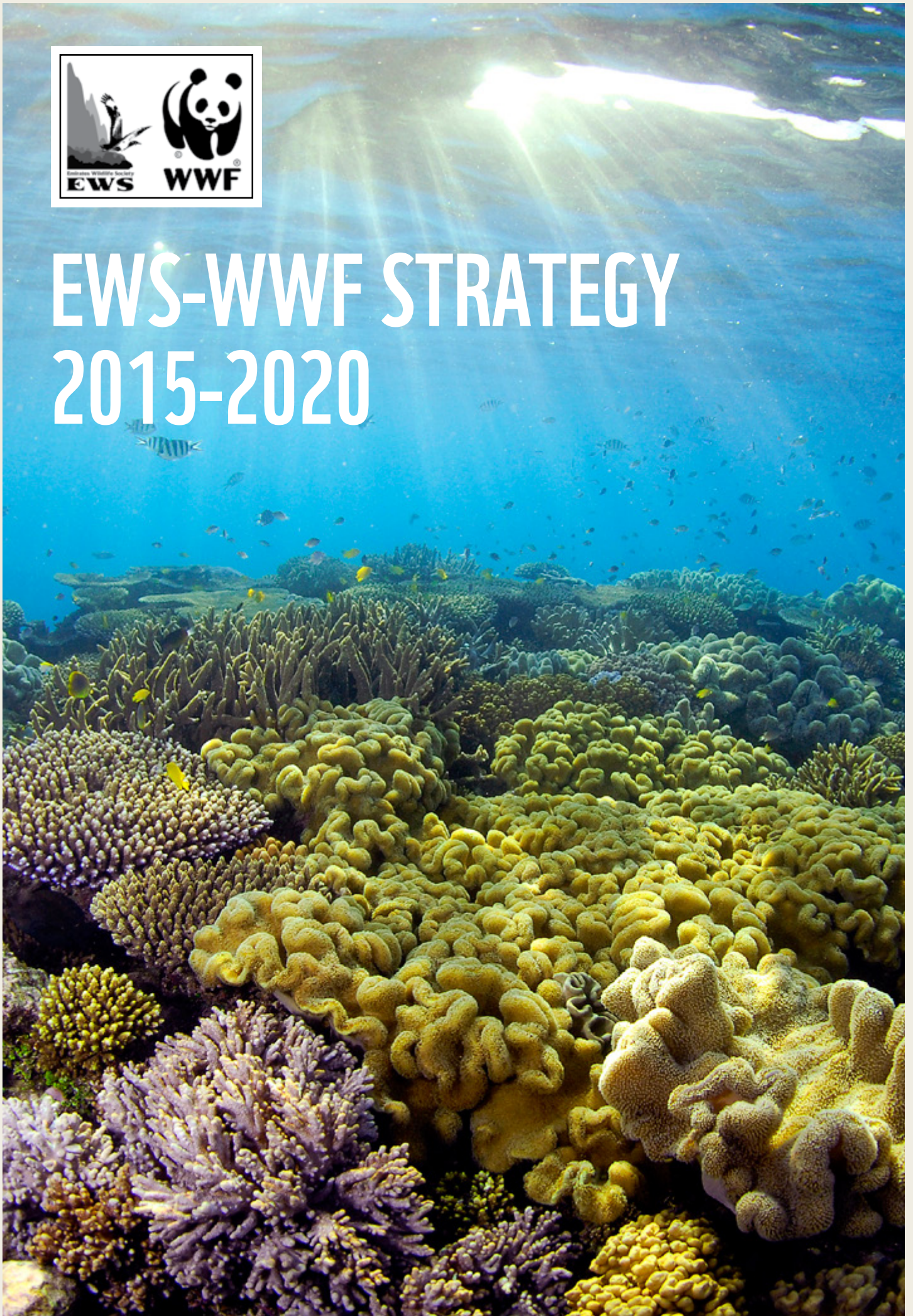




# EWS-WWF STRATEGY 2015-2020





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Emirates Wildlife Society (EWS) is a UAE environmental non-governmental organisation, established under the patronage of HH Sheikh Hamdan bin Zayed Al Nahyan, Ruler's representative in the Western Region and Chairman of Environmental Agency – Abu Dhabi (EAD).

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EWS works in association with WWF, one of the world's largest and most respected independent conservation organisations. EWS-WWF has been active in the UAE since 2001 and has initiated and implemented several conservation and education projects in the region. EWS-WWF works federally in the UAE and in the region with offices in Abu Dhabi, Dubai and Fujairah and is governed by a local board of directors.

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## **VISION:**

**Our vision is to build a future in which people live in harmony with nature.**

## **MISSION:**

**Our mission is to conserve nature and reduce the most pressing threats to the environment.**

**We work with people and institutions in the UAE and region, to implement conservation solutions through science, research, policy, education and awareness.**

# SPECIAL THANKS

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It is with great pleasure that I share with you EWS-WWF's strategic plan, outlining our priorities for the next five years. The Strategic Plan 2020 offers our response to two important questions: How will EWS-WWF add most value to environmental conservation and best serve the United Arab Emirates in its quest to develop a path towards a sustainable future?

Our goal is to mobilise society for the protection of the planet. We are doing this for the wondrous species that live among us and for future generations of humans, who will be as dependent as we are on the planet's health for their well-being and prosperity.

I would like to thank everyone who has helped us make this strategic plan a reality. What began with a one-day brainstorming session to voice the change that we wanted to see and outline our Theory of Change evolved into a collaborative and engaged process in which our Board of Directors, the entire EWS-WWF team, WWF colleagues, and our partners participated.

I extend my sincerest gratitude to our Chairman, His Excellency Mohammed Ahmed Al Bowardi, for setting a clear and ambitious direction. Likewise, my immense appreciation goes to our Managing Director and Board Member, Her Excellency Razan Khalifa Al Mubarak, for her input, wise guidance, feedback, and essential support throughout the planning process.

Tremendous thanks to our Deputy Director General, Laila Abdullatif, who led a significant portion of the strategic plan. Thanks to her, the coordination of numerous workshops and meetings, the assembling of ideas and inputs, and the driving of the initial and final process led to the creation and sustenance of momentum.

I offer a very special thank you to Paola Ferreira, our Conservation and Climate Director, for leading the development of an outstanding new conservation strategy in close collaboration with her team. Her dedication to and energy in this project have been immeasurable, and her leadership is, as always, immensely appreciated and valued by all.

I would also like to thank the entire team at EWS-WWF for their strong support and for the numerous hours that they have devoted to strategic planning while continuing to carry out their other responsibilities. In particular, Tanzeed Alam, Marina Antonopoulou, Simone Lawrence, Chris Woodey, Reem Al Thawadi, and Lisa Perry deserve a special mention for their contributions and commitment to developing this document. It has been a true team effort with some real brainpower going into research, analysis, problem-solving, conceptualisation, planning, and presentation in a comprehensive manner.

Our colleagues from the WWF network and our partners in the UAE have continually provided us with invaluable backing by participating in peer reviews, offering useful feedback, and challenging our propositions. This kind of support has kept us on our toes and will ensure that the projects and activities we take on in the next five years are relevant, ambitious, and, most important of all, have a positive impact on the environment.

Last but not least, I would like to thank Georg Schwede, who originally recommended that we revisit the ambition and focus of our previous strategic plan. He has provided excellent advice and support as we have worked our way through the preparation of this new strategic plan.

We have made tremendous progress in streamlining our efforts and creating a clear roadmap for our work thanks to the dedication and effort of everyone involved. I remain ever thankful to you all. Moreover, I am confident that we can deliver a highly impactful conservation programme and increasingly contribute towards the positive change that is necessary for a sustainable future.

***Ida Tillisch***  
***Director General***

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# MESSAGE FROM THE CHAIRMAN OF THE BOARD OF DIRECTORS, H.E. MOHAMMED AHMED AL BOWARDI



HE Mohammed Ahmed  
Al Bowardi Chairman of  
the Board of Directors of  
EWS-WWF

It is with great pleasure that I present EWS-WWF's strategic plan for 2020. This strategy is the result of intensive research and consultation. It draws a comprehensive and ambitious roadmap for the organisation's delivery of increasing impact. This is necessary for the promotion of sound environmental conservation in the country.

The deep love and respect for nature that the late Sheikh Zayed bin Sultan Al Nahyan so profoundly demonstrated is something we must seek to emulate as a nation.

At first glance, the brown and orange colors of the UAE landscape do not appear to support much life. Living in such a harsh climate isn't easy. That's why the great variety of wildlife that lives here is highly adapted to intense temperatures and very limited rainfall. This is also true for our marine environment, where species have adapted to high summer temperatures.

Sustaining human life in this arid region only adds to the pressures faced and felt by biodiversity. The country uses vast amounts of energy and water to sustain its population and, beyond this, imports a large quantity of food supplies to feed the nation and its visitors. This connects us to the destiny of the world. Studies show that we are tipping the natural balance, and this change will be irreversible unless we make environmental conservation a priority. Not only is it about species, but it is also about the well-being of people and the preservation of traditions that link us to the conservation of the land that we inherited from our forefathers and owe to our children.

What is important however, is that we also recognise how our consumption habits increase our impact on the planet's natural resources and put in place measures to reduce our pressure on the environment. With climate change posing a very real threat to the planet, including humans and wildlife, it is encouraging to see the UAE make great strides towards tackling its ecological footprint in a range of ways.

Through these efforts, I am optimistic that our country can lead the environmental movement regionally and internationally. To support this shift towards a more sustainable UAE, I can think of no better team than the one at EWS-WWF.

Our team members truly understand the importance and interconnectivity of our natural world. Moreover they have a strong desire and passion to make our planet a better place. We know that the UAE can possess a flourishing natural environment without sacrificing its successful economy. In addition, we are ready and have the experience, knowledge, and ambition, to support the government and various communities achieve a sustainable future.

By working together, we can create the conditions that allow us all to live in a country where the principles of sustainable development are effectively embedded in everything we do. For this reason, I am proud to be part of the environmental movement currently sweeping the country and encourage other Emiratis, as well as expatriates, to take a greater interest in conserving our precious natural world.

There is scope for the deep involvement of non-governmental organisations in ensuring that the country delivers its commitments to the environment. At EWS-WWF, we recognise that, to contribute to building a country where nature and the economy thrive side by side, we must maximise our impact. We also recognise the need for partnerships. Therefore, I welcome the committed support from partners, stakeholders and the wider UAE community as EWS-WWF continues to push the environmental agenda in our country.

## EXECUTIVE SUMMARY

As an organisation, EWS-WWF has consistently leveraged a range of partners and other stakeholders to bring conservation to the table of government and business decision-makers. It has carved itself a reputation as an important and influential environmental outfit in the country. By delivering high-impact, robust solutions for conservation that are always grounded in science, EWS-WWF has also played an important role as part of civil society. This coincides with the country's pursuit of its National Agenda, leading to UAE Vision 2021. The vision, in turn, includes the national priority of ensuring sustainable development while preserving the environment.

As such, our efforts will continue to contribute to the protection of the UAE's natural heritage as well as the global work of WWF to improve the overall health of our planet and its ecosystems. This encompasses the conservation of species populations worldwide and the mitigation of threats posed by climate change.

At EWS-WWF, we believe that economic and social growth can be achieved without putting the environment at risk. Given the UAE's geographical and political position, we will continue to encourage development that is sustainable and will benefit the environment in the short and long-term, and to support long-term socio-economic growth. To do this, we will leverage our influence in certain spheres and improve our conservation efforts with strategic activities that contribute effectively to lasting positive change.

In this document, we present a detailed and ambitious roadmap that we believe will deliver important conservation wins. We analysed our limitations, defined the most important conservation needs, and, through this ambitious conservation strategy, have outlined viable solutions that will achieve meaningful outcomes for conservation in the UAE.

## OVERVIEW OF OUR STRATEGIC PLAN

We aim to see the UAE government and private sector make significant progress towards conserving the country's natural heritage with increasingly effective conservation efforts, actions to alleviate climate change, and the alignment of its future development with the UAE Vision 2021. By aligning our efforts with overall governmental ambition, we can help drive sustainable development while preserving the environment. We will work on climate change, energy issues, and biodiversity conservation (terrestrial and marine, as well as the clampdown on the illegal wildlife trade). These topics are of great relevance to conservation and must be prioritised if we want a future where people can enjoy prosperous and fulfilling lives in harmony with nature. We will focus our efforts on bringing conservation science closer to policy makers, initiating and encouraging dialogue on these issues across all sectors of society. We will continue to build strong partnerships to ensure that the changes we contribute to are enduring. We will also foster knowledge sharing and transparency and build capacity in the country.



## **BIODIVERSITY - MARINE**

Our Marine Programme seeks to create a network of marine protected areas with the united support of regional players. By recognising that ecosystem-based conservation is preferable and will achieve a higher success rate, our team will promote the need to safeguard areas of high conservation value and promote regional collaboration to conserve flagship species such as whales and turtles. This programme will feed into WWF's Global Priorities and has therefore been tipped as one area of our work that will contribute highly to worldwide conservation efforts.

## **BIODIVERSITY - TERRESTRIAL**

Meanwhile, our Terrestrial Programme will focus on conserving land-based ecosystems (such as wetlands, mountains, and desert shrublands) and species. We will work with key players to secure our long-term vision of a nationwide protected area network that ensures environmental connectivity.

## **WILDLIFE TRADE PROGRAMME**

Another key focus will be the clampdown on the illegal trade of wildlife, which is currently a major issue with the country acting as a destination for high-end endangered species and a transit point between African and Asian markets. We will support the UAE CITES authorities in their implementation of measures that will position the country as a global leader in terms of its positive impact on reducing the illegal wildlife trade. We will also work with different stakeholders to encourage dialogue and garner long-term commitment that is crucial to ending this destructive trade.

## **CLIMATE CHANGE AND ENERGY**

The broad goal is to reduce greenhouse gas (GHG) emissions, build knowledge on climate risks, and help prioritise them in policy-making. By elevating the priority of climate change action, the UAE will be better placed to take concrete steps to reduce its emissions. To achieve this, we will work with local stakeholders to pursue energy efficiency interventions. We will also help the country expand its ambition in the uptake of renewable energy options and promote their use among different sectors.

## **WHAT IS NEEDED TO ACHIEVE OUR CONSERVATION VISION AND SCALE UP?**

*Naturally, for us to achieve all of this, several fundamental areas must receive our immediate and long-term focus: partnerships, operations and governance, HR, fundraising, communication and outreach.*

## **PARTNERSHIPS**

EWS-WWF cannot achieve its goals alone. Strong partnerships with businesses, governments, finance institutions, local communities, academia, and other NGOs are essential for driving change at the scale needed.

## **OPERATIONS AND GOVERNANCE**

Scaling up our conservation effort will require improvements in our operations, governance, and monitoring and evaluation framework. We will invest in strengthening these functions by establishing an independent operations team, improving current financial systems, and putting in place a clear monitoring and evaluation system based on WWF's Project and Programmes Management Standards. Meanwhile, the HR strategy will focus on long-term manpower planning to increase efficiency and inform team development. We will also focus on promoting accountability and establishing a strong organisational culture.

## **FINANCIAL RESOURCES AND EFFECTIVE FINANCIAL MANAGEMENT**

To run our programmes effectively it is crucial that we have income streams that contribute towards both programme funding allocation and unrestricted funding. Failing to garner adequate financial support will prevent us from increasing our conservation efforts, hence securing financial resources will be a key focus moving forward. Equally, wise stewardship of the resources is critical, and EWS-WWF will closely monitor how funding is spent to optimise efficiency and demonstrate that funding for EWS-WWF is a good investment for the future.

## **CAPITALISING ON OUR EXPERTISE**

EWS-WWF's work is powered by the dedicated people in our team, including leading conservation scientists, policy experts, educators, fundraisers, and communications experts. It is a critical part of the success of the future to ensure we have the right people in the right places and continue to build our capacity.

## **COMMUNICATIONS AND BRAND**

Communication is a key tool for accelerating conservation wins. Recognising that our brand is one of our most valuable assets, we will devote more time and resources to building a stronger presence in the UAE. The increased brand recognition will aid our bid to improve public education on environmental issues and gain buy-in from the community on topics that affect and interest them. We will do this by engaging with varied audiences in as many interconnected conservation efforts as possible and being 'out there' to a greater extent than before. By employing a variety of tactics, such as a stronger focus on campaigns, joint communication efforts with our partners, and well-planned media strategies, we aim to create awareness of important environmental work and establish EWS-WWF as the organisation to partner with.

## **ENVIRONMENTAL EDUCATION AND OUTREACH**

We will develop a new education and outreach strategy to raise awareness of environmental topics among selected audiences by the end of 2015. Environmental education and outreach will continue to play a critical role in enabling us to achieve our goal and that associated with UAE Vision 2021. It will also improve the image of and raise the urgency of key environmental topics and will align closely with our communication work, most specifically with brand awareness and campaigns.

# CHAPTER 1- BACKGROUND

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## 1.1 THE GULF REGION

A number of key countries in the Arabian Peninsula formed the Gulf Cooperation Council (GCC) in 1981. The GCC is a regional intergovernmental council that is composed of Saudi Arabia, the United Arab Emirates (UAE), Qatar, Oman, Kuwait, and Bahrain. The region is surrounded by water bodies, including the Arabian Sea, the Gulf of Oman, the Arabian Gulf, the Red Sea, and the Indian Ocean, with large mountain ranges near the coastlines of Saudi Arabia, Oman, and the UAE. The climate is dry and hot with summer temperatures reaching above 46°C and dry, warm winters with temperatures averaging around 22°C. Limited areas of the GCC are endowed with sufficient ground water, fresh water, and marine water resources to support agriculture and human use in large cities and towns. Water scarcity is therefore an issue across the region not only due to urban development but also because of widespread aridity, drought, limited surface water, and shallow groundwater aquifers (UNEP, 2013). These factors, coupled with the intense consumption of water to meet the needs associated with vast population growth, have resulted in extreme dependency on desalination (Dawoud, 2009).

***“Deep connections with the natural world are historically engrained in the local culture”***

Home to some of the oldest, richest and diverse traditions and cultural practices, the region’s historical significance is found in art, poetry, literature, science, trade and religion. Many cultural and religious sites, ruins, and other landmarks are listed as UNESCO World Heritage Sites (UNEP, 2013). They remain readily identifiable features of the countries in question: examples include the spiritual pilgrimage sites in Mecca. Deep connections with the natural world are historically ingrained in local culture, with hunting, fishing, herding, and falconry among the most prominent activities practiced (UNEP, 2013). One of the biggest threats to cultural history, however, is environmental degradation. This results from the loss of biodiversity, desertification, and drought and pollution that stem from the region’s increasing population and associated pressures, rapid development, and the impact of climate change (UNEP, 2013).

Countries in the GCC operate distinctly from others in the Arab region and the world in general, as is evident in their population demographics and dynamics. Covering an area slightly larger than Algeria (approximately 2,410,710 km<sup>2</sup>), the GCC is recognised as having one of the highest population growth rates in the world: approximately 2.33%, compared to the global average of 1.17% (Ramady, 2012). The current regional population exceeds 46.8 million individuals, up from 33.4 million in 2004 (QNB, 2012). This high growth rate can be attributed to the increasing number of foreign workers attracted by the region’s employment and investment opportunities (UNEP, 2013).

