



**28 billion  
liras  
Investment  
to Izmir**



*“As we see what we have achieved in the journey we started for Izmir about 5 years ago, our courage for the future increases.”*

**Tunc SOYER**  
Mayor of Izmir Metropolitan Municipality

*The Search for Technological Solutions Against Climate Crisis*  
Ece YILMAZDEMİR - Chairman of the Board of Cyclizm Renewable Energy Technologies

*2024 will be the 'Year of Mobilization' in Wind*  
İskender KOKEY - TWEA Secretary General



*“Economic development is the key to a free, independent and ever stronger Türkiye, is always the backbone of the ideal of a more prosperous Türkiye...”*

*K. Atatürk*

## Tunc SOYER

Mayor of Izmir Metropolitan  
Municipality

# “The Not the Expected, but the Constructed.”

### Dear fellow countrymen,

We left behind a year in which we celebrated the 100th anniversary of our Republic with great enthusiasm.

This year, which is one of the turning points in the history of our country, has also been a year in which we have experienced great pain and endured difficulties together. We have once again demonstrated the power of coming together, supporting each other, and looking to the future with hope.

Climate crisis, the increasing effects of drought, economic crisis, and deepening poverty... In Izmir, in such a difficult year, we once again did what suited us. On the morning of 6 February, we stood shoulder to shoulder to heal the wounds of our earthquake victims.

Together, we took many important steps that inspired and gave hope to our country. I am honoured to share with you these steps of hope and the revolutionary works we have implemented in Izmir in the 16th issue of our IZENERGY Magazine.

In 2023, we continued our determination to produce permanent solutions to the infrastructure problems of our city. We have accelerated our work especially in energy and infrastructure projects.

We have done what no one else has done for the separation of combined system storm water and sewerage lines, which cause pollution of the bay and flooding and inundation during rainfall. We have not only put our hands but also our bodies under the stone. The new storm water line we have built in 5 years has reached 300 kilometres in total.



We eradicated the pollution and odour problem in the Bay with the Living Bay Mobilisation we initiated.

With the projects we carried out within this scope, we have realised an investment of 11 billion to improve the water quality of our bay and protect the marine ecosystem.

We have almost revolutionised the Kemeralti Bazaar. We took the risk that no administration has ever taken for the renewal of Kemeralti, the apple of Izmir's eye, which is 600 thousand square metres in size, where 15 thousand tradesmen open their doors every day, visited by approximately 250 thousand people. We completed the most challenging first stage of our work in Kemeralti in the last days of 2023, on the way we set out with a total investment of 2 billion in 4 stages.

We are also ensuring that Kemeralti becomes the lever of Izmir tourism in accordance with its history and identity. With these infrastructure - superstructure works, our goal is to ensure that Kemeralti, which we have included in the provisional list, is included in the UNESCO World Heritage List.

We are proud to fulfil our promise that we will weave Izmir with iron nets in 2023. We have strengthened the environmentally friendly transport infrastructure of our city with our rail system investments, which have revolutionised Izmir's transportation. In February, we will inaugurate Narlidere Metro and Cigli Tram. In Buca Metro, the biggest investment in Izmir's history, giant mole TBMs have gone underground. We will open the Buca

Metro, where our TBMs and hundreds of our staff are working, with great enthusiasm on 2026 June, even before the date we promised. We will open our metro line, which will take a deep breath to the transport problem in Izmir by transporting 400 thousand passengers a day, before the promised date. This giant investment that we have brought to Izmir without a single penny of support from the central government is a first in our country. We are proud of being the only municipality to build its own metro line. This honour belongs to all of us.

This pride belongs to Izmir!

Dear fellow citizens, in 5 years, we left our mark on Izmir's future together. It is an indescribable source of pride for me to have completed 144 promises that is 87 per cent of the 165 promises, I promised to you, my dear Izmiris. However, I also know that this is just the beginning.

In our second term, we will start to see the positive results of the steps we have taken today, and we will continue to increase the welfare of Izmir and share it fairly with new projects, with an understanding that embraces 4 and a half million people and everyone in Izmir. We will work tirelessly with the love of Izmir; we will bring this unique city the service it deserves by braving all obstacles.

I wish that the new year will bring health, happiness, and success to all Izmiris.

I wish you all a pleasant reading in the 16th issue of Izenergy Magazine. With love and respect.

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## A. Ercan TURKOGLU Engineer MSC

Chairman of the Board of  
Directors of IZENERGY INC.

### Dear Izmirites;

We are pleased to bring you the 16th issue of our company's sectoral magazine IZENERGY.

We have left another year behind. Our efforts to make Izmir a greener, livable and sustainable city continue unabated. In this issue, we focus on the environmentally friendly projects prepared by IMM for Izmir. Despite the pandemic, natural disasters and crises, Izmir Metropolitan Municipality has increased its investment expenditures by 150 per cent compared to the previous year by realising a total investment of 28 billion liras in 5 years. This honour belongs to all of us.

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As in every issue, we continue to include all stakeholders of the city in our magazine. We endeavour to include and reach you our academicians who work on our fields of activity, politicians who develop policies, professional chambers, NGOs and other stakeholders.

In this issue, we include the articles of our valuable stakeholders and young entrepreneurs in our Voice of the Sector section. We present to you, our valued readers, the articles titled "Seeking Technological Solutions Against the Climate Crisis" by Ms. Ece Yilmazdemir, Chairman of the Board of Directors of Cyclizm Renewable Energy Technologies, and "2024 Will Be the 'Year of Mobilization' in Wind" by Mr. Iskender Kokey, Secretary General of the Turkish Wind Energy Association.



Our rainwater harvesting project "Sponge City Izmir", which we implemented against the increasing water problem as the climate crisis deepens, continues to develop. In this context, we realised Türkiye's first biological infiltration pond in Odemis. We know the value of each rainwater and say that another water management is possible. In this issue, we share the details of the projects implemented by Izenerji Inc. Water Resources Research and Application Centre with you, our esteemed readers.

IMM's Sustainable Energy and Climate Action Plan which aims to reduce Izmir's energy consumption, promote the transition to renewable energy sources and combat climate change, the Green City Action Plan which aims to increase the city's green areas, develop parks and gardens and establish environmentally friendly transport systems, the Strategy for Living in Harmony with Nature which aims to protect Izmir's natural resources, support biodiversity and sustainable agriculture, the Plastic Waste-Free City Action Plan which encourages the practice to find a solution to the problem of plastic waste and aims to reduce consumption are continue to publish in our magazine as in sections.

Our work to achieve the 2030 climate neutrality targets continues unabated. The NetZeroCities Commission has pre-approved the Climate City Contract, which combines climate action plans with investment plans. Izmir is the first city in Türkiye to implement this innovative approach. In addition, Izmir participated in the COP28 Summit held in Dubai this year on behalf of the city of Izmir and met with leading organisations in the sector for new collaborations.

Dear Izmirians, we continue to work with all our strength to make our city a climate resilient city. In this direction, we are pleased to share that we have implemented ISO 50001 Energy Management System Consultancy Service as Izenergy INC. in order to expand the ISO 50001 Energy Management System studies that we have already implemented in our company in the units and companies of our municipality.

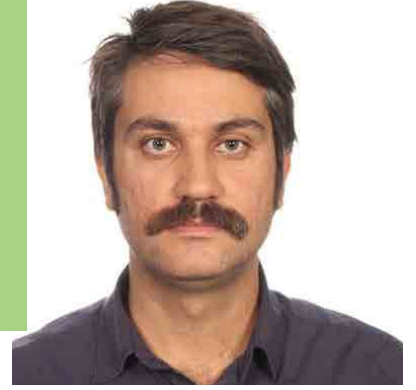
The 16 issue of our magazine is to the full and the headlines enlarge our hopes for the future. We are proud to be able to convey these good works to you, our esteemed readers.

See you in our next issue, clean, sunny, with Izmirians, to bright and healthy days...

He was born on 1 July 1981 in Adana. In 2008, he graduated from Yildiz Technical University, Department of Urban and Regional Planning. Between 2010 and 2015, he worked as an Urban Planner at Istanbul Metropolitan Municipality Department of Zooning and Urbanisation. Between 2015 and 2021, he worked as an Urban Planner and Upper Scale Plan Branch Manager in Izmir Metropolitan Municipality Department of Zooning and Urbanisation, respectively. As of 2021, he has been working as the Head of the Department of Zooning and Urbanization.

## Yagmur Han SENEL Urban Planner

Board Member of  
IZENERGY INC.



## Ensia Held The Last Meeting Of The Board Of Directors For 2023



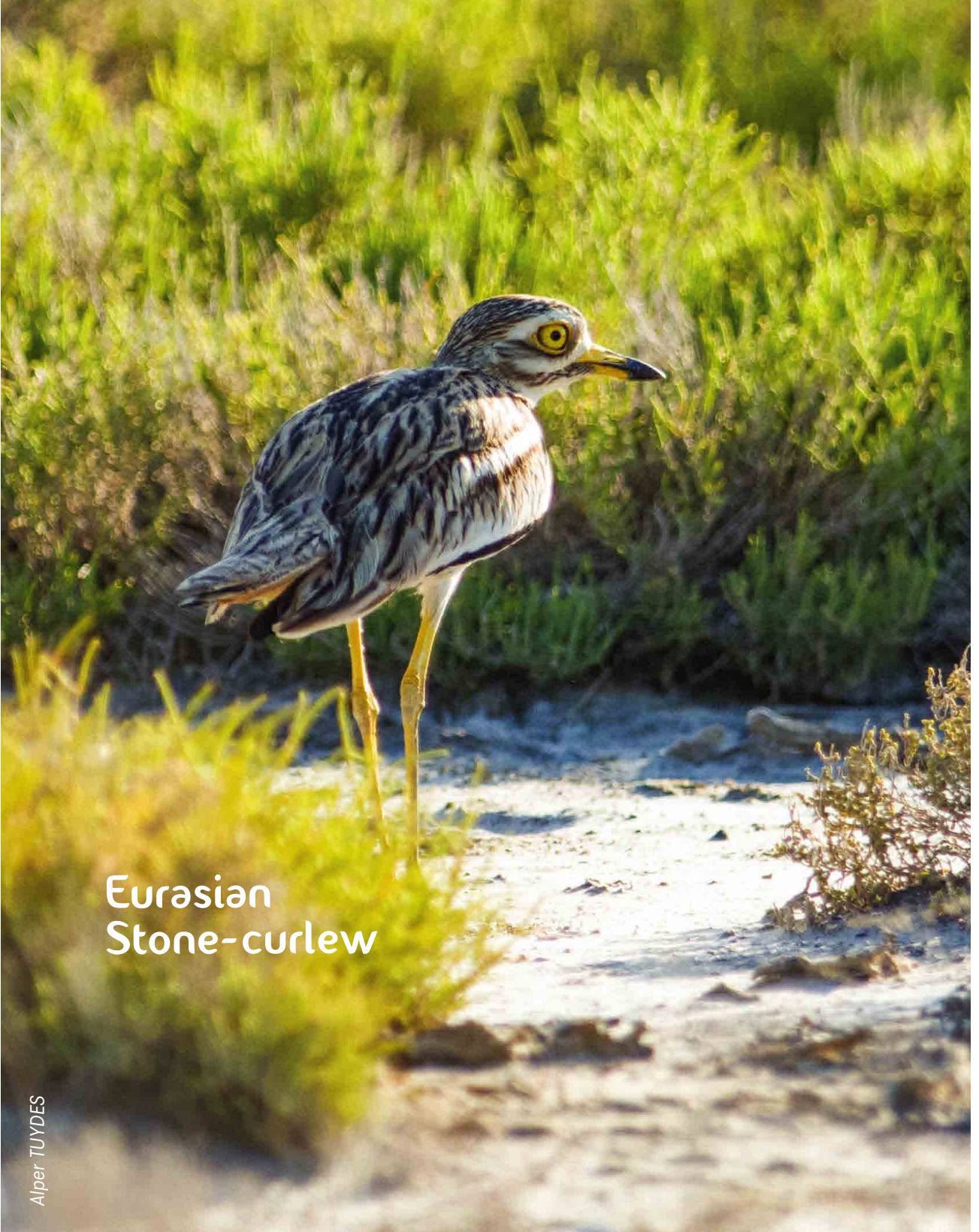
The last 2023 board meeting of ENSIA, of which we, as Izenergy Inc, are a corporate member and of which our Chairman of the Board, Mr. Ercan Turkoglu, is also in the management, was held at the association headquarters. In the meeting where the developments in the clean energy

sector and the activity agenda of the association were evaluated in the year we are preparing to leave behind; Information was given by Ms. Elif Aksahin, Fairs Coordinator of our corporate member IZFAS, about the WENERGY EXPO Clean Energy Technologies Fair, which will be held for the second time in May.

