



2022

ANNUAL REPORT



About the report

The KAPSARC Annual Report is a comprehensive summary of the Center's achievements in energy economics and the environment, including the support provided by administrative functions. It aims to provide accurate information on KAPSARC's activities throughout 2022 highlighting the Center's values and overall function.

This report provides a deeper understanding of KAPSARC's contributions to the energy industry and the environment, making it a valuable resource for those interested in learning more about the Center's work and impact.

How KAPSARC is envisioning the future

Page 9

Learn more about the Strategic Objectives

Page 30

Contents

1. Preface	6
The Chairman's Message	9
The President's Message	10
KAPSARC Key Highlights in 2022	14
Growth at KAPSARC	19
Academy	22
Publications	24
2. About KAPSARC	28
Strategic Objectives	30
KAPSARC's Values	32
Domains and Focus Areas	34
Advisory Offerings	38
Programs of Knowledge & Analysis	40
3. How KAPSARC Works	42
Organizational Structure	44
KAPSARC's Journey Through the Year	46
Knowledge & Analysis	48
• Oil & Gas	50
• Transportation & Infrastructure	52
• Utilities & Renewables	54
• Climate & Sustainability	56
• Energy Macro & Microeconomics	58
• Solutions Productization	60
Consulting	62
• Pool of Consultants	64
• Process Coordination	66
Finance & Operations	68
• Facilities Management	70
• Certifications	72
• Safety, Security & Transportation	74
• Procurement	76
• Communications & Public Relations	78
• Information Technology	80
• Human Resources	82
• Finance	84
• Cybersecurity	86
Other Departments	88
• Strategic Planning & Institutional Initiatives	90
• Strategic Partnership	94
• Internal Audit, Compliance & Risk	96
• Legal Counsel	97





Annual
Report 2022

01. Preface



The Chairman's Message

HRH Prince Abdulaziz bin Salman Al Saud

The global energy landscape has shifted due to the conflict between Russia and Ukraine. The rise in energy prices and reduction of energy flows has brought back the issue of energy security in full force. I have always believed the energy policy has three important pillars: energy security, access to energy to enable economic growth, and sustainability to meet the goals of the Paris Climate Agreement.

Domestically, it has been five years since the launch of Vision 2030, unleashing historic reform to the Saudi economy and society to achieve the goals of the vision. Moreover, in 2021 the Saudi Green Initiative and the Middle East Green Initiative were launched to help mobilize climate action domestically and regionally. Saudi Arabia has set ambitious targets for emission reductions, the development of renewable and low-carbon hydrogen as well as many other goals and initiatives to ultimately achieve our goal of reaching carbon neutrality by 2060. As a nation that has always been at the forefront of energy, Saudi Arabia is poised to lead the world in the development of alternative energy, and KAPSARC has a crucial role to play in this journey.

In these unprecedented times and the ever-shifting needs of policy access to reliable and accurate information has never been so important for policy makers. It is that data, based on empirical evidence, that will make a positive difference. Thus, KAPSARC's ongoing transformation into an advisory think tank that works with other entities within the ecosystem and global experts has progressed exceptionally well over the last 12 months.

The people who contribute to our reports are experts in their fields and those who read them are decision-makers. Throughout

2022 we recorded significant achievements in partnering with high-level, esteemed organizations. These collaborations helped us to provide valuable insights into the future of the Saudi economy and its ability to withstand potential challenges.

The Center has transformed into a trusted partner and advisor for the energy ecosystem and has delivered on its new mandate several significant projects to help advise policymakers. KAPSARC's new mandate is being strengthened by ongoing initiatives, including the KAPSARC School of Public Policy, which now has a strategy and operating model and is scheduled to open in 2024. Additionally, the Saudi Energy Leaders' Assembly (SELA) exists to provide opportunities for young professionals to enhance their organizational skills and now has over 300 members.

However significant, 2022 was only the beginning of the transformation. The Center, energized by the ownership shown by employees, will continue its transformation journey to deliver the Center's vision for long-term success, I am proud of everyone who was involved and look forward to KAPSARC making an ongoing contribution to the energy field in 2023.





The President's Message

Fahad Alajlan

The year 2022 has been unprecedented for projects we have worked on which are crucial to changing the future of energy. I am delighted to announce that KAPSARC exceeded its goals for the year. We achieved this by focusing on Project TASAMI, which had two core components.

Firstly, we transitioned to an advisory think tank by launching a consulting function and providing advisory services. Secondly, we implemented the Project TASAMI recommendations which involved improving our “our operations and affairs.”

These changes have had a significant positive impact on our organization, and we are proud to have achieved these milestones.

In 2022, the trilemma of energy security, affordability, and sustainability became ever more pronounced. Before last year, sustainability was the primary focus, but we were all reminded of the importance of

addressing energy security and affordability. That is why KAPSARC started researching critical minerals and rare earth metals supply chains, and we plan to launch our first energy outlook in 2024. By putting focus on these crucial areas, it enables us to address future energy security.

Engaging with international energy research organizations and partnering with others to share knowledge is essential to our mission of having a global impact. We have collaborated with government bodies, private sectors, and international organizations like the World Bank and UNFCCC to enable us to achieve this ambition.

Over the past year, KAPSARC set institutional KPIs for our internal operations, publications, projects, and extended work, and we exceeded most of them. We hired more staff to tackle important issues related to the energy transition, climate, and sustainability,

which are now more mainstream topics. These are no longer challenges left to specialists but are becoming a core part of public life. As a result, we received increased demand for our work and services in these fields.

By the end of 2022, there were 14 ongoing advisory projects, serving more than 13 different stakeholders. Among our research activities, the team published the 2nd edition of the CCE Index, which measures countries' performance and progress being made in achieving Circular Carbon Economies, and a major paper on how OPEC+ impacts markets and higher oil prices. As the energy sector embraces digital transformation, we published papers discussing the opportunities and risks that energy companies should look at during their digital journey.

Our research focused on policy analysis and economic impact in Saudi Arabia, with papers on the electricity sector's regulation, restructuring, and penetration of renewable energy – and the impact of Saudi Arabia's economic reforms on diversification and resilience to shocks.

I am also proud to report on our expanding regional and global impact. Our coordination of the Middle East meeting for the IAEE in Bahrain and workshops with the Islamic Development Banks and other institutions at COP27 in Sharm El Sheikh demonstrated our clear commitment to collaboration and progress with partners. KAPSARC will have observer status at COP28 in the UAE. As almost 50% of global emissions come from the energy sector, it is necessary to work with them to find solutions. KAPSARC will once again be in attendance and produce reports on the negotiations, discussing the positions and important issues covered, as we contribute to the conversation and collaborate on solutions that benefit the world.

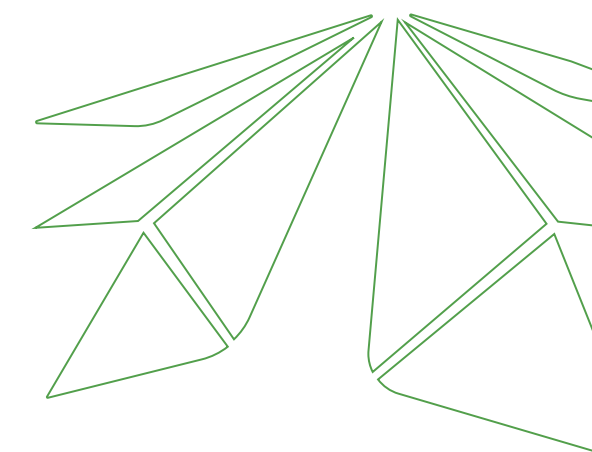
KAPSARC continues its domestic engagements working with NGOs, educational institutions, and the public to raise awareness about energy-related issues. Our events, partnerships with universities, and participation in the Arabic Language Day

celebration illustrate our efforts to connect with diverse audiences.

Throughout 2022, we entered bilateral engagements and exchanged views, including with international visitors and respected organizations such as the IMF. We also launched a School of Public Policy and Executive programs in partnership with the International Institute for Management Development and National Singapore National University. We look forward to launching our climate and sustainability training for non-experts in May 2023.

Our priority for 2023 is to continue to implement the recommendation of Project TASAMI while also improving on advisory, research, and publication fronts to complete the center transformation. There will be a focus on delivering major projects and upgrades to our infrastructure, including a new building for the School of Public Policy. Our goal is to continue meeting the Kingdom's energy and sustainability needs while positively impacting global policymaking.

In closing, I want to say a heartfelt thank you to everyone. Your hard work and dedication make KAPSARC a success, and I am honored to work alongside such a talented and dedicated team. I am proud of what we have accomplished together and excited about what lies ahead.



KEY PROJECTS

KAPSARC
received

70

ADVISORY
PROJECT
REQUESTS

From

12

STAKEHOLDERS

with

9,156

HOURS SPENT

DURING **2022**



KAPSARC

Key Highlights in 2022

KAPSARC has been active in enhancing its thought leadership by engaging policymakers locally & internationally

Key Engagements

	IAEE International Conference Engaged in continuous meetings and high-level preparation ahead of hosting the 44th IAAE International Conference in Riyadh on February 4-9, 2023
	T20 Co-chaired, Governing Climate Target Energy Transition and Environmental Protection (Task Force 3)
	COP27 Co-hosted four side events with Institute of Energy Economics Japan, World Environment Center, Oxford Institute for Energy Studies, and the Islamic Development Bank. Invited panelists/moderators to eight side events.
	KAPSARC - EFI Joint Work Program Workshops and studies on deep decarbonization policies and technologies

Further details to each engagement are mentioned in the next pages

Co-hosted significant activities in partnerships with distinguished entities

	Advancing the Circular Carbon Economy in Saudi Arabia
	The Road to Net Zero: Regional and Global Prospects
	Bridging the Investment Gap for Sustainable Energy Transitions
	CO ₂ Emissions Reduction Progress And Future Perspectives In Aviation
	Critical Global Gas - Hydrogen Market Issues
	The Strategic and Economic Value of Joint Oil Stockpiling Arrangements for Middle East Exporters and ASEAN Importers
	
	Shale Renaissance
	Shell Scenarios: Examine Potential Futures for the Kingdom of Saudi Arabia
	Carbon Markets in the Gulf Cooperation Council Countries
	Advancing the Global Circular Carbon Economy

