

ABU DHABI: INNOVATION AT THE HEART OF A MODERN, DIVERSIFIED, AND SUSTAINABLE ECONOMY

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“In 50 years, when we might have the last barrel of oil, the question is: when it is shipped abroad, will we be sad? If we are investing today in the right sectors, I can tell you we will celebrate at that moment.”

—His Highness Sheikh Mohamed bin Zayed Al Nahyan,
Crown Prince of Abu Dhabi and Deputy Supreme
Commander of the UAE Armed Forces

The United Arab Emirates (UAE) is a federal republic of seven emirates—or states—of which Abu Dhabi is the capital and home to most of the country’s oil reserves. The country has experienced transformational growth since the discovery of oil and gas in the second half of the 20th century. The revenue from natural resources has driven economic progress and funded ambitious government projects while maintaining a low taxation environment that attracts investors and talent from around the world.

The task facing Abu Dhabi—and commodity-exporting nations in general—has been responsibly managing this finite resource to build a sustainable economy for the next generation. Abu Dhabi’s response has been an ambitious program of economy-building projects, using natural wealth as the foundation for long-term, sustainable development and steadily preparing its economy for a post-oil future. This has been allied with measured policies designed to ensure economic stability without hampering growth, including augmenting government revenues through the introduction of a value-added tax (VAT) in 2018 and the planned introduction of road tolls in 2020. The net result has been a highly stable, exceptionally resilient, and increasingly diversified economy, to the point where non-oil sectors now comprise most of the emirate’s GDP.¹

Over the past decade, innovation and knowledge-intensive industries have increasingly taken center stage in Abu Dhabi’s economic vision. Those efforts are also now delivering results. As Abu Dhabi considers how to build further on its achievements, its approach to leveraging oil and gas revenues to accelerate other sectors offers a valuable case study for other resource-based economies.

Building solid foundations for sustainable growth

In the past 50 years, Abu Dhabi has relentlessly reinvested its natural wealth into the broader economy, and the vision for making those investments has grown more complex over time. Businesses, sovereign wealth funds, and government investment agencies have directed revenue into developing non-oil businesses to speed the pace of growth and diversification.

One of the key stewards of the emirate’s wealth has been the Abu Dhabi Investment Authority (ADIA), established in 1976 to invest funds with a focus on long-term value creation. Another key milestone was the creation of Mubadala in 2002, which has innovated and invested around the world to diversify the emirate’s economy and create lasting value for future generations.

Today, while oil resources remain plentiful in the emirate, the non-oil sector now comprises around 60% of Abu Dhabi’s GDP, up from approximately half at the start of the decade.² Sectors including construction, financial services, aviation, tourism,

logistics, trading, manufacturing, and media now all play a much larger role in the emirate's economy than in the past.

Sources of income have been further diversified by 2018's introduction of a VAT in Abu Dhabi, and across the wider UAE and much of the Gulf Cooperation Council (GCC), at a rate of 5%, one of the lowest levels in the world. The country's tax receipts in the first year of the VAT's operation were 25 billion United Arab Emirates dirham (AED), or 5.5% of total revenues, a significant amount that augmented government finances without detriment to the UAE's reputation as a low-tax environment.³ There is zero tax payable on company profits, and the promise of income tax-free salaries for employees is a considerable advantage when attracting and recruiting talent.

Most recently, the knowledge economy has been prioritized for development. As stated in the UAE Ministry of Economy *Annual Economic Report 2019*, in the five years from 2014 to 2018, the country's information and communications sector grew by a total of 27.2% and at an average annual rate of 5.4%; the education sector grew 28.2% in total and 5.6% annually; the professional, scientific, and technical activities sector grew 9.5% in total and 1.9% annually; and the manufacturing sector grew at an average annual rate of 4.2%.⁴

The digital economy now contributes 4.3% to GDP, with that figure predicted to rise substantially.⁵ For instance, around 40% of the population uses government digital services more than once a week, while consumers have also embraced e-commerce.

The growth and diversification of the economy have been carefully nurtured over the years and enhanced by a business-friendly environment and favorable tax regime, easy access to capital and international markets, and financial and political stability.

