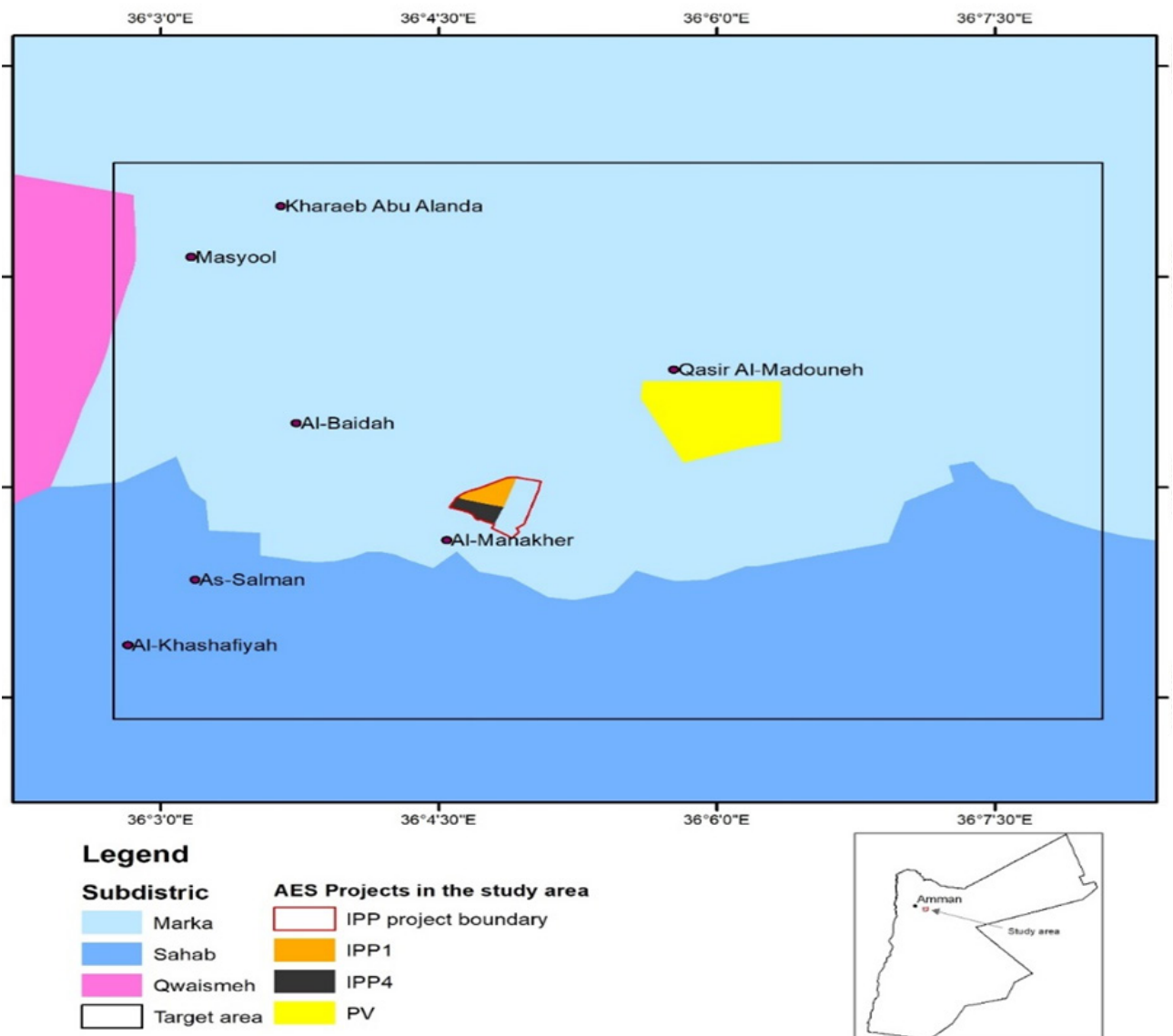
Project target area

Following the initial consultation process and the baseline studies, it was evident Al Manakher and Al Khashafiyah areas were identified as the project areas or the targeted areas.

Following the initial consultation process and the baseline studies, it was evident AES Levant power plants. Hence, they were identified as the project areas.