80
Publications

- Discussion & Methodology Papers
- Commentaries
- Conference Papers

- Data Insights
- Instant Insights
- Journal Papers
- KAPSARC Quarterly Reports

- T20 Policy Briefs
- Workshop Briefs

62
Projects

Internal Knowledge Sharing Events

24

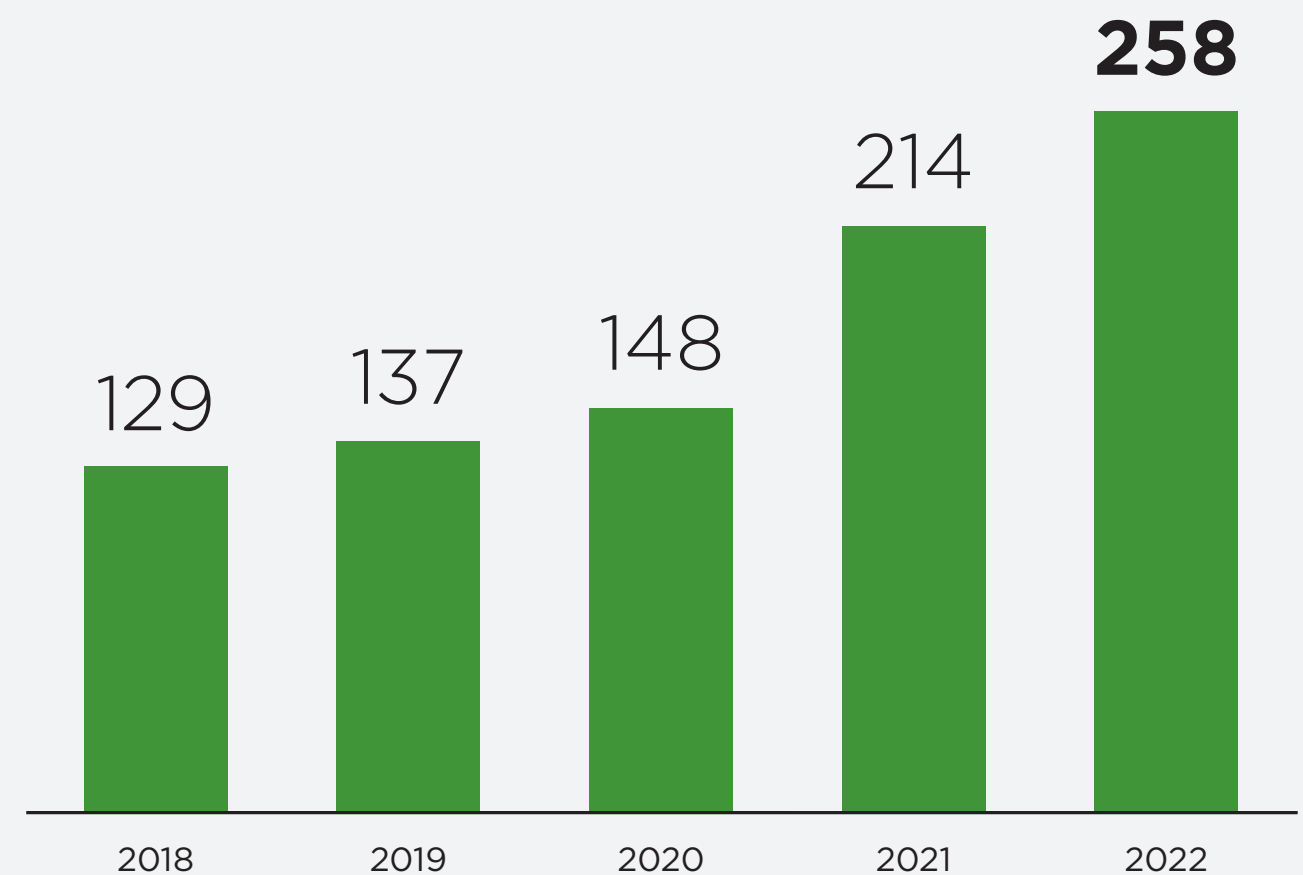
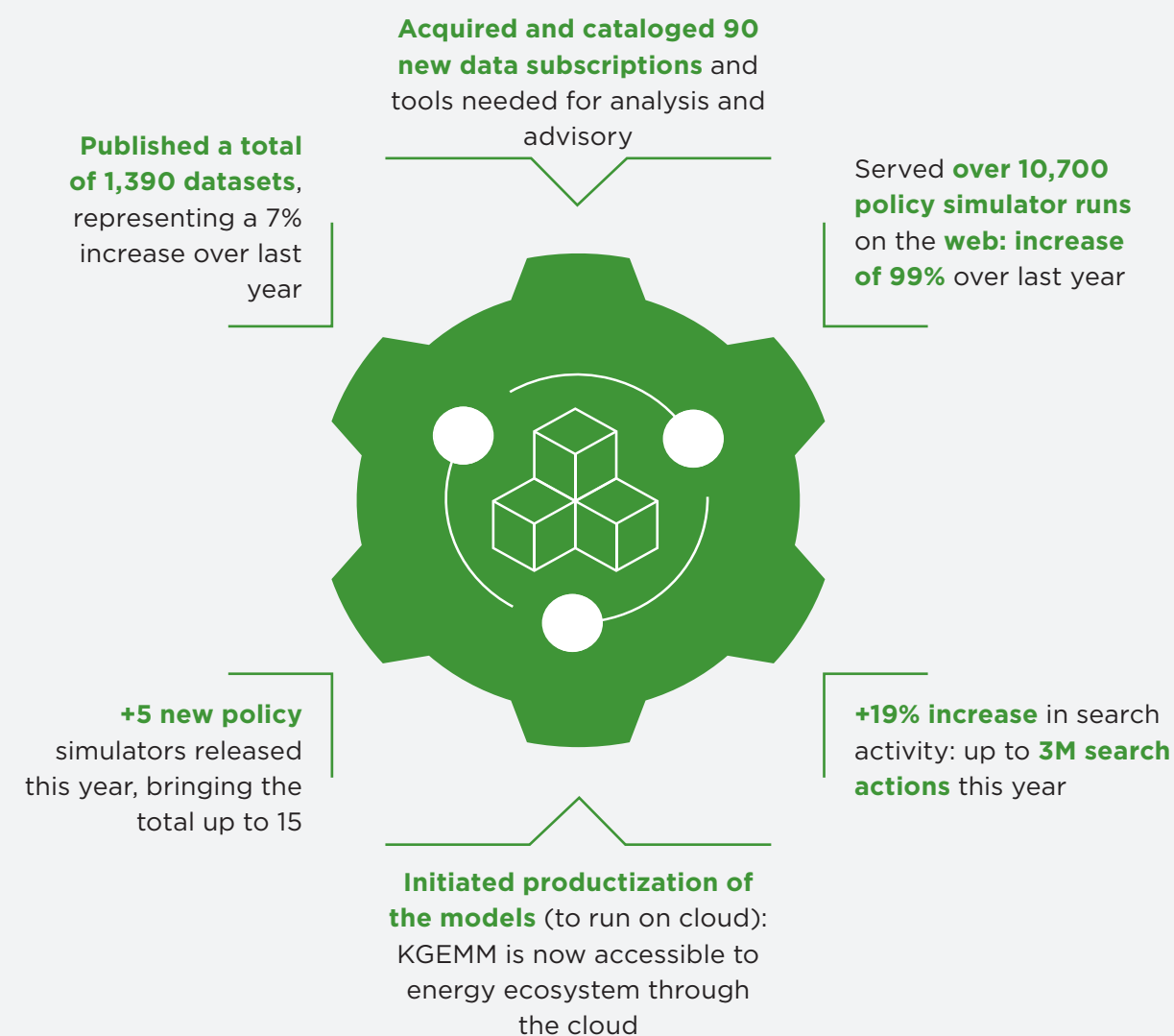
72
Experts

Workshops

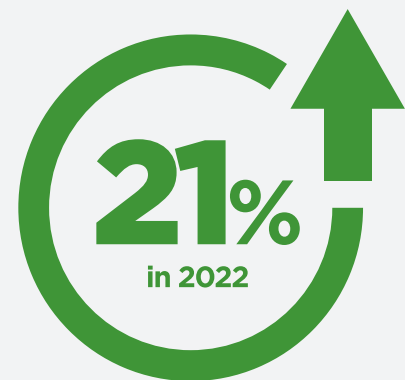
23

KAPSARC Key Highlights 2022

Growth at KAPSARC



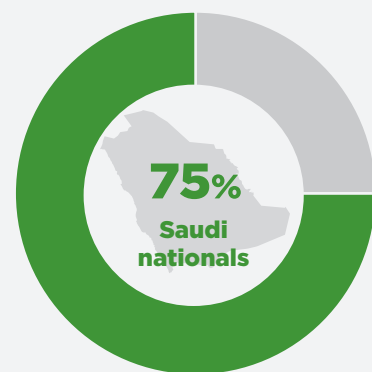
Staff numbers for the period 2018-2022.



Staff numbers increased by 21% in 2022.



Staff consists of 25 nationalities in 2022.



75% of the staff are Saudi nationals.



KAPSARC's Academy

Inspired by His Royal Highness, the Minister of Energy, Prince Abdulaziz bin Salman Al Saud's passion for education, human capital development, and innovation, the KAPSARC Academy was launched in 2022 to play a pivotal role in public policy education in the Kingdom of Saudi Arabia.

The Academy strives to serve as a world-class education and research institution for the next generation of public policy leaders and professionals, both within Saudi Arabia and globally. By creating a nexus between academia, industry, and government in the field of public policy, the academy aims to share and apply knowledge and best practices to address the most pressing public policy challenges and their solutions.

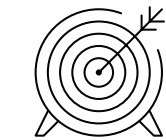
To accomplish this goal, the KAPSARC Academy intends to attract regional and global public policy students, as well as local MBA students, through joint degree programs. It will also provide executive education training to professionals in the public and private sectors, focusing on developing their leadership, management, and public policy skills. In addition, the academy will collaborate with prominent local and global educational institutions to enhance its offerings.

The first training course, the Public Leadership Executive Program, was delivered in October 2022.



Vision

- To be a world-class education and research institution for the next generation of public policy leaders and professionals, within the Kingdom of Saudi Arabia and globally



Mission

- Enable and empower future policy leaders and professionals, within the Kingdom of Saudi Arabia and globally, to positively inform socio-economic choices
- Focus on the most pressing public policy challenges and their solutions
- Create a bridge between academia, industry, and government in the public policy sphere so that knowledge and best practices can be shared and applied

The Public Leadership Executive program



142
Nominated
candidates

119
Registered
candidates

42
Accepted
candidates

34 Full programs
8 Selected
modules

 **30%**

 **70%**

Publications

Reports and research
published throughout 2022



Evaluation of Public Investment Projects

- How Can Governments, Oil and Gas Enterprises, and Research Institutions Collaborate to End Routine Gas Flaring?
- Resilience of Saudi Arabia's Economy to Oil Shocks: Effects of Economic Reforms.
- Moving Saudi Arabia's Role in the Global Methane Pledge Forward.



Future of Transport and Fuel Demand

- Understanding the Trajectory of Urban and Transport Development in Riyadh.
- India's Updated NDC: A Pathway to Net-Zero by 2070?
- Future of Fuels in the Aviation Sector.
- How Long Will the Semiconductor Crisis Affect the Traditional Automotive Sector? Implications for car fuel demand.
- Current and Future Trends in Saudi Arabia's Container Throughput.
- Post-Covid Recovery of Air Traffic in Saudi Arabia.
- Understanding the Willingness to Make the Modal Shift to the New Metro in Riyadh.



Regional Energy Markets

- Fostering Net-Zero Transition Pathways: The Role of Clean Hydrogen.
- The Current State and Future of Clean Hydrogen Projects Worldwide.
- The European Energy Collapse: A Chain of Contingencies or a Recurring Nightmare?
- How Realistic Is Hydrogen for Electrification?
- The Economics and Resource Potential of Hydrogen Production in Saudi Arabia.



Climate Change Policies and Governance

- The Circular Carbon Economy Index 2022.
- Implementing Circular Carbon Economies in the Gulf and Beyond.
- Digital Transformation in the Context of the Energy Transition.
- Digital Transformation in the Oil and Gas Industry: Hype or Hope?
- The Gulf Cooperation Council and the Circular Carbon Economy: Progress and Potential.
- Plastics in the Circular Carbon Economy.
- Potential implications of the EU Carbon Border Adjustment Mechanism.
- COP 26 Outcomes and Opportunities for Saudi Arabia and Other Arab Countries.



Future of Global Oil Markets

- Gaming Out the Proposed Price Cap on Russian Oil.
- KAPSARC Oil Market Outlook (KOMO).
- The Effects of Russian Sanctions on the Global Economy.
- A Closer Look at the IEA Storage Releases.
- Global Crude Oil Storage Index: A New Benchmark for Energy Policy
- Investment Challenges Affecting the Oil and Gas Industry.
- Integrated Oil Companies and the Requiem for a Transition: How Are They Coping with Climate Change?
- Country Horizon: Russia.
- Natural Gas Price Surge: Implications for International Energy Markets and the Way Forward.

Publications

Reports and research
published throughout 2022



Electricity Sector Transitions

- Status of Global Concentrated Solar Power Installations.
- Insights from India's Journey to Over 100 Gigawatts of Renewable Energy.
- Reliability Implications of Unexpected Tripping of Inverter-Based Resources.
- Trends in Global Solar PV Installation in 2021.
- Cost, Emission, and Macroeconomic Implications of Diesel Displacement in the Saudi Agricultural Sector: Options and Policy Insights.
- Keeping the Nuclear Energy Option Open.
- One Year After the Texas Blackout: Lessons for Reliable and Resilient Power Systems.
- Investing in Net-Zero Emission Ambitions: Global ESG Frameworks and CCUS Projects.
- Policy Responses to the Reliability Crisis in the Power Grid.
- The Implications for the Power Sector from Innovation by Startup Companies.
- Understanding the Dynamics of Renewable Energy Transition: Country Performance and Potential.
- Understanding the Dynamics of the Renewable Energy Transition: The Determinants and Future Projections Under Different Scenarios.
- Cross-seasonal Fuel Savings from Load Shifting in the Saudi Industrial Sector.
- Achieving Renewable Energy Targets Without Compromising the Power Sector's Reliability.
- Understanding the Dynamics of the Renewable Energy Transition: A Determinant Index Approach.



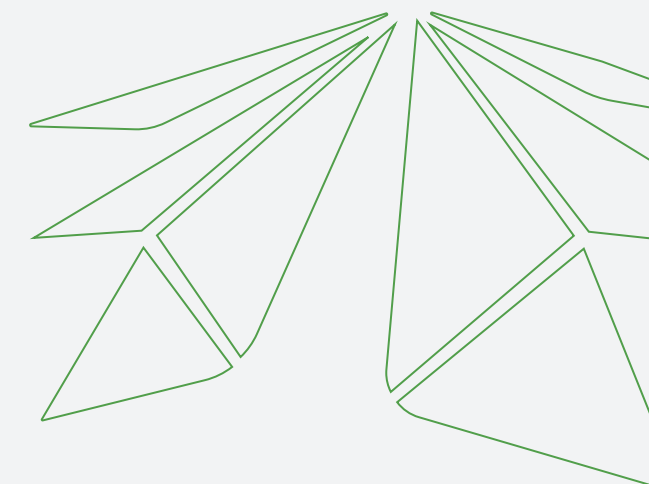
Models, Data and Tools

- A Remaining Piece of the COVID-19 Puzzle: Saudi Arabia's Remittances Account.
- How to Mitigate Transportation Emissions in Saudi Arabia? The Role of Energy Price Governance.
- Determinants of Remittance Outflows: The Case of Saudi Arabia.
- Energy Open Data, Energy Policy Scenario Models and Tools.