In addition, ENSIA Secretary General Hazal Coskun provided comprehensive information about our Clean Energy Ur-Ge Project, in which 28 corporate member companies are involved and approved by the

Republic of Türkiye Ministry of Trade, and the "Clean Energy Cluster Project", in which 65 corporate member companies and 17 stakeholder organisations are involved as "Inviter" and applied to the Republic of Türkiye Ministry of Industry and Technology.

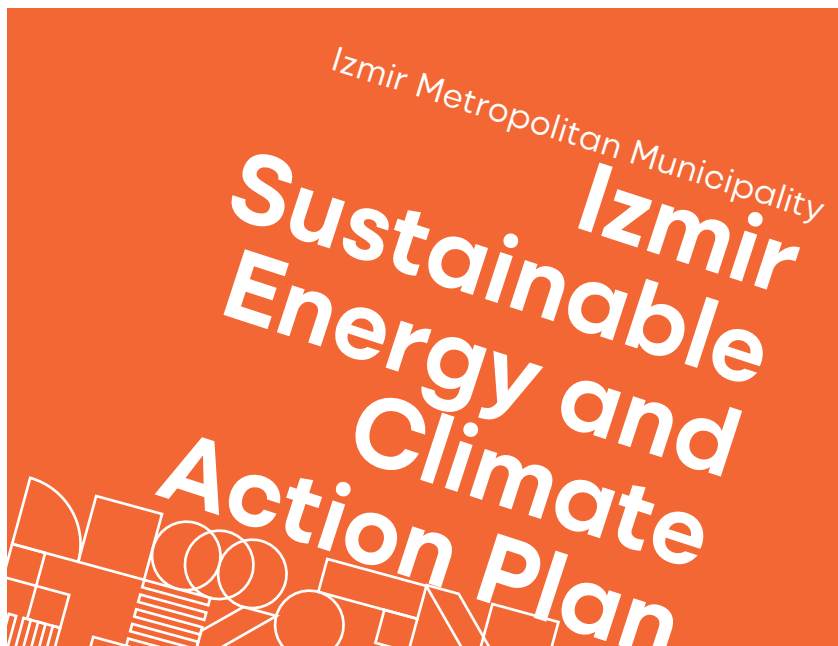
ENSIA, which has reached 125 corporate members, will continue to develop projects and collaborations in 2024 in order to turn Türkiye into an international centre producing equipment, technology and projects in the field of renewable energy and energy efficiency.



## Eurasian Stone-curlew

Alper TUYDES

*The Eurasian Stone-curlew is a coastal bird with a habitat extending from sub-Saharan Africa to Eurasia. They also live in arid, open areas. They usually build their nests on plains with sparse vegetation. The Gediz Delta in Izmir is one of the breeding areas of the species.*



Excerpted verbatim from the Sustainable Energy and Climate Action Plan (SECAP), which includes actions for greenhouse gas mitigation and adaptation to the impacts of climate change, funded by the European Union and supported by the European Bank for Reconstruction and Development (EBRD), which is one of the works carried out by Izmir Metropolitan Municipality to leave a cleaner and livable city for future generations, such as the issue of energy and resource consumption for Izmir's urban sustainability and combating the climate crisis;

**B1.3 Review and update the local-level policies, planning regulations and guidelines for future and new municipality development around energy efficiency. (continue)**


Rationale / Purpose	Planning regulations and building performance standards dictate the energy efficiency of buildings, which can help to reduce emissions (i.e. climate mitigation), as well as ensuring that buildings are better able to adapt to climate change. Given that buildings represent a key source of emissions in Izmir (roughly 42% as of 2018), and also have a significant impact on climate resilience (for instance, due to their impact on overheating, urban heat islands and flood risk), it is important to ensure that best practices are implemented wherever possible through strong policies and guidance. This has cross-cutting impacts on public health, quality of life and cost of living and would follow the identification of 'high-risk buildings' under Law No 6306.
Steps for Implementation	<ol style="list-style-type: none"> <li>1.Establish a working group to review local-level policies</li> <li>2.Conduct a study on energy efficiency design and materials to use taking into consideration future climatic conditions changing climate conditions and flexibility and adaptability in future use</li> <li>3.Engage District Municipalities that are important partners as they are the authority to grant licence to new buildings</li> <li>4.Develop new planning regulations and guidelines for more energy efficient areas</li> <li>5.Cooperate with relevant stakeholders to implement the proposed actions</li> </ol>
Project Type	Policy / Guidance
Timeframe	2022 - 2030
Risk and/or vulnerabilities addressed	<p><b>Risks:</b> IM1, IM11, IM24</p> <p><b>Vulnerabilities:</b> PE-D</p>
Potential Emission Reductions	The new buildings are planned to be 50% more energy efficient than existing buildings 85,806 tCO <sub>2</sub> e in 2030



**B1.3 Review and update the local-level policies, planning regulations and guidelines for future and new municipality development around energy efficiency. (continue)**

Potential Barriers	Distrust of the technologies Lack of awareness Resistance to proposed regulations and guidelines due to cost concerns Higher costs
Action Owner	IMM
Stakeholders	Provincial Directorate of Environment and Urbanisation Ministry. District Municipalities Izmir Chamber of Commerce, the Chamber of Architects and Engineers. Contractors procured for the Urban Transformation Areas
Financing Options	Municipal Budget

<b>B1.11: Explore ways to support residential retrofits being undertaken to a higher and greener energy performance standard.</b>	
Strategic Plan Objectives:	<b>1.2 Planned, Safe and Sound Settlement Areas Will Be Developed or Regenerated</b>
Description	<p>Explore the options that are available to support retrofitting of existing privately-owned residential properties so that they become more sustainable. Retrofitting practices could include, but are not limited to.</p> <ul style="list-style-type: none"> <li>•upgrading the building fabric (e.g. wall and roof insulation, windows, airtightness, etc.)</li> <li>•services (e.g. heating systems and water/sanitary fittings),</li> <li>•green roofs</li> <li>•Water efficiency, rainwater/greywater collection for reuse and rehabilitation</li> </ul> <p>Options to support retrofitting could include:</p> <ul style="list-style-type: none"> <li>•Adjusting permitting requirements for buildings that meet high standards of energy and water efficiency (e.g. fast-tracking permits, allowing greater floor area, etc.)</li> <li>•Developing public awareness campaigns and information schemes to promote uptake in residential retrofitting.</li> </ul> <p>This action should be coordinated with Action B1.3, which includes research and surveys aimed at assessing the existing energy performance of the building stock, in order to target areas currently exhibiting poor performance. It should be aligned with SECAP B4, B5 and ES1.5.</p>
Rationale	<p>Due to the age of the building stock of Izmir (46% having been built prior to 1990 and therefore prior to the introduction of thermal standards) there is likely to be poor building performance across the City, although there is currently no reliable data about the existing building stock in regards to age, household composition, heating systems, energy performance, etc. The energy efficiency and quality of housing stock not only dictates the emissions and cost associated with space heating and cooling, but if poor, it can expose the residents to a higher level of risk to extreme temperatures due to its heightened sensitivity to overheating. Furthermore, opportunities for improving the efficiency of water fixtures and fittings will help to reduce water demands and help remove dated plumbing (often cited as a reason for residents not drinking from the potable water network with dependency on bottled water). By retrofitting residential building, operational energy costs can be reduced, decreasing the resident's vulnerability to overheating, improve water efficiency and quality to reduce water stress and help to reduce GHG emissions.</p>
Steps for Implementation	<ol style="list-style-type: none"> <li>1.Undertake analysis of housing stock to identify those areas that are poor performing, not set for urban transformation and where improvement would reduce energy poverty.</li> <li>2.Create a suite of home energy retrofit options that target the most cost-effective carbon reduction and water efficiency opportunities.</li> <li>3.Conduct Life Cycle analysis for green energy standards proposed to further investigate how buildings should be designed, constructed/retrofitted and operated.</li> <li>4.Establish guidelines that addresses the definitions, technical standards, economic analysis, building envelope recommendations, and building mechanical and electrical systems.</li> <li>5.Developing public awareness campaigns or incentive methods to contribute to household budgets, through tax reductions such as Energy Performance Regulation in Buildings (05.12.2008) on energy gains to be achieved and environmental protection</li> </ol>

Type of action	Policy / Behavioural / Training	
Environmental values positively affected		
Climate Change risks and / or vulnerabilities addressed.	<b>Risks:</b> IM1, IM11, IM24 <b>Vulnerabilities:</b> PE-D	
Potential Emission Savings	The emissions savings depend on the nature of the incentive that is established. For context, if this was delivered for 50% of residential buildings in Izmir, achieving a 10% reduction in electricity demand and a 40% reduction in heat demand	
Plan for delivery	<b>Action owner</b>	IMM
	<b>Stakeholders</b>	MonEnvU, MoENR, IF's, Izmir citizens, Business such a architects
	<b>Financing options</b>	Designers, contractors / construction companies, manufacturers e.g. as insulation, heating systems, etc.
	<b>Revenue/savings opportunities</b>	Savings opportunities will come from lower energy costs, less pressure on energy grids, and improved public health through more comfortable homes.
	<b>Timeline</b>	2020-2030
Impact measures	•Economic Development: increased economic efficiency •Heating/cooling consumption in residential building	
Estimated cost	<b>Initial investment cost: Operating cost: 2.081.250 € Design/development cost: 312.188 €</b>	
Estimated benefits	<b>Health impacts:</b> Public health - more active lifestyles <b>Economic Development:</b> increased economic efficiency; economic growth <b>Environment:</b> Mitigation of GHG Emissions	
Existing Work Leveraged:	Izmir SEAP 2016	
1/25,000 scaled IMM Environmental Plan Alignment	Not spatially dependent.	

## 5.1.2. Transport

### Sector Objective & Target

#### 5.2.2

##### Number of actions 1

Developed to address both adaptation and mitigation aspects, these actions recognise and leverage the existing work undertaken by IMM such as UPI 2030 (the Izmir Transportation Master Plan 2017 – 2030), with projects such as the modernisation of commuter ferries, improving traffic control and the on-going expansion of the metro (which is supported by EBRD).

National level strategies in the sector include the Transport Strategic Plan (2017-2021) and the National Transport Master Plan (2018) which, led by the Ministry of Transportation and Infrastructure, both identify direction and priorities around improving railroad infrastructure, increase environmental awareness, improving energy efficiency and reducing pollution and greenhouse gas emission levels.

It is necessary to acknowledge the cross-sector linkages of the transport sector. Transport is a key enabler of economic growth and trade, providing the networks and services on which economies depend – facilitating individual mobility, movement of goods and equal access to employment and services such as health and education. From an adaptation perspective, Transport infrastructure is also critical in regard to the response and recovery aspect of emergency management

strategies, facilitating elements such as access for emergency services, evacuation routes and the deployment of humanitarian goods and relief packages for victims. When developing actions, these cross-sector linkages need to be incorporated, interacting with other strategies, approaches and policies including but not limited to; energy, industry, tourism, green economy transitions, emergency management, the promotion of gender equality and economic inclusion.