The discovery of oil in the 1950s spurred rapid growth and urbanisation, which continue to this day. As of 2015, GCC countries held a combined 30.23% share of proven oil reserves globally (EIA, 2015), which form the backbone of their economies. As major suppliers of oil and gas, the region’s economies benefit from exports of the resource to the biggest consumers in the world. Meanwhile, accelerated GHG emissions from domestic consumption rank GCC countries in the



top 13 highest per capita CO<sub>2</sub> emitters, resulting in great implications in the fight against climate change and loss of biodiversity (CDIAC, 2013).

However, regional leaders are acknowledging that oil dependency subjects their nations to unpredictable futures given the high volatility of the industry. They have recognised that economic diversification is necessary to eradicate these vulnerabilities. Most GCC countries are moving towards an increased reliance on the service sector, namely tourism, to diversify their income (UNEP, 2013). In 2013, the total contribution of travel and tourism to the region's GDP was 8.4%, which was equivalent to USD 31.96 billion (WTTC, 2014). This diversification will, however, need to be managed sustainably to prevent further impacts on biodiversity and carbon emissions.

**85%**  
OF THE UAE'S  
POPULATION IS LIVING  
IN URBAN AREAS

## 1.2 THE UNITED ARAB EMIRATES

The UAE is made up of a federation of seven emirates (Abu Dhabi, Dubai, Sharjah, Ajman, Ras Al Khaimah, Fujairah and Umm Al Quwain) and covers an area of nearly 83,600 km<sup>2</sup> (roughly the size of Austria). The country shares land borders with Saudi Arabia and Oman, and its coastal areas include parts of the Arabian Gulf to the west and the Gulf of Oman to the east.

The country's climate is arid and hot with a largely desert terrain where summer temperatures reach above 48°C in the coastal regions. As is the case in the rest of the region, winter averages usually hover around 22°C. Rainfall levels are low, with less than 120 mm annually. The exceptions are the mountain regions, which are relatively cool and receive more rainfall; up to 350 mm a year (United Arab Emirates, 2010). Due to water scarcity, the UAE depends on desalination to provide sufficient fresh water for its population. It is the second-largest producer of desalinated water in the GCC, with the capacity to desalinate 8,428,456 m<sup>3</sup> per day (UNEP, 2013). Inevitably, this leads to high energy consumption and GHG emissions, as well as increased impacts on marine environments.

The emirate of Abu Dhabi hosts the capital - the city of Abu Dhabi. The UAE has two levels of government: (a) the federal government (which operates on a



DUE TO WATER  
SCARCITY, THE UAE  
DEPENDS HEAVILY ON  
DESALINATED WATER,  
AND IS THE  
**2nd**  
LARGEST PRODUCER OF  
OF IT IN THE GCC



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nationwide level) and (b) the emirate governments (which operate through local municipalities and agencies).

Expatriates made up 88.5% of the total UAE population of 8.3 million individuals in 2010 (National Bureau of Statistics, 2012). The country has also experienced dramatic fluctuations in its population growth rate - from a 4.4% rise in 2003 to a peak of 17.3% in 2007, before a scale-back to 1.5% in 2013 (World Bank, 2015). This recent decline is expected to reverse slightly as the economy diversifies and expands. This extraordinary population growth is primarily attributable to net inward migration rates. A net migration rate of 66% was recorded in 2007, while the most recent net migration rate recorded was 5% (World Bank, 2015). Increased urbanisation between 2010 and 2015 is a likely result of an increasingly young population, whose median age is 30 years: 24% of the total population are classified as youths (CIA World Factbook, 2014). The proportion of the population living in urban areas by 2013 was above the global average at 85%. To accommodate the rapid population increase, urbanisation was scaled up, and it has resulted in further pressures on terrestrial and marine environments (World Bank, 2015). With a per capita gross national income (GNI) of 58,090 USD, the country is ranked as 'high income' (WBG, 2014).

While the standard of living in the UAE has risen significantly, mainly due to wealth generated by oil revenues, less desirable consequences have also been witnessed, with GHG emissions increasing (from 44 million tonnes CO<sub>2</sub> in 1994 to 172.8 million tonnes CO<sub>2</sub> in 2012) and natural resources, including water and terrestrial and marine ecosystems, being degraded and, in some cases, depleted (MOEW, 2012).

The country is emphasising the departure from oil as the primary source of income (WBG, 2014). An alternative yet lucrative source of income is tourism, towards which 6.2% of total investments in the UAE are allocated. However this allocation is forecasted to rise to 11.9% of all investments by 2024 (WTTC, 2014).

Diverse habitats can be found across the country. They range from coral reefs to man-made oases and from mountains to deserts. Based on the mapping assessment conducted by the Abu Dhabi Global Environment Data Initiative (AGEDI), a number of biodiversity hotspots have been highlighted for significant endemic species (AGEDI, 2013). Despite their adaptability to extreme conditions, wildlife is in steady decline due to threats posed by human activity (The World Bank Group, 2008).

Located in the arid tropical zone extending across Asia and Northern Africa, the UAE's major terrestrial habitat is sandy desert which supports a variety of sparse seasonal vegetation. The Emirate of Abu Dhabi includes the northwestern part of the Earth's largest sand desert - the 'Empty Quarter' or Rub' al Khali.

Also present are key marine biodiversity hotspots, including islands, coral reefs, sea grasses, intertidal areas, salt marshes (known as sabkhas), tidal inlets (known

as khors), and mangroves. Permanent freshwater is scarce, yet some running water persists throughout the year in deep gorges of wadis (valleys) in the mountains as well as in sabkhas and artificial lakes (EWS-WWF, 2015).

The Hajar Mountains in the west act as a rain catchment area, and run-off from the range is the only natural source of replenishment for groundwater. Wildlife adapted to such mountain systems and freshwater habitats include dragonflies, toads, and fish species. The very rugged and remote nature of the mountains makes them a perfect refuge for discrete or persecuted wildlife species, such as the Arabian leopard and the endemic Arabian tahr (EWS-WWF, 2015).

The GCC region, particularly the UAE, is a global anomaly, having risen from a vast desert context to a cosmopolitan hub for business and tourism in a matter of mere decades. The astonishing rate of development is unprecedented, and the region's heavy focus on infrastructural and economic advancement has meant that sensitivities to the environment have been low on the decision-making agenda in some periods. Human activities have undeniably impacted ecosystems, species, and habitats, and so intervention to reduce the negative effects on the environment and ensure sustainable livelihoods for residents is necessary. The country has put in place different climate change and biodiversity strategies and policies, including UAE Vision 2021, Environment Agency-Abu Dhabi Vision 2030 for the city of Abu Dhabi, a Green Growth Strategy for the country, as well as a number of other climate change and biodiversity strategies, all in the effort to address these environmental issues. There is now an opportunity to make use of the socio-political, cultural, and geographical variables to drive awareness and spark positive action. Change needs to happen holistically. Such change should be driven from the top down through future development, implementation and the monitoring of legislation and policy, as well as from the bottom up by creating a shift in public perception and behaviour.



## 1.3 THE ESTABLISHMENT OF EMIRATES WILDLIFE SOCIETY IN ASSOCIATION WITH WWF

Emirates Wildlife Society (EWS) was established in February 2001 under the patronage of His Highness Sheikh Hamdan bin Zayed Al Nahyan, the Chairman of the Environment Agency-Abu Dhabi and the ruler's representative in the western region.

EWS is registered as a society of public interest under the Ministry of Social Affairs in the United Arab Emirates. To better achieve its conservation goals, EWS was established in association with WWF, and is the representative of WWF in the GCC. Together, EWS and WWF (known locally as EWS-WWF) work as one entity throughout the Gulf region to lead and support the conservation of nature and the reduction of the ecological footprint through conservation and education initiatives, policy work, and awareness raising.

## 1.4 GOVERNANCE AND MANAGEMENT

EWS-WWF is governed in accordance with the articles of the Ministry of Social Affairs. Its board of directors consists of a chairman and board members, all of whom are UAE nationals who represent the private, public, and NGO sectors across five of the seven emirates at the time of the writing of this chapter. As an associate office, EWS-WWF also reports to WWF International and operates in accordance with WWF's principles and guidelines.

EWS-WWF is one of few environmental NGO's legally established in the UAE that has a federal mandate. It has also built strong regional partners in order to cultivate the necessary support for effective conservation. This scope, coupled with strong technical capacity, high operational standards, and solid relationships with government bodies, have enabled EWS-WWF to implement high-quality and high-impact programmes and projects.

During the last 14 years, EWS-WWF has experienced successes with regards to the conservation of biodiversity in the region and particularly the UAE. It has also contributed towards global conservation efforts led by WWF. Since 2001, EWS-WWF has implemented a number of projects of various scales thanks to total funding of around USD 22 million, which was raised locally from the private and public sectors. Particularly notable projects include the development of a Protected Area in the Hajar Mountains in Fujairah (an area historically prioritised by the WWF Eco Region framework), the mapping of coral reefs, the undertaking of regional marine turtle research, the coordination of the Ecological Footprint Initiative, and the raising of environmental awareness through educational initiatives and campaigns (such as Heroes of the UAE and Earth Hour). All of these projects have been implemented in partnership with the government and the private sector. During this time, EWS-WWF has

strengthened its role and enhance its reputation as an organisation that develops science-based research to support policy development, builds capacity, raises awareness of key environmental issues, and provides regional stakeholders with a platform to discuss issues critical to policy.

At the end of 2014, EWS-WWF employed 44 full-time staff and six part time staff from 22 countries. The resources acquired and relationships developed over the years have translated into a strong set of organisational capabilities. We seek to build on these capabilities, which will be an important element in the delivery of our strategic vision, and to take the organisation into a chapter of increased impact and high efficiency.



# CHAPTER 2 - CONSERVATION PROGRAMME AND STRATEGIC PLAN

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## 2.1. REASON FOR NEW STRATEGIC PLAN

The Living Planet Report 2014 reported a 50% decline in global biodiversity since 1970, and the Ecological Footprint indicator shows that humanity's consumption of natural resources is increasingly unsustainable (WWF, 2014). Given high consumption patterns of its residents, the UAE has been highlighted as being among the countries with the highest Ecological Footprints per capita (WWF, 2014). It is therefore crucial to reflect on our impact as a conservation organisation and identify the best way to scale up our efforts.

A project portfolio review of the EWS-WWF conservation programme and an assessment of the impact and effectiveness of its implementation was undertaken in Q4, 2014. It concluded that improvements over critical components of the previous strategy (2010-2015) were achievable. This resulted in adopting a systematic method to develop a sound conservation strategy, including the identification of conservation targets, overall impacts, clear strategic outcomes, and measurable goals and objectives that would enable strict performance monitoring and evaluation. The review was an opportunity for us to reflect on our work and consider ways of achieving greater impact in the country and region. Armed with a new Strategic Plan (2015-2020), we will carry out more calculated conservation efforts vis-a-vis other national and regional initiatives, as well as the global efforts led by WWF. Our Strategic Plan lays out clear, desired conservation outcomes coupled with a good monitoring and evaluation framework that will ensure that our projects are well-designed and in line with our overarching mission.

As a local NGO with an international reach, it is crucial for us to maximise our efforts through strategic partnerships and by leveraging the support of other stakeholders if we are to achieve a transformational impact nationally, regionally, and globally.



## 2.2 STRATEGIC GOAL AND OVERVIEW OF STRATEGIES

The UAE has experienced unprecedented economic growth and development and, as a result, its natural resources have experienced enormous pressure. Looking forward, the country has been investing in major infrastructure projects to facilitate its transformation into a hub for trade and tourism and to continue its growth in the future.

EWS-WWF acknowledges that the country will continue to develop rapidly and appreciates the need to ensure economic sustainability. We also recognise that the demand on natural resources and environmental pressures will inevitably increase. Our five-year strategy aims to help make this growth more sustainable. This is in line with UAE Vision 2021, which calls for “sustainable development while preserving the environment.”

**The overall goal of Strategic Plan 2020 is for the UAE government, the private sector, and civil society to make major progress in conserving the UAE’s natural heritage for future generations by increasing effective conservation efforts and acting on climate change.**

EWS-WWF recognises that we cannot achieve this goal by acting on our own. Thus, we will form partnerships with local stakeholders, encourage dialogue on solutions backed by science, and promote transparency and a focus on knowledge sharing.

We will promote an integrated ecosystem-based approach to conservation and responsible planning in order to demonstrate that biodiversity conservation is feasible within an ambitious socio-economic model. We will also highlight the interdependencies between socio-economic well-being and healthy, resilient ecosystems and leverage findings to demonstrate how marine and terrestrial environments can be managed in a sustainable manner. Furthermore, we will collaborate with others to conserve keystone and flagship species, which are synonymous with UAE cultural heritage and, if protected, can also benefit other species and habitats. These efforts will encompass the conservation of both marine and terrestrial biodiversity.

We will aim to make climate change a priority for decision-makers in order to catalyse more ambition and momentum to reduce the country’s GHG emissions. We will do this by flagging the UAE’s vulnerability to the impacts of climate change and detailing the sectors that are most at risk. We will also promote the expansion of energy efficiency on the demand side of those sectors with larger contributions to the country’s GHG emissions: the power and transport sectors. Reducing the emissions of the power sector, which account for 39% of the UAE’s total emissions (MOEW, 2012), will be facilitated by work on energy efficiency standards and through the

development of targeted financial products that encourage consumers to buy more energy-efficient goods and services. To help tackle GHG emissions from the transport sector, which are accountable for 19% of the country's emissions, we will conduct research and support the development of policies to improve the fuel efficiency of light-duty vehicles. We will also catalyse higher levels of ambition for renewable energy in the UAE by conducting research on the potential for renewable energy, implementing a campaign to demystify renewable energy, and supporting the development of a robust policy framework for its implementation.

However, ensuring a sustainable future requires a certain level of investment in the current and next generations. According to UNESCO, Education for Sustainable Development (ESD) allows every human being to acquire the knowledge, skills, attitudes, and values necessary to shape a sustainable future. Armed with this, we must make society conscious of the need to address climate change and conserve biodiversity. Given that the country has benefited from myriad ESD programmes led by different organisations, our aim will be to add unique value to existing initiatives while addressing the main gaps in the sector. Our strategy will consider informal education and outreach for selected target audiences such as households, businesses, government officials, media, Emirati students, and university students in general. Our aim will be to reach out to a larger portion of the population.

The final yet equally critical factor we seek to address is the illegal trade of wildlife, which, according to WWF, is the second-largest direct threat to species survival. Some countries are more susceptible to this trade as a result of their abundant resources, geographic locations, economic standpoint, weak legislative frameworks and enforcement practices, and cultural norms. This 'high-profit, low-risk' crime continues to escalate at an unprecedented rate, threatening wildlife populations as well as communities. While the UAE has started to take a strong stance against this crime, our strategy will support national CITES authorities as well as private sector stakeholders as they implement measures that will position the nation as a global leader in positively impacting the illegal wildlife trade.

To make optimal use of our limited resources and strong expertise, we will focus our conservation solutions on the UAE. However, regional work will continue through partnerships. This has been planned for the marine programme in particular. Other conservation and business development opportunities in the region will be evaluated and pursued if they enhance our overall goal.

# 2020 GOAL

The UAE Government, the private sector and civil society have made major progress on conserving the country's natural heritage for its future generations, by increased effective conservation efforts, acting on climate change and by aligning the country's future development with the targets of the UAE Vision 2021.

Integrating the principles of Sustainable development within environmental limits into key policies, new visions and plans.

## Climate Change & Energy

The UAE takes significant steps towards low Carbon development through increased RE, expanding energy efficiency and addressing climate change risks.

## Biodiversity Conservation

The UAE is home to resilient ecosystems where economic progress is complemented with practical actions to safeguard biodiversity.

## Wildlife Trade

EWS-WWF supports the CITIES authorities and private sector stakeholders to position the country as global leader in its positive impact on IWT

## Environmental Education and Outreach

Increased environmental awareness among targeted audience in the UAE to increase the uptake of sustainable practices and lifestyles

### ENABLERS

Science based conservation

Stakeholder engagement & partnership approach

On-ground work scaled up to policy

Targeted communication & awareness, including capacity building

## 2.3 CONSERVATION GOALS AND TARGETS

### GOALS

**Our conservation goal is to see the UAE government, civil society, and the private sector make major progress on conserving the country's natural heritage through increasingly effective conservation efforts, by acting on climate change and by aligning their future development plans with UAE Vision 2021.**

We are committed to increasing our conservation impact by leveraging the expertise we have acquired in the last 14 years. To enable us to achieve our strategic goal and Theory of Change, the conservation programme includes five strategic programmes, each with its own corresponding vision:

#### **1. Climate Change and Energy Programme:**

By 2020, the UAE will have taken significant steps towards a low carbon development by increasing its ambition for and implementation of renewable energy, expanding energy efficiency, reducing carbon emissions from road transport, and addressing climate change risks.

#### **2. Terrestrial Conservation Programme:**

By 2030, threats to the terrestrial environment will have been abated and the environment will have been preserved through a network of protected areas, and critical areas for biodiversity conservation will have been restored.

#### **3. Marine Conservation Programme:**

By 2020, the UAE's most important marine habitats and species are protected, major threats are addressed, and healthy marine ecosystems are at the heart of planning and development policies.

#### **4. Wildlife Trade Programme:**

EWS-WWF will strengthen its support of the national CITES authorities and selected private sector stakeholders to put measures in place that position the country as a global leader in the fight against the illegal wildlife trade.

#### **5. Environmental Education and Outreach Programme:**

EWS-WWF supports ongoing initiatives on Environmental Education for Sustainable Development by partnering with relevant players in the education sector and by undertaking outreach and promoting awareness through education initiatives (on the importance of addressing climate change and conserving biodiversity).



## TARGETS

The following table summarises the conservation targets that will be our strategy focus (The subsequent chapters describe in detail how these targets will be addressed for each programme.)