Productivity and Economic Diversification

- Saudis in the Private Sector: Women Leading the Way.
- Impact of Stay-home Orders on the Electricity Demand of Residential Buildings: Case Study of Saudi Arabia.
- Balancing China's Energy Security and Its Transition to Carbon Neutrality.
- Role of Energy Efficiency in Designing Carbon-neutral Residential Communities: Case Study of Saudi Arabia.
- The Role of Building Energy Efficiency in Shaping the Energy Transition in Saudi Arabia: Key Challenges and Initiatives.



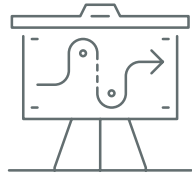


Annual
Report 2022

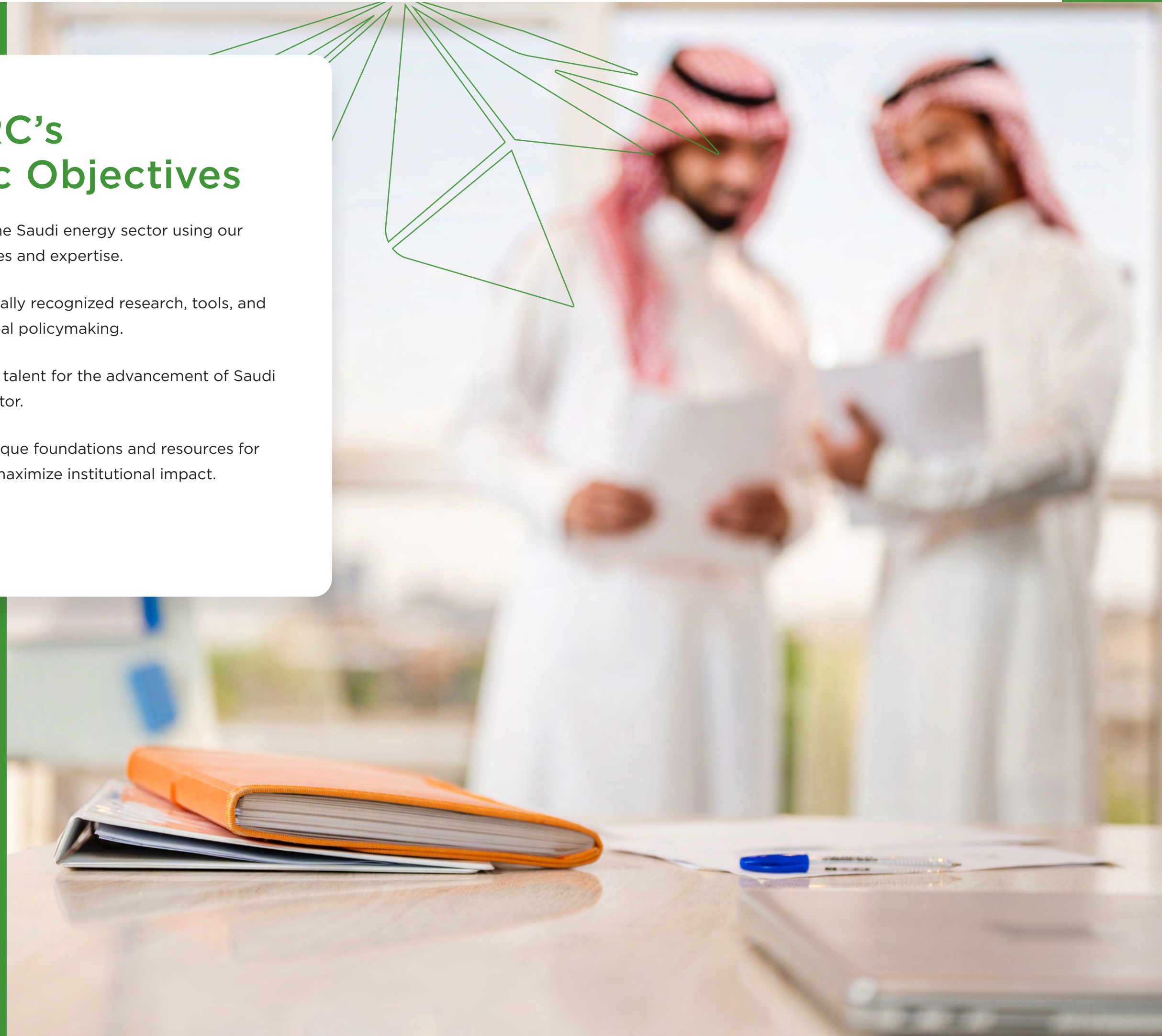
02. About KAPSARC



KAPSARC's Strategic Objectives



- 1.** Provide advice to the Saudi energy sector using our analytical capabilities and expertise.
- 2.** Produce internationally recognized research, tools, and data to impact global policymaking.
- 3.** Incubate distinctive talent for the advancement of Saudi Arabia's energy sector.
- 4.** Use KAPSARC's unique foundations and resources for novel initiatives to maximize institutional impact.





KAPSARC's Values



Our values serve as the cornerstone of our organization. They are a set of fundamental beliefs and assumptions that guide and motivate our employees to achieve our desired culture. Our values are based on our new vision and mission and are the driving force behind everything we do, they form the bedrock of our strategic objectives.

We believe that by upholding our values, we can create a workplace that encourages collaboration, creativity, and growth. Our values inspire us to be accountable, respectful, and inclusive in all our endeavors as we strive to create a culture that values diversity, promotes learning, and encourages personal and professional development.



Transparency

Transparency is a fundamental principle and we believe in acting with integrity and honesty, and our teams know that they can rely on each other to share information and make their actions visible to all. By fostering a culture of transparency, we can build trust and accountability, both within our organization and with our partners and stakeholders.

Excellence

At KAPSARC, we are dedicated to excellence, hold ourselves to the highest standards and strive to deliver the best possible results. Our commitment to continuous improvement drives us to constantly seek out new and innovative ways to enhance our work.

Learning

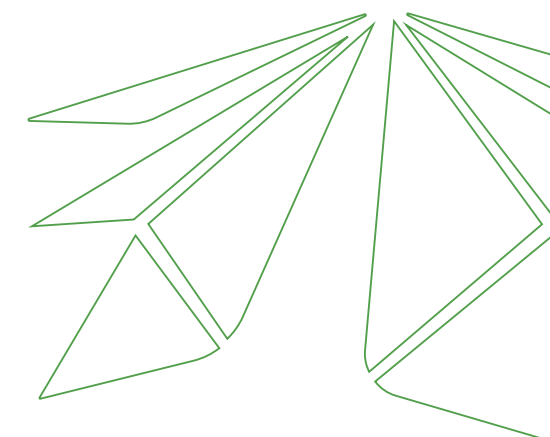
A core value at KAPSARC, we believe every employee has the potential to grow and improve, and we encourage our team members to seek out new opportunities for learning and development. By finding learning in everything we do, we can continue to push ourselves to be the best we can be.

Innovation

Our employees are encouraged to generate new ideas and turn them into useful solutions that add value to KAPSARC and the energy ecosystem. We believe that by embracing innovation, we can stay ahead of the curve and continue to make a positive impact in our industry.

Collaboration

Collaboration is at the heart of everything we do. We recognize that no one person has all the answers, and that the best solutions often come from a diverse group of individuals working together toward a common goal. Our teams work together, building purposeful relationships grounded in cooperation, fairness, and respect, and by working together, we can achieve more than we ever could alone.





Domains & Focus Areas

Domains are broad fields that KAPSARC could engage in, while focus areas drive the yearly selection of projects and capability planning.

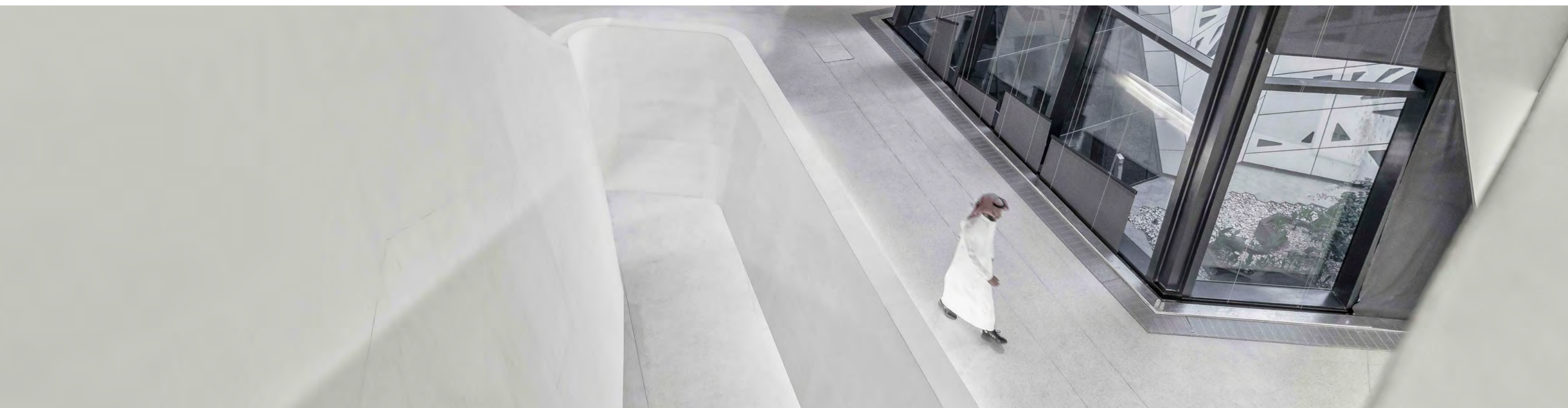
These focus areas are crucial in defining the scope of KAPSARC's involvement with the Saudi energy ecosystem and driving the organization's thought leadership in a targeted and impactful manner.

KAPSARC's Guiding Principles Defining Domains & Focus Areas

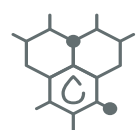
- KAPSARC determines its domains and areas of focus based on their relevance to the Saudi energy ecosystem.
- Requests submitted by the energy ecosystem in 2020 and 2021 serve as a reference point for determining KAPSARC's focus areas.
- KAPSARC benchmarks against other relevant organizations to inform its focus areas.
- Feedback from the KAPSARC Research & Advisory workshop is taken into account when determining the organization's domains and areas of focus.

KAPSARC has identified three domains based on engagements with similar organizations, benchmarking activities, and multiple internal workshops. These domains are primarily related to the needs of the energy ecosystem:

- 1.** Global Hydrocarbon Markets.
- 2.** Saudi Energy Sector, including power and renewables.
- 3.** Climate and Sustainability, including carbon management.



The Three Domains



1. Global Hydrocarbon Markets

Definition

Global demand-supply trends, policies, economics, and technological advancements related to hydrocarbons.

Rationale

To align with KSA's interests in the global hydrocarbons market, it is crucial to focus on hydrocarbons. This approach ensures that we do not miss out on topics of high relevance to KSA, such as upstream oil and gas, and can effectively cater to the country's needs while maintaining a strong foothold in the global market. Our commitment to this strategy will enable us to provide KSA with the best possible service and support.

Identified focus areas

- Upstream Oil and Gas
- Petrochemicals
- Transportation
- Industrial Demand



2. Saudi Energy Sector

Definition

The study of KSA's energy demand-supply trends, policies, economics, and technological advancements in power, renewables, hydrogen, and mobility.

Rationale

Focusing on a broad range of energy topics beyond hydrocarbons are essential to meet KSA's overall energy demands.

Identified focus areas

- Transport
- Infrastructure
- Power
- Energy efficiency
- Industry



3. Climate and Sustainability

Definition

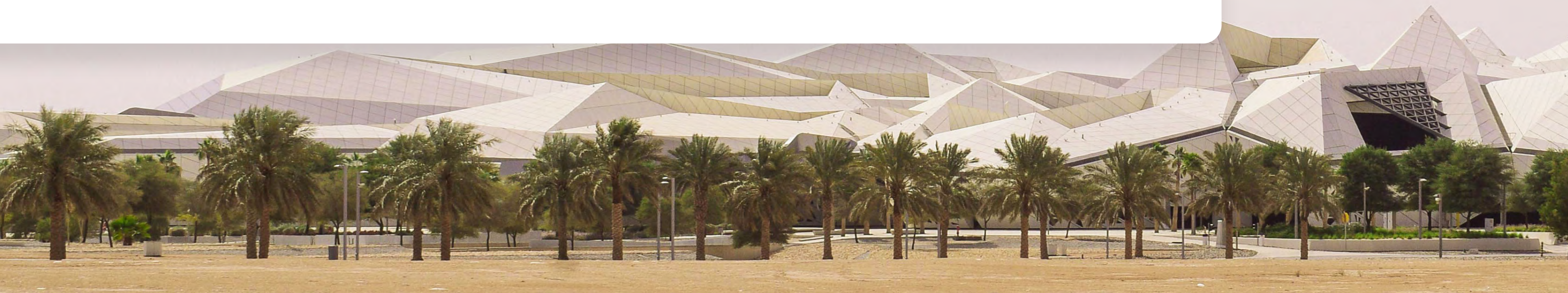
Carbon management, global energy transition, environmental and resource energy footprint, adaptation and the resilience of energy systems.