Map of the project sites



Al Manakher and Al Khashafiyah are located within the Sahab District in the Amman Governorate, approximately 14 km east of Amman. The villages are identified by an arid Mediterranean climate with an average rainfall of 170 mm in the east and 220 mm in the west. However, climate change has been a significant driver behind the increasingly fluctuating annual rainfall, leading to lower agricultural yield production.

The region is within the steppe grassland, which is associated with primarily seasonal natural vegetation cover. The transformation of large rangeland covers into agricultural grounds has been a rising trend. In addition, the target area has been increasing, transforming its land use from rural to urban and industrial.

Ploughing for barley cultivation to support the grazing herds, overgrazing, and human interventions are weakening ecosystem health and loss of biodiversity. Other challenges in the area are air pollution, habitat degradation, weak ecosystem services, lack of adaptation measures to climate change, and limited opportunities for women's empowerment.

Box 2: FACTS AND FIGURES

- Al Manakher and Al Khashafiyah
- Location: East Amman, Sahab district, Ahud area
- Population: Al Khashafiyah 18,000, Al Manakher 1,000
- Economic issues: Unemployment rate reaches 18%, whereas the average, monthly income is around 375 JDs
- Environmental issues: Pollution caused by factories and industries' emissions and poor environmental planning

Achievements

Capacity building and gender and youth involvement

Gender and youth are the backbones of the current and future society. However, they are also the first ones to be forgotten in terms of investments. The project aimed for building capacities within the local community, with special attention to the inclusion of these vulnerable groups by providing grants, funds, and training.

Seed funds for local communities, particularly young women, to implement two project ideas inspired by NbS have been provided. This will contribute to enhancing their livelihoods, social inclusion, gender equality, and creation of employment opportunities for vulnerable community members.

Offering opportunities for marginalized women and girls (Al Manakher and Al Khashafiyah Community) to participate in trainings, associations, and activities were essential. Certain groups of women and girls from traditional backgrounds may seem reluctant to attend or speak up at public events. However, given the opportunity to participate in a meaningful way and in a setting where they feel safe, they are articulate and eloquent.

Three national associations were established through this project's activities, two chaired by women.

- Manakher women NGO
- Al Kerbeh NGO
- Talat al Mankher association

Main achievements:

Trainings

27 training courses were given targeting 48 community members, mainly women.

- Production training
- Food production and food safety
- Soap production
- Cultivation and production of medicinal and aromatic plants
- Marketing training
- Management and financial training
- Training and support for small business start-ups for women
- Four exchange visits with other community organisations/projects

Grants

- Grants were given to three local associations
- Implementation of two small grant projects for local community organisations
 - Local Knowledge and Women Empowerment Project
 - Dairy production and marketing project
- Renovation and restoration of association buildings and headquarters to meet safety and health standards
- Providing equipment and production materials for local associations to start new projects.

Livelihood opportunities

- Participation of women in discussions and decision-making.
- Creating 25 job opportunities for the community members targeting youth and women as part of income-generating activities like yogurt, soap production, and their marketing plans.
- NGOs received applications for 13 initiatives that were hosted and supported by the association on a participatory approach.

Main partners:

- International Union for Conservation of Nature
- AES Levant
- The National Research and Development Centre
- Ministry of Social Development