**Table 36: IMM Strategic Plan 2020 – 2024 objectives Addressed**

Strategic Heading	Strategic Goal	Strategic Objective(s)
Quality of Life - Public Transport	2. Making Izmir a Smart City with A high Level of Quality of Life and A Well- Developed Transport Network	2.1. Public Transportation, Economic, Energy Efficient, Fair, Comfortable, Common and Everyone It will be made accessible for
Quality of Life - Urban Transportation	2. Making Izmir a Smart City with A high Level of Quality of Life and A Well- Developed Transport Network	2.2. A Sustainable Transport System Will be Created with A Harmonious Interaction Between Different Modes of Transport, Offering Different Options

The SECAP mitigation and adaptation actions for transport are summarised below in Table 37 and further developed into a business case.

**Table 37: Summary of Transport Sector Actions**

Action ID	Action Headline	Responsible Body	Cross-sector benefits	Link to Mitigation
T1.7	More sustainable urban mobility: mass transit and local mobility.	IMM	N/A	Yes

# The European Green Deal and Türkiye Steps Towards the 2053 Net-Zero Target

**The main objectives of the European Green Deal are to achieve net zero by 2053. These are targets that must be achieved for our country, which is planning to achieve them.**

Since its announcement on 14 July 2021, many regulations have been enacted within the scope of the European Green Deal. Some of these regulations have affected the legislation in Türkiye.

For example:

- ✓ Based on the EU Taxonomy, the BRSA published the draft "Green Asset Ratio Communiqué".
- ✓ Carbon Regulation Mechanism at the Border National Emissions Trading System in Türkiye has accelerated the work on the establishment of a new centre.
- ✓ Similar regulations for buildings in the European Union have also entered into force in our domestic law.
- ✓ Work is underway to create a National Taxonomy for the identification of sustainable activities.





For the first time in Türkiye, the European Bank for Reconstruction and Development (EBRD) provided a grant of EUR 300 thousand to Izmir for the preparation of a "Green City Action Plan". All stakeholders of the city participated in the preparation process of the Green City Action Plan. The Green City Action Plan was prepared with the contribution of more than 100 participants from Izmir Metropolitan Municipality units, public institutions, non-governmental organisations, universities and professional chambers. approved by the Izmir Green Excerpted verbatim from the City Action Plan;

**ES1.5: Mass role out of solar energy on municipality owned assets and land e.g. municipality buildings, road reserved, bus stops.**

Action Description	This action would involve an investment in 15MW of solar energy to be installed upon buildings owned by municipalities and their subsidiaries by 2030.
Potential Impact	Within the strategic plan of IMM there are 10 solar energy plants planned until the end of 2024. We can easily assume that IMM will develop more projects after the year 2024. By increasing the municipalities renewable energy generation capacity, it diversifies the energy supply, reducing the exposure of the municipality buildings and key infrastructure to the risk of power shortages and blackouts as a result of a climate hazard.
Action Owner	A 15MW installation of photovoltaic would result in a saving of 12,168 tCO <sub>2</sub> e in 2030. Financial benefits could also be achieved if there is excess energy generation by exporting the electricity to the Cities utility grid.
Timeframe	IMM
Timeframe	2020 - 2030
Financing Options	Municipal Funding, PPP, commercial financing from banks and private investment, IFI's

**ES1.7: Undertake a public lighting replacement scheme for all poles owned / run by municipality by installing LEDs.**

Action Description	This action would involve an analysis of energy use by lighting zones across the province for LED replacement. This should prioritize zones throughout the province where energy use is the highest and also be aligned with the replacement of existing lighting poles when either broken or their life cycle has come to an end.
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**ES1.7: Undertake a public lighting replacement scheme for all poles owned / run by municipality by installing LEDs. (continue)**

Potential Impact	Potential emission savings for IMM would be 10,980 tCO <sub>2</sub> e in 2030 if all public lighting is replaced with LEDs. If the lighting managed by organisations other than IMM were also replaced, a further 111,102 tCO <sub>2</sub> e could be saved by 2030.
Action Owner	IMM District Municipalities The Ministry of Transportation Directorate of Highways
Timeframe	2020- 2030
Financing Options	Municipal Budget, PPP, IFIs, IIBank.

**Basket 6: Enhance evidence for action through studies / assessments**

**Buildings: B1.9  
Energy Supply:  
ES1.1, ES1.4,  
ES1.11, ES.A**

To understand the potential for increasing the uptake of low and zero-carbon (LZC) energy options will require studies to be undertaken. This will ensure that efforts are focused on the uptake of LZC technologies that play the greatest cost-effective role in minimising GHG emissions, and also helps to ensure a secure, reliable and affordable supply of energy to everyone. It is also crucial for achieving Izmir’s goals for sustainable transport, which will rely on the availability of LZC electricity.

**What is already being done?**

At present, there are a number of LZC installations across the province, including solar PV, wind turbines, geothermal energy installations and heat networks – but multiple sources, including the Izmir Sustainable Energy Action Plan (SEAP, 2016) indicate that there is significant additional potential within Izmir. The Izmir Strategic Plan includes a target of undertaking preliminary studies for renewable energy technologies. Some key

projects around this include solar energy plant in Municipal buildings and carparks (2016-present); installation of solar panels in water depots for chlorination in villages (IZSU); and the establishing a smart energy and management system in the Municipality.

These commitments are supported by nation-wide policies and strategies such as the National Climate Change Strategy, the Energy Efficiency Strategy, and the 11th National Development Plan and the Strategic Plan of the Ministry of Environment and Natural Resources, which sets a nation-wide target of at least 30% of electricity to come from renewable sources by 2023.

**IMM Strategy Plan 2020-2024 Targets related to Actions**

The selected objectives from the IMM Strategic Plan 2020 - 2024, related to the actions the group focused on, are summarized below.

**Priority Environmental Challenges Addressed**

The following key findings from this study were presented at the Challenge Prioritisation Workshop, at which the Technical Committee and stakeholders were consulted to verify the findings and prioritise the challenges. These priority environmental challenges have been identified as exacerbating the need for low-carbon energy and heat studies.

**Table 25: A summary of IMM Strategic Plan 2020-2024 Objectives addressed by this basket.**

Strategic Heading	Strategic Goal	Strategic Objective
<b>Infrastructure – Urban Infrastructure</b>	<b>1. Building a Sustainable Infrastructure Available to Everyone</b>	<b>1.1 A Sustainable Urban Infrastructure Will Be Built to Contribute to the Urban Economy</b>
<b>Quality of Life – Accessible and Clean Energy</b>	<b>2. Making Izmir a Smart City with a High Level of Quality of Life and A Well-Developed Transport Network</b>	<b>2.4 Access to Reliable, Sustainable and Affordable Energy by Everyone Will be Promoted</b>
<b>Nature – Climate Action</b>	<b>5. Making Izmir a Global Model City for Its Harmony With Nature</b>	<b>5.2 In Order to Adapt to Climate Change and its Impacts, Actions Will Be Taken in All Areas, Primarily in Agriculture and Energy</b>

**Table 26: Priority Environmental Challenges**

State Indicator	Priority Environmental Challenges
<b>GHG Emissions</b>	There is currently a minimal uptake of renewable energy by both the municipality and private sectors.
<b>GHG Emissions</b>	Reducing the Municipalities emissions as part of the city’s commitment to a 40% reduction in emissions against the 2018 baseline by 2030.

# Izmir's Strategy for Living in Harmony With Nature

Izmir's Strategy for Living in Harmony with Nature Excerpted verbatim from Izmir's Strategy for Living in Harmony with Nature.

## The Urban and Ecological Backbone: The Meles Creek and its Environs

### LAYERS 1 2 3

#### Integrational axes:

- ✓ Enabling nature to influence the city
- ✓ Ensuring the human impact on rural areas be in harmony with nature
- ✓ Encouraging a cyclical-feedback economy
- ✓ Strengthening the bonds between rural and urban cultures

#### Explanation:

Two essential strategies have been identified for the Meles Natural Life Corridor based on the idea of rendering it a functional part of the infrastructure: (i) connecting it with the parks on the Izmir periphery by integrating the green space systems in the valley, and (ii) carrying out micro-interventions towards the restoration of the Meles Cree.

Designed through a competition, ten thematic park areas have been proposed along the Meles Natural Life Corridor. Each of these parks, programmed according to Izmir's

history, biodiversity, and local needs, has been conceived of according to the principle of meeting the social, ecological, and structural needs of the neighbourhoods in which they are located. Trough the openings created by micro-interventions, an ecological window will be opened in the impassable ares in the Meles and its nearby environs for the living things for which this currently forms a barrier. Thus, by developing the orphological structure of the river, it is aimed that the Meles will be reintegrated with the city as a living organism once again.

The proposed living park in the Meles Delta, where the Meles, Arap, and

Manda rivers converge, show how nature is able to repair itself despite all of the problems generated by urbanisation. Program proposals have been developed for bird watching sports in the marshlands and the targeted area for education on the delta ecoststems, eco-information statios, hiking and cycling connections, and experiential routes. One part of the projects, the Şehitler Korosu Menegi. Reserved Area, will comprise an ecologicaş cpmservation and education space with thematic routes such as a nature observation trail, and bio-hydrology trail, with nature workshops, observation points, and cafe units.

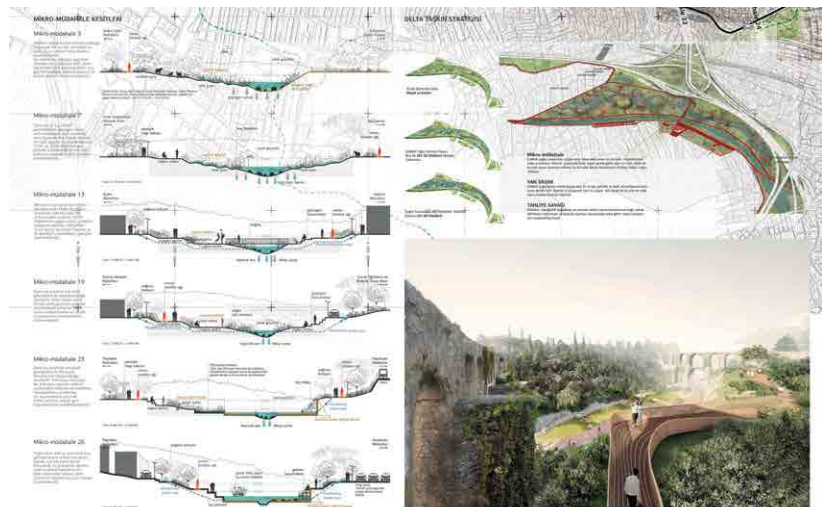
## The Sponge City Program LAYERS 2 3

#### Integrational axes:

- ✓ Enabling nature to influence the city
- ✓ Ensuring the human impact on rural areas be in harmony with nature
- Encouraging a cyclical-feedback economy
- Strengthening the bonds between rural and urban cultures

#### Explanation:

In order to increase permeability to rainwater in heavily urbanised areas, the city's hydrological mechanisms have been remodelled. The sponge city approach has been implemented at the pilot level in Peynircioglu River, the Meles Valley, Portakal Valley, the Uzundere Urban Renewal Area, and the Kadifekale Recreational Area.



The Meles Delta Recreational Projects.

Izmir joined the "Plastic Waste-Free Cities Network" initiated by WWF worldwide and involving 36 countries in December 2019 with the signing of the declaration of intent by IMM Mayor Mr Tunc Soyer, and Izmir became the second city in the Mediterranean after Nice to commit to becoming a plastic waste-free city by 2030.

In this direction, we present to you, our esteemed readers, the "Plastic Waste-Free City Action Plan" (excerpted verbatim) prepared as a result of the pilot applications initiated in Cesme.