Programme	Conservation targets
Marine Conservation Programme	<ul style="list-style-type: none"> <li>• Hawksbill turtle (<i>Eretmochelys imbricata</i>)</li> <li>• Green turtle (<i>Chelonia mydas</i>)</li> <li>• Loggerhead turtle (<i>Dermochelys coriacea</i>)</li> <li>• Humpback whale (<i>Megaptera novaeangliae</i>)</li> <li>• Arabian Sea subpopulation</li> <li>• Coral reefs</li> <li>• Sea grass</li> <li>• Coastal habitats</li> </ul>
Terrestrial Conservation Programme	<ul style="list-style-type: none"> <li>• Arabian tahr (<i>Arabitragus jayakari</i>),</li> <li>• Egyptian vulture (<i>Neophron percnopterus</i>)</li> <li>• Mountain gazelle (<i>Gazella gazella</i>)</li> <li>• Caracal (<i>Caracal caracal</i>)</li> <li>• Blanford's fox (<i>Vulpes cana</i>)</li> <li>• Arabian leopard (<i>Panthera pardus nimr</i>)</li> <li>• Arabian oryx (<i>Oryx leucoryx</i>)</li> <li>• Wetlands</li> <li>• Green Urban Environments</li> <li>• Desert and Xeric Scrublands</li> <li>• Al Hajar Montane Ecoregion</li> <li>• Wadi Hydrology System</li> <li>• Habitat Connectivity</li> </ul>
Climate Change and Energy Programme	<p>To avoid adverse impacts of climate change, such as extreme heat, rainfall pattern shifts, and coastal flooding due to sea level rise, it is in the UAE's best interest to secure an ambitious global deal. Actions to tackle climate change indirectly influence the health of the planetary ecosystem, including species and their habitats. We will strive to ensure that the UAE works towards an international commitment not to exceed a 2°C temperature rise, which would otherwise expose up to 40% of global species to extinction.</p>
Wildlife Trade Programme	<ul style="list-style-type: none"> <li>• Cheetahs (<i>Acinonyx jubatus</i>) – main conservation target</li> <li>• Lions (<i>Panthera leo</i>) – spill over target</li> <li>• Tigers (<i>Panthera tigris</i>) – spill over target</li> <li>• African Elephant (<i>Loxodonta Africana</i>) – main conservation target</li> <li>• Sharks (<i>Carcharhinidae spp.</i>, <i>Eusphyra spp.</i> &amp; <i>Sphyrna spp.</i>) – secondary conservation target</li> </ul>

## SUMMARY OF CONSERVATION STRATEGIES

Summary of the conservation strategies for each programme (described fully in the following sections):

Programme	Strategies & sub-strategies
<b>Marine Conservation Programme</b>	<ul style="list-style-type: none"><li>• Integrated Marine Planning and Management</li><li>• Conserve Migratory Flagship species</li><li>• Introduce Voluntary Standards</li></ul>
<b>Terrestrial Conservation Programme</b>	<ul style="list-style-type: none"><li>• Central Biodiversity Database</li><li>• Support the development of a Protected Area Network and integrated national policy on protected areas</li><li>• Encourage the establishment and implementation of best practices in protected area management and promote environmental education and sustainable tourism</li></ul>
<b>Climate Change and Energy Programme</b>	<ul style="list-style-type: none"><li>• Strong expansion of energy efficiency</li><li>• Increase ambition and implementation for renewable energy</li><li>• Implementing the UAE Ecological Footprint Initiative”</li><li>• Address climate change risks</li></ul>
<b>Wildlife Trade Programme</b>	<ul style="list-style-type: none"><li>• Address issues concerning customs enforcement</li><li>• Reduce demand for CITES-listed species by supporting awareness campaigns</li><li>• Engage with airlines</li><li>• Research emerging wildlife trade issues</li></ul>

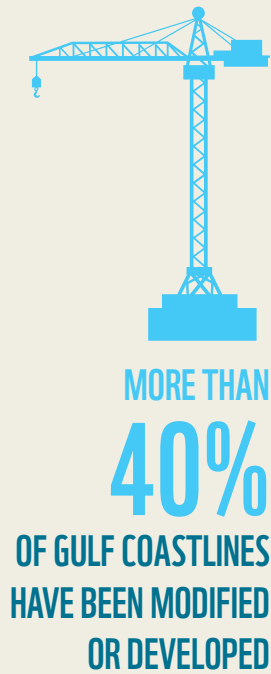
# CHAPTER 3 – MARINE PROGRAMME

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### 3.1 BACKGROUND

The marine environment in the regional waters of the Gulf is unique. The Gulf is home to a diversity of habitats, including coral reefs, mangrove forests, and extensive sea grass meadows. These support many flagship species, including the green turtle (*Chelonia mydas*), the hawksbill turtle (*Eretmochelys imbricata*), the loggerhead turtle (*Dermochelys coriacea*), the Arabian Sea humpback whale (*Megaptera novaeangliae*), the Indo-Pacific humpback dolphin (*Sousa chinensis*), and the world's second-largest population of dugongs (*Dugong dugon*), among other species.



It is particularly impressive that, despite extreme climatic conditions, the region has a high level of biodiversity and harbours excellent examples of ecosystems' responses to natural environmental stresses. Such phenomena were recorded by EWS-WWF's Marine Turtle Conservation Project, which discovered that hawksbills migrated to cooler waters during the summer to avoid the higher sea water temperatures characteristic of the region (EWS-WWF, MRF, *et al.* 2015; Pilcher *et al.*, 2014).

Moreover, echoing occurrences in other parts of the world, the Gulf waters are under increasing pressure from human activities due to the rapid rate of urbanisation and development considered critical for the UAE's and the region's economic prosperity. Threats to the marine environment are mostly driven by the continuous and unsustainable growth of a number of economic sectors, including energy, water desalination, shipping, tourism, construction, and fishing. These factors, combined with the non-integration of marine biodiversity conservation needs into maritime use planning and decision-making, exacerbate the impacts of the threats on the complex and highly interconnected nature of the marine ecosystem.

The Marine Programme will be based on a strong track-record in marine research in order to strategically expand our conservation portfolio and respond to the increasing needs of regional marine conservation through scientifically sound, robust, partnership-based solutions. We will work to demonstrate that economic progress can be complemented by practical conservation actions and to highlight the pivotal link between socio-economic well-being and healthy marine ecosystems.

***“Protecting specific habitats is fundamental, but should be coupled with strategic and responsible development outside of their boundaries as well”.***

**Our Marine Programme proposes integrated solutions with a holistic approach that entails:**

- **Safeguarding high conservation value (HCV) habitats and species** through an ecosystem-based approach to marine conservation,
- **Promoting an integrated approach** that combines place-based protection to sustain ecosystem functioning with responsible development guidelines outside strict protection boundaries,
- **Addressing major threats** to marine habitats and species by promoting responsible practices,
- **Facilitating regional collaboration to conserve flagship** species through robust scientific information, data-sharing and stakeholder dialogue.



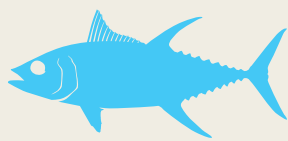
## 3.2 SCOPE AND VISION

### GEOGRAPHIC AND THEMATIC SCOPE

Given the presence and influence of EWS-WWF in the UAE and its unique position, our Marine Programme will focus on driving policy action for marine conservation in the UAE. At the same time, to effectively address challenges within complex marine ecosystems, our conservation work will extend beyond national boundaries. As the only WWF office in the region, we are ideally positioned to drive regional conservation on matters related to WWF's global priorities. However, we also recognise that, to protect WWF priority migratory species such as hawksbill turtles, green turtles, and Arabian humpback whales, the geographic scope for flagship species protection must be regional. The programme's scope will cover the Gulf, the Gulf of Oman, the Western Arabian Sea (an important marine eco-region recognised by WWF), and their coastlines (see Figure 1). We recognise that, for these regional initiatives to be successful, there is a need to liaise with other organisations in the wider region around the Arabian Sea to conserve the migratory species of our programme's focus (e.g. WWF Pakistan).

The programme will use on-the-ground conservation that is rooted in science and strong stakeholder engagement to advance policy change based on those sound scientific findings and feasible solutions.





**53%**  
OF THE WORLD'S  
FISHERIES ARE FULLY  
EXPLOITED

## FIGURE 1. GEOGRAPHIC SCOPE

The Gulf is a shallow marginal sea of the Indian Ocean between the Arabian Peninsula and southwestern Iran. The sea has an area of about 241,000 square km. Its length is some 990 km, and its width varies from a maximum of about 340 km to a minimum of 55 km in the Strait of Hormuz. It is bordered by Iran to the north, northeast, and east; by Oman and the UAE to the south and southeast; and by Qatar, Bahrain, and Saudi Arabia to the southwest and west. It is also bordered by Kuwait and Iraq in the northwest.

The Gulf of Oman is the northwest arm of the Arabian Sea, between Oman, to the southwest and Iran to the north. The Gulf of Oman is 320 km wide between Ras Al Hadd in Oman and Gwadar Bay on the Pakistan–Iran border. It is 560 km long and connects with the Gulf through the Strait of Hormuz. The Western Arabian Sea, as defined in this scope, constitutes the exclusive economic zone (EEZ) of the Sultanate of Oman.

\*Due to the interconnected and complex nature of the marine environment, EWS-WWF will, where relevant, work with organisations on initiatives beyond the stated geographic scope. An example of this is the CBD Ecologically and Biologically Significant Marine Areas (EBSAs) workshop in the Northwest Indian Ocean and work on the Arabian Sea humpback whale as its range occurs across a number of countries.

## PROGRAMME VISION

### **The Marine Programme Vision:**

By 2020, the UAE's most important marine habitats and species are protected, major threats are addressed, and healthy marine ecosystems are at the heart of planning and development policies.

## 3.3 CONSERVATION TARGETS AND GOALS

### CONSERVATION TARGETS

Targets have been selected to represent key marine biodiversity features of the UAE and the region, and to inform the strategic planning process. In order to go into further detail, EWS-WWF will undertake a study to identify Key Ecological Attributes (KEA) for each target. This will allow us to define the long-term viability of the targets, as well as their desired condition.

CONSERVATION TARGET	JUSTIFICATION
<b>MARINE SPECIES</b>	
<p><b>Hawksbill Turtle</b> (<i>Eretmochelys imbricata</i>)</p>	<p><b>Global IUCN* Red List Status: Critically Endangered</b></p> <p><b>WWF Global Priority Species</b> (McLellan et al, 2012).</p> <p><b>Occurrence in the region:</b> Their range includes much of the Gulf of Oman’s and the Gulf’s coastal waters, and they are known to nest on the beaches of a number of countries in the region (Ross &amp; Barwani, 1982; Al-Mohanna &amp; Meakins, 2000). In the UAE, hawksbills have been recorded nesting on a majority of Abu Dhabi’s islands (EAD &amp; AGEDI, 2009; Pilcher <i>et al.</i>, 2014) as well as Sir Bu Nair, Sharjah (Al Suweidi, 2012; Pilcher <i>et al.</i>, 2014).</p> <p><b>Wider conservation impact:</b> The protection of the species will typically benefit sandy shores, coral communities, and species, such as reef fish, that are reliant on corals.</p>
<p><b>Green Turtle</b> (<i>Chelonia mydas</i>)</p>	<p><b>Global IUCN Red List Status: Endangered</b></p> <p><b>WWF Global Priority Species</b> (McLellan, Arps &amp; Donnelly, 2012)</p> <p><b>Occurrence in the region:</b> Green turtles are the most abundant turtle species regionally. They forage throughout the region due to extensive areas of sea grass, and they nest on the beaches of a number of countries within the Gulf and the Gulf of Oman (Ross &amp; Barwani, 1982; Rees <i>et al.</i>, 2013; Mobaraki, 2004). Extensive aerial surveys show that green turtles forage in sea grass meadows within established protected areas of Abu Dhabi.</p> <p><b>Wider conservation impact:</b> The protection of the species will benefit sandy shores, sea grass meadows, and other species, such as dugongs, that depend on sea grass for foraging.</p>
<p><b>Loggerhead Turtle</b> (<i>Dermochelys coriacea</i>)</p>	<p><b>Global IUCN Red List Status: Endangered</b></p> <p><b>WWF Global priority species (McLellan, Arps &amp; Donnelly, 2012)</b></p> <p><b>Occurrence in the region:</b> Loggerheads are not as prevalent in the Gulf as they are in the Gulf of Oman and the Arabian Sea. Studies in the 1980s showed that Masirah Island, Oman, supported the second-largest nesting population in the world, with a minimum of 30,000 females estimated to nest annually (Ross &amp; Barwani, 1982). Recent data (Witherington et al., 2015) on the status of the Oman nesting population has not yet been published, and, therefore, the trends of the actual population size are not well understood.</p> <p><b>Wider conservation impact:</b> The protection of the species will benefit sandy shores, coral communities, and pelagic habitats favoured by this population.</p>
<p><b>Humpback Whale</b> (<i>Megaptera novaeangliae</i>)</p> <p>Arabian Sea subpopulation</p>	<p><b>Global IUCN Status: Endangered</b></p> <p><b>WWF Global priority species</b> (Burgener, Elliot &amp; Leslie, 2012)</p> <p><b>Occurrence in the region:</b> The Arabian Sea humpback whale is recognised as an isolated resident subpopulation of an estimated 82 individual animals, based on surveys along the coast of Oman (Minton <i>et al.</i>, 2008). Its recorded distribution within the region extends to India, Iran, Oman, Pakistan, Sri Lanka, and Yemen. Evidence of the presence of these animals in range areas other than Oman, where they have a confirmed continued presence, is only indicated by limited sightings (Minton <i>et al.</i>, 2008).</p> <p><b>Wider conservation impact:</b> Provides opportunities for the conservation of other species (mostly large baleen whales, but also dolphins), habitats (such as the continental shelf), and ecologically important areas.</p>

\* The International Union for the Conservation of Nature (IUCN) is the world’s main authority on the conservation status of species. The IUCN Red List is the world’s most comprehensive inventory of the global conservation status of biological species.

## MARINE HABITATS

<p><b>Coral Reefs</b></p>	<p><b>Conservation Status:</b> More than 85% of coral reefs in the Gulf are considered threatened (WRI, 2011). Recent assessments indicate that the coral habitats of the Gulf are endangered, with those in the Gulf of Oman as critically endangered (AGEDI, 2014).</p> <p><b>Occurrence in the region:</b> Due to the relatively shallow nature of the Gulf, coral reefs exist in varying abundance along the coastlines of all Gulf countries. Areas with the most abundant coral communities occur in the waters of Abu Dhabi and eastern Qatar, with colonies also occurring along eastern UAE and Oman. Corals in this region are unique since they are able to tolerate high water temperatures and salinity levels. Prominent species include <i>Acropora</i>, <i>Porites</i>, <i>Platygyra</i>, and many other smaller favids.</p> <p><b>Wider conservation impact:</b> Coral reefs are among the most biologically rich and productive ecosystems. They provide a critical habitat for numerous invertebrates and commercially important fish species such as the orange-spotted grouper (<i>Epinephelus coioides</i>), spangled emperor (<i>Lethrinus nebulosus</i>), and Painted sweetlips (<i>Diagramma pictum</i>). The protection of coral reefs will ultimately benefit reef fish, sharks, turtles, algae, and sponges associated with this type of habitat.</p>
<p><b>Sea grass</b></p>	<p><b>Conservation Status:</b> Recent regional biodiversity assessments have indicated that the sea grass habitats of the Gulf are endangered (AGEDI, 2014).</p> <p><b>Occurrence in the region:</b> Three sea grass species are found here: <i>Halodule uninervis</i>, <i>Halophila ovalis</i> and <i>Halophila stipulacea</i>, with the vastest distribution occurring along the Gulf's western coast in Saudi Arabia (Price, 1990; Kenworthy <i>et al.</i>, 1993), Bahrain, Qatar, and the UAE (Phillips, 2003).</p> <p><b>Wider conservation impact:</b> Sea grasses provide fish nursery areas and important foraging habitats for dugongs and green turtles. They are also vitally important for ecological functioning and continual productivity (Phillips <i>et al.</i>, 2004). So the protection of sea grass habitats will benefit green turtles, dugongs, crustaceans, and fish species.</p>
<p><b>Coastal habitats</b> This category consists of habitats that occur in the intertidal zone: mangroves, sandy shores, beaches, sabkhas (saline mudflats), and rocky shores.</p>	<p><b>Conservation Status:</b> Recent regional biodiversity assessments indicate that different types of Gulf coastal habitats are classified as either endangered or vulnerable (AGEDI, 2014).</p> <p><b>Occurrence in the region:</b> Sandy shores occur throughout the region while rocky shores are primarily prevalent in Oman and Iran, particularly on the Arabian Sea coast.</p> <p>In the UAE, mangroves are mostly found within the waters of Abu Dhabi. However, small mangrove stands can be seen in Dubai and Sharjah and larger stands in parts of Umm Al Quwain and Ras Al Khaimah (AGEDI, 2013; Spalding <i>et al.</i>, 2010). Only one mangrove species occurs naturally in the Gulf—<i>Avicennia marina</i>, of which there are only a few natural stands. Most stands of mangrove were planted by hand after the previous removal of existing areas.</p> <p><b>Wider conservation impact:</b> Sandy and rocky shores are vital for crustaceans, polychaetes, algae, gastropods, and nesting marine turtles. Mangroves are important for migrating waterfowl, serve as nursery areas for juvenile fish, and stabilise the shoreline (EAD &amp; AGEDI, 2009).</p>
MARINE CONSERVATION TARGETS (NOT ADDRESSED DIRECTLY BY THE MARINE PROGRAMME)	
<p><b>Sharks</b> (<i>Carcharhinidae</i> spp., <i>Eusphyrina</i> spp., &amp; <i>Sphyrna</i> spp.)</p>	<p><b>Conservation Status:</b> The CITES Appendix II<sup>5*</sup> outlines the regional occurrence of the whale shark (<i>Rhincodon typus</i>) three species of hammerhead sharks; scalloped (<i>Sphyrna lewini</i>), smooth (<i>Sphyrna zygaena</i>), and great (<i>Sphyrna mokarran</i>), and the Oceanic whitetip shark (<i>Carcharhinus longimanus</i>).</p> <p><b>Occurrence in the region:</b> A number of reef and pelagic shark species are found in the UAE (Jabado, 2012). In addition to those listed above, the blacktip reef shark (<i>Carcharhinus melanopterus</i>), grey reef shark (<i>C. amblyrhynchos</i>) and whitecheek shark (<i>C. dussumieri</i>) have been observed in coral reefs across the region. One of the largest congregations of whale sharks has been observed in Qatar (Robinson <i>et al.</i>, 2013).</p> <p><b>Wider conservation impact:</b> Sharks are top-level predators and play a role in maintaining the natural balance of marine ecosystems.</p>

\* CITES places certain controls on the international trade in specimens of selected species. The species covered by CITES are listed in three appendices according to the degree of protection they need. Appendix II includes species not necessarily threatened with extinction but for which trade must be controlled in order to avoid utilisation incompatible with their survival.

**NOTE:** The UAE is considered an important trade hub for exporting shark products to Asian markets, particularly China via Hong Kong. Given that the UAE Government has recently enacted new legislation to regulate the shark trade and a number of other organisations are already involved in improving and implementing such laws (for instance, IFAW), the Marine Programme has not identified sharks as a priority target. However, we will continue to monitor the status of the shark trade and to address key gaps under a separate set of strategic interventions dealing with the wildlife trade and CITES implementation overall. Likewise, the Wildlife Trade Programme (WTP) will carry out research to further identify potential interventions for EWS-WWF in the context of the illegal trade of shark fins. Our Marine Programme team will provide technical support for these efforts and offer necessary links with in situ marine conservation activities in the UAE and the region.

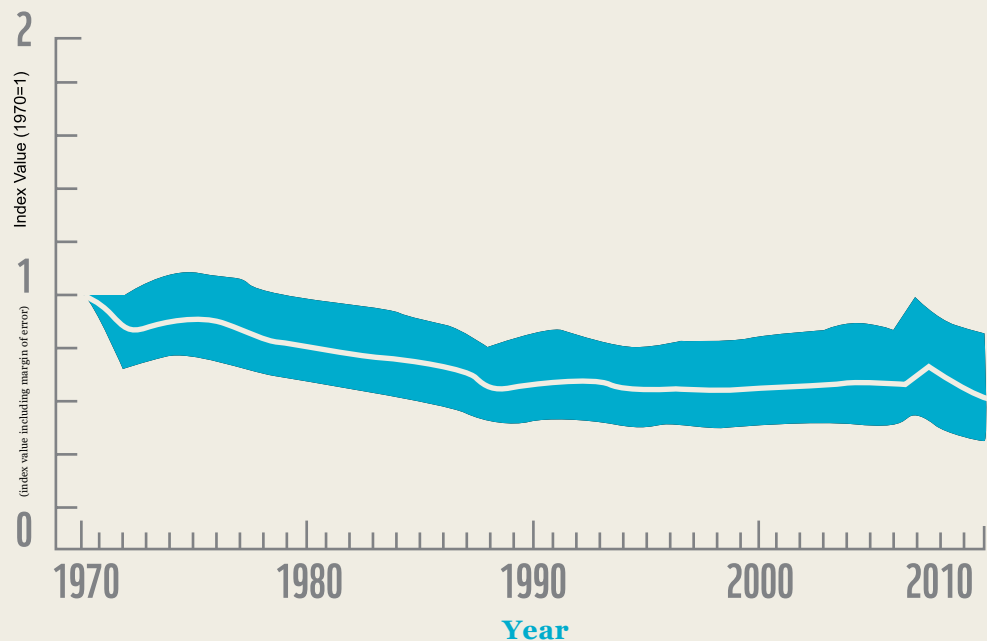
### 3.4 SITUATION ANALYSIS

#### BACKGROUND OF THREATS

The marine environment is facing myriad threats and is in decline globally. The Marine Living Planet Index (see Figure 2), which tracks changes in 3,132 populations of 910 species (of fish, seabirds, marine turtles, and marine mammals) in temperate and tropical marine ecosystems, indicates a 39% decline between 1970 and 2010 (WWF, 2014).