Abu Dhabi offers investors an advanced level of infrastructure—by sea, air, and road—as well as an inexpensive energy supply and communications technology. With more than 200 islands, the Yas Marina Circuit F1 track, and Louvre Abu Dhabi, among many other attractions, its lifestyle appeals to expats, while world-class universities offer collaborations for research and development (R&D). Abu Dhabi is also a haven of economic stability and financial strength within the Middle East and North Africa (MENA) region, offering investors confidence with a predictable policy framework underpinned by a clear strategy for national growth.

The businesses that benefit come in all sizes. Global companies routinely choose Abu Dhabi as a regional base for the Middle East and nearby regions. At the same time, micro, small, and medium-sized enterprises (MSMEs) make up 98% of all companies and contribute 29% of Abu Dhabi's GDP and 43% of its employment, according to the Abu Dhabi Chamber of Commerce and Industry.⁶

Family-owned companies are also a defining feature of the commercial landscape, often trading across multiple industries. Having grown in step with Abu Dhabi itself, some

family businesses generate significant income as the local agent for international brands, such as global retailers, food service, or car manufacturers. They are also active in areas such as construction and property, publishing and media, and manufacturing. The best of these family businesses are highly competitive, with world-class management and operational experience, and are now aiming to develop as agile and innovative organizations fit for a digital future.⁷ Targeted business support by the Abu Dhabi government will help them to achieve a sustainable and creative path for future growth.

In addition to local businesses, Abu Dhabi has accelerated the growth of international and expatriate-owned companies by establishing special economic zones—including five “free zones”—targeting specific sectors ranging from media through to shipping and manufacturing. For small and medium-sized enterprises (SMEs), free zones simplify the business set-up process and enable 100% foreign ownership of the business.⁸ These free zones are innovation ready, promoting the growth of industry clusters where similar businesses can thrive as part of like-minded communities. The free zone concept has proven successful in encouraging knowledge-economy start-ups. Standout examples include Abu Dhabi's twofour54 ecosystem, which has earned a reputation as a regional center for media businesses, and Masdar City, which has established Abu Dhabi as a major regional hub for the green economy and a test bed for renewable energy and technology companies.

Planning for the long term

Today, Abu Dhabi benefits from an economy that encompasses a healthy combination of local companies and international partners, major corporations and SMEs, and a dynamic start-up culture that attracts foreign and local entrepreneurs. The latter is particularly important for sustainable long-term growth, and Abu Dhabi has worked in recent years to ensure innovators have everything they need to succeed.

While words such as “start-up” and “entrepreneur” are frequently used as proxies for “innovation”, the reality is that many new businesses compete in an existing space rather than explore new possibilities. A traditional approach has been the “agency” model, based on bringing ideas from abroad and tailoring them to the local market. Abu Dhabi is now building on these foundations, as part of its wider economic diversification plans, and creating an environment where new ideas and business models can flourish.

The next challenge is to expand a successful business ecosystem into a world-leading innovation ecosystem. In the past decade, innovation has moved to the center of the country's long-term vision, recognized as a key ingredient that will accelerate transformation and leapfrog economic development. Innovation is at the core of clearly defined strategic programs, including the Abu Dhabi Economic Vision 2030 and the Abu Dhabi government's Ghadan 21 accelerator program.

Announced in 2007, the Abu Dhabi Economic Vision 2030 created a roadmap for the emirate's economic future by defining four priority areas to direct public policy: economic development, social and human resources development, infrastructure development and environmental sustainability, and optimization of government operations.

This vision has been instrumental to informing planning. For example, the Economic Vision 2030 outlines the importance of addressing skill gaps and encouraging collaboration between higher education institutions to support the research and development ecosystem. The vision has also helped prioritize infrastructure projects, including airports, ports, road construction, electricity supply, and telecommunications networks that are now allowing Abu Dhabi to be at the forefront of harnessing technological innovations.⁹

Ideation to implementation to innovation

Building on initiatives like the Abu Dhabi Economic Vision 2030, the UAE National Innovation Strategy was launched in 2014 with the aim of making the nation one of the world's most innovative within seven years. The UAE has made good progress in this regard, steadily rising up the Global Innovation Index (GII) rankings in recent years to currently stand at 36th globally and 1st in the Arab world.¹⁰

The UAE National Innovation Strategy has four tracks: implementing supportive institutions and laws, applying an integrated system of modern tools, encouraging the private sector to innovate, and preparing individuals to obtain highly innovative skills. Understanding that innovation is a cornerstone of both economic and social development, the four tracks work together to establish a national culture of ideas, entrepreneurship, and partnership between the public and private sectors.