Izmir Metropolitan Municipality  
**Plastic Waste Free City Action Plan**

**2.2.6: Partnership and/or cooperation with relevant institutions that can act together in accordance with the Zero Waste Regulation to invest in necessary recycling infrastructures (bins, trucks, routes, etc.) (SW 1.6)**

Strategic Plan Objectives	<b>5.1.5.1 Sustainable Waste Management and Recycling Mechanisms to be Developed</b>
Rationale	The action focuses on IMM investment in and development the smart waste collection infrastructure and facilities needed to take forward the Izmir Integrated Solid Waste Management Plan (2018). It will be developed in line with action SW 1.3 and SECAP action SW 1.8. The amount of solid waste per capita in Izmir has increased in recent years, from 390.55 kg per capita in 2008 to 469.09 kg per capita in 2018, an increase of 20%. According to Izmir Integrated Solid Waste Management Plan, the amount of waste per capita is expected to continue to increase in the next 10 years. In 2018, Harmandali Landfill received 4,800 tonnes of waste per day. In 2025, the amount of municipal solid waste to be generated is projected to be 5,413 tonnes. Therefore, this action is necessary to minimise the increase in waste and associated greenhouse gas emissions. The focus should be on increasing capacities and moving to a smart waste management system in order to ensure weekly waste collection from all wastes across the province. The first step of this action is to address the lack of information on the number of available waste collection trucks and to identify which districts of Izmir need more waste collection services. It has been developed in line with the construction dates of the disposal and recycling facilities outlined in the Izmir Integrated Solid Waste Management Plan.
Implementation Steps	<ol style="list-style-type: none"> <li>1.Cooperation with district municipalities for effective recycling. Identifying the necessary infrastructure needed (bins, suitable trucks, route optimisation, etc.)</li> <li>2.Completion of Harmandali waste separation unit</li> <li>3.Establish new waste transfer stations (5 stations are already planned until 2025).</li> <li>4.Operation of recycled waste transfer stations, including monitoring and reporting of targets</li> <li>5.Ensuring effective co-operation with private/public recycling organisations/facilities</li> <li>6.Raising public awareness on recycling</li> <li>7.Organizing awareness-raising and promotion activities and campaigns for the use of recycled materials through channels such as print, visual media and social media</li> </ol>
Time Frame	2020-2030
Action Owner	IMM
Stakeholders	Ministry of Environment and Urbanisation, District Municipalities Recycling Facilities

<b>2.2.7 Waste collection infrastructure (collection service, collection rate, bins/containers, vehicles) including smart collection systems and route optimization software in cooperation with the District Municipalities evaluation (SW1.17)</b>	
Action Description	This action includes a better understanding of the existing waste collection infrastructure and management practices in order to model the impacts on the operational cost and efficiency of routing and optimisation of smart collection systems. This action will help inform the investments required for the waste management structure and will be a precursor to action SW 1.3.
Possible Impacts	In general, two thirds of the revenue from waste management comes from waste collection. Considering this situation, increasing the operating efficiency of the waste collection fleet will increase the profitability for the district municipality / private company providing waste collection services. Increasing the efficiency of the waste collection system will result in reduced operating costs, more regularised waste collection intervals and improved customer service, as well as reduced greenhouse gas emissions from the waste collection process.
Time Frame	2021-2025
Action Owner	IMM
Financing Options	Municipal budget, public-private partnerships

<b>2.2.8 Support and accelerate investments in waste segregation (dry recyclables and organic waste) and clean material recovery infrastructure and composting facilities based on Izmir Integrated Solid Waste Management Plan (2018) (SW1.4)</b>	
Strategic Plan Objectives	<b>5.1 Sustainable Waste Management and Recycling Mechanisms will be Supported</b>
Description	In line with the targets set out in the Izmir Integrated Solid Waste Management Plan prepared by IMM in 2018, waste should be separated at source or subjected to mechanical/biological treatment before being sent to landfills. In order to achieve this, to carry out an assessment study and complete waste collection systems in order to invest in waste separation facilities (such as Harmandali Physical Separation Plant), clean material recovery facilities and Compost production facilities.
Rationale	<p>*Separation of recyclable wastes will reduce the amount of waste sent to landfills and the space required for waste collection will be reduced.</p> <p>*Recycled materials will find a place in the economy</p> <p>*Biodegradable wastes will be utilised in compost production instead of being sent to waste collection sites.</p>
Implementation Steps	<ol style="list-style-type: none"> <li>1. Evaluation of the possible quantities of different waste streams</li> <li>2. Assessment of the existing and necessary infrastructure and space requirements for waste segregation, reuse and composting</li> <li>3. Identify what is needed for separate collection, recycling and composting, including funding and financial and technological support</li> <li>4. Complete investments in waste collection systems necessary to facilitate the separation and treatment of recyclable and biodegradable waste 2021-2025</li> </ol>
Time Frame	2021-2025
Action Owner	IMM
Financing Options	Municipal Budget, International Finance Institutions, Ilbank, public-private partnerships, private Banks



It is very easy to access information with the 2D City Guide



IMM makes the lives of Izmirians easier with the software and applications it has implemented. The Department of Information Technologies has renewed and simplified the interfaces of the web and mobile supported 2D City Guide and Cemetery Information System.

Record in infrastructure with the 300 kilometres of stormwater line



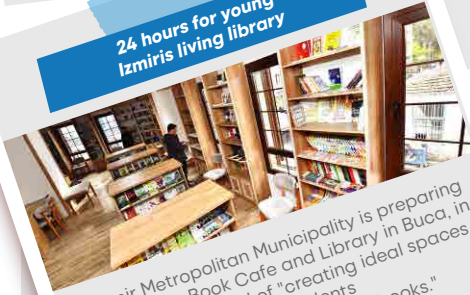
Within the scope of the infrastructure mobilisation initiated by Izmir Metropolitan Municipality Mayor Tunc Soyer since the day he took office, the production of storm water separation lines completed throughout the city has reached 300 kilometres.

24 hours living library for young Izmiris



Within the scope of the "Living Parks" Project, which IMM President Tunc Soyer pioneered in order to integrate Izmir residents with green areas in a healthy way, the Health Improving "Parks" studies continue to be implemented.

24 hours for young Izmiris living library



Izmir Metropolitan Municipality is preparing to open a Book Cafe and Library in Buca, in line with its goal of "creating ideal spaces that students need to study and read books."

Asarlik and Koyundera İZBAN station is coming



İZBAN, one of the important links of the urban rail system in Izmir, will build Lale station in Konak district and Katip Celebi station in Cigli district. IMM, in accordance with the demands metropolitan has taken action, Asarlik and two new buildings for Koyundera to make a station will be put out to tender.

Engelsizmir Congress welcomed 1,500 visitors on the first day



Organised by IMM, the 4th International Engelsizmir Congress hosted 1,500 visitors on its first day. In the congress themed "Innovative Approaches in the Field of Disability", both the winners of the Engelsizmir National Cartoon Competition received their awards and the Touchable Modern Art Ceramic Works Exhibition was opened.

338 million TL contribution to citizens' pockets



IMM's Public Transport scheme continues to offer a 50 per cent discount on all public transport vehicles during certain hours. With 5 years of uninterrupted implementation, 338 million TL has been contributed to the citizens' pockets.

Kemeraltı tradesmen will not be charged for solid waste from 2024



In the last assembly of the year, IMM decided not to collect solid waste disposal fee from the tradesmen in 2024 in order to alleviate some of the hardship experienced by the tradesmen during the construction of the historical renovation project in Kemeraltı Bazaar.

Türkiye's largest waste water treatment plant title comes back



Izmir Metropolitan Municipality İZSU General Directorate continues the revision and capacity increase works initiated at Cigli Wastewater Treatment Plant in line with the Living Bay Programme.

Disaster-resilient Izmir and a clean Giant steps for the Bay



IMM İZSU General Directorate has made significant investments in the fields of wastewater, rainwater separation and drinking water infrastructure within the scope of the infrastructure attack initiated during the term of President Tunc Soyer.

# The Search for Technological Solutions to the Climate Crisis

**Ece YILMAZDEMİR**  
Communication and Management Expertise

**Cyclizm Renewable Energy Technologies**  
Chairman of the Board of Directors



The symbiotic relationship between the climate crisis and the need for innovative green technologies laid the foundation for Cyclizm. When Cyclizm started its journey to develop and launch an AI-based cloud platform, it not only contributed to the advancement of green energy technology, but also undertook the mission to promote sustainable transformation through the development of renewable energy software. Our goal is to become a leading decision support system for companies looking to invest in clean hydrogen production and to set the standards of excellence and innovation in the renewable energy sector.

As clean hydrogen moves from the investment planning phase to the next phase, a promising shift in the energy projection can be observed. Technologies to minimise investment risk and reduce the unit cost of hydrogen production have become important and urgent. Clean hydrogen, which is often seen as the

green energy storage method of the future, a saviour to reduce the carbon burden of transport and heavy industry, has been in the academic studies and R&D phase for a long time. However, especially with the sharp decline in renewable energy production costs, its value has been recognised internationally and it is moving towards the next stage of commercialisation. As clean hydrogen gains acceptance as a mainstream energy source, it can replace fossil fuels in industrial processes, transport and energy storage, and contribute further to our quest for a sustainable, low-carbon solution.

There are some major barriers to the clean hydrogen sector; a significant proportion of projects are currently in the planning stage, but only a small proportion (4 per cent) are under construction or have taken a final investment decision (FID). The main reasons include the high cost per unit of clean hydrogen, demand uncertainties, lack of regulation and lack of infrastructure to transport

lack of infrastructure to transport hydrogen to end users. Only 1.2 per cent of planned clean hydrogen investments have been financed by financial institutions. This indicates that it is seen as a high-risk investment by financial institutions.

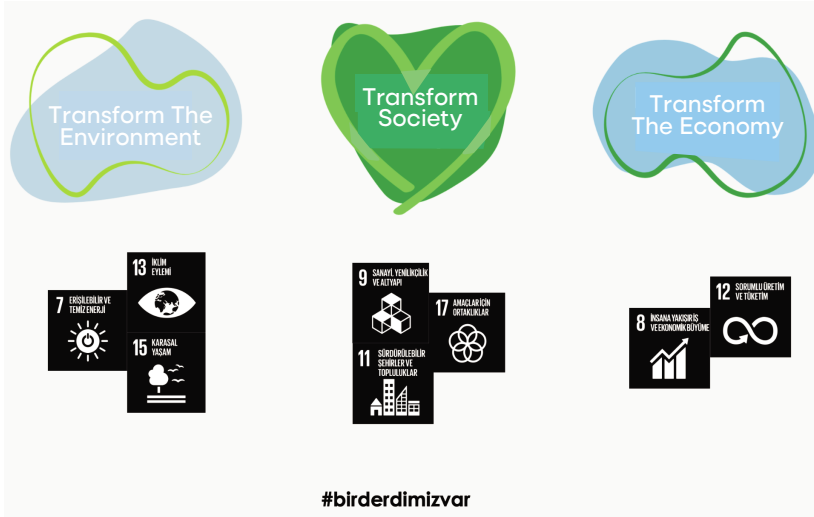
Clean hydrogen is leading the green transformation in the energy and heavy industry sectors. Cyclizm has been developed as a cloud platform that can eliminate technical and commercial uncertainties in clean hydrogen investments. The platform offered by the artificial intelligence-based Cyclizm, which can reduce unit production costs by up to 30% and provide efficiency increases in production up to 50%, thanks to artificial intelligence-supported optimization, to optimize hydrogen production; it takes into account critical parameters such as location-specific hydrogen production simulation, supply-demand estimation, cost analysis, carbon footprint calculation and investment return period.

The screenshot shows the Cyclizm platform interface. On the left is a sidebar with a 'Cyclizm' logo and navigation menu including 'Dashboard', 'Create New Report', 'Manage Reports', 'Renewable Hydrogen Plants', 'H2 Plant Locations', 'Solar Plants', and 'Wind Plants'. The main area displays a four-step process: 1. Renewable Hydrogen Plant Simulation, 2. Solar Power Plant Parameters, 3. Wind Power Plant Parameters, and 4. Electrolyzer Specifications. Below this is a map of the Mediterranean region with a search bar and a 'Please select a location below or manually enter the coordinates.' prompt. A location 'Izmir Arge' is selected, showing a calculated elevation of 103m. At the bottom, there are input fields for 'Longitude' (27.14341200000000), 'Latitude' (38.41473300000000), 'Location Name' (Izmir Arge), 'Yearly Hydrogen Demand' (9999119299 kg), and 'Currency' (Euro (EUR)).