Rationale

- Carbon management is the central component of this domain.
- The environmental and resource footprint of plastics and electric batteries are critical for the future of hydrocarbons.
- Climate change impacts and the adaption of energy systems do matter for the Kingdom.

Identified focus areas

- Hydrogen
- Carbon capture, utilization, and storage (CCUS)
- Nature-based solutions
- Storage
- Climate and sustainability – targets and financing



KAPSARC's Advisory Offerings



Evidence-based research and insights

- Sector-specific outlooks, such as those from energy-intensive industries.
- Analysis of technology, markets, and risk.
- Sensitivity, feasibility, and impact analysis.
- Publication of journal papers and reports, including academic papers.
- Policy analysis.
- Ad hoc expert interview/insights.
- Review/validation of external reports & data.
- Sensitivity analysis (e.g., scenario planning).
- Feasibility analysis (cost analysis).
- Needs-based assessment.
- Market analysis.
- Technology assessment (e.g., new tech).



Data, models, and tools (analytics)

- Data sharing, e.g., datasets.
- Development of models, tools/software, and data platforms.
- Benchmarking.



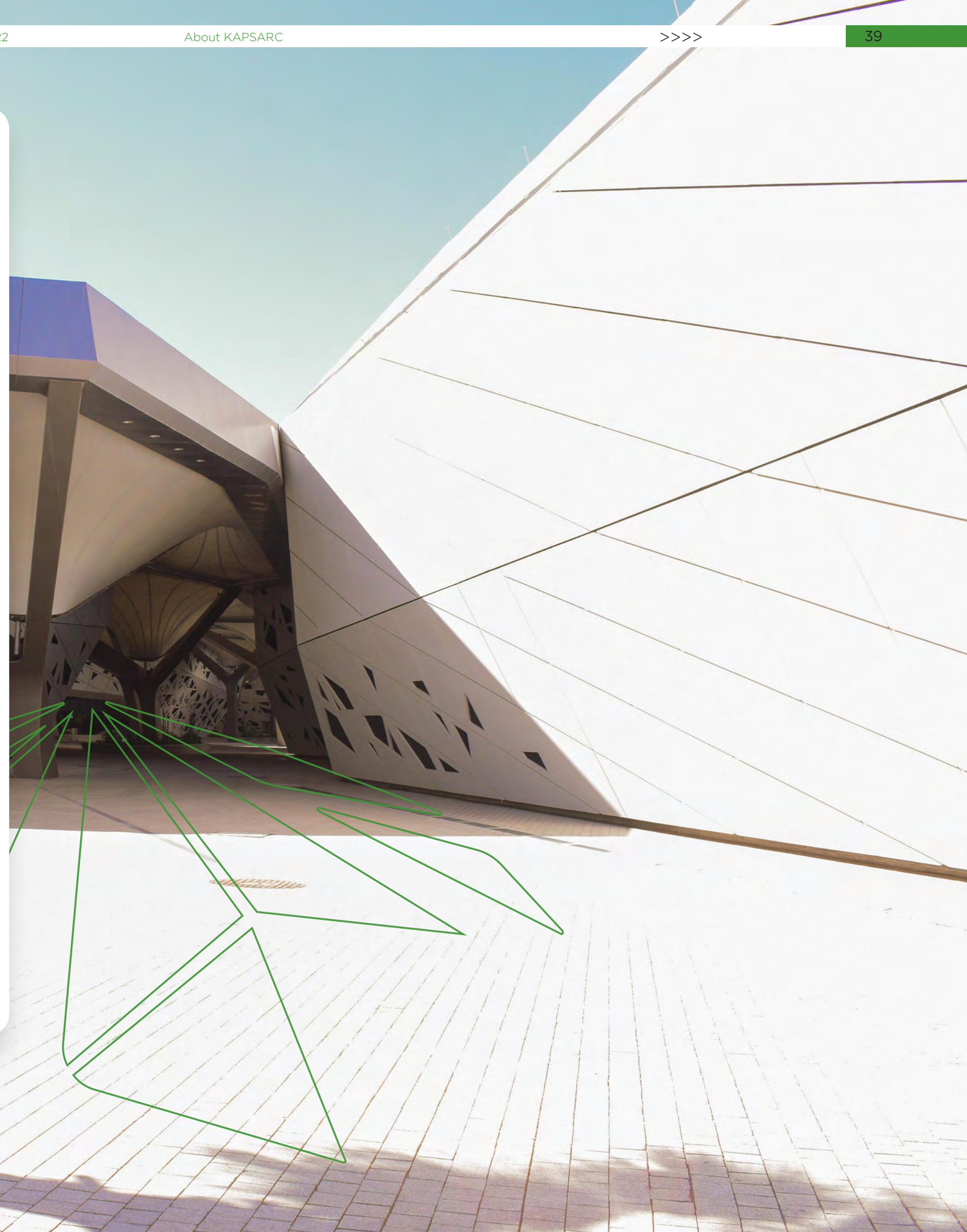
Strategy

- Strategy development.



Knowledge sharing

- Workshops, forums, and seminars.
- Virtual offerings, such as podcasts and webinars.



Programs of Knowledge & Analysis



Energy Macro & Microeconomics

- Analyzing the interaction of energy and macroeconomics through economic models.
- Evaluating the broader economic impact of energy market and policy changes.



Oil & Gas

- Studying the evolving global energy landscape, including supply, capacity, tech, investment, and economic effects.
- Analyzing trends in oil and gas markets.



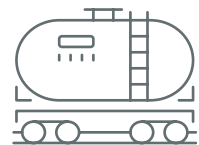
Utilities & Renewables

- Assessing the implications of the global energy transition.
- Supporting the Kingdom in creating a long-term value framework for its energy transition plan.



Climate & Sustainability

- Highlighting the benefits of a risk-informed carbon management strategy.
- Identifying effective tech and policy options for climate mitigation and adaptation, while considering risks.



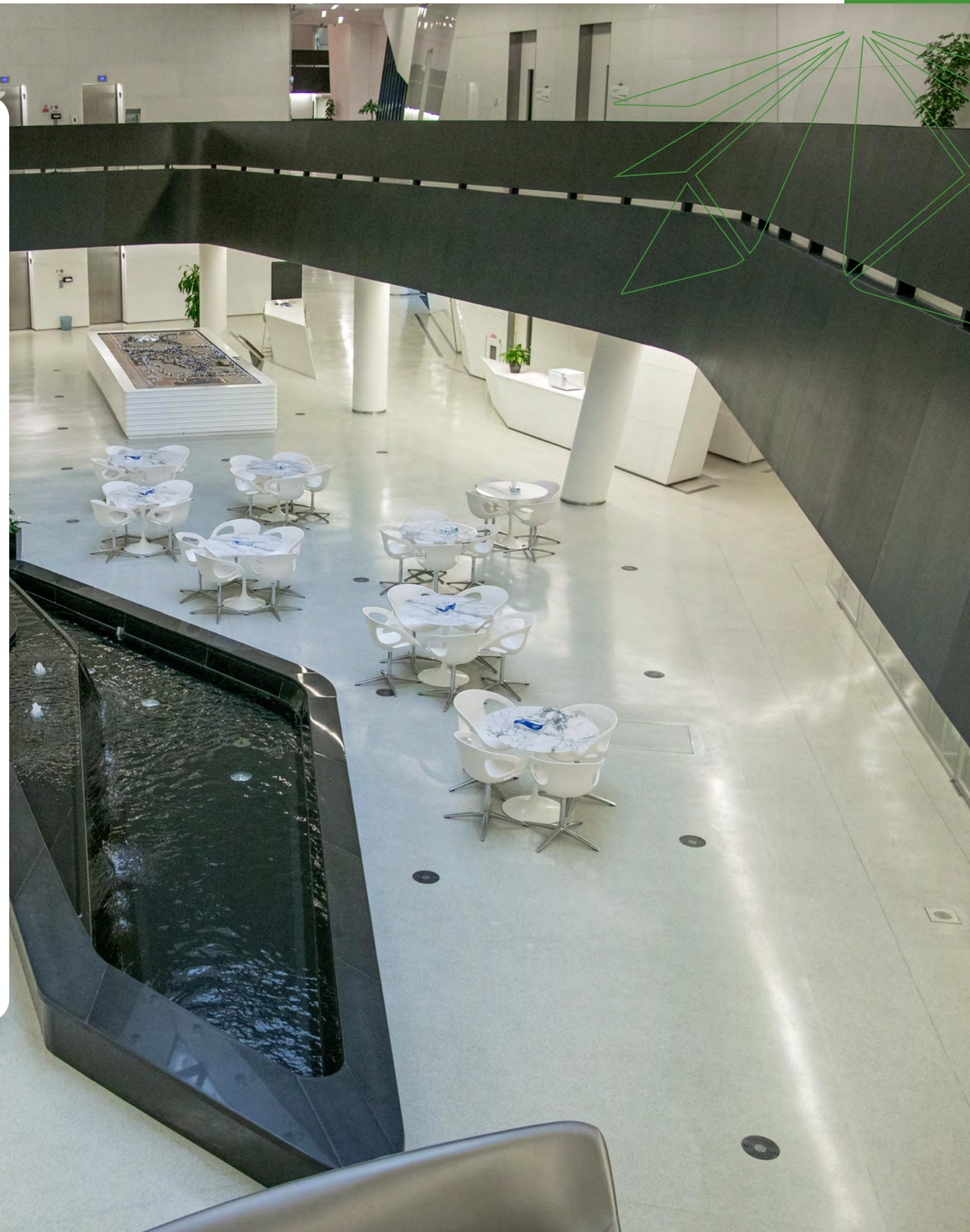
Transportation & Infrastructure

- Investigating future domestic transport energy demand and modeling efficient and resilient urban systems.



Solutions Productization

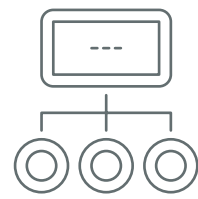
- Enhancing energy economics understanding with open data and insight applications.
- Providing data and web application platforms for researchers and policy stakeholders.



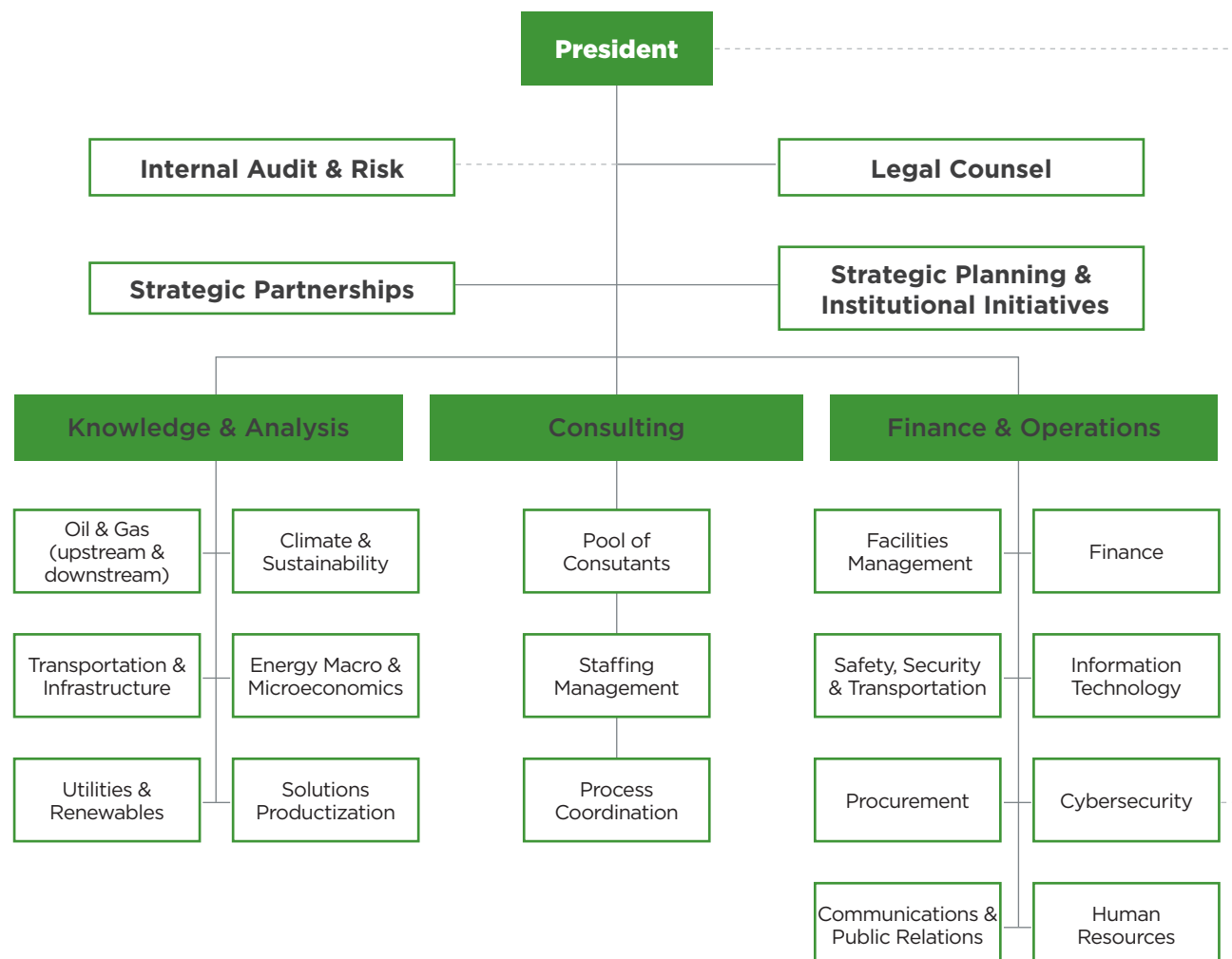
Annual Report 2022

03. How KAPSARC Works





Organizational Structure





KAPSARC's Journey Through The Year

KAPSARC consists of three functions and various administrative offices that manage all internal and external procedures. Each function comprises multiple specialized departments or programs.