This is a stark visualisation of the declining health of our oceans. Although these figures represent the global situation, the Gulf and the Arabian Sea are not immune. In a region that already faces natural extremes in weather, there are now mounting pressures from threats that cause habitat modification, destruction, and fragmentation; the disturbance or mortality of individual animals; and poor water quality.

**Figure 2. Marine Living Planet Index showing a decline in the number of species from 1970 to 2010**





## CLIMATE CHANGE

The Gulf is characterised by extreme environmental conditions such as high sea surface temperatures ranging from 15°C in the winter to 36°C in the summer. Soaring temperatures, combined with limited precipitation and fresh water flow, mean that the Gulf also experiences high evaporation. This leads to high salinity. Salinity levels range from 37-41 psu (practical salinity units), above the global average of 35 psu (Reynolds, 1993). Given that marine species inhabiting the area already function at the maximum limits of their environmental tolerance, any changes in climatic conditions could impact them severely. For example, only a small anomalous increase of 1-2°C in sea surface temperature for prolonged periods can trigger coral bleaching, as witnessed in the region in 1996, 1998, 2002, and 2010 (EAD, 2009; Riegl, 2002; Burt *et al.*, 2008; Riegl *et al.*, 2012). It is estimated that the bleaching events in 1996 and 1998 affected approximately 98% of *Acropora* spp. (Riegl, 2002).

Changes in sea surface temperature can also alter growth rates of sea grass and cause marine life to migrate to locations with more ideal temperatures, impacting their behaviour, metabolism, and life cycles (WWF, 2013). However, for certain species with distinct home ranges (for instance, cetaceans) the ability to move to alternative habitats may be restricted (Sheppard *et al.*, 2010).

Our Marine Turtle Conservation Project discovered that the short-term migration of foraging hawksbill turtles in the Gulf is linked to climatic changes. This novel finding marked the first step towards understanding behavioural changes of sea turtles related to temporary water temperature shifts. It is expected to have significant implications for studies into the effects of climate change on turtle populations in other parts of the world (Pilcher *et al.* 2014). Marine turtles also rely on the temperature of the sand, in which the eggs incubate, to determine the gender of the hatchlings. Thus, rising temperatures can skew gender distribution, favouring more females than males and creating a significant threat to genetic diversity.

Rising sea water temperatures might also affect commercial fisheries. The availability of commercially important fish species, such as kingfish (*Scomberomorus commerson*), is likely to be affected as they are usually more abundant at cooler water temperatures (EAD, 2009). Finally, rising sea levels can submerge coastal habitats and indirectly affect species that rely on these habitats (EAD, 2009).

## URBAN AND INFRASTRUCTURE DEVELOPMENT

Over the past few decades, rampant coastal development for residential, tourism, industrial and commercial purposes has put significant pressure on the coastal and marine environment. The impact of population growth and its associated development are particularly prevalent in smaller Gulf countries such as the UAE, where residents live entirely or almost entirely within 100 km of the coast (Van Lavieren *et al.*, 2011). It is estimated that more than 40% of the coastline in the Gulf region has been modified or developed (Hamza & Munawar, 2009). The extent of coastal modification and the demand for seafront residential property and infrastructure

are set to increase as urban populations along the Gulf's shores continue to grow; forcing multiple impacts on the environment (UN, 2013; Khan, 2007; Sheppard *et al.*, 2010).

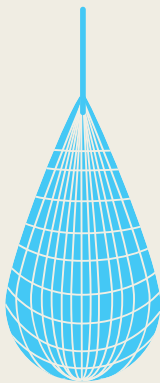
Dredging and the construction of man-made islands, marinas, waterfront properties, and associated infrastructure can result in the direct loss and degradation of shallow, productive marine habitats such as coral reefs, mangroves, sea grass meadows, and inter-tidal areas (Van Lavieren *et al.*, 2011). Dredging activities can increase water turbidity and alter water movement, which are often detrimental to the health of fragile habitats such as sea grasses (Erftemeijer and Lewis, 2006).

## UNSUSTAINABLE FISHING PRACTICES

Due to rapid population growth and the rising demand for seafood, fishing efforts have increased at a global level, resulting in the dramatic reduction of fish stocks. It is estimated that 53% of the world's fisheries are fully exploited and 32% are over-exploited, depleted, or recovering from depletion (FAO, 2010). The extent of this depletion for fishery resources can also be witnessed locally where surveys of the UAE's demersal and small pelagic fish resources have shown major declines. Annual stock assessments by EAD between 2002 and 2012 revealed that approximately 73% of demersal and 89% of pelagic resources in Abu Dhabi were categorised as over-exploited, while only 17% and 1%, respectively, were exploited sustainably.

Fisheries in the Gulf and the Gulf of Oman are small-scale and artisanal in nature with fishermen using multiple types of equipment (RECOFI, 2010). Unfortunately, fishing gear has been associated with many impacts on the marine ecosystem. Incidental capture is considered one of the most serious threats to marine turtles globally with 85,000 turtles incidentally captured from 1990 to 2008. However, this figure is likely to be underestimated by at least two orders of magnitude (Wallace *et al.*, 2010). Gill nets are widely used in the region and are associated with the entanglement of hatchlings leaving beaches (Pilcher, 1999) and turtles in water. They have been identified globally as being of primary concern for green and hawksbill turtles, and longlines have been similarly identified for loggerheads (Wallace *et al.* 2011).

Dugongs, too, are known to be incidentally captured in gill nets (Baldwin & Cockcroft, 1997; Marsh, 2008; Jaaman, Lah-Anyi & Pierce, 2009; Moore *et al.*, 2010), with recent studies by EAD indicating that the main cause (72.5%) of dugong mortality between 2000 and 2014 was drowning in abandoned, lost, and/or illegal fishing nets (EAD, 2015). Entanglement in fishing gear also presents a significant threat to Arabian Sea humpback whales, with scarring observed in as much as 30-40% of the population (Minton *et al.*, 2011). Discarded fishing gear, lost traps, and the resultant ghost fishing are considered a major issue in the Gulf, with an estimated 260,000 traps lost or abandoned per year in the waters of the UAE alone (Macfadyen *et al.*, 2009).



**“GHOST FISHING”  
AS A RESULT OF  
DISCARDED FISHING  
EQUIPMENT A MAJOR  
ISSUE IN THE GULF**

## ILLEGAL HARVESTING

Growing demand in Asia is driving the shark fin trade globally, with the UAE ranking as an important trade hub. Of the 87 countries around the world that export shark fins to Hong Kong, the UAE is the fifth-largest exporter (Mundy-Taylor & Crook, 2013; FAO Fishstat, 2012). From 2000-2011, the UAE's records showed that 24,873 tonnes of whole shark were captured (FAO Fishstat, 2012). Over that same period, according to FAO data, the country exported (as exports and not as re-exports) 5,789 tonnes of shark fins, which were worth \$171,961. Although the supply chain within the UAE and the region is not well recorded, according to recent studies, it appears that shark products are brought into the country from Oman, Iran, and Yemen; a small targeted shark fishery exists in the UAE, with some species such as hammerheads and guitar fishes being sought after for their fins (Jabado *et al.*, 2014).

## TOURISM RECREATION ACTIVITIES

The tourism sector has grown exponentially over the past decade, and countries in the region are increasingly investing in the industry as part of their economic development plans (Gladstone *et al.*, 2013). The region's coastal and marine landscapes provide many opportunities for tourism and recreation. Tourist arrivals in the Gulf have been growing steadily since 1995 and reached a peak of 22.9 million in 2010 (Gladstone *et al.*, 2013). According to Dubai's Tourism Vision 2020 plan, the UAE aims to welcome 20 million visitors annually by that year (DTCM, 2013), and with Dubai hosting Expo 2020, the sector is expected to boom considerably.

Increasing numbers of hotels located along the UAE coastline overlap with or are in close proximity to important and fragile coastal habitats. Since tourists and UAE residents are increasingly using the sea for recreation through activities such as boating, diving, and fishing, significant pressures on the coastal and marine environment are taking shape (Gladstone *et al.*, 2013; EAD & AGEDI, 2009).

## INDUSTRIAL DEVELOPMENT, WATER DESALINATION & SHIPPING

Historically, economic development has mostly been connected to the growth of the energy sector since the Gulf is home to the largest oil reserve in the world. Offshore platforms and industrial facilities, including oil and gas treatment facilities, petrochemical production units, and power and desalination plants, often overlap with critical coastal and marine habitats. If not managed properly, this may ultimately result in their degradation (EAD and AGEDI, 2009).

As 60% of the world's oil shipping occurs via the Strait of Hormuz, and given that about 2,195,000 barrels of crude oil and 509,000 barrels of refined oil are transported daily from the UAE (Sheppard *et al.*, 2010), the country is inevitably contributing towards intense levels of marine traffic for its international trade. Important environmental concerns regarding shipping traffic include accidental collision with cetaceans, turtles, and dugongs resulting in increased mortality and the potential introduction of invasive species via ballast water (EAD & AGEDI, 2009; Hamza & Munawar, 2009).

Accessibility to fresh water is also an issue due to high aridity and low precipitation in the region, which sees much of its freshwater being obtained from desalination. As much as 60% of the world's desalination capacity is located in the Gulf, with the UAE accounting for 26% (Lattemann & Hopner, 2008). Desalination plants use intake structures to draw water into them from the sea. Unfortunately, the known threats posed by this process are impingement or entrainment, by which marine organisms, such as fish and turtles, get caught up in the intake screens or smaller marine organisms get drawn into the plants with the source water (Lattemann & Hopner, 2008).

## POLLUTION

There are many sources of pollution in the region's marine environment. Acoustic pollution, caused by seismic surveys and noise from ships, affects marine life, particularly cetaceans as they use sound to communicate with each other (Wright, 2014). Noise and light pollution along the coast can also negatively affect female turtle behaviour and hatchling survival rates.

Spills associated with oil and industrial facilities, shipping, and shipping terminals and ports, cause the accumulation of toxic substances in benthic species and can contaminate human food chains (Naser, 2014). Chronic oil pollution can impede coral growth and reproduction and also increase the mortality of sea grasses (Rezai *et al.*, 2004; Krupp & Abuzinada, 2008; EAD & AGEDI, 2009), consequently affecting reef organisms and fish stocks.

Meanwhile, wastewater from domestic and commercial sources, as well as effluent containing a variety of chemicals from industrial activities, is often discharged into the marine environment (Sale *et al.*, 2010). Recurring algal bloom events had a severe impact in the Gulf from August 2008 to May 2009, resulting in increased fish mortality, damage to coral reefs, effects on tourism and water desalination operations, and restrictions on fishing activity (EAD & AGEDI, 2009). Brine discharges, the undesired by-product of desalination, impact the thermal and chemical properties of the surrounding waters and affect benthic ecosystems and reefs (Lattemann & Hopner, 2008). Sadly, this problem is further exacerbated by shallow depths and slow sea water flushing (which lasts three to five years in the Gulf), causing pollutants to persist in the marine environment for a long time (Naser, 2014).

## INDIRECT THREATS AND DRIVERS

There are also a number of indirect threats and drivers that impact the marine environment, namely;

**Lack of understanding and appreciation of the value of biodiversity and ecosystems:** There is a lack of understanding of the pivotal link between socio-economic well-being and healthy marine ecosystems and the interdependencies of the maritime sector and a healthy environment (for its operations).

**Lack of understanding of the conservation status of biodiversity and ecosystems:** In the region, research capacity is somewhat limited with often fragmented environmental research efforts or limited information sharing and published reports. This can pose a considerable challenge to science-based decision-making.

**Limited political support:** Without strong backing from political fronts, sustainable marine resources are overlooked in favour of short-term economic growth. Marine conservation requires strong political buy-in and a wider understanding of the links between healthy ecosystems and human well-being.

**Limited and fragmented protection:** The regional marine environment is experiencing increasing pressure despite the existence of a number of established Marine Protected Areas (MPAs). Insufficient protection leads to the loss of habitats, the biodiversity they support, and the ecosystem services they provide.

**Limited enforcement:** Even in instances where adequate legislation is in place, low levels of stakeholder engagement and a lack of resources to enforce legislation often lead to unregulated activities being practiced.

**Low environmental awareness:** A myriad of people rely upon and impact the marine environment. They include decision-makers, tourists, consumers of marine products, and maritime industry stakeholders. The lack of environmental awareness of the need for marine conservation among these users can restrict the adoption of responsible practices and development measures.

### 3.5 OUR UNIQUE ADDED VALUE AND ROLE

We have been involved in marine conservation in the Gulf since 2008 through a number of initiatives. They include preparing the first map of shallow coral reef habitats in the southeastern Gulf in coordination with EAD and the Ministry of Environment in Qatar (2008) and carrying out a sustainable seafood consumer awareness campaign, Choose Wisely, in 2010. Perhaps one of the most memorable and notable initiatives was the Marine Turtle Conservation Project, which, as the largest scale initiative of its kind in the region, sought to better understand marine turtle behaviour and conservation needs in the Gulf. The initiative embodied our approach to informing conservation action through collaborative, science-based solutions, transparency, and knowledge-sharing. Thus, it not only served as the launch pad for expanding our marine conservation efforts, but also established EWS-WWF as a key facilitator of robust marine conservation efforts in the region.

**Neutral Regional Convenor:** From an initiator of turtle conservation at a regional scale, EWS-WWF has come to be seen as a leading expert organisation on turtles. EWS-WWF will continue to focus on aligning flagship species conservation and facilitating regional dialogue to translate conservation science into sound policy action. As the only WWF representative in the Gulf region, EWS is ideally positioned to provide WWF with a unique access point to drive marine conservation.



## 3.6 STRATEGIES

### OVERALL THEORY OF CHANGE FOR PROGRAMME

Building on our previous work, we aim to strategically broaden our conservation portfolio and respond to the increasing marine conservation needs in the region.

Safeguarding habitats and species of high conservation value is critical for the future prosperity of the marine environment, but to achieve this, a combination of interventions is required. Place-based protection to sustain ecosystem functioning is fundamental, but it should be coupled with strategic and responsible development outside protection boundaries. By working with key stakeholders, we can inspire a positive shift in marine conservation through the integrated approach of ecosystem protection coupled with responsible planning and management.

We appreciate the need to ensure economic sustainability. So, in line with this, we will promote the ecosystem-based approach to show how marine conservation is feasible within an ambitious socio-economic model. At the same time, we will highlight the interdependences between socio-economic well-being and healthy, resilient marine ecosystems to leverage increased political, industrial, and community support for an aspiring UAE agenda to conserve and manage its marine environment in a sustainable manner.

To address challenges within complex marine ecosystems, conservation efforts should be extended beyond national boundaries. To achieve this, we will strengthen our current role in addressing specific conservation needs for flagship species and nurture ongoing regional dialogue on such species to close information gaps and, consequently, significantly enhance the development of long-term conservation strategies. Robust scientific information will inspire collaboration and benefit wider regional marine conservation agendas.

**“By 2020, representative marine habitats and species of the UAE will be conserved in order to maintain ecosystem functioning and resilience .”\***

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\*Indicators: % of representative habitat coverage under protection, critical habitats for marine turtles under protection, % of policies and plans in place integrating key habitats/species, habitat fragmentation index

# MARINE PROGRAMME KEY STRATEGIES

## STRATEGY 1

### INTEGRATED MARINE PLANNING AND MANAGEMENT

Promote the adoption of integrated marine planning and management to ensure that a holistic and ecosystem-based approach is taken to preserve ecosystem functioning (UAE scope).

### THEORY OF CHANGE

In a rapidly growing economy where an increasing number of economic activities take place within the marine realm, an integrated approach will aid in an effective response to the plethora of challenges that marine biodiversity currently face. EWS-WWF will work with key stakeholders in the UAE to promote the marine conservation agenda, taking into consideration the ecosystem-based approach. Such an approach will consider ecosystem and biodiversity requirements without disregarding the socio-economic and human well-being needs: ‘The more resilient and functional the marine and coastal ecosystems, the stronger will be its capacity to support human well-being in the long-term ’

### KEY SUB-STRATEGIES

- **Sub-Strategy 1.1 - Ecosystem Connectivity and Functionality**

Promote the importance of ecosystem connectivity as a fundamental component of marine conservation and maritime use planning.

- **Sub-Strategy 1.2 - UAE MPA Network Vision 2020**

Promote the design and management of an ecologically coherent MPA network as a key strategy for marine biodiversity conservation and ecosystem functioning.

- **Sub-Strategy 1.3 - Biodiversity Inclusive Planning & Development**

Promote best practices and streamline biodiversity conservation into integrated maritime planning and management to protect high conservation value areas beyond protected area boundaries.

- **Sub-Strategy 1.4 - Communication Campaign and High-Level Engagement**

Raise awareness of the socio-economic links and benefits of a healthy marine environment to leverage political and financial support towards the long-term marine conservation agenda.

## DESCRIPTIONS OF SUB-STRATEGIES

The first critical step towards an ecosystem-based approach is to promote the importance of ecosystem connectivity as a key component that should be integrated into marine conservation and maritime use planning. Maintaining ecological connectivity among habitat and species populations is a concept that is recognised among conservationists globally (Almany et al., 2009). It gains particular importance in a complex marine environment that is facing increasing challenges. Our aim is to produce a comprehensive report to assess current fragmentation threats, highlight ecological connectivity needs, and propose a set of principles to help integrate the concept of connectivity into a guiding framework for planning strategies and relevant policies.

Such a conservation and management agenda will be fundamentally grounded in the implementation of a coherent network of MPAs in the UAE to support the resilience of critical habitats and flagship species. A number of protected areas have already been established. However, despite progress, the marine environment is still under threat. Working towards establishing and effectively managing a network of MPAs is a vital conservation strategy that enhances ecosystem processes by: i) addressing multiple threats that affect marine and coastal ecosystems; ii) promoting the resilience of ecosystems, including responses to potential climate change effects; and iii) safeguarding a number of critical habitats and species.

EWS-WWF aspires to drive the development of the UAE's MPA Network Vision 2020 to facilitate the implementation of the National Biodiversity Action Plan (NBSAP) that the UAE government recently adopted. Ultimately, the MPA Vision will help the country achieve its international commitment to conserve at least 10% of coastal and marine areas through an effective and ecologically representative network of protected areas as specified in the Strategic Plan for Biodiversity 2011-2020 and under the Aichi Target\* (Convention of Biological Diversity, 2011).

In preparation of the UAE MPA Network Vision, EWS-WWF aims to support the UAE government and engage closely with important organisations to promote marine protection. In addition, we aim to facilitate the implementation of a long-term protected areas network by engaging with current MPA managers and relevant stakeholders to explore further opportunities and challenges, and to pinpoint additional resource and technical capacity needs.