Image 1. Cyclizm Platform

SOURCE: 'Global Hydrogen Review 2022 - analysis. IEA. <https://www.iea.org/reports/global-hydrogen-review-2022>

<sup>2</sup>Hydrogen Insights 2022 - Hydrogen Council. (n.d.). <https://hydrogencouncil.com/wp-content/uploads/2022/09/Hydrogen-Insights-2022-2.pdf>



**Visual 1. Sustainability Theme of Cyclizm**

in production up to 50%, thanks to artificial intelligence-supported optimization, to optimize hydrogen production; It takes into account critical parameters such as location-specific hydrogen production simulation, supply-demand estimation, cost analysis, carbon footprint calculation and investment return period. It compares all of these parameters by simulating thousands of different investment scenarios and presents the optimum investment model. In this way; it offers a data-driven approach to companies worldwide to determine the most suitable clean hydrogen production methods for their investment needs.

By digitizing feasibility studies and providing real-time analysis, the platform minimizes cost uncertainty, maximizes carbon reduction commitments and facilitates the transition to clean hydrogen production. Optimized plant design enables cost reductions and improved return on investment, helping companies make informed investment decisions in the clean hydrogen sector.

As Cyclizm, we aim not only to provide innovative technology, but also to lead the industry by creating a database of electrolyzers used in hydrogen production. In this endeavour, we aim to address the lack of information in the industry and to centre for technical details in the production we want to gather at one point. We create Türkiye's first PEM and alkaline electrolyzer technical database and

we are committed to providing reliable, comprehensive and up-to-date information to the sector by regularly updating this database.

Our commitment to share this valuable source of information with the industry reflects our desire to contribute to energy transition efforts not only in Türkiye but also internationally. By sharing the database we have created as open source, we aim to increase collaboration in the industry and introduce hydrogen technologies to a wider audience on a global scale. In this way, by supporting global efforts in sustainable energy, Cyclizm aims to play a role in promoting environmental and economic sustainability both locally and internationally.

If we consider Cyclizm from a holistic perspective, the fact that the product is being developed by a multidisciplinary team, that it can manage multiple stakeholders as an initiative, and that the founding team can contribute to the product development process by taking the problems directly from the ecosystem thanks to its experience makes it easier to work on a relative issue and develop technologies. The founding team's experience in the fields of energy, innovation, deep technology and entrepreneurship, which they met at Originn Creative Hub, a co-working and living space in Izmir, continues with their academic studies. The product he developed to inspire other projects for the purpose of academic research related to the product simultaneously with the work is running it.

Cyclizm positions itself as an impact initiative. In addition to its work directly contributing to eight of the sustainable development goals, it aims to support the transition to clean hydrogen production using artificial intelligence technology and other digital solutions through its Sustainability Manifesto. Focusing on green and sustainable energy sources, it seeks innovative ways to overcome the energy crisis and combat climate change. It places great emphasis on optimising facilities and processes, with an emphasis on energy efficiency. Cyclizm combines environmental protection principles, clean hydrogen production with best practices and environmental protection methods to minimise environmental impacts. Cyclizm is committed to serving businesses with accurate and transparent data, reducing carbon footprints and encouraging collaboration, while committing to innovation and advanced technology to continuously improve in the field of sustainable energy. It sees its sustainability mission as a commitment to society, the economy and future generations, and maintains this commitment with high standards.

Cyclizm takes its name from Izmir. Just like an energy cycle, Izmir's energy transformation, rich cultural heritage and energy potential have been a source of inspiration for us. On the one hand there was "Cycle" and on the other hand there was Izmir's pioneering role in the energy sector, its values and potential. Cyclizm represents the beginning of technological transformations in the energy sector, and this starting point carries a symbol beyond a mere geographical location.

The basic principle of Cyclizm is cooperation and ecosystem. This initiative, which aims to open up to the world from Izmir, aims to introduce the values of this beautiful city to the world and to open the doors to more creative solutions. For this reason, we will continue our work with the belief of collaborating both in the development of products originating from Izmir and in the developed products.

## 2024 will be the 'Year of Mobilization' in Wind

İskender KOKEY  
Mechanical Engineer

TWEA General Secretary



Turkish Wind Energy Association (TWEA) held its 2023 year-end evaluation and 2024 projections meeting on 5 January at Four Seasons Hotel Bosphorus.

-At the meeting, which was held under the title of "The Effects of Global Economic and Geopolitical Developments on International Relations and International Energy Policies", TWEA's 2023 activities were presented by TWEA President Ibrahim Erden. Ozturk Selvitop, Director General for Foreign Relations of the Ministry of Energy and Natural Resources, Burak Rende, Deputy Director General for Energy and Multilateral Transport of the Ministry of Foreign Affairs, and Ibrahim Erden, President of TWEA physically attended the session.

-TWEA President Ibrahim Erden said that 2024 will be a 'year of mobilisation' for wind in the areas of 'permits, financing and sustainable growth of the wind industry'.



Speaking at the meeting attended by senior representatives of TWEA member companies and members of the press, TWEA President Ibrahim Erden stated that 2023, which was a very challenging year for both Türkiye and the world, was full of extremely positive developments for the near and medium-term future of the Turkish wind energy sector, even though it did not yield the desired results in terms of the new wind installed capacity brought into the grid. Stating that the 2023 National Energy Plan and Hydrogen Roadmap announced in January clearly revealed Türkiye's targets in renewable energy, including wind, Ibrahim Erden reminded that according to the plan, Türkiye's wind installed capacity is targeted to increase to 29,600 MW in 2035 and Türkiye's first official targets in the field of offshore wind energy are included in this plan.

"After 2022, which we declared as the 'Year of Industry', we focused on activities that will enable more and faster investments in the sector in 2023, which we called 'Year of Investment'. 2024 will be a 'mobilisation year' in the fields of wind permits, financing and sustainable growth of the wind industry," Erden said: "We worked with the motto "100th Year of our Republic, One Hundred Years of Wind". We also took initiatives to have wind declared as a 'strategic sector'. We worked closely with the Ministries of Energy and Natural Resources, Industry and Trade, Environment, Urbanisation and Climate Change, Environment, Interior and Foreign Affairs within the framework of our establishment mission and in line with the objectives of improving the investment environment. We have emphasised sector information and stakeholder meetings. We represented our country with large delegations at WindEnergy Hamburg and WindEurope Copenhagen events abroad and made productive contacts. We made intensive efforts to bring the WindEurope 2026 event to our country with the great support of our relevant public organisations, and although Istanbul was shortlisted with Madrid, we did not get a positive result. We will continue to work to bring this event and other WindEurope events to Türkiye in the coming years. We have increased our work on offshore wind and in this context, in cooperation with Shura Energy Transformation Centre we published our 'Offshore Wind Energy Tenders: Global Trends and Recommendations for Türkiye'. We have intensified our work on the Izmir Candarli Port, which we hope will become a hub for the wind energy sector. In addition, we have presented regional energy projects such as the 'Taseli Renewable Resource Area Project', which we have developed with a civil initiative and in cooperation with our Ministry of Energy and Natural Resources, to the information of our esteemed public administrators and relevant sector stakeholders. We have continuously and intensively worked with our public and private sector stakeholders in the areas of permitting, zoning and land acquisition and



SOURCE: TWEA 05 January 2024 Year End Meeting Press Release



domestic industry has reached a significant level and continues to contribute to the energy supply security of both Türkiye and the region, as well as to our employment," said Selvitop, also drawing attention to China's place in energy conversion manufacturing.

Burak Rende, Deputy Director General for Energy and Multilateral Transport of the Ministry of Foreign Affairs, stated that the way of talking about energy security has changed after the developments in the last few years and said: "First of all, we need to pay attention to the electrification issue in China. This situation brought many resources, especially critical minerals, to the agenda". Rende stated that the global pandemic and its effects, and most recently the developments in the energy field with the Ukrainian war, have become noticeable. Burak Rende, who evaluated that "the EU found itself in the middle of this crisis" and touched upon the war and crisis situations in the region where Türkiye is located, said that this situation made Türkiye the main element and said, "Renewable energy is also becoming the main element of our energy security. We think that renewable energy will be a gain for Türkiye and Türkiye can be one of the main actors in this field. This will also determine the political power of Türkiye."

Following the session, IIEEC Director Bora Sekip Guray made a special presentation on the 'Türkiye Green Hydrogen Future' report prepared by IIEEC.

allocation processes; competitive financing and access to financing; and efficient and sustainable development of the wind industry. We responded to the calls of national and international institutions such as the EU Commission, the European Cultural Foundation, the Ministry of Industry and Technology with 5 different project applications. Our EU Commission IPA-III project was approved. In addition, we continue to work on the Candarli Port and we attach great importance to our 'Izmir Industry Cluster' project application to the Ministry of Industry."

Türkiye's Permanent Representative to the European Union and Deputy Minister of Foreign Affairs Mehmet Kemal Bozay, who attended the session titled "The Effects of Global Economic and Geopolitical Developments on International Relations and Our International Energy Policies" held within the scope of the meeting via video link, said that despite the wars around Türkiye, the fact that it can be talked about wind energy is in such a geography is an indicator of Türkiye's power and stability. Mentioning that the role of renewable energy is gradually increasing and saying, "I wholeheartedly believe that wind energy will be one of the determining factors in Türkiye's political and economic future," Bozay said, and he noted that while Türkiye's contribution to the European Union's energy regulations is so high, they want to talk about what the new networks that will emerge, including wind, might be. "The EU needs to see its interests here and start a meaningful dialogue. We are also looking at what can be done with countries such as Romania and Bulgaria and how we can utilise the Black Sea for offshore wind. I believe

that TWEA will enter a process of cooperation with Central Asia, the Middle East, the Caucasus and African countries in the wind sector in the coming period" said Mehmet Kemal Bozay also underlined the sensitivity on environmental issues.

Another speaker of the session, Dr Ozturk Selvitop, General Manager of Foreign Relations of the Ministry of Energy and Natural Resources, stated that the results of the elections to be held in the USA and EU countries in 2024 will shape renewable energy policies and that they aim to provide diversity of resources and financing from different sources. "Although we received a lot of criticism when adding the renewable energy contribution process in 2011, we supported our domestic industry with a 5-year temporary application. And our



## IZTASIT Period Started in Bergama



Soyer, speaking at the introduction meeting of Bergama, the sixth stop of IZTASIT project, promised to bring IZBAN to Bergama for the next term. He showed the project as an example for Türkiye and emphasised that it is a model where citizens, minibuses, tradesmen and the municipality benefit. He also stated that Buca Metro would be completed before the deadline. Regarding infrastructure investments, he emphasised that he was different from populist politicians and that he attached importance to planning for the future and infrastructure investments. IZTASIT Bergama project will serve with 16 buses and 4 lines, Izmir Card will be valid instead of cash payment in public transport.

## Cigli Tram Started Service

IMM inaugurated the Cigli Tram with a ceremony attended by tens of thousands of Izmirians after the groundbreaking three years ago. Mayor Tunc Soyer attended the first journey and became the first passenger of the tram. In his speech at the opening ceremony, Soyer emphasised the pride of the giant investments made in Izmir. With an eye-popping investment of 183 million Euros, Cigli Tram will be free of charge until 19 February. Soyer stated that 41 billion worth of rail system investment was made in Izmir in 5 years. Cigli Mayor Utku Gumrukcu emphasised the importance of the tram for Cigli and thanked Mayor Soyer. With the opening of the tram, it was stated that Cigli people are in the heart of Izmir.



## Soyer Protects the Rights of Labourers



Izmir Metropolitan Municipality Mayor Tunc Soyer signed additional protocols and collective agreements that improve the salaries of Izenergy, IZELMAN, IZFAS employees. Soyer emphasised that they would defend labour and stated that they adopted a labour-protected local government approach instead of currency-protected deposits. Stating that they have taken an exemplary step in Izmir, Soyer drew attention to the importance of democracy, justice, rule of law and labour struggle. With the signed protocols, the wages of 6 thousand 114 public labourers and 19 thousand 855 Izenergy, IZELMAN, IZFAS employees were improved. On top of the 38,56 per cent wage increase as of January 2024, an 11,5 per cent improvement was made effective from 1 February 2024.