Within Abu Dhabi, the Ghadan 21 accelerator program—"ghadan" being an Arabic word for tomorrow—is doubling down on efforts to achieve these objectives by investing in business, innovation, and people.¹¹ Launched in 2019, it is a three-year holistic package worth a total of AED 50 billion (US\$13.6 billion) designed to boost Abu Dhabi's knowledge-based economy. One year into the program and more than 50 initiatives are underway—many aimed at attracting and supporting innovative start-ups and small businesses and spurring innovation through research and development.

Highlights from Ghadan 21's first-year report card in February 2020 included establishing the Abu Dhabi Investment Office's AED 535 million (US\$145 million) Ventures Fund to 1) invest in both early- and later-stage tech ventures, 2) be a limited partner in established global funds looking to access the MENA region, and 3) partner with global accelerators focused on helping innovative start-ups.

Another flagship Ghadan 21 initiative, Hub71, based at Abu Dhabi Global Market (ADGM), has assessed and welcomed more than 50 start-ups to its coworking space operated by WeWork. Hub71 is a global technology ecosystem that encompasses capital providers, business enablers, and strategic partners under one roof. It does this with support from strategic partners such as Mubadala, SoftBank Vision Fund, Microsoft, and ADGM. Abu Dhabi also entered into the largest-ever government partnership with private enterprise, XPRIZE Foundation, investing AED 300 million (US\$81 million) in a crowdsourcing innovation platform through a series of XPRIZE Abu Dhabi global competitions.

Mitigating risk and supporting growth

Many decades of effective policymaking, sound investment, and long-term planning have laid strong and stable foundations for economic growth. This is evident by the resilience shown to the economic turbulence of early 2020 and the government's ability to respond decisively with an ambitious package of stimulus measures under the Ghadan 21 Accelerator Programme. This included assisting with the availability of loans to local companies as part of a new partnership between the Department of Finance and three of the emirate's major banks—ADCB, ADIB, and FAB—providing SMEs with more financing options. The message was clear: ambitious entrepreneurs with great ideas will be supported in Abu Dhabi through all economic cycles.

The Abu Dhabi government has for many years placed great emphasis on supporting innovative entrepreneurs, recognizing both their contribution to the economy and the reality that governments are uniquely able to de-risk the critical early phases of a new enterprise. Deeply embedded within this mission and vision is the Abu Dhabi Investment Office (ADIO).

ADIO supports companies that have innovation at the core, helping them to win and succeed in Abu Dhabi. Its incentive programs and dedicated investor care team helps companies access everything the emirate has to offer. For start-ups, ADIO understands that speed is everything, especially for innovation-focused companies trying to stay ahead of the competition. As such, it can make decisions and deploy capital quickly. Armed with a significant funding pool, ADIO offers bespoke packages of cash and non-cash support, incorporating both advisory services and incentives, delivering the right building blocks that each individual investor needs to succeed.

Abu Dhabi's innovation ecosystem works in unison to create an environment where big thinking can thrive. For specialized financial technology (fintech) entrepreneurs, ADGM's RegLab is proving a highly effective source of innovation. It offers a controlled environment where start-ups at the cutting edge of fintech can safely test innovative solutions.

Multiple initiatives running in parallel are enabling Abu Dhabi to move quickly, de-risk innovation, and achieve results.

Maintaining a clear focus on priority areas

While innovation applies across all sectors, the best results are achieved through targeted programs solving specific challenges that are locally relevant, yet also globally significant.

For example, one focus area for ADIO is agricultural technology or “AgTech”. ADIO is directing AED 1 billion (US\$272 million) worth of incentives into AgTech innovations to deliver economically and environmentally sustainable food production in desert and arid environments. In April 2020, ADIO invested AED 367 million (US\$100 million) in four AgTech pioneers establishing new R&D and production facilities in the emirate as part of its goal to turn sand into farmland, solve complex global agriculture challenges, and expand the profile of local food producers. Making such a significant investment at a time of so much global uncertainty embodies Abu Dhabi’s commitment to put innovation at the heart of long-term economic planning.

ADIO is also supporting innovation in areas where Abu Dhabi has a comparative advantage, like its plentiful energy sources, such as oil and gas or sunlight for solar generation. The emirate’s established industries provide a ready customer base for innovative tech solutions.