Coupled with our focus on ensuring the protection of select representative marine and coastal habitats, we will guide decision-making towards responsible development so as to mitigate negative impacts outside protected area boundaries and ultimately enable ecosystem functioning and services to future generations. Providing guidelines and highlighting the biological and ecological principles to be considered by decision-makers and planners con-

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\*The UAE has set National Targets for meeting its commitments to the CBD in its NBSAP. Specifically, this initiative is relevant to target 14, which is "By 2021, 14% of coastal and marine areas are conserved through effectively managed ecologically representative protected area systems, and, if necessary areas, important to biodiversity and ecosystem services are connected"

tributes to minimising the environmental cost of future development. Such important guidelines can be integrated into the current maritime planning and development processes (for instance, environmental impact assessments, permitting procedures, risk assessments) and can be also adopted voluntarily by the private sector\*. These guidelines can also explain how development can proceed in a sustainable way across the marine seascape, balancing both economic progress and biodiversity protection. We will initiate work on this by first developing technical guidelines for turtles, then expanding them to encompass other flagship species and the broader marine environment.

Applying a communications plan that targets stakeholders is directed at enhancing understanding of the links between healthy marine ecosystems and human well-being and long-term economic sustainability for the UAE. The communications messaging, which was developed in line with messages used by the WWF Global 'Sustain our Seas' Campaign, will promote the benefits that healthy marine ecosystems can provide to other economic sectors, such as fisheries, tourism, and desalination, in potable water provisioning. EWS-WWF will prepare a number of technical documents that will demonstrate the socio-economic benefits of MPAs, exploring links to key economic sectors in the UAE, such as tourism and fisheries. The end goal of this sub-strategy will be to achieve increased buy-in from stakeholders and political influencers, and financial support to help unlock barriers and create solutions for the long-term implementation of the MPA network and wider marine conservation.

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\* This also feeds into meeting the national targets that the UAE has set for meeting its commitments to the CBD in its NBSAP. More specifically, target 2 is "By 2021, biodiversity values have been integrated into decision making and planning processes"

## STRATEGY 1 - INTEGRATED MARINE PLANNING AND MANAGEMENT

Promote the adoption of integrated marine planning and management to ensure ecosystem connectivity and functioning (UAE scope).

### STRATEGY GOAL

By 2020, a long-term approach, integrating marine biodiversity and planning, will underpin the UAE policy framework for marine protection.

SUB-STRATEGIES	OBJECTIVES
<p><b>1.1 Ecosystem Connectivity</b></p> <p>Promote the importance of ecosystem connectivity as an integral component of marine conservation and maritime use planning.</p>	<p>By the end of 2016, we will provide decision-makers with a framework and recommendations on how ecosystem connectivity can be integrated into overall marine planning and management.</p>
<p><b>1.2 UAE MPA Network Vision 2020</b></p> <p>Promote the design and management of an ecologically coherent MPA network as a prime strategy for the conservation of marine biodiversity.</p>	<p>By 2017, a roadmap for the UAE's MPA Network Vision fulfilling the CBD 2020 commitment on marine protection will be developed and supported by key stakeholders.</p> <p>By 2018, the UAE Government will endorse the country's MPA Network Vision (MPA network configuration, management, and capacity needs).</p> <p>By 2020, at least 10% of representative marine and coastal habitats in the UAE will be recognised under a formal protected status.</p> <p>By 2020, key principles for the long term management of the UAE MPA network will be reflected in government policies and initiatives for marine protection.</p>
<p><b>1.3 Integrated Planning &amp; Development</b></p> <p>Streamline biodiversity conservation into maritime planning, management, and development process (e.g. Environmental Impact Assessments).</p>	<p>By 2018, guidelines to integrate marine biodiversity conservation needs into the UAE maritime planning and management process will be developed with selected stakeholders and reflected in policy development processes (Flagship marine species and critical habitats).</p> <p>By 2018, decision-makers within the public and private sector will be provided with Key Principles for Environmental Impact Mitigation and Compensation.</p> <p>By 2020, connectivity and EIA biodiversity technical guidelines will be integrated in key development projects in the UAE.</p>
<p><b>1.4 Communication Campaign and high level political engagement</b></p> <p>Raise awareness on the socio-economic links and benefits of a healthy marine environment to leverage political and financial support towards the long-term marine conservation agenda.</p>	<p>By 2018, increased understanding of the socio-economic benefits of MPAs will be achieved at key national/regional policy fora and targeted sectoral discussions.</p> <p>By 2018, the UAE will be recognised for its environmental stewardship and will achieve increased visibility on marine conservation (in at least two key international meetings).</p> <p>By 2020, increased exposure around the benefits of marine protection will be achieved in national and relevant international scientific and policy discussions.</p>



## Strategy 2- MIGRATORY FLAGSHIP SPECIES

Spearhead collaboration and information sharing to address conservation needs of ecologically and culturally important migratory species in the UAE and the region (Regional Scope).

### THEORY OF CHANGE

Safeguarding of well-known and culturally important species has been done in the past by many conservationists as a successful strategy that not only addresses species-specific conservation needs but also contributes to a wider marine protection agenda.

Flagship species, such as marine turtles and cetaceans, are ambassadors of the marine environment for a variety of reasons. Being long-lived animals, they act as indicators of the status of the marine environment and require long-term strategies that can benefit other animals and habitats. Subsequently, by protecting them we can contribute to greater conservation wins. Working to conserve flagship species will support our efforts to promote an integrated management approach by strengthening the MPAs agenda and by demonstrating ecosystem connectivity scenarios based on their complex lifecycles, distribution, and multiple habitat use (Refer to Strategy 1).

Conserving migratory species requires efforts at various geographical scales, particularly since these animals use multiple habitats and cross borders at different stages of their life cycles. These emblematic and endangered species also constitute an attractive conservation-related topic that can increase political support in the region and ultimately enhance positive change beyond species-driven conservation efforts.

### KEY SUB-STRATEGIES

- **Sub-Strategy 2.1 - UAE Turtle Conservation Initiatives:**

Facilitate the development and implementation of a UAE framework to drive turtle conservation action and address cross-cutting threats on related marine habitats and other flagship species.

- **Sub-Strategy 2.2 - Regional Collaboration for Conservation:**

Facilitate collaboration and information sharing to address information gaps; this is critical for the conservation of migratory flagship species in the region (turtles and Arabian Humpback whales).

- **Sub-Strategy 2.3 - Assessment and Mitigation of Key Threats:**

Promote best practices to mitigate impacts of the entanglement of marine turtles and whales in fishing gear.

## DESCRIPTION OF SUB-STRATEGIES

We aspire to strengthen our marine turtle research and conservation portfolio by working to close information gaps on green turtle populations in the region\* in matters such as population connectivity and to assess known distribution against current protected areas. This approach will help form a robust regional baseline upon which strategies can be hinged to address species population priorities rather than solely focusing on fragmented national actions that do not always benefit migratory species.

By leading such a ground-breaking regional research project, we will strengthen our current role, nurture existing relationships, and contribute towards increased regional dialogue and technical capacity to address conservation priorities for marine turtles overall. This strategy will also help to unlock political barriers, facilitate information sharing, and achieve international recognition and exposure to further motivate positive change.

In parallel with our work towards an improved understanding of distribution, connectivity, and habitat management, EWS-WWF aims to address information gaps around key anthropogenic threats responsible for population declines beyond habitat degradation, for instance, incidental capture by fishing gear. Threats due to fishing activities are vaguely understood in the region, yet there are ever-increasing mortality records of marine megafauna in the UAE and the region. Engaging with stakeholders in the UAE to collaboratively assess the magnitude of this problem will help build the necessary relationships and inform future decisions on how to best minimise the risks of entanglement and incidental capture.

In the UAE, we will work with the programme's stakeholders to streamline priorities for turtle conservation at the federal level through the development of a National Plan of Action and integrate this with wider marine management, responsible planning, and the MPAs agenda. Our work in the UAE aims to demonstrate success stories of effective management in at least one Important Turtle Area (ITA)\*\* in the region. Such a story will highlight opportunities for a positive shift in marine turtle conservation.

Finally, our team will support a regional collaboration initiative for the conservation of the endangered Arabian Sea humpback whale. This initiative will be undertaken in partnership with a number of representative WWF offices in the North West Indian Ocean, such as WWF Pakistan and WWF India, and, therefore, it is expected to help EWS-WWF leverage international technical and financial support from a wide range of organisations.

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\* This also feeds into meeting the national targets the UAE has set for meeting its commitments to the CBD in its NBSAP. More specifically, national target 5 is "By 2021, the status and trends of the main elements of biodiversity are monitored, controlled and linked to the decision making process"

\*\*A term coined in: Pilcher, N.J., Antonopoulou, M., Perry, L., Abdel-Moati, M.A., Al Abdessalaam, T.Z., Albeldawi, M., Al Ansi, M., Al-Mohannadi, S.F., Al Zahlawi, Z., Baldwin, R., Chikhi, A., Das, H.S., Hamza, S., Kerr, O.J., Al Kiyumi, A., Mobaraki, A., Al Suwaidi, H.S., Al Suweidi, A.S., Sawaf, M., Tourenq, C., Williams, J. and Willson, A. 2014. Identification of Important Sea Turtle Areas (ITAs) for hawksbill turtles in the Arabian Region. *Journal of Experimental Marine Biology and Ecology*. 460:89–99.

## STRATEGY 2 - MIGRATORY FLAGSHIP SPECIES

Spearhead collaboration and information sharing to address conservation needs of ecologically and culturally important migratory species in the UAE and the region (Regional Scope).

### STRATEGY GOAL

By 2020, key conservation initiatives will be implemented to safeguard ecologically and culturally important migratory species and critical habitats in the UAE and the region.

SUB-STRATEGIES	OBJECTIVES
<p><b>2.1. UAE Turtle Conservation</b></p> <p>Facilitate the development and implementation of a UAE framework to drive turtle conservation action and address cross-cutting threats.</p>	<p>By 2017, information on hawksbill ITAs will be integrated into key relevant policy processes and key ITAs will be formally recognised for conservation.</p> <p>By 2017, threats from development will be minimised through the design of guidelines that integrate marine turtle conservation needs into the planning and management process (Flagship species and habitats).</p> <p>By 2018, a UAE National Plan of Action for the Conservation of Turtles will be developed to streamline monitoring, research, and conservation priorities in the UAE.</p> <p>By 2019, the benefits of managing at least one critical turtle habitat in the UAE will be demonstrated in partnership with government and tourism stakeholders (Focus: Sir Bu Nair).</p>
<p><b>2.2. Regional Collaboration</b></p> <p><b>Focus: Turtles &amp; Arabian Sea Humpback Whales</b></p> <p>Facilitate regional collaboration and information-sharing to address information gaps critical for the conservation of migratory flagship species in the region</p>	<p>By 2018, the regional sharing of knowledge and information to enable the conservation of key turtle species will increase.</p> <p>By 2020, we will support regional collaboration and close critical information gaps on the ‘endangered’ Arabian Sea humpback and isolated population.</p> <p><i>Note: EWS-WWF will participate in this collaborative effort with WWF International, WWF Pakistan, and WWF India.</i></p>
<p><b>2.3. Assessment and mitigation of key threats</b></p> <p><b>Focus: Entanglement with fishing gear</b></p> <p>Promote best practices to mitigate impacts of key economic activities.</p>	<p>By 2019, we will improve understanding of fisheries’ interactions with marine flagship species.</p> <p>By 2020, impacts on fisheries’ interactions will be understood and efforts to mitigate impacts on megafauna will be initiated in a participatory way.</p>

## STRATEGY 3 - VOLUNTARY STANDARDS

Guide the responsible development and operations of two key industry sectors through the adoption of voluntary standards.

### THEORY OF CHANGE

Engaging with the private sector can offer numerous opportunities to help industry stakeholders become stewards of good practice and sustainably manage the UAE's marine resources, and also leverage increased political and financial support for marine conservation. Building on previous experience engaging with companies to reduce emissions (Heroes Private Sector Programme), our Marine Programme aims to work with two key sectors of the maritime industry to adopt responsible practices.

### KEY SUB-STRATEGIES

- **Sub-Strategy 3.1 - Tourism: Responsible Voluntary Practices**

Work with selected stakeholders to alleviate threats on the marine and coastal environment from tourism development, hotel operations, and recreational activities.

- **Sub-Strategy 3.2 - Water Desalination: Voluntary Standards**

Work with key stakeholders to demonstrate global leadership in adopting responsible practices to address impacts on biodiversity and the marine environment.

### DESCRIPTION OF INTERVENTIONS

Tourism is a growing economic sector in the UAE that also drives coastal development and a wider increase in marine and coastal recreational activities. We will initially engage with key stakeholders from the sector to demonstrate its links to marine ecosystems and biodiversity. With the increased interest and support of the tourism industry, we aim to help develop responsible practices that can be adopted to positively influence tourism development, facility operations, and recreational activities.

By engaging with the water desalination industry, which has been well-established for decades, on issues that impact marine biodiversity, EWS-WWF aims to explore best available techniques and responsible practices for the sector. We envision working with organisations to help them become global leaders of environmental stewardship by adopting responsible practices and standards.

## STRATEGY 3 - VOLUNTARY INDUSTRY STANDARDS

Guide responsible development and operations for two key industry sectors through the adoption of voluntary standards.

### STRATEGY GOAL

By 2020, address cross-cutting environmental threats driven by two key economic sectors (through responsible practices and increased involvement in marine conservation activities)

#### SUB-STRATEGIES

#### OBJECTIVES

##### 3.1. Tourism Responsible Practices

Work with key stakeholders to mitigate threats to the marine and coastal environment through tourism development, hotel operations, and recreational activities.

By 2018, demonstrate the links between the marine environment and key features of the tourism sector (impacts and inter-dependencies).

By 2019, achieve the increased participation and support of key players in the tourism sector for the UAE's MPA Network Vision and overall marine conservation.

By 2019, low-impact principles and responsible operational guidelines for the tourism sector will be developed and reflected in the operation plans of at least one key stakeholder.

##### 3.2. Water Desalination Standards

Work with key stakeholders to demonstrate global leadership in adopting responsible practices to address impacts on biodiversity and the marine environment.

By 2019, demonstrate the links between the marine environment and the desalination sector (impacts and interdependencies).

By 2020, the development of responsible practices to address the impacts of water desalination operations on marine biodiversity will be initiated with at least one key stakeholder/operator.



### 3.7 FINANCIAL REQUIREMENTS

In order to operate such a programme and ensure that the goals it achieves meet the highest best practice standards, EWS-WWF is dependent on long-term and short-term financial backing. The majority of the funding will likely be sourced from the government, businesses, and foundations, as well as the supplemental allocation of unrestricted funding. It is estimated that the Marine Programme will cost 37,840,000 million dirhams over the next five years.



# CHAPTER 4 - TERRESTRIAL PROGRAMME

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## **4.1 INTRODUCTION AND BACKGROUND**

### **BACKGROUND CONTEXT**

In recent years, the UAE has been through very fast-paced development that has led to increased pressures on the environment. While urbanisation and the development of infrastructure have supported the growing population, the quick and unregulated growth has also severely impacted the country's fragile ecosystems. The UAE's natural habitats, including deserts, plains, and mountains, have experienced these increasing pressures as a result of habitat degradation, grazing problems, extensive urbanisation, land reclamation for industry and agriculture, inadequate legislation, and the absence of a coordinated federal system for environmental protection

### **PURPOSE OF THE PROGRAMME**

The protection of terrestrial environments can be achieved through the development of a large-scale, dedicated, robust Protected Areas Network (PAN). EWS-WWF is confident that such a network of protected areas across the country is the most efficient and practical solution for the preservation of terrestrial environments for future generations. This network should be complemented with biological corridors and specific actions for selected endemic and threatened species. EWS-WWF intends to work with institutional partners across the UAE to facilitate dialogue on a common vision for the UAE and to complement the extensive work already done on species conservation and reintroduction by other organisations in the UAE.

## **4.2 SCOPE AND VISION**

### **GEOGRAPHIC AND THEMATIC SCOPE OF PROGRAMME**

EWS-WWF's Terrestrial Strategy for 2015-2020 is limited geographically to the UAE. Focusing specifically on UAE terrain allows us to initiate the development of an effective network of protected areas in the country. This model could be replicated around the region. Its main focus will be to support the creation of national legislation, build up environmental databases, align with international standards, and endeavour to create a model protected area based on best practice

### **PROGRAMME VISION**

The conservation of terrestrial biodiversity can be achieved through a two-track process. Our belief is that a series of protected areas around the country is critical for achieving a harmonious human-nature balance and reducing threats to the terrestrial environment. EWS-WWF will work closely and collaboratively with partners, institutions, and stakeholders to develop such a network. Secondly, to secure the future of the UAE's protected areas and ensure that the protection of the environment is high on the agenda of each emirate, it is our vision to support federal and local authorities to develop legislative frameworks aimed at protecting the terrestrial environment's respective habitats and the dependent wildlife.

## 4.3 CONSERVATION TARGETS AND GOALS

### CONSERVATION TARGETS

EWS-WWF has identified different types of targets for its Terrestrial Strategy, including large-scale ecological systems, endemic and threatened species, ecological processes, and human well-being targets. On the large scale, the ecological system targets were cross referenced with WWF classifications and consisted of:

- Desert and xeric shrublands;
- Al Hajar Al Gharbi montane ecoregion;
- Wetlands; and
- Green urban environments comprising a selection of human-made habitats.

These broad and diverse ecological targets capture all the ecological systems and biodiversity in the UAE. Additionally, two major ecological process targets that deserve specific conservation attention were identified:

- The wadi hydrology system, which comprises all existing freshwater catchment basins in the country, including Wadi Wurayah; and
- The habitat connectivity of areas hosting important biodiversity, allowing for the exchange of individuals, colonisation, and the increase in the resilience of habitats.

It is unusual to identify ecological processes as targets, but their recognition emphasises their importance for conserving the country's biodiversity.

The incorporation of human well-being targets in conservation planning is a new and evolving effort that seeks to address the correlation between socio-economic development and on-the-ground conservation. Identifying the human benefits, as in our Marine Programme, is valuable for any conservation organisation seeking to successfully execute its plans to preserve the environment, therefore, the acceptance, support, and success of the project are included as targets.

**THERE IS AN  
EVOLVING EFFORT  
IN CONSERVATION  
PLANNING TO  
ADDRESS THE  
CORRELATION  
BETWEEN SOCIO-  
ECONOMIC  
DEVELOPMENT AND  
CONSERVATION**

## DESERTS AND XERIC SHRUBLANDS

The desert and xeric shrublands constitute a major habitat type in the UAE that consists of three ecoregions, the Arabian desert and East Sahero-Arabian xeric shrublands, the Arabian Gulf desert and semi-desert, and the Gulf of Oman desert and semi-desert. The latter has been divided into two units: one consisting of the outwash plain along the coasts of UAE and Oman and the other consisting of the inland deserts west of the Hajar Mountains. Animals dependent on this ecosystem are the Arabian oryx (*Oryx leucoryx*), Egyptian spiny-tailed lizard (*Uromastix aegyptia*), and sand gazelle (*Gazella subgutturosa marica*), all listed as Vulnerable, along with the near-threatened sand cat (*Felis margarita*). Rüppell's fox (*Vulpes rueppellii*), the honey badger (*Mellivora capensis*), and the golden eagle (*Aquila chrysaetos*) are of least concern in the IUCN Red List. However, nationally, they are highlighted as endangered - critically endangered and are dependent on healthy, functional, large desert and shrubland habitats. Overgrazing, loss of habitat, and habitat disturbance due to increased development all threaten this target.