## Green Infrastructure Vision Strengthens with Meric Living Park in Bornova

The sixth of the Living Parks, which is part of Soyer's "Green Infrastructure" vision, was opened in Bornova. The park is a 60 thousand square metre area that integrates with nature and forests and includes various social areas. Soyer stated that within the scope of the Green Infrastructure vision, they rebuilt Izmir as a circular city that is in harmony with nature and reassuring, and emphasised that they increased the amount of green space in Izmir by 60 percent and breathed life into the city. Meric Living Park was designed as a complex that meets the various needs of children, neighbourhood residents and nature lovers. Many municipal departments and companies worked together in the construction of the park, and the wishes of the neighbourhood residents were also taken into consideration.



## The Legend of Karakilcik carries into the Future



Izmir Metropolitan Municipality Mayor Tunc Soyer started with a handful of seeds in Seferihisar and spread it all over Türkiye, and now it reaches from the field to the table in the hands of young people. Yasar University Gastronomy and Culinary Arts Department students, together with the members of Izmir Metropolitan Municipality Youth Municipality, entered the field to sow the seeds of black pigeonpea. Izmir Village Coop Association President Neptun Soyer, who did not leave the young people alone while sowing on 4 deceres of land in Menderes, said, "Young people should have a mark in the field. This identity should be given to young people and from young people It is also necessary to transfer it to the future."

## Kemeralti's New Century Starts

IMM is preparing for a new era by renovating the Historical Kemeralti Bazaar with a huge investment of 770 million liras. With infrastructure and superstructure works, changes are taking place in many areas from waste water systems to internet network. A colourful festival will be organised to welcome 2024. Aesthetics and security are also prioritised along with the infrastructure improvements in the market. In addition to these works, Kemeralti is being revitalised with various events and concerts. As a result of the investments made, no solid waste fee will be collected from the tradesmen of the bazaar in 2024 and it is aimed to give the bazaar a modern face by preserving its historical texture.



## WENERGY-Clean Energy Technologies Fair on 9-11 May

The announcement of Wenergy-Clean Energy Technologies Fair, hosted by Izmir Metropolitan Municipality, in cooperation with IZFAS, BIFAS and EFOR Fair Organization, with Siemens as the main sponsor, was made at a press conference.

Stating that they have developed Izmir fair organisation since they took office, Mr Soyer said; "Another world is possible. Another energy production is possible. In our fair, we will come together with our participants from 12 cities in our country from Istanbul to Gaziantep, from Sanliurfa to Mugla. More than 200 sector stakeholders from our country and different parts of the world will be with us. Hundreds of visitors and sector professionals and investors will meet at our fair. Organisations, companies and non-governmental organisations serving the energy sector will come together under the roof of Fuar Izmir. The latest in the sector technologies in Izmir, the city of clean energy will be exhibited. World energy in Izmir will meet," he said.



## Big and Bold Steps in Urban Regeneration



Izmir Economic Development Coordination Board (IEDCB) held its 123rd and last meeting of the year at the Historical Havagazi Factory Cultural Centre hosted by IMM Mayor Tunc Soyer. In the meeting where 2023 was evaluated, issues on the city agenda such as IMM's "Izmir Terminal City" study, "Presidency and City Assemblies Idea Project Competition as a Focus of Civilisation" and urban transformation projects were discussed.

In the meeting, the winning project of the "Presidency and City Assemblies as a Focus of Civilisation Idea Project" competition, which was organised for the new building to replace the IMM main service building, which was demolished after the 30 October Izmir earthquake due to its risky condition, was introduced.

Stating that they have carried out transformation works in 5 thousand 500 independent buildings in 5 years, IMM President Soyer said, "However, we never consider these works sufficient. We are in preparation. In the new period, we will take big and bold steps."



## 28 Billion Liras Investment to Izmir

During Soyer's tenure, a record level of investment was made in the city despite economic difficulties, pandemic and natural disasters. Under Soyer's leadership, the municipality increased its investment expenditure by 150 per cent to 28.6 billion TL. In this process, one third of the investments were allocated to infrastructure projects. Mayor Soyer stated that the success rate is 87 per cent and that they have exceeded their promises.

Investments were made in a wide range of areas from transport projects, agriculture to social services. Especially rail system projects, renewal of the bus fleet, agricultural subsidies and earthquake risk efforts to minimise the impact of the social security system came to the forefront. Social in the field of cash support for children aid and disaster relief provided has played an important role.

In a series of projects realised in Izmir, an initiative to fight drought and expand rainwater harvesting has been launched under the name "Sponge City Izmir". The project includes the distribution of rainwater tanks to thousands of buildings and a campaign for 10,000 rain gardens. Steps are being taken to promote green regeneration in the city: bus stops, cemeteries and roads are made impermeable, are being turned into fields. Also, underground various water harvesting to replenish their water systems are also being installed.

Izmir is also undergoing a major transformation with asphalt paving works and projects to improve traffic flow. Road expansions, tunnels and new connection roads to relieve the city's traffic are significantly reducing travelling times. Historic buildings are also being restored, such as the reactivation of the Sasal Water Factory, which supplied the city's water supply.



Cigli Wastewater Treatment Plant

Waste management is also on Izmir's agenda. With the IzDonusum Project, waste is separated at source and the income from environmentally friendly waste management facilities increases significantly. Green areas are being increased and city parks are being renewed.

In the cultural field, the historical sites restoration and revitalise tourism in the name of the giant investments attract attention. Izmir's to revitalise its cultural heritage many projects are being carried out: historical restoration of places, ancient Smyrna Agora was unearthed.

The large-scale investments made in the city during Soyer's term of office were once again emphasized with the "Mass Opening and Groundbreaking Ceremony of Major Infrastructure Investments" held in Cumhuriyet Square and announced IZSU's giant projects.

Investments including critical infrastructure elements such as drinking water, sewerage lines, rainwater separation systems and wastewater treatment plants were introduced to Izmir residents. By emphasizing the steps taken to prevent pollution in the bay, the good news was given that these projects that will shape the future safe life of Izmir will be implemented.

Izmir also draws attention with its sports training, youth projects, women's entrepreneurship and activities for disabled people. The city also takes pioneering steps in health services, measures against forest fires and animal welfare.



# Izmir's Climate City Contract is at the European Commission



For the first round of applications, 12 Mission Cities have submitted their Climate City Contracts to NetZeroCities. The 10 cities that submitted their Climate City Contracts were the first to be awarded the Mission label. These cities are Klagenfurt (Austria), Sonderborg (Denmark), Mannheim (Germany), Cluj-Napoca (Romania), Madrid, Valencia, Valladolid, Vitoria-Gasteiz and Zaragoza (Spain) and Stockholm (Sweden).

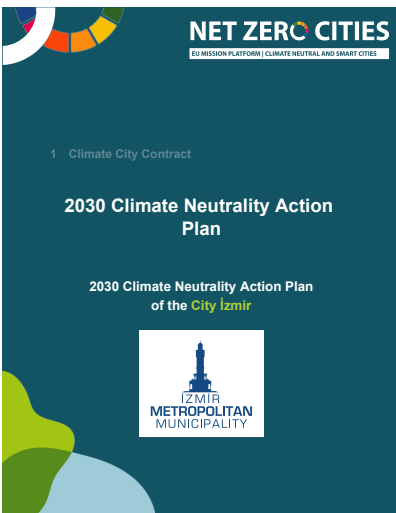
In September, 27 cities, including Izmir, submitted their applications to the NetZeroCities Platform. In order to comply with the deadline set by the European Commission, the first version of Izmir's Climate City Contract was submitted to the platform under the coordination of Izenenergy with the support of the city's relevant experts. According to the official announcement made by the NetZeroCities Platform, Izmir has passed the first qualifying step, the compliance check, to earn the Mission Label. Having successfully passed the evaluation of the NetZeroCities Platform, Izmir's Climate City Contract is now being evaluated by the relevant committees of the European Commission, which is the final decision maker in order to receive the Mission Label.

The 112 Mission cities selected by the European Commission under the Climate Neutral and Smart Cities Mission are expected to prepare a Climate City Contract. The cities that prepare the Climate Contract will be awarded with the Mission label and the financing conditions for climate actions will be unlocked.

The Climate City Contract consists of 3 main documents: Action Plan, Investment Plan and Commitments. Thanks to this innovative concept developed within the scope of the Climate City Contract, a comprehensive financial assessment of climate action plans and a

comprehensive financial assessment based on stakeholder participation the groundwork has been laid.

Climate City Contracts are assessed by the Mission Platform NetZeroCities twice a year in March and September. The applications are initially assessed by NetZeroCities and the contracts that pass the conformity check are forwarded to the European Commission. After the final evaluation by the relevant committees authorised by the European Commission, the selected cities are awarded the Mission Label.



## GCC Izmir Working Groups Meetings Continue

The Global Climate Community Izmir, which is carried out under the coordination of Izenergy in order to implement the EU Climate Neutral and Smart Cities Mission in Izmir, has started to organise the second of the working group meetings in order to create the road maps for the climate neutrality target with the city stakeholders.

In the working groups gathered under 6 headings: Buildings: Energy Consumption and Energy Efficiency, Energy Production, Mobility and Transportation, Green Infrastructure and Nature Compatible Solutions, Waste and Circular Economy, Green Industry, information was provided for new participants about the concept determined by the Cities Mission. A comprehensive discussion was held with the representatives of the Working Groups about the current situation of Izmir towards the net zero target and their expectations, opinions and suggestions were received.



**Energy Generation**



**Buildings: Energy Consumption and Energy Efficiency**



**Green Industry**



**Waste and Circular Economy**



**Green Infrastructure and Nature Compatible Solutions**



**Mobility and Transport**

In the presence of representatives from Izmir Metropolitan Municipality, Izmir Development Agency, Aegean Region Chamber of Industry, Izmir Chamber of Commerce, TMMOB,

ENSIA and many other organisations, important steps are being taken to create an Izmir-wide synergy within the scope of the Cities Mission.

## The First Part of Izmir's Climate Change Adaptation Mission Technical Support Programme Completed



Izmir was entitled to participate in the Technical Assistance Programme under the Climate Change Adaptation Mission. With its application, it became one of the first cities to benefit from the Technical Assistance Programme for Adaptation Mission activities. The aim of the Technical Assistance Programme is to provide technical support for the development of action plans, pilot applications, financial and social conditions within the scope of adaptation to climate change. In the first part of the Climate Change Adaptation Mission Technical Assistance Programme, the adaptation actions prepared by Izmir within the scope of SECAP and GCAP were evaluated by the experts. In the meeting attended by IMM Climate Change and Clean Energy Branch Directorate, authorised personnel from Izenergy and IZDOGA and Adaptation Mission Experts Beatriz Mayor and Giovanni Roberti, opinions and suggestions on areas for improvement in Izmir's adaptation actions were evaluated.



## Combating Climate Change in our Buca

Fossil fuels with industrialisation increased utilisation, improper agriculture practices, forest areas greenhouse due to reasons such as accumulation of gases in the atmosphere climate cause a change.

In our province, the effects of climate change have become more palpable and forest fires, reduction of our water resources, extreme temperature changes, flood disasters as a result of sudden rainfall, drought and desertification and ecological degradation are increasing day by day.

As Buca Municipality; anticipating that we can take important steps in the fight against Climate Change and create positive impacts on a local scale; we became a signatory of the "Covenant of Mayors for Climate and Energy" [Covenant of Mayors - (CoM)] on 06/01/2022 with the aim of

**Hakan DEMİREL**  
Environmental Engineer

Climate Change  
and  
Zero Waste Directorate  
Environmental Engineer



participating and supporting the mayors to achieve the climate and energy targets of the European Union, which was initiated by the European Commission in 2008, and within this scope, we made commitment on emission reduction.

It has been decided that we will be able to use our process more efficiently, more sustainably and more effectively by participating in the Izmir Province Integrated Sustainable Energy and Climate Action Plan (SECAP) Training and Support Programme. Within the framework of this programme, it was decided to receive consultancy services with the contract signed between Izenergy INC. and Buca Municipality in order to move forward together with expert academicians.