Knowledge & Analysis

The Knowledge & Analysis function aims to produce globally recognized analysis, data presentation, and actionable insights. It fosters a culture of excellence and aims to maximize KAPSARC's capacity for successful engagement on a global scale.

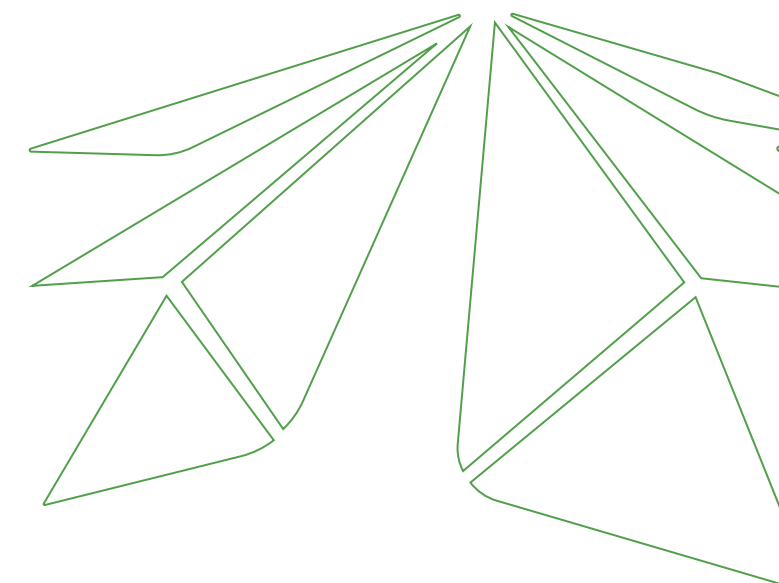
Objectives

- Partner with Consulting to advance KSA's energy sector through evidence-based and expert recommendations.
- Produce internationally recognized analysis, insights, data, and products in our focus domains to impact global policymaking.
- Leverage KAPSARC capabilities to effectively engage in global, regional, and local policy dialogues.
- Adopt a culture of excellence, knowledge transfer, growth, and mentorship to hire, develop, and retain thought leaders.



Key Achievements in 2022

- Explored and promoted applications of behavioral economics to streamline domestic energy consumption.
- Developed KAPSARC models of Saudi Arabia's economy to enhance cost-benefit analyses of energy policies and projects.
- Built a model capturing the macroeconomic effects of Saudi Arabia's 2060 Net Zero Emissions.
- Published new results on OPEC+'s market stabilization actions and the global economy
- Produced an analysis of the impact of Vision 2030 on the Saudi economy's resilience to oil price shocks.
- Launched the 2nd edition of the Circular Carbon Economy Index and an interactive lab feature hosted on the CCE Index web portal.
- Expanded analytical modeling capabilities in estimating GHG emissions in Saudi Arabia.
- Partnered with the Energy Futures Initiative, the Oxford Institute for Energy Studies, and the World Bank Group on joint studies in gas markets, the hydrogen economy, integrated energy outlooks, and energy efficiency.
- Launched the 2nd edition of the Circular Carbon Economy Index – with an expanded list of countries from 30 to 64, covering 90% of the Global Economy and CO₂ emissions.
- Assessed the impact of energy efficiency on CO₂ emissions in the Kingdom.
- Produced internationally recognized publications on investment challenges affecting the oil and gas industry.
- Produced publications and increased expertise on alternative uses of hydrocarbons – hydrogen, critical minerals.
- Analyzed the integration of renewables into the KSA power grid.
- Assessed demand side management including its broader economic implications.
- Evaluated the major economic, reliability, and environmental challenges facing the power and utility sectors.
- Assessed the trends in policies, regulations, and technological evolutions on energy demand and the subsequent environmental impacts of transportation systems and infrastructure.
- Evaluated the impact of transport infrastructure investments on sustainable futures for KSA.
- Used spatial models to assess interventions in urban planning for impact on energy demand and sustainability.





Oil & Gas (Upstream and Downstream)

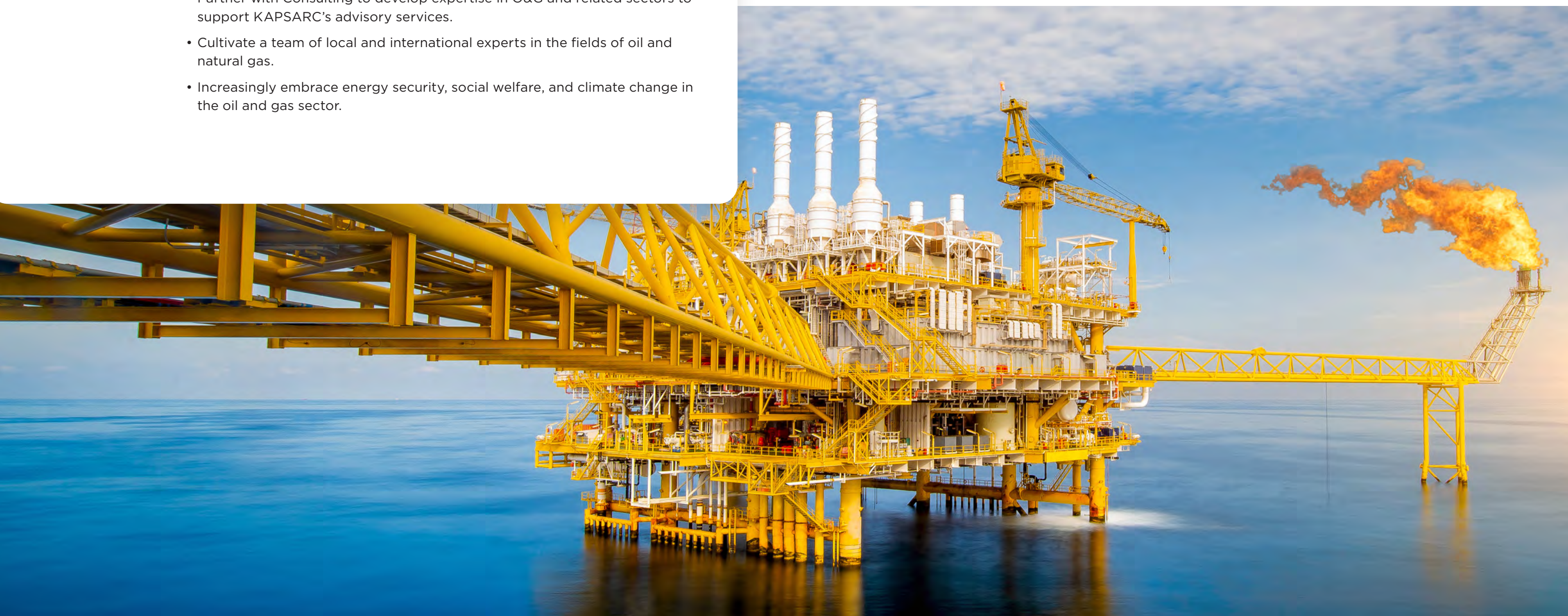
The Oil and Gas (O&G) program produces internationally recognized thought leadership to support and guide the energy ecosystem, focusing on the challenges and opportunities in the hydrocarbon space. The program oversees numerous active projects in four key focus areas: oil, gas, refining and petrochemicals, and energy security and resilience, as well as training, developing, and retaining local talent to ensure knowledge transfer and career development.

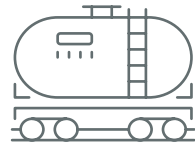
Objectives

- Publish economic and market analysis reports to shape policymaking and develop evidence-based recommendations.
- Develop and customize O&G models and tools relevant to Saudi Arabia.
- Partner with Consulting to develop expertise in O&G and related sectors to support KAPSARC's advisory services.
- Cultivate a team of local and international experts in the fields of oil and natural gas.
- Increasingly embrace energy security, social welfare, and climate change in the oil and gas sector.

Key Achievements in 2022

- Released 61 external publications including five book chapters, eight Commentaries, eight journal articles, 11 Instant Insights, seven Workshop Briefs, four KOMO reports, four T20 policy briefs, five Data Insights, a country report, and seven Discussion Papers.
- Organized 14 workshops and webinars in conjunction with 16 strategic partners.
- Developed six analytical tools and models active or in development.
- Delivered two key knowledge-sharing initiatives through coaching, mentoring, and knowledge dissemination.
- Held 13 professional and academic engagements and featured in 19 media outlets.





Transportation & Infrastructure

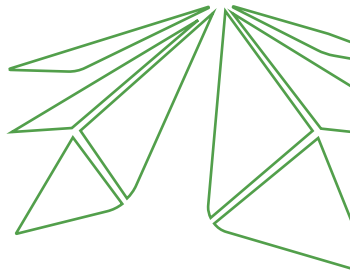
The Transport and Infrastructure (T&I) program focuses on exploring the energy, economic, and environmental impacts of evolving technology trends, policy developments, and investments in all sectors related to transportation and infrastructural systems. The program assesses the impact of the transformations in road, rail, aviation, and maritime transport to analyze their impact on global and local oil demand.

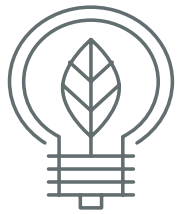
Objectives

- Collaborate with Consulting to help the energy ecosystem understand the implications of local and global developments in the transportation and infrastructure sectors.
- Deliver research outputs on transportation and infrastructure themes to influence local and global policymaking.
- Showcase research at major KAPSARC-hosted and international conferences to foster dialogue with the ecosystem and global stakeholders.
- Support experts in their growth and development as thought leaders.

Key Achievements in 2022

- Contributed to G20 Indonesian Presidency with policy briefs.
- Published more than 50 publications focused on the following:°
 - Transport and energy demand for land, aviation, and maritime sectors, including passengers and freight.
 - ° Energy transition, environmental challenges, and opportunities in the transport sector.
 - ° Behavior analysis and policy studies on vehicle ownership and modal shift decisions.
 - ° Potential for alternative fuels for the maritime sector.
 - ° Future of Fuels in the Aviation Sector.
 - ° Studies on electric vehicles (EV) in reducing CO₂ emissions.
- Hosted and co-hosted six workshops on transport matters focused on the following:
 - ° Lifecycle analysis in the LDV sector.
 - ° Sustainable urban planning in cities to achieve energy efficiency and sustainability targets.
 - ° Role of sustainable fuels in transport like hydrogen, sustainable aviation fuel.





Utilities & Renewables

The Utilities and Renewables (U&R) program analyzes the major economic, reliability, policy, and environmental challenges that confront the power and utility sectors. These challenges include the integration of renewable power, the role of innovation, such as green hydrogen, in meeting net-zero commitments, international electricity trade, and market and regulatory reform. The U&R program is committed to providing comprehensive and insightful analysis of these complex issues, providing actionable insights that can help these industries navigate the challenges they face.

Objectives

- Partner with Consulting to provide evidenced-based knowledge and analysis on utilities and renewables to the energy ecosystem, contributing to the economic development of KSA's energy sector.
- Build and/or provide quantitative models, methods, studies, and tools that support policy decision-making within the KSA.
- Showcase research at major KAPSARC-hosted and international conferences to foster dialogue with the ecosystem and global stakeholders.
- Train, develop, and retain local talent to ensure knowledge transfer and career development in the renewable and utilities sector.

Key Achievements in 2022

- Contributed to the formulation of the electric vehicle charging infrastructure policy which was enacted this year.
- Assessed policy options and associated cost and macro implications of displacing diesel in the Saudi agricultural sector.
- Assessed reliability implications of deploying high shares of renewable energy into the Saudi power sector (Best Paper Award; IEEE Smart Grid Conference).
- Quantified the economic and resource potential of hydrogen production in Saudi Arabia.