## AL HAJAR MONTANE ECOREGION

This ecoregion extends from Oman northwards to the Musandam peninsula. Many of the plant and reptile species found in this region bordering the UAE and Oman are endemic, including the Arabian tahr (*Arabitragus jayakari*) and the Egyptian vulture (*Neophron percnopterus*). The vulnerable mountain gazelle (*Gazella gazella*), Blanford's fox (*Vulpes cana*), and Caracal (*Caracal caracal*) have also made their home here. Furthermore, the montane region includes the historic range of the Arabian leopard (*Panthera pardus nimr*). Overgrazing, mining, and development threaten the species and habitats in this ecoregion.

## WETLANDS

The wetlands in the UAE consist of wadis with permanent or seasonal freshwater pools, palm oases, springs, coastal brackish marshes, intertidal mudflats, and many man-made freshwater bodies (dam lakes, water treatment plants, recreational lakes). Despite impacts from human use, they still provide critical breeding and stopover habitats for birds, as well as a home for rare amphibians and insects. Numerous threatened bird species listed as vulnerable as per the IUCN Red List. They include the great knot (*Calidris tenuirostris*), marbled teal (*Marmaronetta angustirostris*), and greater spotted eagle (*Aquila clanga*) alongside the endangered Arabian tahr (*Arabitragus jayakari*). Several dragonfly species, including the endangered *Urothemis thomasi* and *Arabineura khalidi* and the near threatened *Paragomphus sinaiticus* all use wetland habitats for shelter, food, and water resources (for breeding or wintering, or for refueling during their migration). The threats to wetlands include development, climate change, habitat degradation, habitat loss, and invasive species.



## GREEN URBAN ENVIRONMENTS

With increasing numbers of parks and wetlands being constructed in urban environments, these areas have inadvertently become vital lifelines for many native and migratory species. In an environment where wetlands and vegetative cover are limited and often diminishing, these human-made ecosystems provide valuable compensatory habitats and help ensure the viability of wildlife populations. One example of their relevance and benefit to wildlife is evident in recordings of one of the rarest species in the country, the social lapwing (*Vanellus gregarius*). This critically endangered bird has been noted regularly in fodder fields around Dubai. The threats to green urban environments include poorly managed developments that fail to integrate biodiversity conservation and the control of invasive species in their overall construction plans. An interesting characteristic of this target is that development is both a threat and a source of success for wildlife; the key is to develop with green urban environments in mind.

## WADI HYDROLOGY SYSTEMS

Despite their arid nature for most of the year, wadis provide wonderful spaces for many creatures, including a number of native species as witnessed in Wadi Wurayah. Although wadis are streams or riverbeds that are dry most of the year, they offer shelter, and, during wet seasons such as those originating on the Hajar Mountains, provide water within the wadi system as well as to downstream scrublands. These systems are threatened across the country by mining and land disturbance.

## HABITAT CONNECTIVITY

Protecting pristine habitats is fundamentally important for the survival of many endemic and threatened species, but it is not sufficient to ensure the long-term survival of these species. Connectivity between high-quality habitats is equally important for increasing the resilience of ecological systems to climate change or local threats and for allowing gene flow through the natural exchange of individuals. Resilient sites are defined by their high capacity to adapt to climate change while maintaining biological and genetic diversity, and ecological function. The majority of species which depend on such interconnected areas include large animals such as the Arabian oryx (*Oryx leucoryx*), Arabian tahr (*Arabitragus jayakari*), the mountain gazelle (*Gazella gazella*), and larger carnivores such as the caracal (*Caracal caracal*) and Arabian leopard (*Panthera pardus nimr*), but also numerous arthropods, reptiles, and plants.

## ENDEMIC AND THREATENED SPECIES

Endemic species are those whose range of occurrence is only or primarily in the UAE, while threatened species are those listed as recently locally extinct, critically endangered, endangered, or vulnerable by the IUCN Red List and a listing of threatened mammals in the UAE. Species listed as data deficient also deserve special attention in order to fill information gaps about their population sizes and the pressures they face, and to earmark a listing for their status in the UAE as a minimum. With a more rounded and robust understanding, all groups, endemic, threatened, and data deficient, require continued and elevated conservation efforts to safeguard their future survival. This target is threatened by development, habitat disturbance and degradation, overgrazing by feral goats and camels, climate change, invasive species, hunting and persecution, and illegal trade.

## HUMAN WELL BEING TARGETS

**Secure Livelihood.** Ensuring the future survival of terrestrial habitats and species is a critical element to securing the livelihoods of UAE residents. It is anticipated that, as eco-tourism earns a name for itself, the livelihoods of those living in close proximity to these biodiverse regions will become more secure. The wise management of water resources is a secondary win for this target.

**Recreation and Health.** A nation that respectfully uses and enjoys its natural riches is a happy and healthy one since the increased benefits of protected areas for wildlife can have a knock-on effect on people's physical and mental health.

**Groundwater and Aquifers Benefit to Humans and Nature.** Protected areas will enhance the replenishment of local groundwater and aquifers, providing services to both humans and nature.

**Culture and Spirituality.** Ensuring that archaeological and religious sites are protected in line with any conservation efforts will help enhance local well-being in the form of spiritual and religious enrichment, recreation, and aesthetic experiences.

**Reduced Carbon.** Through the enhanced development of natural vegetation, the presence of protected areas might aid in the sequestration of carbon and contribute to reducing the UAE's carbon footprint.

## 4.4 GOAL

### SUMMARY OF THE PROGRAMME GOALS

The EWS-WWF Terrestrial Strategy will aim to contribute towards the following goals:	
<b>Wetlands</b>	To protect and maintain wetlands of international and national importance while managing artificial wetlands for biodiversity conservation.
<b>Green Urban Environments</b>	To recognise biodiversity enhancement as an integral component in any urban planning for green spaces. To value biodiversity in urban areas and in the green city concept as contributions to human well-being.
<b>Desert and Xeric Shrubland</b>	To protect and manage selected areas to ensure a healthy and functional ecosystem that is aligned closely to its native form and structure. To ensure that such areas are large enough and connected appropriately to maintain viable populations of large predators and herbivorous mammals.
<b>Al Hajar Mountain</b>	To protect and manage selected areas to ensure a healthy and functional ecosystem that consists of a large native structure. The area should comprise connectivity to allow viable populations of large predators and native ungulates to survive and thrive.
<b>Endemic and Threatened Species</b>	To ensure that all endemic and threatened species benefit from protection measures and are not at risk of local extinction.
<b>Wadi Hydrology System</b>	To maintain and restore the hydrological condition in UAE wadis of significant ecological and conservation value.
<b>Habitat Connectivity</b>	To maintain, develop, or re-establish connectivity in ecologically significant areas across habitats on a landscape scale.
<b>Human Well-Being</b>	To increase livelihood security related to ecotourism and proper management of water resources, to seize recreation opportunities, and to improve health through the protection of ecologically significant areas. To improve the conditions of groundwater and aquifers, and the sequestration of carbon.

## 4.5 SITUATION ANALYSIS

### BACKGROUND OF THREATS

Seven Threats Were Identified Across The Seven Ecological And Ecological Process Targets;

### DEVELOPMENT, INCLUDING URBAN, RESIDENTIAL, TOURISM, MINING, AND INDUSTRIAL.

The discovery of oil reserves in the 1970s has largely contributed to the rapid increase of wealth and associated development in the UAE in the past few decades. What is most staggering is that, in 1968, the UAE boasted a neat population of 180,000 inhabitants, yet in 2014, this number has escalated significantly to 9.44 million. This increase can be partly attributed to the booming oil and gas industry that has sprung up in the country since then, combined with a lucrative and desirable lifestyle which attracts many tourists and immigrants. The increase in oil extraction and associated industries has generated more wealth, which has been injected into developing infrastructure, extending urban and residential areas, and diversifying industrial sectors. However, in order to position itself as global leader and compete on the world stage, the country has often developed at the expense of natural habitats and without enough attention to the environment in the land use planning process. Most developments along the shores and coastal habitats pose more threat than any others since many find the idea of coastal living desirable. Meanwhile, rapid inland development is putting pressure on all existing habitats, either by the complete conversion of natural habitats to urban, residential, or industrial areas, or by fragmenting the habitats with a dense network of built areas and linear infrastructure, such as highways, that limit, alter, or impede wildlife movements and the resilience of natural habitats.

### INVASIVE SPECIES

While few studies assessing the impact of invasive species on native UAE wildlife have been conducted, their effects are certainly not negligible. Urban and industrial development have created a multitude of artificial habitats, which have been colonised by exotic species that were voluntarily introduced, that escaped from captivity, or that result from human activities.

Commensal rats (*Rattus sp.*) and mice (*Mus musculus*) can be encountered in every area where humans are established. In freshwater habitats, different fish species have been voluntarily introduced, either for pest control (like the killifish – *Aphanius dispar*) or for recreational fishing (*Tilapia spp.*). Feral domestic cats and feral goats are the most evident invasive species that may negatively impact the UAE's natural habitats and or indigenous species. While all of them may compete with native species, goats negatively impact local vegetation and feral cats may

interbreed with Gordon's wildcat, thus posing threat to the future survival of this species, which is already threatened with extinction.

Among the many bird species introduced to the UAE, either on purpose or by accident, several may pose significant threats to native species, and wild habitats. Their populations should receive specific attention. Some examples of these include the common mynah (*Acridotheres tristis*), the rose-ringed and Alexandrine parakeets (*Psittacula krameri*) and (*P. eupatria*), the Indian crow (*Corvus splendens*). In addition, several alien plant species such as *Prosopis juliflora* and the Sodom's apple milkweed (*Calotropis procera*) have been introduced to the country

## HABITAT DISTURBANCE AND POLLUTION

With the expansion of the country's infrastructure network and continued population growth, very few habitats are exempt from disturbance. Even remote desert areas are now the recreation grounds for four-wheel drive vehicles that run over the fragile and rare vegetation of the desert sand dunes and gravel plains (which can take a long time to recover) while killing small nocturnal animals (such as reptiles, small mammals, and insects) hidden in their burrows.

Noise pollution caused by humans is one of the major factors affecting UAE wildlife. Car traffic, unregulated noise from vehicles and aerial traffic over natural habitats, and the human population and its noisy activities severely contribute to the depletion of wildlife populations. This occurs because of a reduction in the efficiency of animal communication and the inducing of physiological effects such as increased stress or behavioural changes (including abandonment of territory or breeding failures).

Although there is limited evidence of the adverse influence of electromagnetic fields created by high-voltage power lines and communication on terrestrial and aquatic ecosystems, the increasing encroachment of power lines over natural habitats is of serious concern.

Pollution from littering and chemical and or organic contamination is a big concern too. Littering is widespread throughout UAE. However, it is likely that this laissez-faire approach to the environment is driven by lack of environmental education and public spirit. Chemical and organic contamination are serious threats, particularly in freshwater habitats, natural and artificial, but also due to the risks of contaminating underground water.

## OVERGRAZING BY FERAL GOATS AND CAMELS

Overgrazing is commonly a serious threat in arid lands, where plant regeneration is slow and productivity very low. Historically, livestock such as goats, sheep, and camels have provided sustenance to the UAE population. However, with the advent of the technological age, dependence on livestock is past,



so the activity now predominantly exists where local traditions are practised. Large herds of domestic goats, sheep, and camels impact most natural habitats through overgrazing. In most parts of the Hajar Mountains, an uncontrolled and healthy population of feral goats are adding their detrimental contribution to the overgrazing of dry land vegetation. In indirect terms, they are negatively affecting native wild herbivores that depend on the habitats. Such herbivores include gazelles and Arabian tahr. In mountainous areas in particular, overgrazing also has a negative effect on soil erosion.

## CLIMATE CHANGE

Climate change is a global phenomenon which poses significant threats to biodiversity. It is likely to be a challenge for wildlife in desert environments, such as those found in the UAE, to cope with certain impacts of climate change. However, there is also some inherent resilience among the habitats and species that occur in these extreme environments.

While the precise impacts of climate change can still only be estimated, it is likely that the freshwater ecosystem habitat and its reliant species are the most vulnerable to such changes in our climate. However, it is also possible that the make-up of terrestrial habitats may change as species disappear or their relative abundance shifts. In addition, seasons may shift and impact certain co-dependent evolutionary relationships such as flowering cycles and pollinator abundance. The already unpredictable rainfall patterns may alter, and we may witness changes in drought seasons or increasingly severe flash floods.

Climate change usually exacerbates stresses caused by other human activities which threaten conservation targets. Climate change increases the vulnerability of the UAE's habitats and wildlife to these other stresses.

## HUNTING AND PERSECUTION

Poaching and persecution are very serious threats that have already severely reduced populations of several native species, including the mountain gazelle (*Gazella gazelae*), Arabian tahr (*Arabitragus jayakari*), Asian houbara bustard (*Chlamydotis macqueenii*), and caused local extinctions of the Arabian wolf (*Canis lupus arabs*), the striped hyena (*Hyaena hyaena*), and the beautifully iconic Arabian leopard (*Panthera pardus nimr*). Large mammals are among those species which have suffered the most from excessive hunting and persecution.

Sadly, raptors such as eagles, harriers, and hawks are also hunted targets, and their existence may be under serious threat after their intensive and systematic persecution.

Hunting may have been practiced to protect domestic herds or for sport. However, it is now officially prohibited or at least strictly regulated in most parts of the country. Enforcement is challenging, and there is still poaching, even in selected protected areas. It is thought that poaching may also occur on a large scale across the entire country. As a primary action, poaching must be eliminated or at least massively reduced in order to secure a safer environment for the nurturing of species.

## **ILLEGAL COLLECTION AND TRADE**

Animal trafficking is the fourth-largest illegal commercial market in the world, after drugs, weapons and human trafficking. Naturally the trafficking of wildlife species is a significant threat to desirable species. The extent to which the illegal collection and trade of native species in the UAE is poorly documented, however, as are the species that might be affected by this trade. Several endemic and rare reptiles, such as the spiny-tailed lizard, are likely the target of unscrupulous wildlife collection traders, while the capture and trade of wild falcons is still practiced in UAE.

## **THREAT ASSESSMENT AND THREAT RANKING**

For each target, we assessed threats based on their scope, severity, and irreversibility. The highest ranking threats across all target areas were climate change and overgrazing from feral goats and camels.

Climate change is a very high threat to two of the listed targets: wetlands and the wadi hydrology system since both habitats depend on rainfall.

Meanwhile overgrazing by feral goats and camels is a risk for desert and xeric shrublands, the Al Hajar Montane ecoregion, as well as endemic and threatened species.

The next level of prioritised threats to consider includes development, habitat degradation (from sources other than feral goats and camels), and the impacts of invasive species. Targets ranked with a very high threatened status include the Al Hajar montane ecoregion, wetlands, and endemic and threatened species.

Overall the terrestrial ecosystems in the UAE are highly threatened.

## **4.6 OUR UNIQUE ADDED VALUE AND ROLE SUMMARY OF KEY ROLE OF EWS-WWF ON PROGRAMME GLOBALLY AND NATIONALLY**

EWS-WWF has developed its capacity with regard to terrestrial environment conservation thanks to a successful, working partnership with the government of Fujairah in Wadi Wurayah National Park. Through an agreement with Fujairah

Municipality, it has been possible for us to develop a network of partners offering varying levels of support to abating the most prevalent threats to terrestrial wildlife, undertake indispensable research for biodiversity conservation and water, and offer business development support.

In addition, the federal nature of EWS-WWF allows it to convene stakeholders from the various emirates and, thus, support federal- and emirate-level environmental authorities in their development of a common vision for protected areas in the UAE. This is particularly important for ensuring the indispensable ecosystem connectivity that is required to improve the chances of successful biodiversity conservation targets. Also, our association with the WWF allows our organisation to bring the UAE the best-in-class biodiversity conservation practices and expertise.

## 4.7 STRATEGIES

### OVERALL THEORY OF CHANGE FOR PROGRAMME

Four strategies have been identified and prioritised according to their prospective positive impacts on improving the status of the conservation targets and reducing threats:

- Develop a central biodiversity database for the UAE, to be hosted by the MoEW;
- Initiate the development of a national protected area network (PAN) and collaborate in the formulation of an integrated national policy and legislative framework for protected areas, corridors, and endemic and threatened species with institutional partners in close collaboration with the Ministry of the Environment and Water and other relevant organisations;
- Establish and implement best practice in protected area management that also promotes environmental education and sustainable tourism through our collaboration in Wadi Wurayah National Park.

### STRATEGY 1:

#### SUPPORT THE FEDERAL GOVERNMENT IN THE DEVELOPMENT OF A CENTRAL BIODIVERSITY DATABASE FOR THE UAE

All conservation strategies should be grounded in a thorough knowledge of species ecology, distribution, abundance, the habitats' main components, and their functioning. While a lot of information has been collated in the last 40 years by independent naturalists, travellers, conservation organisations, or academics, accessing this information can be challenging. Given that, in the UAE, there is currently a partial lack of information on the distribution and status of significant endemic and threatened species, habitats, and areas of high biodiversity, it would be particularly relevant to coordinate data for a more holistic understanding of the situation.

The need for a central database of such information would be critical for environmental managers to integrate into conservation or land use planning. This strategy aims to fill this gap by encouraging and assisting the Ministry of Environment and Water in the development of appropriate structures and mechanisms to coordinate, gather, manage, and share a range of environmental information sources. To foster such an outcome, a document identifying the gap in biodiversity knowledge and data availability or access should be developed by EWS-WWF in partnership with the Ministry of Environment and Water to extend the example of the bird banding coordination to a federal biodiversity database. Such a tool would provide robust information to land use planners as well as private and institutional actors involved in using or conserving the environment.

A best practice example that can be drawn upon for such purposes is the further development of the model used in the national bird banding efforts in a bid to contribute to a centralised federal database that coordinates and shares information between emirates. Showcasing the coordination of bird banding data through a partnership at the federal level is expected to instigate the development of federal administrative structures dedicated to biodiversity data.

## **OBJECTIVE 1**

By Q4, 2016: A national bird banding coordination structure will have been implemented with the Ministry of Environment and Water.

## **OBJECTIVE 2**

By Q4, 2016: A document identifying the need for a national biodiversity database will be developed.

## **OBJECTIVE 3**

By Q4, 2017: Based on the lessons learned from the implementation of the national bird banding coordination structure, a proposal will be developed and submitted to the Ministry of Environment and Water to develop a federal biodiversity database.

## **STRATEGY 2:**

### **SUPPORT FOR THE DEVELOPMENT OF A NATIONAL PLAN AND AN INTEGRATED NATIONAL POLICY AND LEGISLATIVE FRAMEWORK FOR PROTECTED AREAS, CORRIDORS, AND ENDEMIC AND THREATENED SPECIES WITH INSTITUTIONAL PARTNERS.**

Supporting the development of a protected areas strategy is core to our terrestrial strategy to protect the nation's biodiversity. A vision document that promotes a protected areas programme, established policies, a framework, and an institution for implementation will be completed in the medium term. Once policy, framework, and institutions exist, then the programme will aim to influence land use planning, traditional uses of nature, and environmental

laws, helping to directly and indirectly reduce recognised threats.

Integrating biodiversity data into land use planning and the establishment of a protected areas and corridors network requires the presence of a national policy and legislative framework. The intermediate results, therefore, include a review of national and emirate laws, bylaws, and decrees, and the development of a strategic approach coordinated with environmental actors and institutions.