The procedures to be carried out within the scope of SECAP studies are mainly the preparation of greenhouse gas emission inventory, climate risk and vulnerability analysis, reduction of energy consumption and climate adaptation action plans preparation.

As Buca Municipality, some of the actions we are taking and can take to minimise the effects of climate change and protect the environment are listed.

-To carry out the necessary training and studies to raise awareness of the public on the issue of climate change

-Improving the insulation of buildings in order to increase energy efficiency

-To orientate and promote renewable energy sources

-Protecting the natural ecosystems of urban areas by increasing green areas with new development plans

-Systems to increase the use of public transport instead of private car use improve

-Sustainable water resources to encourage the use of

-Also on waste management recycling by making studies to increase rates

## The First Part of Izmir's Climate Change Adaptation Mission Technical Support Programme Completed



Izenergy continues to work with the district municipalities of Izmir province within the scope of Integrated SECAP! On 21 December Thursday, the internal stakeholders of Buca Municipality, who came together at Buca Municipality Assembly, were informed about Buca's carbon emissions and potential energy resources obtained within the scope of SECAP studies. Following the informative presentation by Assoc. Prof. Dr. Mete Cubukcu and Asst. Prof. Dr. Hasan Sarptas, the questions of the relevant stakeholders in the units of Buca Municipality were taken and brainstorming was carried out for potential solutions.



**Ecem KURTULUS  
KAZANCI**  
Environmental Engineer

**Environmental Protection and  
Control Manager**



efficient LED lighting, thermal insulation boards on exterior walls and drip irrigation systems in our parks are used. New service buildings and facilities are designed as green buildings with environmentally friendly features that minimise energy and water consumption.

The total installed capacity of Karaburun Municipality is 80 Kwh Solar Power Plant and 20 Kwh Wind Turbine, and the electricity generated in the solar power plant is supplied to the grid, meeting an average of 10% of the annual electricity consumption in the service buildings. It is aimed to increase this ratio with the realisation of SECAP outputs.

The total installed capacity of Karaburun Municipality is 80 Kwh Solar Power Plant and 20 Kwh Wind Turbine, and the electricity generated in the solar power plant is supplied to the grid, meeting an average of 10% of the annual electricity consumption in the service buildings. It is aimed to increase this ratio with the realisation of SECAP outputs.

## Karaburun Protects Its Blue and Nature

As Karaburun Municipality, activities are carried out in order to make Karaburun, which has 5 blue flag beaches and 15 swimming areas, with its tangerines, tangerines, hair goats, clean air and unique nature, historical and natural beauties, a district that develops with sustainable tourism, agriculture and animal husbandry.

In order to prepare a "Sustainable Energy and Climate Action Plan" (SECAP) for our Municipality in order to support the activities to combat the climate crisis and reduce the risks of natural disasters in Karaburun with sustainable policies, we have signed the "Izmir Province Integrated Sustainable Energy and Climate Action Plan (SECAP) Training and Support Programme" with Izenergy INC. We have signed the "Integrated

Sustainable Energy and Climate Action Plan (SECAP) Training and Support Programme for Izmir province" and the first step is to become a signatory of the CoM (Covenant of Mayors for Climate and Energy Initiative) European Covenant of Mayors for Energy and Climate.

Karaburun Municipality aims to increase energy efficiency, achieve sustainable development goals and strengthen the local economy by ensuring sustainable energy use, reducing greenhouse gas emissions, adopting environmental protection strategies and contributing to sustainable energy transformation.

In order to achieve these targets, work has begun in service buildings; in order to reduce energy consumption,

## Studies Carried Out by Gaziemir Municipality within the Scope of Climate Change



Climate change and the related negative impacts will negatively affect the current systematic and future living conditions in the world. It is obvious that every individual will be exposed to and affected by this situation. Izmir is one of the provinces that will be most exposed to the effects of the climate crisis due to its geographical location and urbanisation. As Gaziemir Municipality, we have accelerated our efforts to see where we are in Gaziemir, one of the central districts of Izmir, to improve the conditions, to reduce the negative effects and to raise awareness of our citizens about this process they will face.

In this context, in 2023, we became a party to the Covenant of Mayors (Covenant of Mayors-CoM), which

**Derya  
DIZMAN KAYAR**  
Environmental Engineer

**Climate Change  
and  
Zero Waste Manager**



aims to fight global warming and support the use of clean and renewable energy, and in which 11,847 municipalities in the world act together. As Gaziemir Municipality, we have started the preparation of Sustainable Energy and Climate Action Plan (SECAP) for our district in 2023. We aim to ensure energy saving, energy efficiency and the use of renewable energy sources in new investments and ongoing projects for our district and to increase green areas in our district. We organise

trainings on Climate Change and Zero Waste for our municipal staff and citizens who benefit from our service buildings. By organising trainings on Climate Change and Zero Waste in our schools in our district, we have reached a total of 7786 children in 51 trainings since 2022. We raise awareness of our citizens with our public spots. As Gaziemir Municipality, we will continue our efforts to ensure that every citizen living in our district is sensitive to climate change and nature and to increase awareness on this issue.

# Gaziemir Municipality Bureaucrats and Employees within the Scope of Integrated SECAP Writing Internal Stakeholder Meetings Organised!



Izenergy continues to work with the district municipalities of Izmir province within the scope of the Integrated Sustainable Energy and Climate Action Plan (SECAP)!

An internal stakeholder meeting was held with Gaziemir Municipality on Monday, 22 January at Gaziemir Municipality Assembly within the scope of writing the Integrated Sustainable Energy and Climate Action Plan (SECAP) and the stakeholders of the district were informed about the current situation.

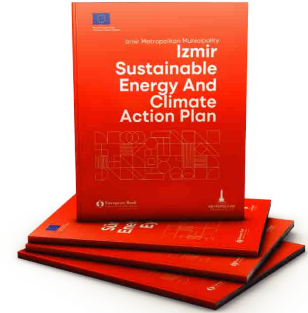
Ercan Turkoglu, Chairman of the Board of Directors of Izenergy, emphasised the importance of sustainability and energy efficiency for cities and municipalities today.



Assoc. Prof. Dr. Mete Cubukcu talked about the content of the Sustainable Energy and Climate Action Plan (SECAP) and provided information from the data of the district municipalities, while the municipal stakeholders were informed about SECAP and shared information on emission reduction techniques in their districts. Again after the presentation, the questions of the stakeholders consisting of the units affiliated to Gaziemir Municipality were answered and their suggestions were taken into consideration for the SECAP phase to be written.

Gaziemir Municipality bureaucrats and employees recognised the importance of SECAP not only for energy and climate but also for a sustainable and

climate neutral Izmir with smart infrastructure and stated that they are ready to take steps for the Action Plan with its pros and cons.



## Izenergy Starts ISO 50001 Energy Management System Consultancy Service for IMM'S Institutions and Companies



Our meeting titled ISO 50001 Energy Management System and Energy Efficiency Measures was held with the participation of Izmir Metropolitan Municipality units and companies and our energy efficiency consultant Mr. Onur Gunduru. Energy efficiency in public buildings was discussed at the meeting.

In the meeting where Climate Neutral and Smart Cities Mission, action plan for public buildings in SECAP, Regulation on Increasing Efficiency in the Use of Energy Resources and Energy, Saving Target and

Implementation Guide in Public Buildings were discussed, the importance of energy efficiency in achieving 2030 targets was emphasised.

It was stated that ISO 50001 Energy Management System is extremely important for the proper consumption and management of energy as well as being an obligation for public institutions and provides the opportunity to invest in the future by reducing greenhouse gas emissions from energy consumption. In addition, it was explained that it also paves the way for organisations to be competitive in the market. The road map for the efficient use of energy and

the initiation of ISO 50001 studies was shared with the participants of the meeting by evaluating the energy consumption of IMM units and companies. Metro Inc., which has ISO 50001 certificate, and IZSU officials who have reached the audit stage shared their experiences. In this process, we also shared with the participants that we, as Izenergy INC., started to provide ISO 50001 Energy Management System Consultancy Service. It was stated that consultancy will be provided on issues such as data analysis, documentation, training workshops and system sustainability after certification.

## Izmir Agriculture and Nutrition Sustainability Summit

Izmir Agriculture and Food Sustainability Summit was organised in cooperation with Young Leaders and Entrepreneurs Association (JCI). Today's local & global food supply chain system challenges, green transformations with healthier, safer and sustainable agri-food systems, consumer transparency, the latest innovations in agri-food, strategic sustainability roadmaps of organisations and brands, Ali Ercan Turkoglu, Chairman of the Board of Directors of our company, was the main speaker at the event, which was organised to create added value with environmental and social impact, to evaluate the importance of ecosystem collaborations, risk areas and solution proposals regarding the transformation of the current situation.



## Sponge City Izmir Projects are Expanding



Research and Application Centre, our company plans to build Izmir as a sponge city within 5 years. With this goal set out by Izmir Metropolitan Municipality Mayor Tunç Soyer in the promotion of the project carried out on December 26, 2022, our city will be prepared for a great green transformation with the water cycle and will bring a new perspective to rainwater management and practices. For this purpose, Izmir Metropolitan Municipality Council approved Türkiye's first Sponge City Directive in 2022 and put it into effect. For the first time in Türkiye, a new storm water management system, "Sponge City Green Infrastructure Storm Water Systems", which will be based on the classical piped water and sewerage infrastructure system of a city and will be built in integration with this system, will be put into practice. In this framework, there is a need to develop pilot implementation projects for various areas of the city in order to develop different implementation techniques of the Sponge City Izmir Project and to enable monitoring and on-site examination of its performances.

Based on this need, R&D qualified pilot projects have been developed by our Water Resources Research and Application Unit to be implemented in the roads, streets, squares, cemetery areas, refuges, parks, car parks, marketplaces, roofs, etc. of the city. The construction-implementation investments of these projects will be covered by our company, on-site examination and testing of new techniques, measurement of flood performances and cost-effectiveness analyses will be ensured. Efforts will be made to ensure that the investments made within this scope are taken as an example, developed as a source of inspiration and disseminated throughout the country, especially by Izmir Metropolitan Municipality. Our Sponge City Project and sustainable innovative green infrastructures will contribute to the future growth and development targets of our company.

Inspired by the experiences of sustainable water management, low-impact urbanisation, water-oriented urban design and sponge city concepts applied in other cities around the world, our company has taken action to initiate a new approach to sustainable storm water management in Izmir. For this purpose, the "Water Resources Research and Application Center", which is a structuring-organisation based on the "Sponge City" concept for the first time in Türkiye, has started its activities in our company as of September 2021.

Izmir's existing water and sewerage infrastructure system is old and has a combined structure of rainwater and sewerage system. The collection of wastewater and rainwater with the same pipes exposes the city to great difficulties when the rainfall is slightly higher than normal. The existing system is not able to carry the load in these cases, causing flooding and inundation. In the last five years, floods and inundations at 5800 points in the city have turned into a disaster and caused serious economic costs.

Izmir Metropolitan Municipality and IZSU General Directorate are investing heavily to separate the city's rainwater from the sewerage system. However, a study conducted by IZSU General Directorate in 2017 determined that a budget of 12 billion TL is required to separate the rainwater systems from the classical system with drainage. These very large and very expensive

infrastructure investments are unlikely to be realised with the current, short and medium term budgets of Izmir Metropolitan Municipality and IZSU General Directorate. On the other hand, the separation of rainwater from the classical piped systems brings high costs as well as various construction and operation difficulties. In urban areas, streets and avenues where infrastructure and superstructure are dense, the construction works for laying storm water lines are structurally very difficult and may adversely affect the daily lives of urban dwellers for long periods of time.