Products produced by Women Associations / cc: IUCN ROWA

Solar water heaters

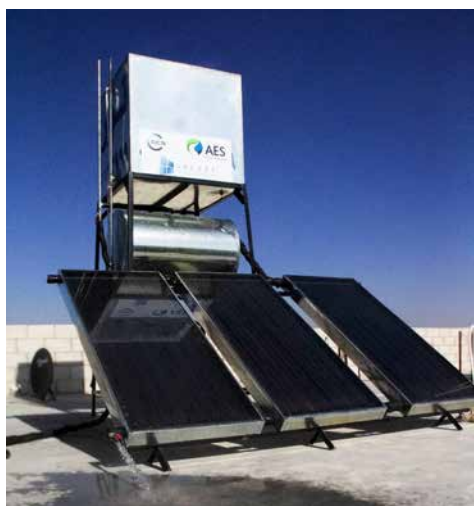
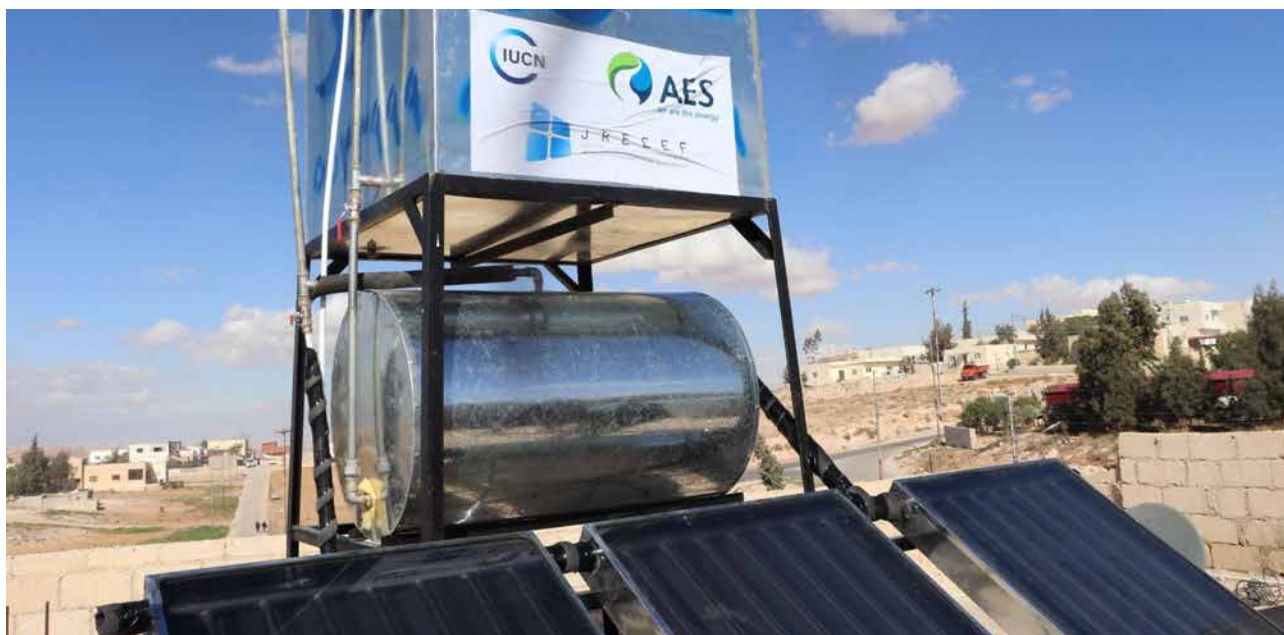
This activity consists of the installation of 260 solar heaters for low-income families in the project's area. This will reduce energy consumption by 30-50% per household/month, which will translate to major utility bill savings and enhance their purchasing power. The number of beneficiaries from this activity in the first phase included 200 households distributed among the local communities: Al Manakher, Khashafiet Al Dabaibeh, and Al Baida. In the second phase, the project installed an additional 60 units in Al Manakher. Many homes heat water with electricity, natural gas, or other fossil fuels. That's many tons of carbon going into the atmosphere. Therefore, switching to solar hot water is a great way to reduce carbon and other greenhouse emissions and protect the climate.

Main achievements:

- Installing 260 units of solar water heaters
- Distribution of 200 energy-saving light bulbs
- Reduce energy consumption by 30-50% per month per household

Main partners:

- International Union for Conservation of Nature
- AES Levant
- Ministry of Energy



installed solar water heaters / cc: IUCN ROWA

Vet clinic

The shortage of veterinarians and vet clinics in remote areas reflects the work and life preferences of veterinarians nowadays, working with companion animals in larger practices in urban settings rather than with livestock in remote areas. This phenomenon is exacerbated by unfavourable working conditions, including commuting longer distances, climate conditions, long shifts, and weak demand, as farmers cannot afford veterinary services. The problem explicitly affects rural and remote areas such as Al Manakher and Al Khashafiyah. Around one thousand of the total population in Al Manakher village, of whom more than 75% of the population is dependent on agriculture and pastoralism in this region. Meanwhile, diseases such as aphthous ulcers, intestinal diseases, smallpox, and plague pose health threats to both human and animal populations. Consequently, due to the dependence on pastoralism, the establishment of the veterinary clinic contributes to food security and local development.