The fundamental information about species' status and trends is often lacking in the UAE. This gap in knowledge, which keeps being underlined by local conservation organisations, must be addressed in priority as it is a prerequisite for the development of a PAN. EWS-WWF will invite relevant organisations to jointly develop large-scale and long-term biodiversity monitoring schemes in those ecosystems where there are information gaps to support the conservation of the PAN. This would start with the development of a biodiversity survey on the Hajar Mountains as a priority conservation area, building upon the previous work that EWS-WWF did in partnership with Fujairah Municipality. This component of the strategy would have to feed into strategy 1, which is related to the biodiversity database.

## **OBJECTIVE 1**

By Q4, 2016: A comprehensive wildlife survey covering the entire Hajar Mountains range within UAE boundaries will be conducted jointly with UAE conservation organisations and its results published.

## **OBJECTIVE 2**

By Q2, 2018: Environmental authorities will agree on a national vision for a PAN;

## **OBJECTIVE 3**

By Q2, 2018: A policy framework for the national PAN will be adopted federally;

## **OBJECTIVE 4**

By Q2, 2019: The PAN will be promoted and integrated into local legislation and land use planning;

## **OBJECTIVE 5**

By Q4, 2020: Each emirate will develop the PAN according to the federal vision.

## **STRATEGY 3:**

### **ESTABLISH AND IMPLEMENT BEST PRACTICE IN PROTECTED AREA MANAGEMENT THAT ALSO PROMOTES ENVIRONMENTAL EDUCATION AND SUSTAINABLE TOURISM**

While launching a PAN is a core strategy that will benefit wildlife around the country as a whole, it must be implemented in conjunction with effective management



and restoration efforts. Such efforts must safeguard habitats for ecosystems and their reliant species and balance strides forward in conservation with environmental education and ecotourism. Wadi Wurayah National Park, the first terrestrial national park in the country, has a complete management plan that integrates the management of natural resources with environmental education and ecotourism, and boasts dedicated staff, who have been assigned to execute that plan. In the medium term, implementing the management plan is key, and the lessons learned from its implementation will be communicated through the WWF Monitoring and Evaluation process. Outcomes from this will then be used as a model to manage the protected areas and corridors developed through the national PAN in the future. EWS-WWF aims to continue supporting the Fujairah government by undertaking critical research that will monitor and evaluate the effectiveness of the implementation of the management plan.

### **OBJECTIVE 1**

By Q1, 2016: We will have developed and started operating environmental education programmes for a varied audience;

### **OBJECTIVE 2**

By Q4, 2016: A water flow, water table level, and water quality monitoring system will be in place;

### **OBJECTIVE 3**

By Q2, 2017: A research and biodiversity assessment plan and a robust biodiversity monitoring scheme aimed at understanding medium- to long-term trends will be adopted and implemented;

### **OBJECTIVE 4**

By Q2, 2018: All major threats will be identified and mitigation strategies proposed for implementation, including the reintroduction of key species;

### **OBJECTIVE 5**


By Q2 2020: The archaeological riches of the park will be thoroughly documented and their scientific and cultural value evaluated

### **OBJECTIVE 6**

By Q4, 2020: Improvements of habitats in pilot restoration zones will be measurable.

## **4.8 FINANCIAL REQUIREMENT**

The terrestrial strategy is currently not funded. It has been estimated to cost 15,258,000 dirham over the next five years to deliver this component.



# CHAPTER 5 - CLIMATE CHANGE AND ENERGY PROGRAMME

## 5.1 BACKGROUND

Climate science predicts that global warming is likely to exceed 2°C this century unless a sharp and sustained decline in emissions of at least 80% by 2050 (compared to 1990) is underway before the year 2020. Holding 34% of the world's oil reserves, the Gulf region provides fossil fuel energy to the rest of the world. At the same time, every country in the region has growing consumption of fossil fuels with some of the highest per capita associated greenhouse gas (GHG) emissions in the world. For example, the UAE's GHG emissions per capita is five times the world average, something that is driven by the energy sector in particular. Fossil fuels, mainly natural gas, are used to generate large quantities of energy and to desalinate sea water in order to provide sufficient quantities of fresh water for the population. Paradoxically, climate change also poses a serious threat to the Gulf region, which is going to be at the frontline of impacts. These could include anything from extreme heat, increased salinity, and changes in patterns of precipitation to coastal flooding due to rising sea levels.

GLOBAL WARMING IS  
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OF CARBON  
EMISSIONS BY 2050

Therefore, EWS-WWF believes it is in the region's and the UAE's best interests for a strong and ambitious international deal on climate change to keep temperatures below 2°C and for it to lead by example domestically to address the issue.

Using science-based and multi-stakeholder interventions, EWS-WWF's Climate Change and Energy Programme aims to reduce the country's contribution to global GHGs by making climate change a national priority and driving forward actions to increase ambition for and implementation of renewable energy and energy efficiency. Conducting research on the risks posed to the country by climate change means decision-makers can prioritise such actions and recognise the importance of securing a robust international agreement on climate change. This calls for sustained engagement with government authorities at both federal and emirate levels and with corporations and civil society, and the pursuit of measurable programmatic goals. As the UAE makes rapid strides in economic development, our Climate Change and Energy Programme will enable and accelerate the country's transition to a lower carbon economy. It will not only tackle the climate challenge, but help to address an issue that poses a threat to biodiversity and is a stress multiplier for a range of economic, social, and environmental problems.

## 5.2 SCOPE AND VISION

### GEOGRAPHIC AND THEMATIC SCOPE OF PROGRAMME

Retaining a predominantly UAE focus, our programme will undoubtedly recognise the regional, political, and economic context of the GCC. The UAE is well-positioned to emerge as a thought and action leader in the Gulf as actions in one country can often lead to similar actions in neighbouring countries. Yet it also has the opportunity to learn sustainability practices and policies from its neighbours, especially given its vulnerability to climate change, the impacts of which are shared by the region. Therefore, we will work at a regional level on a case-by-case basis and when suitable partners are available.

Helping the UAE reduce its GHG emissions by increasing energy efficiency (in the power and transport sectors) and the share of renewable in the energy mix is possible through a focus on the development of suitable economic instruments and the enhancement of awareness of the risks posed by climate change.

### PROGRAMME VISION

**‘By 2020, the UAE takes significant steps towards low carbon development by increasing its ambition and implementation of renewable energy, expanding energy efficiency, decreasing carbon emissions from road transport and addressing climate change risks.’**

This country-level vision captures key areas of intervention, reflecting the spirit of UAE Vision 2021, to ensure that “the UAE is conscious of its responsibility to safeguard nature and mitigate the effects of climate change on its habitat and ecosystems in order to ensure that future generations inherit an environmentally sustainable world.”

## 5.3 CONSERVATION TARGETS AND GOALS

### CONSERVATION TARGETS

According to WWF, climate change is a threat to global biodiversity as it is anticipated that a failure by the global community to stay below the 2°C temperature increase threshold would put between 15% and 40% of species at risk of extinction. Actions to tackle climate change therefore also indirectly influence the health of the planetary ecosystem, including species and their habitats and the human livelihoods that depend on them.

An assessment of the viability of targets and the corresponding information for Climate Change can be found in Appendix 1.

## SUMMARY OF PROGRAMME GOAL

The broad goal is to reduce GHG emissions, build knowledge on climate risks, and help prioritise them in policy-making. By elevating the priority of climate change action, the UAE will be better placed to take concrete steps to reduce its emissions. To achieve this, we will work with local stakeholders to pursue specific result-oriented renewable energy and energy efficiency interventions.

There is now widespread global recognition of the threats posed by climate change. These include the physical, economic, environmental, and social risks, together with the need to adapt to imminent changes and mitigate current and future emissions. The UAE's vulnerability to climate risks, as outlined in the strong potential impacts on its coastal infrastructure, marine resources, and fresh water availability place participation in global action on climate change among the country's best interests. When compared with other countries, the UAE is not a large emitter of carbon emissions. Its total emissions did, however, rise by 5% per year on average from 1994 to 2013, and it is currently the third highest per capita emitter among Gulf countries, emitting five times the world average of per capita emissions (World Bank, 2010).

The 2012 GHG inventory outlines that a range of sectors contribute to the UAE's GHG emissions, but that the power and transport sectors are responsible for 39% and 19% of those emissions, respectively. The shifts in energy consumption and provision patterns are opportunities we seek to target through this programme in order to move the country and planet closer to a low carbon energy future. EWS-WWF already has built a strong reputation by acting with impact on these sectors. Therefore, focusing on reducing the demand for electricity and water, increasing the supply of renewable energy options, and improving the efficiency of light-duty vehicles will move the programme forward.

When developing this program, the EWS-WWF team recognised and factored in the country's economic and environmental context, especially given its economic reliance on the oil and gas sector and related push for economic diversification, its extreme desert climate (resulting in large cooling and energy requirements), scarce fresh water resources, and the need to preserve the natural environment.



## 5.4 SITUATION ANALYSIS

### BACKGROUND OF THREATS

The impacts of climate change include but are not limited to changing weather patterns and extreme events, such as droughts, flash floods and storms, altered hydrological cycles, the increase in surface temperatures, and the rise in the sea level. According to the IPCC, if emissions continue to track its highest emissions scenario model, global temperatures could rise by between 3.2°C and 5.4°C by the end of the century (compared to baseline temperatures from between 1850 and 1900). However, should the scenario outlining the lowest possible emissions prevail, the average global temperature could rise from 0.9°C to 2.3°C by the end of the century (for the same baseline years). The rise in temperatures will directly impact glacier melt and sea level rise, and, consequently, land inundation and the increased salinity of aquifers.

The GCC is particularly vulnerable to the impacts of climate change. According to the Arab Forum for Environment and Development (AFED) “the Arab countries are in many ways the most vulnerable in the world to the potential impacts of climate change, the most significant of which are increased average temperatures, less and more erratic precipitation, and sea level rise, in a region which already suffers from aridity, recurrent drought, and water scarcity” (Tolba and Saab, 2009). The rise in sea level poses grave risks to the region given its high concentration of populations in coastal areas and the existence of large-scale on-shore and off-shore developments for tourism, industry, power and desalination plants, and commerce. Climate change is expected to also adversely affect environment-based livelihoods by impacting marine resources, soil quality, and the availability of water (Tolba and Saab, 2009). Recent modelling by AGEDI also shows that temperatures will rise across the region by 2°C to 3°C by 2060, sea temperatures will increase by 1.7°C to 2.8°C, humidity will peak by about 10%, and rainfall will be more prevalent than current amounts by as much as 50% to 100% for parts of Dubai, Sharjah, and the northern emirates. AGEDI’s research also highlights increased chances of tropical typhoons moving across the Arabian Peninsula and the need for further research to assess sea level rise.

While weather shifts will be felt by humanity, we must not forget the impacts that global warming is likely to have on the region’s biodiversity. Changes to weather patterns will result in habitats losing their ability to provide adequate sustenance to the wildlife they currently support, while other habitats may be lost entirely and species may be left at the edge of their habitable range without any other places to go. In turn, this may alter competitive relationships among species and see invasions by generalist species and negative human adaptive responses (Malcolm *et al* 2002). The UAE waters are home to 240 species of fish, four of which are endangered. Climate impacts may exacerbate the adverse conditions some marine species are already facing. Nowhere are these threats more apparent than in the Gulf and the surrounding seas, which are already subject to extreme environmental conditions.

The country is heavily reliant on trade for its consumption goods, yet there has been an articulation of concern by the Foreign Minister, His Highness Sheikh Abdullah bin Zayed Al Nahyan at the ‘Abu Dhabi Ascent’ event in 2014 that climate impacts anywhere in the world would affect the UAE’s access to imported resources and goods and, in particular, food. His Highness noted:

“For a country like the UAE which relies on trade for the great majority of our food supplies, climate change impacts elsewhere in the world are every bit as important as impacts felt in our region. If climate change disrupts agriculture in one country, food prices rise everywhere. We live in an interconnected world, where what impacts one country affects us all” (WAM, 2014).

For this reason, the threat of climate change can be a trigger for the transformation of energy systems and carbon-intensive ways of living to shift towards a pathway that emphasises the efficient use of energy and outlines opportunities for savings and sustained growth in the region. Additionally, a growing reliance on renewable energy, energy efficiency, and the use of more fuel efficient vehicles will translate into the country using less oil and gas for electricity generation and transport fuels. This, in turn, means that it would benefit financially by having more of these resources available to export at international market prices, which are far higher than domestic prices.

Clean energy markets, especially those for solar power, have the potential to emerge as potent avenues for lucrative investment in the UAE; just a few examples that strengthen this point are Dubai’s recent tripling of its renewable energy target to 15%, its carbon reduction target of 16% by 2021, and its target to reduce energy demand by 30% by 2030. Meanwhile, Abu Dhabi has set a renewable energy target of 7% of installed power production capacity by 2020. Even though the targets remain modest, these are steps in the right direction, and the pursuit of renewable energy could open up possibilities for the climate-friendly expansion of the power sector and establish leading clean energy projects and players in the country. The recent solar PV project contract awarded by the Dubai Electricity and Water Authority set a world record low price of generating electricity at US \$0.0584/kWh.

## 5.5 CONCEPTUAL MODEL

### CONCEPTUAL MODEL WITH DIRECT AND INDIRECT THREATS

It is widely acknowledged that increases in GHG emissions exacerbate climate change, which in turn threatens biodiversity and affects human well-being. Therefore, our Climate Change and Energy Programme aims to centre its efforts on reducing those emissions while simultaneously building on the knowledge and capacity of imminent climate risks.



**15-40%**  
**OF SPECIES ARE AT  
RISK OF EXTINCTION  
IF WE FAIL TO STAY  
BELOW THE  
2°C threshold**

The UAE GHG Inventory of 2012 \* (compiled by the Dubai Carbon Centre of Excellence and the MoEW) provides a national guide for identifying the key sectoral priorities for GHG reduction. We are using them to direct our programme's strategies and activities towards working with sectors with the highest potential to reduce emissions \*\*. The power sector accounts for the largest share of nationwide emissions; it is responsible for 39% of the total. By comparison, the transport sector is responsible for as much as 19%. Given that these two contribute to the largest portions of emissions, they are designated as priority sectors for our programme to engage with. EWS-WWF has built strong momentum and a reputation among these sectors with its previous achievements.

Action on climate change is often deprioritised to maintain focus on growth rates and the energy that fuels such growth. It has, therefore, been documented in our conceptual model for this programme that the context of rapid development, along with the growing population and its needs, drives decision-making on a number of key areas that influence UAE's contribution to global emissions. This frame of thinking is buoyed by the perception of access to 'limitless' fossil fuels and international recognition of the country's dynamic growth. Sadly, the lack of detailed attention to environmental and climate considerations does not accurately reflect the country's potential or its global responsibility.

The availability of highly subsidised fuel, power, and water fails to drive consumer decisions and behaviours towards less wasteful use of resources. For example, a vehicle's fuel economy does not influence an individual's automobile preference because petrol is cheap. This makes large, inefficient cars a desirable and economically viable alternative. Likewise, homes waste energy and water because these resources are heavily subsidised. We recognise that these two examples directly influence emissions from the two sectors our programme will prioritise: the transport and power sectors (the production and consumption of electricity and desalinated water).

\*The Ministry of Energy has now developed a 2013 GHG inventory which outlines similar trends in the UAE's GHG emissions.

\*\* The 2012 Greenhouse gas inventory was used for prioritisation. There is a more recent 2013 inventory in which the overall trends are similar and, therefore, do not affect the prioritisation.

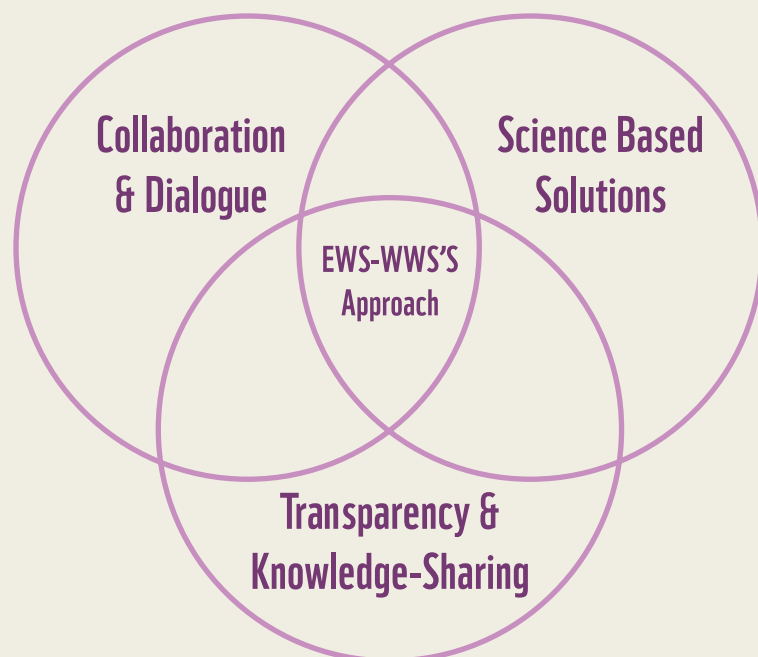
The efficient use of resources is further undermined by the lack of governance frameworks—including regulations and institutional capacity. This is relevant because, to address inefficiencies in the transport sector, infrastructure must provide ample and convenient choices that expand the use of public transport. At the same time, consumers need to be encouraged to invest in fuel-efficient vehicles. This can be achieved through a range of policy options, such as regulating vehicle fuel-economy through standards and by charging the true price of fuel.

For energy production, it is crucial to develop policies that lead towards increasing the share of renewable energy in the mix. Rational pricing of power and desalinated water will play a further role in reducing wasteful energy consumption. Power and water use are also strongly linked to access to efficient products and services. This access is currently hampered by the existence of an immature market that is blighted by information gaps, technical capacity gaps, and a lack of regulation.

On the basis of this conceptual model, our internal knowledge, and consultation with external stakeholders, we were able to prioritise select strategies on which to focus our efforts as part of the programme on Climate Change and Energy.

## 5.6 EWS-WWF UNIQUE ADDED VALUE AND ROLE

No other international or local NGO is working on climate change and energy issues in the UAE and Gulf region with a track record like ours. Furthermore, working on these topics in a region that is rich in fossil fuels and whose economies depend heavily on their exploitation poses unique challenges. It also presents hugely transformative opportunities for influence and impact on



*“Reduction of GHG emissions can be achieved by implementing energy efficiency and renewable energy options, and elevating climate change as a priority”*

the climate change issue. Our approach is simple. We want to make climate change more of a national priority for the UAE and to increase ambition for and implementation of renewable energy and energy efficiency in the UAE. Doing so will enable the UAE to lead by example on global climate change and be a positive influence internationally. Maximising transparency and maintaining independence and the understanding that economic growth will continue in the UAE, we work across a multitude of sectors to tackle climate change through multilateral partnerships and by growing the capacity of stakeholders. Building on our experience of previous projects implemented by EWS-WWF’s Climate Change & Energy Programme, such as engaging with the private sector on energy and water efficiency and developing the foundation for the UAE’s lighting regulation, our approach is to contribute beyond that which is already planned in the UAE and to fill gaps that add value to current efforts and scale up the level of ambition. By providing market-based and policy solutions across emirates and across sectors, we believe we can scale up our impact to reduce the UAE’s carbon emissions.