For Abu Dhabi’s national oil company, ADNOC, technology is a key enabler for delivering smart growth as part of its 2030 Strategy.¹² More broadly, industry leaders have coined the phrase “Oil and Gas 4.0” to describe the scale and pace of change to operations, closely aligned with the concept of the Fourth Industrial Revolution.¹³ Disruption and opportunity cut across sectors including artificial intelligence (AI), cybersecurity, and blockchain—three standout areas for investment for ADIO—as well as automation and robotics.

AED 10 billion (US\$2.72 billion) is earmarked in 2020 for infrastructure spending through public-private partnerships, presenting a huge opportunity for the private sector. More generally, the Abu Dhabi Local Content Program, created by the Abu Dhabi Department of Economic Development, is also making it easier for the private sector to participate in government tenders.

This clear focus on a limited number of priority sectors applies across Abu Dhabi’s full range of innovation support, with strong synergies between ADIO and other agencies supporting R&D and start-ups. For example, Hub71 has launched the Abu Dhabi Climate Initiative with government partners to fast-track research and development in water and climate technology, including establishing a dedicated accelerator program, Climate Lab. XPRIZE Abu Dhabi aims to find solutions to critical global challenges, including climate change, water scarcity, and AI.

Abu Dhabi is enabling innovation on all fronts—and in all business cycles—using the strength of its economy and its comparative advantages to create opportunities for established companies and start-ups with equal vigor.

Bringing private sector finance into the funding mix

Abu Dhabi is distinguished in its ability to direct government investment into innovation. However, recognizing the risk of relying exclusively on public funds, Abu Dhabi is resolute in balancing government and private sector investment in innovation to ensure long-term economic sustainability.

ADIO’s role is to empower private investment and innovation, acting as an enabler and catalyst using a tool kit of cash and non-cash incentives to remove potential obstacles to innovation. ADIO’s Ventures Fund, as discussed earlier, is increasing the available funding pools in Abu Dhabi by expanding the venture capital (VC) universe, among other objectives.

The ability of early-stage companies to access financing has been an obstacle to entrepreneurship in the MENA region, with traditional banks, institutional investors, and family offices working hard to close the gap. The emirate is now seeing the growth of alternative financing sources, including VCs, which have been fundamental to Silicon Valley’s success but have been less prominent in the MENA region’s investment landscape.

This approach maintains a healthy balance between attracting international investment into Abu Dhabi and supporting the growth of local businesses. For locally-based partners, particularly family businesses, ADIO works to reduce the financial risk inherent in pivoting away from an agency model, discussed earlier, and towards one where businesses are empowered to originate new ideas, and/or to disrupt and tailor ideas from abroad. This will allow the best Abu Dhabi-owned companies to expand into sectors where there is scope to grow into internationally significant operators.

Beyond funding innovation, Abu Dhabi is building a pathway to raise future capital with stock exchange listings. Two of the region’s largest listed companies, First Abu Dhabi Bank (FAB) and telecom provider Etisalat, are listed on the Abu Dhabi Securities Exchange (ADX). The number of listed companies in the UAE, either in Abu Dhabi or on the Dubai stock exchanges, continues to grow, rising from 130 in 2017 to 137 in 2018.¹⁴ Authorities in the UAE are looking at ways for SMEs to use an initial public offering (IPO) to raise funds—a very welcome strategy as “unicorns” emerge from the local innovation ecosystem and rise into global players.¹⁵

Learning from the Abu Dhabi experience

Abu Dhabi is blessed with natural wealth, but this places a deep responsibility on the current generation. The lesson learned from the past is that such good fortune must be reinvested for tomorrow—carefully and with consideration—so that economic opportunity expands beyond the limits of a commodity boom.

While many economists will debate the benefits and risks of government intervention in the economy, Abu Dhabi's unique circumstances have demonstrated the value of robust central planning to maximize community benefit and emphasize long-term growth.

Its journey so far demonstrates the value of clear strategic thinking, diversifying a resource-based economy step-by-step. Family-owned companies have successfully leveraged the strong economy to build revenues, while free zones have welcomed international investment where needed, integrating high-value activities into the economy. Abu Dhabi has consistently set ambitious economic goals, identified and funded the inputs that will contribute to achieving those goals, and then raised the bar even higher.

Today, Abu Dhabi boasts a highly diversified economy—the fruits of strategically invested oil and gas revenue—that is less dependent on revenue from natural resources with each passing year.