The AES Levant project has successfully supported the veterinary clinic based in Al Manakher. By financing the rent of the building, providing vaccines and medicines, and paying staff, the clinic has served around 574 livestock owners. The agricultural extension center serves around 350 farmers, including women working in agricultural processing on a wide range of services, including animal disease prevention, control and treatment, surgical operations, training veterinarian, and advising owners on the care of their livestock and new-borns in addition to general agricultural extension.

Main achievements:

- 574 farmers were supported out of 600 farmers in the project area
 - 185165 sheep vaccinated
 - 1355 goats vaccinated
 - 73 camels vaccinated
 - 115 horses vaccinated
- In total 43962 vaccines given
- Providing a mobile veterinary clinic to reach remote areas

Main partners:

- International Union for Conservation of Nature
- AES Levant
- Ministry of Agriculture



Vet clinic, medicines and treatment / cc: IUCN ROWA

Schools more sustainable (eco-schools)

This activity starts in the classroom and expands to the community by engaging the next generation in action-based learning. Through this component, young people will experience a sense of achievement at having a say in their schools' environmental management policies, ultimately steering them towards the transition of their schools to be more eco-friendly. The Eco-School component is an ideal way for local schools to embark on a meaningful path toward improving the environmental footprint of a school, a change that inevitably leads to a more sustainable, less costly, and more responsible school environment.

The AES Levant project funded the transition process of two schools to eco-schools through water harvesting facilities, solar water heaters, a greenhouse, a nursery, and a green corner/garden. Participatory activities supported the identification and decision-making on the best methods to become more sustainable. With student participation, these initiatives have been implemented.

Main achievements:

Installation of Two on-grid photovoltaic systems PVsat Al Khansaa secondary school and Al Manakher preliminary school.

Installation of two solar water heaters

The installation of two greenhouses

Rainwater harvesting system in each eco-school

Paper recycling

200 trees planted

Two training courses on sustainability are to be conducted.

Two waste collection points are to be installed with the support of Amman's greater municipality.

The installation of two traditional agricultural tunnels (greenhouses) at A Khansaa secondary school and Al Manakher preliminary school.

Main partners:

- International Union for Conservation of Nature
- AES Levant
- Ministry of Energy
- Ministry of Education



Environmental monitoring

The environmental monitoring program was a one-month-long monitoring effort to assess air quality and air pollutant emissions. Industrial pollutants such as SO_x, NO_x, TSP, PM₁₀, PM_{2.5}, CO₂, Dioxin, and H₂S have been measured. Three areas have been under the mandate of this program, which has been assessed three times in the timespan of a month. According to the ministry of Environment, the initial results of the air quality monitoring revealed that the pollution levels are within acceptable limits according to Jordanian and international standards.

Main achievements:

- Air quality is proven to be acceptable limits according to Jordanian and international standards

Main partners:

- International Union for Conservation of Nature
- AES Levant
- Ministry of Environment

Green building

Strong communities are identified with good communication, a place to come together, and a sense of ownership of their lands. Al Manakher and Al Khasafiya lacked a space for gatherings, associations, and other occasions. A green building will provide them with a sustainable facility that provides a healthy and comfortable workspace for local stakeholders, especially the women's associations that were established in the project's earlier phases. The building will consist of (What are the main parts of the building) and will also host an academy where women can learn about NbS and how to provide for themselves according to these principles. It will be the first and only green building devoted to local communities in Jordan.

The environmentally responsible and resource-efficient building, supported by the AES Levant project, will include:

- Two workspaces: for two women CBOs
- One multipurpose conference room: for training, meetings, and community events
- One exhibition room: for the CBOs products, endemic/local species, etc.

Main achievements:

- Land purchased
- Design building finished

Main partners:

- International Union for Conservation of Nature
- AES Levant
- The Local Government
- Royal Scientific Society (RSS)
- Building Research Centre

Nursery

In collaboration with the Sustainable Environment and Economic Development (SEED) Project funded by the United States Agency for International Development (USAID), IUCN established a community nursery to propagate native rangeland species, with a production capacity of 80,000 seedlings. Using the latest technologies and scientific methods, the nursery produces improved quality pastoral seedlings that are capable of adapting to harsh environmental conditions, such as rainfall scarcity.