Climate & Sustainability

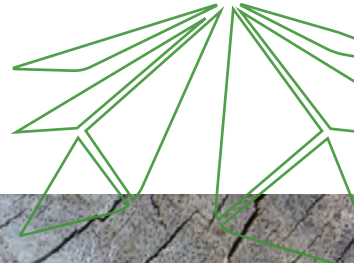
The Climate and Sustainability program advises the Kingdom on how to achieve its sustainability and climate targets. It does so by producing state-of-the-art national, regional, and global climate-energy-economic models, analysis, and insights. These focus on climate economics, climate change policies, and environmental sustainability. This includes aligning consulting activities with core research projects and vice versa. With a focus researching on developing net-zero emission strategies for KSA (including regulatory and policy instruments) and extending the CCE Index outreach through regional deep dives, the department aids in developing energy efficiency strategies in KSA. Outreach efforts include plans to attend COP28 and T20, other high-impact events, and hosting more KAPSARC workshops.

Objectives

- Partner with Consulting to offer high-quality advisory services to support the Kingdom in achieving its climate and sustainability targets, including its net-zero emissions target and Paris Agreement commitments.
- Produce and disseminate cutting-edge data, insights, and analyses in the areas of climate economics, climate change policies, and environmental sustainability through research publications and outreach activities.
- Cultivate a renowned team of local and international experts in the fields of climate change and sustainability.

Key Achievements in 2022

- Launched the second edition of the Circular Carbon Economy Index with an interactive Lab feature hosted on the CCE Index web portal.
- Published 37 papers, conducted 10 workshops, and presented at over 90 events.





Energy Macro & Microeconomics

The Energy Macro & Microeconomics (EM&ME) program investigates how energy sectors and markets interact with economies. The program addresses policy questions relevant to the energy ecosystem and develops modeling tools that can help assess the economy-wide consequences of reshaping energy markets. These tools are designed to provide insights into the potential impacts of economic policy decisions on energy sectors and help inform policy decisions that can drive sustainable growth and development.

Objectives

- Produce economic analysis that informs policymaking in Saudi Arabia by leveraging KAPSARC's modeling and analytical capabilities.
- Publish economic analysis of Saudi Arabia's domestic and global actions that advance Saudi perspectives in the international policy debate.
- Partner with Consulting to develop and customize economic models and tools that serve the needs of the energy ecosystem.
- Contribute to enhancing and showcasing KAPSARC's expertise in energy economics through developing local talent and sharing impactful insights with strategic partners.

Key Achievements in 2022

- Promoted applications of behavioral economics to streamline domestic energy consumption.
- Developed models of Saudi Arabia's economy to enhance cost-benefit analyses of energy policies and projects.
- Built a model for the macroeconomic effects of Saudi Arabia's 2060 Net Zero Emissions.
- Published new findings on the market stabilization efforts of OPEC+ and their impact on the global economy, which were presented to the staff of the OPEC Secretariat.
- Produced an analysis of the impact of Vision 2030 on the Saudi Arabian economy's ability to withstand fluctuations in oil prices.





Solutions Productization

The Solutions Productization department is working toward becoming the trusted partner for making a lasting positive impact in the energy sector of Saudi Arabia. It strives to provide quality consulting services, building on KAPSARC capabilities and resources to solve complex problems and make a sustainable impact for our stakeholders through creativity, tenacity, and team spirit. It achieves this through a range of methods, including creating visually impactful infographic data stories, expanding the datasets, and reach, of the KAPSARC open data portal, and will extend this via the creation of a KAPSARC Policy Simulations Lab that improves the reach and understanding of KAPSARC Data, Models, and Simulators.

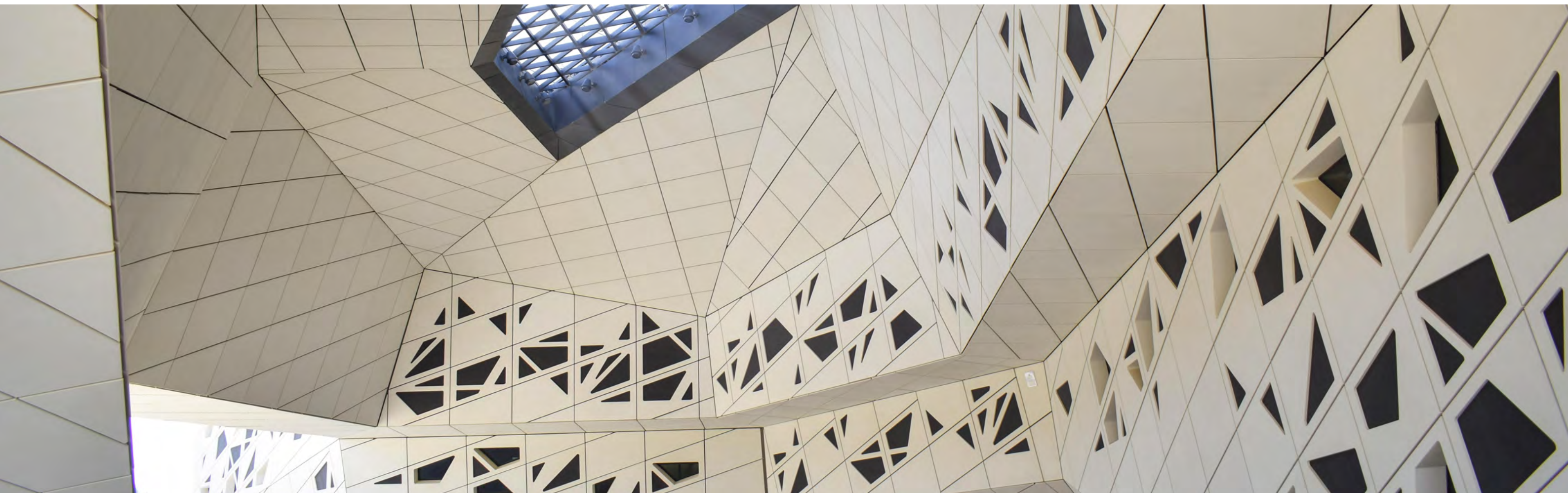
Objectives

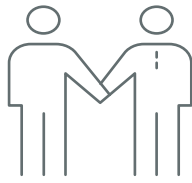
- Deliver internationally recognized high-quality data portals with machine-readable data and analytics. Deliver energy economy and climate data through KAPSARC data-portal and other channels.
- Deliver easy-to-use policy scenario simulators that enable stakeholders to derive insights using KAPSARC energy, economy, and climate models. Disseminate KAPSARC data, model, and policy simulator products to the energy ecosystem and highly recognized industry partners through the workshop.

- Introduce data and model-tools awareness campaign, expanding reach. Disseminate KAPSARC data, model and policy simulator products to the energy ecosystem and highly recognized industry partners through yearly high impact workshop covering energy, climate and economy policy tools.
- Increase internal knowledge sharing.
- Optimize the publications process.

Key Achievements in 2022

- Added 80 new datasets to the data portal, launched five policy simulators, namely, CCE Index COP27 edition, Hydrogen Cost Analyzer, Global Energy Macro-Econometric Model Simulator, Input-Output Model, and The Climate Adaptation and Mitigation Partnership eSankey Visualization.
- Delivered two energy and climate online policy simulators: Oil Revenue Calculator and Carbon Management Simulator.





Consulting

The Consulting function provides the Kingdom's energy ecosystem with world-class advisory services in the fields of energy economics and sustainability. It does so by leveraging KAPSARC's models, methods, and tools (MMTs) as well as its subject matter expertise.

Function Mission

- The function strives to provide quality consulting services building on KAPSARC capabilities & resources to solve complex problems and make a sustainable impact for our stakeholders through creativity, tenacity, and team spirit. The vision is to become a trusted partner for making a lasting positive impact in the energy sector of Saudi Arabia.

Objectives

- Be the partner of choice for KSA energy sector stakeholders on key initiatives that aim to preserve and promote the energy interests of Saudi Arabia.
- Deliver impactful services to KSA energy sector stakeholders by leveraging KAPSARC's distinctive thought leadership, expertise, solutions, and partnerships – in close collaboration with Knowledge & Analysis teams.
- Ensure sustainability of impact on the energy ecosystem by institutionalizing the solutions and services provided.
- Adopt a culture of excellence, knowledge transfer, growth, and mentorship to hire, develop, and retain consulting talent.





Pool of Consultants

The Pool of Consultants is in place to meet the increasing demand for consulting services from the KSA energy sector in the context of the fierce talent competition. It enables KAPSARC to strengthen our methodologies and frameworks for the effective and efficient delivery of projects. Amid a culture of excellence, knowledge transfer, professional growth, mentorship, and development, the department continues to grow the Pool of Consultants, across all levels, by attracting talented professionals from top-tier organizations.

Objectives

- Deliver impactful services to KSA energy sector stakeholders by leveraging KAPSARC's distinctive thought leadership, expertise, solutions, and partnerships, in close collaboration with Knowledge & Analysis teams.
- Manage the assigned projects and proposals effectively and efficiently and produce/scope high-quality deliverables/solutions.
- Promote KAPSARC offerings to KSA Energy Ecosystem stakeholders and build awareness about KAPSARC's capabilities.

Key Achievements in 2022

- The launch of 22 consulting projects, of which nine were completed during the year.
- The satisfaction rate based on clients' feedback reached 97.5%.
- The consulting team grew from six professionals at the beginning of 2022 to 17 professionals by the end of the year.





Process Coordination

The department manages external stakeholder requests by allocating resources and overseeing projects, prioritizing requests in a timely and accurate manner. They build relationships with stakeholders to understand project needs and match personnel to engagements for quality and efficiency. By identifying capabilities and expertise gaps in critical domains for the KSA energy sector - including Climate Finance, ESG, petrochemicals, and more - in collaboration with Knowledge & Analysis and the Pool of Consultants, it can bridge the gap in terms of capabilities via partnerships and feedback loop to Knowledge & Analysis and Pool of Consultants. The department also continuously improves functional systems and processes in line with global standards and changes in the business environment.

Objectives

- Plan and fulfill requests for process coordination and staffing in a timely and effective manner while ensuring the team (Experts and Consultants) is fully utilized when staffing.
- Raise advisory capability by ensuring individual aspirations and developmental gaps are considered as a part of the criteria of the staffing process.
- Adopt a culture of excellence by continuously improving the processes.

Key Achievements in 2022

- The department received 72 consulting requests, out of which 22 were converted into projects.
- Handled 80 ad-hoc requests, which were staffed with experts and consultants, tracked, and reported on.
- Successfully arranged the contribution of 74 KAPSARC Consulting and K&A professionals, accounting for more than 28,000 manhours.
- Developed a functional and cross-functional workflow guideline along with relevant forms and templates.
- Created visibility and transparency across multiple levels by developing and sharing reports and dashboards.
- Automated timesheet entries and approval process.





Finance & Operations

Finance & Operations is responsible for providing support to all functions including the management support offices. Plan and monitor the Center's finances, as well as the implementation of everyday activities to achieve its strategic goals. It also ensures that the activities of procurement, including any necessary agreements, are executed efficiently. This function plays a crucial role at KAPSARC, as it is responsible for the continuation of operations as well as supervising the completion of day-to-day obligations. It consists of several departments:

- Facilities Management
- Safety, Security & Transportation
- Procurement
- Communications & Public Relations
- Information Technology
- Human Resources
- Finance
- Cybersecurity





Facilities Management

The Facilities Management department is responsible for the tools and services that support the functionality, safety, and sustainability of KAPSARC's buildings, grounds, and infrastructure. It aims to be a recognized Facilities Management champion supporting of KAPSARC's vision and provide quality Facilities Management services in a safe, sustainable, and comfortable "work and live environment" to improve the quality of life of KAPSARC residents and the productivity of the Center's core business.

Objectives

- Maintain high quality of service benchmarked against international standards to ensure that the facilities meet the needs of KAPSARC, its employees, and the community.
- Ensure the provision of regular, high-quality, and efficient services at the best prices.
- Manage energy and water consumption of KAPSARC facilities.
- Achieve and maintain international quality system certificates.
- Support KAPSARC facility needs by upgrading existing facilities and implementing new facilities as per KAPSARC strategic requirements.

Key Achievements in 2022

- Maintained high levels of optimization for the PV plant's production of free electrical power to the KAPSARC site.
- Achieved 100% operational reliability of critical systems without any incidents affecting business continuity.
- Received five prestigious international green building certifications (LEED EBOM Platinum certifications) – the first in KSA at this level.





Certifications

KAPSARC achieved five new LEED EBOM Platinum certifications.