The Abu Dhabi Economic Vision 2030 is inching towards its fulfillment date. The emirate's leadership is considering the strategic vision that will follow—looking ahead not only to the next decade but also to the next 50 years and the trends that will shape the future of its people, with certainty that the drive towards an economy based on knowledge, ideas, and innovation will only accelerate.

Notes:

- 1 Statistics Centre - Abu Dhabi (SCAD), 2020.
- 2 Statistics Centre - Abu Dhabi (SCAD), 2020; Statistics Centre - Abu Dhabi (SCAD), 2010.
- 3 UAE Ministry of Economy, 2018.
- 4 UAE Ministry of Finance, 2019.
- 5 UAE Ministry of Economy, 2019.
- 6 Abu Dhabi Chamber of Commerce and Industry, 2019.
- 7 PwC, 2019.
- 8 UAE Government, 2020.
- 9 Abu Dhabi Executive Council, 2007.
- 10 Abbas, 2019a.
- 11 Government of Abu Dhabi, 2020.
- 12 Abu Dhabi National Oil Company (ADNOC), 2020.
- 13 The National in partnership with Abu Dhabi National Oil Company (ADNOC), 2020.
- 14 UAE Ministry of Economy, 2019.
- 15 Abbas, 2019b.

References:

- Abbas, W. (2019a, July 25). UAE is Arab world's most innovative nation again. *The Khaleej Times*. Retrieved from <https://www.khaleejtimes.com/business/local/uae-is-arab-worlds-most-innovative-nation-again>
- . (2019b, December 24). SMEs owned by nationals will soon be able to take IPO route. *The Khaleej Times*. Retrieved from <https://www.khaleejtimes.com/smes-owned-by-nationals-will-soon-be-able-to-take-ipo-route>
- Abu Dhabi Chamber of Commerce and Industry. (2019). *Small and Medium-sized Enterprises in Abu Dhabi*. Retrieved from <https://www.abudhabichamber.ae/OurDocuments/Small%20and%20Medium-sized%20Enterprises%20in%20Abu%20Dhabi%20-%20fc9eeafd-d10c-4f36-a408-6c16a0bb7fe4/smes%20cropped.pdf>
- Abu Dhabi Executive Council. (2008). *The Abu Dhabi Economic Vision 2020*. Retrieved from <https://www.ecouncil.ae/PublicationsEn/economic-vision-2030-full-versionEn.pdf>
- Abu Dhabi National Oil Company (ADNOC). *ADNOC Integrated 2030 Strategy*. Retrieved from <https://www.adnoc.ae/en/strategy2030>
- Government of Abu Dhabi. (2020). *Ghadan 21 Accelerator Programme*. Retrieved from <https://www.ghadan.abudhabi/en/home/>
- PwC. (2019). *Future-proofing Middle East Family Businesses*. Retrieved from <https://www.pwc.com/m1/en/publications/documents/family-business-survey-2019.pdf>
- Statistics Centre – Abu Dhabi. (2010). *Statistical Yearbook of Abu Dhabi 2010*. Retrieved from https://www.scad.ae/Release%20Documents/Statistical%20Yearbook%202010_1.pdf
- Statistics Centre – Abu Dhabi. (2020, January 12). *Abu Dhabi GDP continues to achieve significant growth rates: SCAD. WAM*. Retrieved from <https://wam.ae/en/details/1395302815572>
- The National in partnership with Abu Dhabi National Oil Company (ADNOC). *Oil & Gas 4.0*. Retrieved from <https://oilandgas4.thenational.ae/>
- UAE Government. (2020). *Starting a Business in a Free Zone*. Retrieved from <https://www.government.ae/en/information-and-services/business/starting-a-business-in-a-free-zone>
- UAE Ministry of Economy. (2018, October 31). *UAE Economy*. Retrieved from https://www.economy.gov.ae/UAEconomyMagazine/UAE%20Economy%20Magazine_Issue%2031.pdfs
- UAE Ministry of Economy. (2019). *Annual Economic Report 2019*. Retrieved from https://www.government.ae/-/media/About-UAE/UAE-economy/MOE_Annual-Economic-Report_2019_.ashx?la=en
- UAE Ministry of Finance. (2019, December 10). *VAT contributed 5.5% to country's overall revenue in 2018. WAM*. Retrieved from <https://www.wam.ae/en/details/1395302809400>