The nursery was inaugurated by the Mayor of Amman who was impressed with the irrigation system that conserves a huge amount of water. With 56 thousand seedlings, the team managed to consume 750 cubic metres of water out of a total of 1000 cubic metres, saving 250 metres during five months as it utilises water sprays for irrigation.

In collaboration with Sustainable Environment and Economic Development (SEED) Project funded by the United States Agency for International Development (USAID), the project team established a community nursery to propagate native rangeland species, with a production capacity of 80,000 seedlings. Using the latest technologies and scientific methods, the nursery produces improved quality pastoral seedlings that are capable of adapting to harsh environmental conditions, such as rainfall scarcity.

The team of eight motivated young men and women from Al Khashafiyah was selected, trained for six months, and collaborated with agricultural experts to work in the nursery. As the area has a notably high unemployment rate, before establishing the nursery, these young talents were unemployed and the project provided job opportunities for them. To guarantee the sustainability of this project, the project team partnered with the Greater Amman Municipality to run this nursery and provide long-term job opportunities for those youth.

Part of the produced seedlings was distributed among community members and stakeholders to use in community gardens. The rest will be used for the restoration of ecosystems in Badia, and landscaping by the Greater Amman Municipality.

Main achievements:

- Establishment of a community nursery to propagate native rangeland species, with a production capacity of 80,000 seedlings
- Training of a team of eight motivated young men and women from Al Khashafiyah to work in the nursery

Main partners:

- International Union for Conservation of Nature
- AES Levant
- Greater Amman Municipality
- Sustainable Environment and Economic Development (SEED)
- United States Agency for International Development (USAID)



Activities from the nursery / cc: IUCN ROWA

Landscape/Ecosystem restoration

Reducing soil erosion and floods risk by restoring natural ecosystems and local vegetation is of high importance in the theme of climate change. In addition to securing the rehabilitation of local rangelands that plays an important role in developing the livestock sector and food security, this component will also disseminate best practices and install pilot sites related to water harvesting/catchment techniques.

Main achievements:

- A Tractor was purchased to be used by the local communities.
- Distributing seedlings and trees to families to be planted in their house gardens.
- Ploughing the land to reduce soil erosion and increase water harvesting.
- Rehabilitation of natural range land with native seedlings.
- Raising awareness of Sustainable Land Management practices SLM

Main partners:

- International Union for Conservation of Nature
- AES Levant
- The Ministry of Agriculture



Ecosystem restoration activities / cc: IUCN ROWA

Visibility and Public Awareness

- Publishing more than 25 social media posts (in both Arabic and English), and on the International Union for Conservation of Nature website.
- Publishing a detailed informative report on the approach and results of the project
- Publishing Training Manual on Nature-Based Solutions
- Publishing Stakeholder Engagement Model Handbook
- Publishing a short video about the project achievements

Sustainability

The project will contribute to the positive environmental, social, and economic development of the communities in Al Mnakher and Al Khashafiyah and will be sustainable beyond the implementation period. Through knowledge and skills acquired, funds facilitated to the communities will employ new ventures to the communities. The communities will sustain themselves in conservation and economic development.

The Sustainability of the achieved results will be through:

- Conservation of the range seeds collected at the national gene bank" NCARE gene bank" and local farmers seed banks"; Women association and Local farmers".
- More than 5 local farmers will have their ability developed to adopt varieties adapted to CC'.
- Women and youth will be involved in public awareness activities to assure the sustainability of the project.
- Capacity building through implemented training courses at the local level.
- Knowledge sharing with decision makers to Consolidate national efforts toward sustainable management of range land and rehabilitation.
- Four non-governmental associations with income-generating activities developed and supported with infra-structure including women, disabled, and youth are engaged.
- Environmental pollution control and biodiversity conservation measures were implemented and community awareness was enhanced.





INTERNATIONAL UNION
FOR CONSERVATION OF NATURE
Regional Office for West Asia (ROWA)

Abdel Latif Salah Street, bldg.29,
Sweifiyeh, Amman, Jordan
Tel : +962 (6) 5546912/3/4
Fax: +962 (6) 5546915
www.iucn.org