In Izmir, which is experiencing water scarcity in terms of water resources potential, the water potential per capita is 614 cubic metres per year. This value is half of the average of Türkiye. A significant portion of Izmir's drinking water is supplied from outside its provincial borders, from Sarikiz, Goksu springs and Gordes dams located in Manisa province, 100 km away. Therefore, tens of thousands of cubic metres of water are delivered to the city centre every day with huge energy costs. On the other hand, the Little Menderes Plain, one of the largest plains of the city and the country, has been faced with major spatial collapses due to drought and excessive groundwater consumption, and a serious water stress has started to be experienced in the plain.

With the Sponge City Izmir Project developed by the Water Resources



Sponge City is within the scope of our projects;



## 5000 Rainwater Tanks to 5000 buildings

We have introduced an incentive system for the 5 THOUSAND RAINWATER TANKS FOR 5 THOUSAND BUILDINGS PROJECT in Izmir in order to utilise the rain that falls in the city and restore it to the natural water cycle.



## 10.000 Rain Gardens

We are working to create 10 thousand rain gardens in order to reduce the flow of rainwater in our city, to clean the flow water and ensure that it reaches our bay and to realise a green transformation with rainwater in our city.

## Rain Stations

We are transforming our bus stops into environmentally friendly green bus stops with rainwater harvesting. We have carried out our first works in this scope in 12 of our bus stops. Our work continues at the other pilot stops we have determined.



## Green Transformation at Cemetery Areas

We are realising a green transformation by harvesting rainwater in our cemetery areas. We use the harvested water in the irrigation system. We realised our first transformation project in Isikkent Cemetery.



## Sponge Car Parks Sponge Parks

We are transforming our city's asphalt and concrete covered impermeable roads, car parks, etc. surface areas into permeable areas to prevent flooding. By directing the rainwater falling on these areas to parks and refuges, we prevent flooding and realise green transformation with the water cycle. Our projects within this scope have been completed in two park areas in Buca district and Gaziemir IZELMAN car park.



## Agriculture Areas Biological Leaching Ponds

We promised that we would store rainwater underground and use it for irrigation and energy. In this context, we are continuing our Little Menderes Plain Rainwater Harvesting Project, which constitutes the rural leg of our Sponge City Project, at full speed. With the project, we are harvesting rainwater by establishing recharge wells, infiltration cisterns and infiltration ponds to recharge groundwater in the Little Menderes Plain. For this purpose, we have built the first biological infiltration pond of our country in Odemis district, which will store 60 thousand cubic metres of water, that is, water that can accumulate 24 Olympic pools, underground.



## 2000 Rainwater Filtering Tanks Supply to Our Farmer

In order to encourage farmers in Little Menderes Plain to harvest rainwater with their wells, we continue to distribute 2000 rainwater filtering tanks.

## Sponge Village

In order to popularise rainwater harvesting in rural areas, we established the first sponge village of our country together with our villagers in Karaburun Sarpincik Village.



We are expanding our vision of a city resilient to climate crisis and drought with our Sponge City Project, and strengthening our rainwater and green infrastructure network by subjecting our city to a nature-based green transformation with the water cycle.

# 2023 United Nations Conference on Climate Change Dubai (COP28)



Within the scope of 2023 United Nations Climate Change Conference (COP28), Ali Ercan Turkoglu, Chairman of the Board of Directors of Izenergy INC. and Berkay Yilmaz, Head of EU Projects Unit, took part in the event held in Dubai between 4-7 December.

## What is COP28 and Where is It Realised?

COP stands for "Conference of the Parties", where "parties" are the

countries that signed the original UN climate treaty in 1992. COP28 is an annual climate meeting organised by the United Nations (UN) where governments discuss how to come together to limit and prepare for future climate change. The summit took place in Dubai, United Arab Emirates, scheduled to take place from 30 November to 12 December 2023, but was completed after a one-day delay.

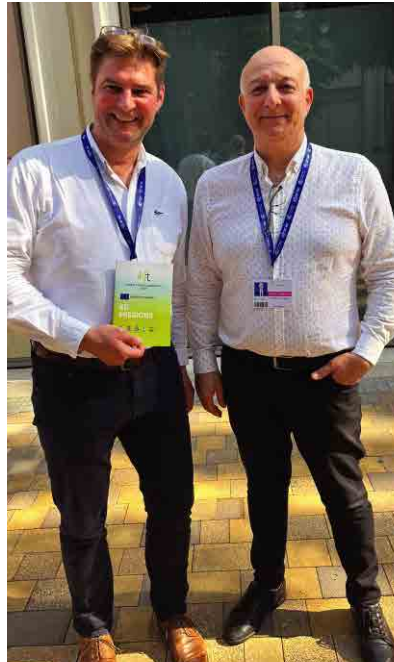


## COP28 Meetings of Izenergy INC.

Within the scope of COP28, Ali Ercan Turkoglu, Chairman of the Board of Directors of Izenergy INC. held various important meetings. During the meeting with Meleket Sahlu, representative of Ethiopian Investment Holding, a detailed evaluation was made on PPP (Public-Private Partnership) applications. During the meeting with Mr Ahmet Turkoglu, CEO of EPIAS, information was exchanged on the company's practices and potential business models. The meeting with Irem Barzilay, representative of Garanti BBVA, focussed on the Green Loans and Izenergy GCC project portfolios. In addition, in the meeting with Andy Kerr, Chief Strategy Officer of Climate-KIC, a detailed assessment was made about the Cities Mission and the projects in Izmir, and it was emphasised that GCC Izmir will be an exemplary model by bringing all stakeholders together in the city. Finally, in the meeting with Selen Inal, Clean Energy and Green Transition Consultant, information was exchanged on the projects in Izmir's climate neutrality journey and GCC Izmir. These meetings were organised to further strengthen Izenergy INC.'s work on sustainable energy and green transition.



(from left to right)  
A. Ercan Turkoglu - Chairman of Izenergy INC.  
Meleket Sahlu - Deputy CEO of Ethiopian Investment Holding



(from left to right)  
Andy Kerr - Climate-KIC CSO.  
A. Ercan Turkoglu - Chairman of Izenergy INC.

## COP28 Results

COP28 concluded with the 28th Conference of the Parties to the United Nations Framework Convention on Climate Change (UNFCCC), which took place on 13 December 2023 in Dubai, United Arab Emirates. The Conference operationalised the Damage and Loss Fund established by COP27 in 2022. It also completed the first global review of climate action under the Paris Agreement and adopted a resolution calling for an orderly transition from fossil fuels to climate-neutral energy systems and accelerated short-term action. This is the first time is the first COP decision on fuels. The outcomes of the Conference are as follows:

On 13 December, a decision was taken on the first global review of the Paris Agreement. The global review is a two-year process to examine progress on mitigation, adaptation and climate finance and identify ways forward.

States Parties committed to accelerated action in the critical decade of reducing global greenhouse gas emissions by 43 per cent below 1990 levels by 2030, to limit global warming to 1.5 °C. Countries committed to trebling global renewable energy capacity and doubling the global pace of energy efficiency by 2030.

States Parties committed to accelerated action in the critical decade of reducing global greenhouse gas emissions by 43 per cent below 1990 levels by 2030, to limit global warming to 1.5 °C. Countries committed to trebling global renewable energy capacity and doubling the global pace of energy efficiency by 2030.

The Conference resolution emphasises the importance of protecting and restoring nature and ecosystems and calls for increased efforts to halt and reverse deforestation by 2030.

As an important outcome of the summit, an agreement on the operation of the Loss and Damage Fund was reached on the first day of the conference. The Fund will initially be hosted by the World Bank and has received donations totalling over \$700 million, including \$100 million each from Germany and the United Arab Emirates.



(from left to right)  
A. Ercan Turkoglu - Chairman of Izenergy INC,  
Irem Barzilay - Garanti BBVA Sustainable Finance Manager



(from left to right)  
A. Ercan Turkoglu - Chairman of Izenergy INC,  
Ahmet Turkoglu - EPIAS CEO

## Status and Role of European Parliament

The European Parliament adopted a resolution on COP28 during its second session in November. The resolution emphasised the importance of gradually reducing fossil fuels and direct and indirect fossil fuel subsidies. A delegation from the Parliament was joined by Peter Liese (EPP, Germany), who led the conference.



European Parliament

## Reactions and Next Steps

European Commission President Ursula von der Leyen welcomed the successful conclusion of the conference. While some commentators said that COP28 marked the beginning of the end of the fossil fuel era, others complained about the lack of concrete targets and timelines. The results of the global review will inform the next round of Nationally Determined Contributions, which will be submitted in the first quarter of 2025. Carbon market negotiations under Article 6 of the Paris Agreement were not concluded at COP28 and will continue next year, as will discussions on a post-2025 collective post-2025 target for providing climate finance. COP29 will take place in Baku, Azerbaijan, in November 2024 and COP30 in Belém do Pará, Brazil, in 2025.



(left to right)  
Selen Inal - Clean Energy and Green Transformation  
Consultant  
A. Ercan Turkoglu - Chairman of Izenergy INC.

## Employees of Izenergy INC.



**Giray BUTUR**

I born in Izmir in 1995. I graduated from METU Department of Environmental Engineering. I started working as EU Projects Officer at Izenergy INC. on 5 July. I would like to thank Izenergy for giving me the opportunity to make a difference in the city I love.

Hello, I'm Musa Cicek. I was born in 1976, graduated from primary school and married. I have been working at Izenergy INC. since 2019. I have been working as a painter in the Department of Parks and Gardens, Afforestation Branch Directorate.

**Musa CICEK**



**Serkan MORKAYA**

I am Serkan Morkaya, born in 1981, graduated from high school and have 2 children. I have been working at Izenergy INC. since 2011. I have been working as a painter in the Department of Parks and Gardens, Afforestation Branch Directorate.

I am Mehmet Cagri Bal, born in 1988, graduated from Odemis Industrial Vocational High School, married and have 2 children. I have been working at Izenergy INC. since 2019. I have been working as a Meter Opening and Cutting employee in IZSU Odemis Branch.

**Mehmet CAGRI BAL**



**Ramazan DURUS**

I was born in 1985 in Mardin Midyat. I am married with 2 children. I have been working as a security personnel in IMM Izulas INC. since 2018. I am proud to be a part of Izenergy INC. and IMM family.

I was born in Izmir in 1987. I have been working as a driver in Izenergy for 8 years. I am married and have 1 child. I am very satisfied with my unit and working environment. I am happy to be a member of the Izenergy family.

**Murat GUMUS**



**Ali KARAKAS**

I am Ali Karakas, born in Erzurum in 1990, graduated from high school, married and father of 2 children. I have been working at Izenergy INC. since 2020. I have been working as a furniture foreman in the Department of Parks and Gardens, Afforestation Branch Directorate.

Hi, I'm Yelda Kara. I was born in 1981 in Izmir. In 2017, I started working as a security guard in Izmir Metropolitan Municipality as a staff of Izenergy INC. It is a pleasure to be a part of this family.

**Yelda KARA**



**Tugba CINAR**

I was born in 1994 in Zonguldak. I graduated from Adnan Menderes University Management Information Systems. I worked as a software support specialist in the private sector for 3 years. I continued my education life with a master's degree at DEU. For 3.5 years, I have been working as Netsis Supervisor at Izenergy INC.

I was born in 1985 in Izmir. I graduated from Economics. I am married and have 1 child. I have been working as a private security guard in the Protection and Security Branch Directorate within IMM since 2006. I am happy to be a part of IMM and Izenergy family.

**Muhammed BASTURK**

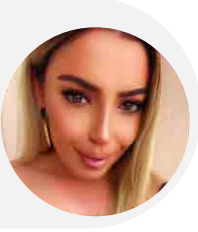


**Nevzat ALKAN**

I am working in the Department of Property Management. I am a graduate of Public Administration, Sociology, Classroom Teaching, Justice Teaching, Local Governments, Photography. I work as a Football Referee and as the President of the Journalism and HHD Association affiliated to the World Press Federation.

I am Gozde Unal, I have been working at the Tourism Branch Directorate as Izenergy staff since 2020. I am very pleased to be in the Izenergy family and I would like to thank you very much for the improving conditions day by day.

**Gozde UNAL**



“We will endeavour to be a light for the future of young people.”

**Tunc SOYER**  
Mayor of Izmir Metropolitan Municipality