1. Recreation Center & Apt1



2. Retail & Apt2



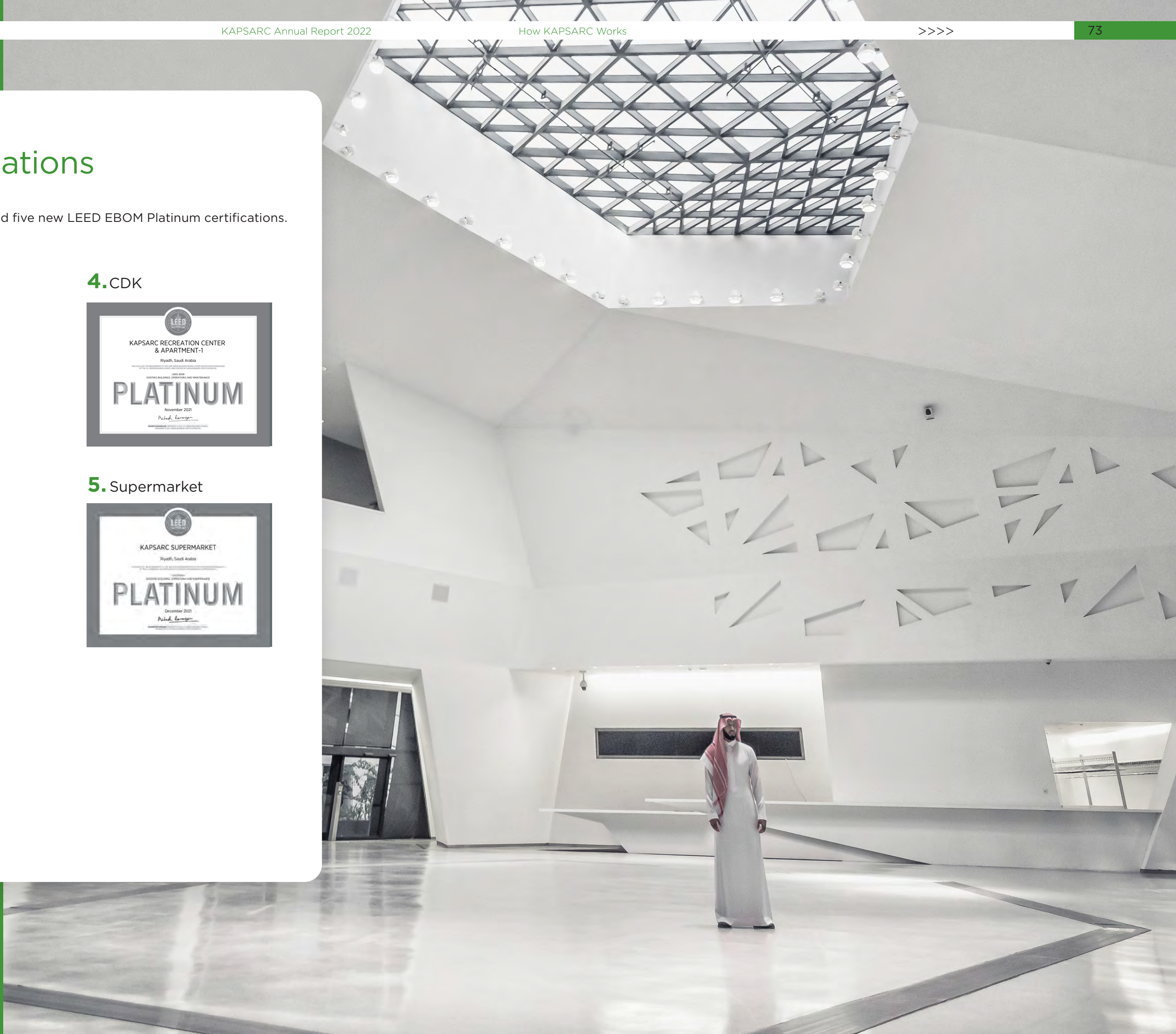
3. Community Service & Apt3



4. CDK



5. Supermarket





Safety, Security & Transportation

The Safety, Security, and Transportation department ensures that KAPSARC's working and living environments are risk-controlled and secure. It protects the lives and health of workers, residents, and visitors by identifying, preventing, and managing the risks associated with safety and security.

The department is also responsible for providing a safe, reliable, efficient, environmentally friendly and satisfying transport system.

Objectives

- Maintain safe and secure working and living conditions, and enhance the lives and health of employees, residents, and visitors.
- Raise safety and security awareness among employees and residents through knowledge sessions, events, activities, and communication.
- Maintain high-quality transportation services, ensuring they meet the needs of KAPSARC.

Key Achievements in 2022

- Several safety and security-related awareness initiatives have been completed for employees and residents.
- A total of 175 Life Ambassadors completed the First Aid training program in ROC, Utility and RCC.
- Maintained high-quality transportation and safety-measure services with a 98.5% customer satisfaction rating.
- Completed comprehensive KAPSARC Security Risk Assessment and Business Impact Analysis covering the whole KAPSARC site.
- Updated KAPSARC Business Continuity Plan & KAPSARC Emergency Response Plan to be aligned with the requirements of the Ministry of Energy (MOE) KSA.





Procurement

The Procurement department helps KAPSARC acquire essential supplies and services. It works to fulfill approved purchase requests, providing long-term agreements or items to the requesting parties. It also engages in external communication with suppliers, contractors, service providers, and relevant government entities. The procurement process is governed by KAPSARC's Procurement Policies and Procedures Manual. It aligns with its digital transformation by implementing necessary changes in the system for digital signatures and fully automated with the SAP upgrade project.

Objectives

- Procure goods and services with the best value for money and easy-to-use policy-driven procurement tools, whilst ensuring the highest ethical standards and supply market competitiveness.
- Maintain a robust network of preferred local and global suppliers capable of meeting KAPSARC's business needs.
- Manage the overall procurement process, including tendering and contracting, effectively and efficiently.
- Proactively manage high-value contracts in an efficient and timely manner.

Key Achievements in 2022

- Established the needed commitments (Contracts or Purchase Orders) promptly.
- Enforced robust procurement governance on all procurement transactions through policies and procedures. This will have an institutional impact by mitigating operations and legal risks to protect the Center's reputation and brand with external vendors.
- Established and maintained excellent relationships with vendors.
- Recorded no defect rate for all 214 commitments established for the Center without delivery variations or failures.





Communications & Public Relations

The Communications and Public Relations department helps to build KAPSARC's brand image. It aims to raise the Center's profile locally and globally to make it the go-to advisory think tank in energy economics and sustainability. It does this through effective communications, media interaction and creatively producing the products of different departments.

Objectives

- Establish a long-term relationship with the KSA energy ecosystem and its stakeholders to foster increased awareness, relationship, and collaboration opportunities.
- Engage with the public through multiple initiatives to enhance its awareness of the Center, its mandates, and its activities.
- Use various media platforms to inform external audiences about KAPSARC, its mission, activities, and its impact to generate positive publicity and awareness.
- Manage events that support planned communications programs, and the Center's operations, and help achieve its strategic objectives.
- Maintain an efficient, timely, and convenient publishing process, and support KAPSARC's departments with publishing-related services and resources.

Key Achievements in 2022

- Published 77 research publications across diverse formats, reaching a wider audience and establishing KAPSARC as a thought leader. All publications were translated into Arabic to promote knowledge-sharing and inclusivity in the Middle East and North Africa region.
- Ensured user-friendly, visually appealing, easy-to-navigate, and up-to-date website with the Center's latest news and research findings aligned with the organization's brand identity and messaging.
- Organized 119 activities to engage internal and external stakeholders and showcase KAPSARC's impact on the global energy industry.
- Managed workshops in the Kingdom and overseas to facilitate knowledge exchange and collaboration with diverse stakeholders.
- Achieved highly successful social media strategy for 2022, breaking yearly records and effectively sharing research findings, and engaging with followers on Twitter, LinkedIn, and YouTube.
- Elevated KAPSARC's research and reputation in the media landscape.

90%

year-on-year increase in media

3,640

mentions

»

20

languages





Information Technology

The Information Technology department fosters innovation within KAPSARC by driving digital transformation initiatives, operating infrastructure platforms and delivering software solutions.

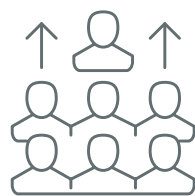
Objectives

- Support KAPSARC's growth momentum by ensuring reliable, robust, and resilient network connectivity, maintaining dependable platforms, and fulfilling service requests.
- Transform KAPSARC's legacy processes through digital transformation and empower employees with a modern digital workplace. That is achieved by providing appropriate tools, technologies, and methods.
- Support the development of productized solutions and foster an innovation culture with cutting-edge Proof of Concepts and experimental concepts.

Key Achievements in 2022

- Digitized Performance Management and Goal Management system in partnership with HR.
- Automated the Workshop Request Process for Communications & Public Relations department and the Knowledge & Analysis function.
- Streamlined the Visitor Access Management System for business visitors.
- Developed the IAEE conference website and ongoing engagement channel for the 2023 Riyadh IAEE Conference.
- Implemented a technology mind map wheel to the CCE visualization tool to explore the circular carbon economy variables.
- Launched the Saudi Energy Leaders Assembly (SELA)





Human Resources

The Human Resources (HR) department is responsible for attracting and retaining talent by providing competitive compensation, an appealing working environment, and maintaining a positive culture. To achieve that, HR supports and manages all employee-related activities, including training, professional development, and performance management.

Objectives

- Hire the best talent to support KAPSARC's value proposition and its required capabilities.
- Develop and implement a world-class human capacity-building model for KAPSARC to incubate distinctive talent.
- Retain high-performing talent by enabling the attainment of KAPSARC's values and behavioral competencies.

Key Achievements in 2022

- The Performance Management Process has been automated, including individual objective setting, self-reflection, and multi-raters, to foster better assessment and promote a culture of continuous feedback, collaboration, and excellence.
- Launched Graduate Development Program (GDP). It is a 12-month program that aims to attract and develop graduates who have distinguished themselves through high academic achievement. The program seeks to build a strong pipeline of talent, serve the community by grooming and developing talent and creating a brand image for the Center.

Human Capacity Building Model

KAPSARC has been working on building and fostering continuous learning for all employees to enhance their knowledge, develop the required skills and grow their careers.

SO3

Incubate distinctive talent for the advancement of Saudi Arabia's energy sector

Strategic Outcomes

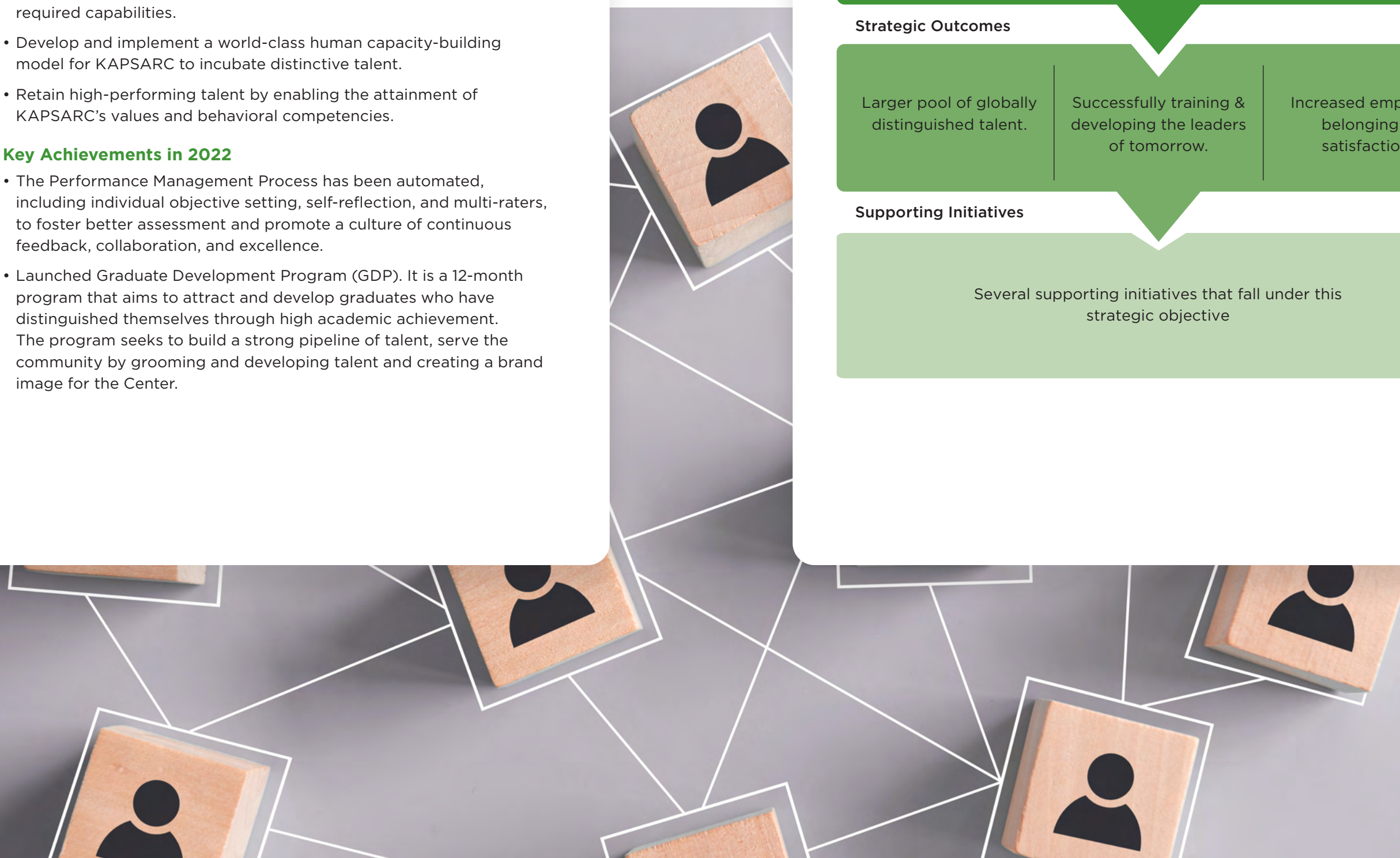
Larger pool of globally distinguished talent.

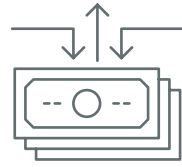
Successfully training & developing the leaders of tomorrow.

Increased employee belonging & satisfaction.

Supporting Initiatives

Several supporting initiatives that fall under this strategic objective





Finance

The Finance department is responsible for managing the finances of the Center and its subsidiaries, through accounting, treasury, budgeting, and compliance functions to protect and preserve their assets. They ensure that all financial operations and transactions are managed and accounted for in compliance with International Financial Reporting Standards and other legal requirements. The department also aims to enhance the reliability of the Center's fiscal position and maximize the effective and efficient use of funds.

Objectives

- Ensure compliance with International Financial Reporting Standards and other legally mandated standards.
- Enable other departments by ensuring all the financial operations and transactions are adequately managed and accounted.
- Manage cash liquidity to ensure the availability of funds to cover liabilities and process invoices.
- Maximize the efficient use of funds through effective financial planning and budgeting.





Cybersecurity

The Cybersecurity department holds the crucial responsibility of safeguarding information systems and overseeing cybersecurity governance, compliance, and risk management throughout KAPSARC.

Objectives

- Making KAPSARC more resilient to cyber-attack and better able to protect its infrastructure from cyber-attacks.
- Establishing cybersecurity risk management program to oversee the measurement and management of cyber risks.
- Building a strong cybersecurity culture within KAPSARC to support all cyber security objectives

Key Achievements in 2022

- Implemented a 24/7 monitoring and detection program that watches over KAPSARC's information systems against cybersecurity threats, incidents, or abnormal activities and responds to cybersecurity incidents by performing proper analysis and investigation.
- Established a complete cybersecurity program to conduct gap assessments, build a cybersecurity risk management framework and developing governance (department strategy, policy, and process) capabilities.
- Increased cybersecurity awareness by sharing flyers and conducting training for executives.
- Completed the Cybersecurity program, including a governance and risk framework.





Other Departments

- Strategic Planning & Institutional Initiatives
- Strategic Partnerships
- Internal Audit, Compliance and Risk
- Legal Counsel





Strategic Planning & Institutional Initiatives

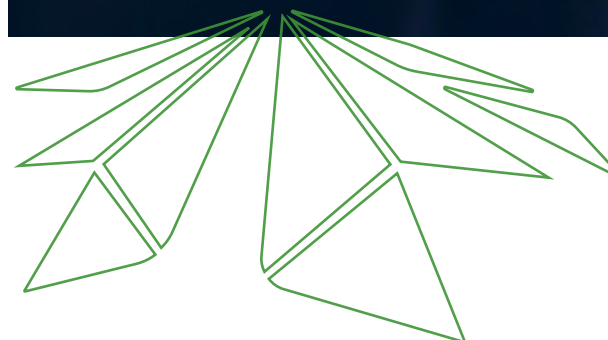
The Strategic Planning & Institutional Initiatives department provides a range of programs designed to achieve specific strategic objectives. Its primary focus is to ensure that the Center remains competitive and adaptable to change, while also taking advantage of new opportunities.

This department is a recent addition to the Center's administrative structure, and it operates under the direct supervision of the President. Its primary goal is to help the Center align with its organizational strategy. It promptly receives requested documents from departments for quarterly operational and performance reports.

Additionally, the department will implement a new project management tool to improve data gathering, encourage collaboration, track and monitor the performance of the organization, and establish objectives for the development and prosperity of KAPSARC and assist in achieving these objectives through an efficient strategic plan.

Objectives

- Establish a solid foundation for strategy and operational planning practices that will be integrated into the institutional framework.
- Develop and implement a comprehensive institutional performance management system that will enable the organization to track and measure progress toward its goals.
- Conduct monthly operational performance reviews and quarterly strategy reviews to ensure the organization is on track to meet its objectives.
- Prioritize strategic initiatives to ensure they align with the organization's overall objectives and goals.







Strategic Partnerships

The Strategic Partnership department's purpose is to institutionalize relationships and the approach to collaboration, activate partnerships in support of KAPSARC and Energy Ecosystem priorities, facilitate connections and relationships for the Energy Ecosystem, and support Energy Ecosystem messaging through evidence-based analytic and research work. Moving forward, the focus will shift from establishing how to think about the department function, and much more toward execution of the outreach and partnership function on behalf of the Center's priorities. This translates into organizing several cross-program initiatives with partners, including KAPSARC founding a think tank consortium in support of the Net Zero Producers Forum, building on the work initiated with the Payne Institute to expand the focus on the role of materials and minerals in the energy transition - particularly the supply constraints and potential supply chain bottlenecks - and supporting the Ministry in its outreach efforts on several fronts.

Objectives

- Leverage external partnerships to fill gaps in capability to respond to requests from the Energy Ecosystem in close coordination with K&A and Consulting.
- Enhance soft power and access for KAPSARC and the Energy Ecosystem in priority geographies.
- Identify and work with like-minded partners with complementary perspectives, priorities, and approaches.
- Prioritize and focus partnership activities to support the current thematic and geographic priorities of KAPSARC and the Energy Ecosystem.

Key Achievements in 2022

During 2022, KAPSARC collaborated informally with a larger number of individuals and organizations. However, these relationships were formalized in written agreements with a few key partners to serve the benefit of the Center and the Energy Ecosystem. These formalized partnerships include:

- Derasat and KAPSARC signed a memorandum of understanding (MoU)
- The Oxford Institute of Energy Studies and KAPSARC signed a research agreement in March 2022
- OIES and KAPSARC signed an MoU in May 2022
- The World Energy Council and KAPSARC signed a contract in May 2022
- The Energy Futures Initiative and KAPSARC signed a contract in June 2022
- The Institute of Energy Economics, Japan, and KAPSARC signed an MoU in August 2022
- The United States Association for Energy Economics and KAPSARC signed an MoU in August 2022
- Aeon Collective, a cross-disciplinary Waqf based in Riyadh, and KAPSARC signed an MoU in August 2022
- The Economics and Technology Research Institute of the China National Petroleum Corporation and KAPSARC signed an MoU
- The Institute of Energy at Peking University and KAPSARC signed an MoU in December 2022
- The Payne Institute for Public Policy at the Colorado School of Mines and KAPSARC signed a contract to study the global demand for rare earth, materials, and minerals and their utilization for energy sources.



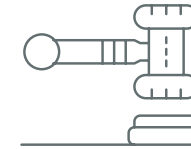


Internal Audit, Compliance & Risk

The Internal Audit, Compliance, and Risk department plays a crucial role in ensuring that KAPSARC operates efficiently and effectively, evaluating an in-depth understanding of the business culture and analyzing all KAPSARC policies and procedures, as well as analyzing data and providing recommendations that enable the Center to make informed decisions that align with its objectives. The team is dedicated to identifying potential vulnerabilities and risks developing strategies and implementing measures to mitigate them, safeguarding KAPSARC's assets and reputation, and maximizing opportunities for success. The wider function is to assist the organization in achieving strategic objectives and protecting its assets through ongoing risk assessment and a full internal audit cycle of all activities to ensure internal control, efficiency, effectiveness, and improvement of the Center's operations.

Objectives

- Implement the approved Internal Audit Plan and communicate the results with Senior Management and the Board of Trustees.
- Provide objective assurance on internal audit activity and consulting to compliance, governance, and risk management-related processes and controls across KAPSARC.
- Identify and document the organization's risks in critical business processes, define the internal controls within each process, and provide recommendations to mitigate those risks.
- Communicate and provide training in audit, risk management, and compliance to all employees within the organization.



Legal Counsel

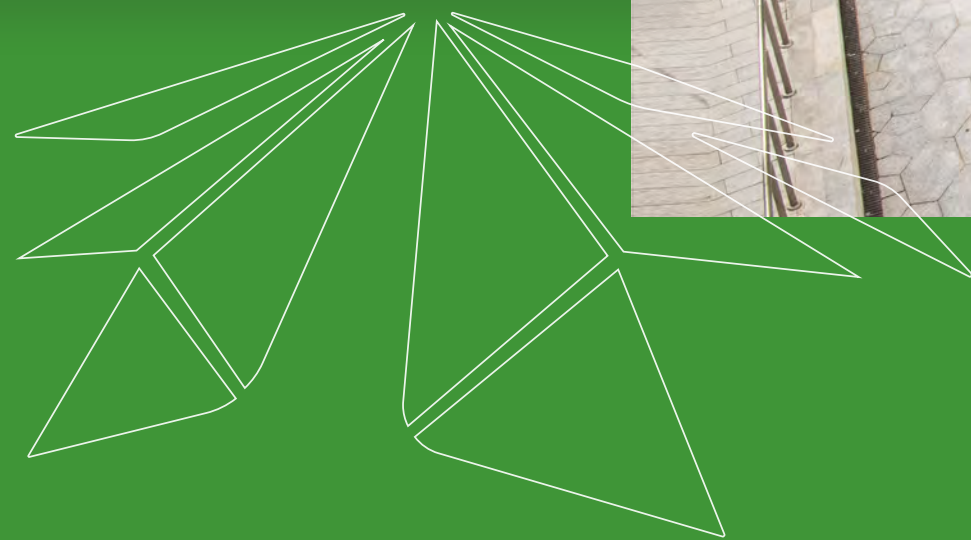
The Legal Counsel department plays a crucial role in ensuring that KAPSARC operates in full compliance with all applicable regulations and laws. The department helps protect the Center from exposure to legal risks and liability by providing expert legal advice on a wide range of matters.

To achieve this, the Legal Counsel department takes charge of all legal affairs at KAPSARC, planning, leading, and managing all related activities. Its scope of work includes providing legal advice on a variety of matters, such as legal documents, intellectual property rights, employment-related issues, policies and procedures, corporate affairs, commercial transactions, new projects, and regulations.

Objectives

- Conduct a thorough review of the legal landscape to identify relevant regulations and ensure that KAPSARC complies with them.
- Develop standardized legal templates for engagement and partnership agreements to streamline the process and ensure consistency.
- Draft new contracts for engagements and requests, and work with both internal and external stakeholders to ensure that any changes are aligned with KAPSARC's goals and objectives.
- Provide timely legal advice to all departments within KAPSARC, while also managing trademarks and copyrights and engaging with external legal entities for litigation support when necessary.

Annual Report 2022





Launch of the Graduate Development Program (GDP)

- Roll out of the 12-month program that aims to attract, nurture and develop top graduate trainees and equip them with the skills and experience required to start their careers.
- The Program has been designed using a blended learning approach with 70% on-the-job learning, 20% Social Learning, and 10% training.
- GDP is a 12-month program that aims to attract and develop graduates who have distinguished themselves through high academic achievement.
- The program seeks to build a strong talent pipeline, serve the community by grooming and developing talent and create a brand image for the center.



19

» From 2,000 applicants, 19 were accepted

Gender Distribution



31%



69%

The Program



- 70% of the GDP learning journey takes place on projects that leverage real-world assignments to grow capabilities



- **Regular feedback**
GDPs are evaluated on a quarterly basis and given feedback by their line mentor on their performance in the program
- **Buddy mentoring**
Assigned mentor for each GDP who provides support and guidance to GDP, as well as on how to navigate the KAPSARC culture



In-house training programs

- **Completed**
Business Acumen, Data Analysis, High impact Presentation
- **Planned**
Data Management, Research Methods, Project Management

70% On-the job learning

20% Social Learning

10% Training

Final Project

The final project will be related to GDP's learning objectives.

KAPSARC's Continuous Efforts

Results of KAPSARC's ongoing commitment in areas of employee engagement and organizational transparency.



Oversight Committees



Human Capital
3 Staff Reps



Capital Projects
3 Staff Reps



Health & Safety
3 Staff Reps



Cybersecurity



4
Leadership Briefings



3
Townhall Meetings



2
Achievements Reports



2
Poster Sessions

Periodic Updates

Alignment of organizational context through periodic communication, **quarterly staff meetings** and **monthly leadership briefings**

Achievements by staff are being materialized and documented in **quarterly reports** and socialized with all for better awareness of performance





مركز الملك عبدالله للدراسات والبحوث البترولية
King Abdullah Petroleum Studies and Research Center