Our actions will build on many of the existing strategies and interventions of the UAE at the federal level and emirate level. They include the Dubai Integrated Energy Strategy 2030 and its Demand Side Management Plan, as well as Abu Dhabi’s renewable energy target for 7% by 2030. As the only federal environmental NGO in the country, we are uniquely placed to facilitate national action on energy and climate change policies by working with different ministries and federal agencies. Progress is occurring on many levels; our role is to make sure that the implementation of the strategies and plans are robust and that additional plans are accelerated and ambitious.

## **5.7 STRATEGIES AND THEORY OF CHANGE**

### **OVERALL THEORY OF CHANGE FOR PROGRAMME**

The country requires a strong and ambitious global agreement to reduce GHGs and keep climate change below 2°C. If climate change becomes more of a national priority then the country will naturally wish to lead by example, implementing more ambitious domestic GHG reduction targets and expanding its actions on energy efficiency and renewable energy. The UAE is uniquely placed to demonstrate that countries with economies based on fossil fuels can shift towards and, perhaps more importantly, are shifting towards lower carbon economies that are based on energy efficiency and renewable energy. Adopting this lead role will catalyse further action in the GCC region, which is far behind many other countries in tackling climate change. In turn, it will accelerate global efforts to address the issue.

Our programme has four high level objectives (see below), which interconnect to deliver the level of ambition and action on climate change needed in the UAE.



To help reduce emissions, critical enabling factors will be addressed first. That will pave the way for the reduction of the UAE's GHG emissions through the increased implementation of energy efficiency and renewable energy options. These include contributing to the development of a pricing framework for energy and water that accounts for environmental externalities such as CO<sub>2</sub> emissions. They also include elevating climate change as a priority for UAE decision-making through research and engagement on the risks posed to key sectors of the economy.

Meeting these conditions will enable us to tackle GHG emissions from the power sector, which accounts for 39% of the UAE's total emissions. Expanding action on energy efficiency on the demand side will be facilitated by working on the development of energy efficiency standards for products and through the development of targeted financial products that will encourage consumers to purchase more energy efficient goods and services. We will also catalyse ambition for and implementation of renewable energy in the UAE through a campaign to demystify renewable energy for utilities, energy bodies, university students, and decision-makers, and by conducting objective research on the potential for renewable energy and supporting the development of a robust policy framework for its implementation in the UAE. In order to help tackle GHG emissions from the transport sector, we will conduct research on and support the development of policies to improve fuel efficiency of light-duty vehicles in the UAE. While some of the work will be delivered through existing EWS-WWF initiatives, most will require new project structures to be set up. The applicability of the work at the GCC level will also be assessed on a case-by-case basis, depending of the scope of the topic and the availability of suitable partners.

Finally, it will be important for the programme to follow some principles in its approach as these have been repeatedly identified as being critical to increasing the impact of the strategy. A degree of flexibility and adaptability will also be required to take advantage of strategic opportunities that may appear and/or if funding requires the fast-tracking of certain areas. The principles are as follows:

- Educating decision-makers with the knowledge gained through projects, which is crucial for facilitating changes in attitudes and approaches.
- Understanding what drives political will in issues and designing work to address this.
- Maintaining a rapid response (positive and negative) mechanism to announcements through media and/or letters so that we can hold stakeholders accountable.

## STRATEGIES

### STRATEGY 1:

#### STRONG EXPANSION OF ENERGY EFFICIENCY

By expanding action on energy and water efficiency (EE/WE) and addressing the demand side of the power and desalinated water sector, we can reduce GHG emissions. Our focus will lean particularly on building momentum to tackle key barriers affecting the uptake of EE/WE. It will also look at the fair pricing of energy and water, financial products to enable people to purchase energy-efficient goods and services, developing strong energy performance standards for appliances, improving the energy and water efficiency of buildings, and the development of an open source and independently developed service for consumers to learn about the ranking of energy efficient products, which would be called ‘Top 10 UAE’ and be linked with similar ‘Top 10’ services globally.

#### OBJECTIVE 1

By 2016, policy and decision-makers in the private and public sector will be convinced that barriers to energy and water efficiency in the private sector need to be tackled.

#### OBJECTIVE 2

By 2017, the UAE will have developed fair tariffs for energy and water that reflect environmental costs.

#### OBJECTIVE 3

By 2018, the UAE will start to develop targeted financial incentives, enabling people to purchase the most energy and water efficient technologies on the market and driving reductions in energy demands.

#### OBJECTIVE 4

By mid-2019, the UAE will have developed minimum energy and water performance standards for existing buildings and/or will be in the process of improving the implementation of new building codes to drive energy and water efficiency.

#### OBJECTIVE 5

By mid-2020, the UAE will have reviewed and will be undertaking improvements of energy and water efficiency standards, and labels for appliances.

#### OBJECTIVE 6

By the end of 2020, the UAE will have launched a Top 10 UAE programme to help consumers access independent and robust information about the most energy- and water-efficient products on the market.

## STRATEGY 2:

### INCREASING AMBITION FOR AND IMPLEMENTATION OF RENEWABLE ENERGY

Helping to reduce GHG emissions by increasing the ambition for and implementation of renewable energy, this strategy aims to build knowledge about renewable energy, its potential in the UAE, and its implications. Our goal is to develop a targeted campaign to dispel misconceptions about renewable energy, conduct sound research, and engage on the potential of renewable energy in the UAE to inform decisions on increasing targets and the development and implementation of a comprehensive policy framework.

#### OBJECTIVE 1

By 2017, key stakeholders will be more convinced that renewable energy offers benefits to the UAE.

#### OBJECTIVE 2

By 2018, an objective assessment of the potential for renewable energy in the UAE will have led to the development of more ambitious targets.

#### OBJECTIVE 3

By 2020, the UAE will have a robust and comprehensive policy framework to deliver more ambitious targets with clear roles and responsibilities, and sufficient finance.

#### OBJECTIVE 4

By the end of 2020, the UAE will be monitoring the implementation of renewable energy policies and adjusting them as needed.

#### OBJECTIVE 5

By the end of 2020, the UAE will have started to develop financial instruments to accelerate the uptake of renewable energy.

## STRATEGY 3:

### IMPLEMENTING THE UAE ECOLOGICAL FOOTPRINT INITIATIVE

The UAE reduces its carbon emissions and contributes to addressing climate change through the development and implementation of science-based energy and environment policies. Emissions from the lighting and transport sector are reduced thanks to the effective implementation of the lighting standard and vehicle fuel economy regulation respectively. The country continues to verify the Ecological Footprint value for the WWF Living Planet Report.

#### OBJECTIVE 1

Assess whether the UAE indoor lighting market has been transformed due to the implementation of the lighting standard.

#### OBJECTIVE 2

Conduct technical research and support ESMA and other relevant stakeholders in the development of a UAE vehicle fuel economy regulation.

### OBJECTIVE 3

Increase confidence in the UAE's Ecological Footprint indicator, with continuing verification in the years of the publication of the Living Planet Report (LPR) and better understanding of its policy relevance for the country.

### STRATEGY 4:

#### ADDRESSING CLIMATE CHANGE RISKS

Making climate change more of a priority for decision-makers in the UAE is of critical importance as it will facilitate more ambitious action and momentum on energy efficiency and renewable energy. The UAE's vulnerability to the impacts of climate change means that it has a strong stake in any robust international agreement on climate change. Understanding and highlighting the sectors of the economy that are also at risk from climate change will also enable increased momentum towards the implementation of low-carbon and less energy-intensive economic diversification plans for the country.

### OBJECTIVE 1

By 2017, key stakeholders will be more convinced that the UAE is vulnerable to the impacts of climate change.

### OBJECTIVE 2

By 2018, UAE decision-makers will be more aware of the economic risks posed by climate change and convinced of the need to accelerate diversification towards a low carbon economy.

### OBJECTIVE 3

By 2020, the UAE will have committed to carbon reduction goals in international forums.

## 5.8 FINANCIAL REQUIREMENTS

The implementation of the Climate and Energy programme has commenced. It is estimated that the programme will cost 38,150,700 dirham over the next five years. The Climate and Energy programme is dependent on financial support, which will be pursued through programmatic funding opportunities for partners and stakeholders.



# CHAPTER 6 - WILDLIFE TRADE PROGRAMME

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## 6.1 BACKGROUND

Illegal wildlife trade is a “high-profit, low-risk” crime that is continuing to escalate at an unprecedented rate, threatening global wildlife populations as well as their dependent communities. According to the Fighting Illicit Wildlife Trafficking report (commissioned by WWF), illegal wildlife trade is currently the second-largest direct threat to species survival and the fourth-largest global illicit trade, preceded only by the trade in humans, narcotics, and weapons. If the trade-driven exploitation of wildlife is left unaddressed, we risk the demise of numerous iconic species such as elephants, rhinos, cheetahs, and tigers in a matter of mere decades.

**ILLEGAL WILDLIFE  
TRADE IS CURRENTLY  
2<sup>ND</sup>  
LARGEST DIRECT  
THREAT TO SPECIES  
SURVIVAL, AND  
4<sup>TH</sup>  
LARGEST GLOBAL  
ILLICIT TRADE**

Tackling the issue presents a challenge to EWS-WWF, but it is one we are ready to face. A collaborative approach is needed. We will work alongside leading government and private sector stakeholders in the Wildlife Trade Programme (WTP) to spur action to fill existing gaps and fortify current CITES implementation measures in the UAE. Each of our strategies offers a comprehensive roadmap that has been verified by feedback from numerous topical experts.

The programmatic interventions will add value to ongoing government efforts surrounding enforcement (initially focusing on customs) and the supply chain and logistics sector. Our programme will also seek to engage top airlines, bolster awareness campaigns led by the CITES authorities, and conduct continual research to ensure the largest possible impact. Moreover, it will serve to complement the Wildlife Crime Initiative (WCI), led by WWF and TRAFFIC.

In 2014, Environment Agency Abu Dhabi (the UAE CITES Scientific Authority) commissioned EWS-WWF to carry out a Wildlife Trade Report. This report indicated that the role of the UAE in the illegal wildlife trade is two-fold. First, the country acts as an end-user of numerous CITES-listed live species. Second, it plays a role as a transit point for wildlife products. Figures captured by the study elevate the seriousness of such trafficking as a local and international crime and trigger an escalated sense of urgency about ending the country’s role in the trade.

The data reflects a large local demand for live species listed in the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), with the majority of pet shops readily displaying CITES-listed species for sale. With regards to the illegal trafficking of CITES-species products, the UAE was described as a country “of importance to watch”, given the alarming figures of the ivory trade obtained from the Elephant Trade Information System (ETIS). This statement may be interpreted as being suggestive of a trade ban, so the situation warrants immediate remedial action. The risk of not acting at all is the inevitable tarnishing of the country’s public image, which, in turn, could negatively impact the tourism industry. The main out-

puts of the ‘EWS-WWF Wildlife Trade Report 2014’ are a series of well-constructed recommendations, based on global best practice, to minimize the UAE’s role in wildlife trafficking. The recommendations touch on governance structures, legislation and legal frameworks, market monitoring, engagement with the transport sector, demand reduction, enforcement, and response mechanism plans.

Given that the issue has been highly prioritised within global environmental networks, we can maximise our efforts by tapping into WWF’s and TRAFFIC’s global resources and aligning ourselves soundly with their efforts and initiatives.

## 6.2 SCOPE AND VISION

### GEOGRAPHIC AND THEMATIC SCOPE

The thematic scope of our programme on wildlife trade is to combat the illegal trafficking of CITES-listed species through the UAE or their consumption (either live or as products) within the UAE. The illegal market is characteristically multifaceted and highly adaptable, leading to its rampant success. Countering it with robust solutions would send a powerful message to the national and international community about the implications of the trade and would have a positive impact on conservation in the places where the species originate. Resolving the issue would appeal to all audiences, inadvertently touching on health and safety issues, conservation, the economic standpoint, national security, animal welfare, and more. The fundamental aim is to achieve a degree of sustainable trade whereby human populations may benefit from products of nature without disturbing delicate ecosystems or threatening important or endangered species.

Certain countries are more susceptible to the trade due to an abundance of local resources, their geographic locations, their economic standpoints, weak legislative frameworks or enforcement practices, and cultural norms. Geographic location, degree of globalisation, relative wealth, and popularity as a travel hub are all factors that render the UAE a popular location for traffickers. The primary geographic focus of the five-year programme would be the UAE with an anticipated spillover effect regionally and globally over time. The airline strategy (discussed in detail in point 6.5.2) entails a more global approach that positions airlines as the ‘middle-man’, transporting items from their sources to consumer countries. Ultimately, wildlife trafficking is transnational, highly pervasive, and virtually limitless. To expect to achieve market success while strictly confining all efforts to the UAE or to the initial research scope would be a restrictive and naïve approach. Therefore, our strategy aims to contribute to existing global efforts.

## PROGRAMME VISION

Our overall programmatic vision is:

***“To support the UAE CITES authorities to implement measures that would position the country as a global leader in its positive impact on reducing illegal wildlife trade.”***

In accordance with this, catalysing national-level responses and streamlining government, private sector, civil society, consumer, and stakeholder commitment to act against this damaging trade are critical. The ultimate long-term outcome would see local and global flagship species thriving and trade being promoted in a sustainable way that preserves biodiversity.

## 6.3 CONSERVATION TARGETS

The black market nature of the trade makes it virtually impossible to obtain accurate hard data on trafficking trends and patterns. It is estimated that confiscations account for a mere 10% to 20% of the actual trade volume (Boehr, 2014). Our conservation targets were therefore selected based on a variety of reputable data sources and consultation with key experts.

### CHEETAHS, (ACINONYX JUBATUS) - LIVE PET TRADE

Cheetahs are listed under CITES Appendix I \* and are, therefore, afforded the highest level of protection from trade-driven exploitation. Any form of commercial trade in this species is strictly prohibited.

The Illegal Trade in Cheetahs report released by the CITES Secretariat in July 2014 revealed that the primary destination of live cheetahs was the Gulf states. The GCC market is one of the top two markets for the illegal trade in cheetahs and was highlighted as being significantly larger and more lucrative than other global markets

It is estimated that, between the years of 1990 and 2012, 531 cheetahs exported out of South Africa (both legally and illegally) were destined for China, Japan, the UAE, and the USA. Gross imports for the UAE were reportedly significantly higher in recent years than in the past:

- 30 cheetahs were reportedly imported for personal purposes from 2008-2011.
- 39 cheetah cubs (of Somali origin) were confiscated in the UAE between 1998 and 2002.

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\* The CITES appendices are a mechanism of categorisation in place to afford different species the appropriate level of protection in accordance with the impact of the trade on their survival: <http://www.cites.org/eng/app/index.php>

- 20 cubs have been seized in the UAE since 2010 (15, of which 11 died, arrived in one shipment).

Furthermore, in February 2014, at the Arabian Biodiversity Conservation Workshop, Dubai Customs indicated that confiscations were still occurring.

It is important to note that, for the programme, cheetahs as a conservation target may be interpreted to be an umbrella species. The UAE's demand for cheetahs also applies to numerous other CITES-listed species such as lions (*Panthera leo*—Appendix I and II) and tigers (*Panthera tigris*—Appendix I). Thus, the success of targeted activities will inevitably have a spillover effect for other closely-related, desirable species.

## AFRICAN ELEPHANT, (*LOXODONTA AFRICANA*) - IVORY TRAFFICKING

African elephants are listed under CITES Appendices I and II (depending on the sub-population from which they are extracted). However, the trade in ivory is strictly monitored and, in many countries, is banned altogether.

TRAFFIC released the Illegal Trade in Ivory and Rhino Horn report in September 2014. It highlighted the latest international findings on ivory and rhino horn trafficking and drew upon emerging trends in the trade. While there was little emphasis on the current trend of rhino horns passing through the UAE, this does not mean that the trade isn't occurring, especially given the historical demand for horns in neighboring Yemen.

In the case of elephant ivory, however, the UAE was specifically mentioned as a key global transit point (and the foremost transit country) between African source countries and Asian markets.

Furthermore, research indicates that, although trade through the country was documented between 2009 and 2011, it has dramatically increased, with numerous routes established by 2012 and 2013.

The Environmental Investigation Agency also released a report in November 2014 referencing numerous cases in which the UAE was involved as a transit point for ivory consignments.

The nature of shipments and methods of smuggling are diversifying. In the past, ivory was transported in large consignments via shipping routes. However, studies are noting an increased number of shipments travelling as air cargo and even in passenger luggage and carry-on baggage.

Similarly to tackling cheetah trafficking, tackling ivory trafficking is expected to reap benefits for other species that are transported via similar trade routes, to similar demand markets (locations and drivers), and in similar regions.

Beyond the aforementioned reports, solid statistics and facts are difficult to come by. Numerous national and international media articles have also shed light on occurrences of illegal cheetah trafficking and possession and the relative ease with which these animals can be obtained, and on interceptions of ivory shipments passing through the UAE.

There are numerous other species of relevance that were not part of the scope of the initial research, but they were deemed significant enough to warrant further investigation. These species, as well as the details surrounding their trade will be explored as part of the WTP research strategy.

## 6.4 GOAL

In a bid to curb illegal wildlife trafficking in the UAE, our programme is dedicated to collating research-based knowledge and expertise. This will build our in-house capacity to assist relevant stakeholders as they tackle the grave issue. Our overall goal is to substantially reduce the impact of wildlife trade in the UAE (including the trafficking of products and the local demand for live species) on the conservation targets outlined by 2020.

The initial phase of the programme collected and analysed quantitative and qualitative data from a plethora of credible sources in order to propose a concise set of recommendations. Each of the recommendations pertained to a unique aspect of the trade. The next phase will involve the implementation of strategies that guide and actualise our recommendations. The tracking of progress is critical, whether the actions are directly led by EWS-WWF or another organisation, and, overall, we will adopt a supportive, advisory role and offer guidance and insights to stakeholders tasked with driving the change.

The importance of this programme cannot be downplayed. It will significantly stifle the trade of endangered live species and products through the UAE, highlight the ways in which illegal trade impacts global biodiversity, and demonstrate how all countries can play a major role in preventing this detrimental trade from moving forward.

Our programme is coherently aligned with EWS-WWF's mission, vision, and Theory of Change. It will aid us in our efforts to work closely with people and institutions in the UAE and the region to conserve biodiversity through education, awareness, policy, and science-based research. The ongoing requests for support from key national bodies, namely the MoEW and EAD, are a testament to the abilities of our team, especially in the realms of research, policy support, capacity building, stakeholder engagement, and effective communication and messaging.

In summary, this intertwined approach will contribute significantly to the conservation of global species by addressing a threat that is currently thriving



within and through the UAE channels. It is a critical area for consideration, particularly when our unique strengths are factored in. It is also crucial that no activities should not be dismissed without a thorough understanding of their context and implications.

## 6.5 SITUATION ANALYSIS

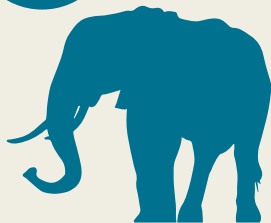
### BACKGROUND OF THREATS

The illegal trade in wildlife easily attracts criminals and is, therefore, growing at an alarming rate. The result is the bolstering of organised crime networks and the unprecedented escalation of the threat to global species. There is a pressing need to tackle this trade due to the threats it poses.

The chief concern is the trade's detrimental impacts on the conservation of global biodiversity. Tens of thousands of species and hundreds of millions of individual plants and animals are being illegally captured or harvested every year to satisfy the demands of different global markets, including the pet trade, the medicinal market, and fashion trends (TRAFFIC- Wildlife Trade). What's more, the scale of the trade ranges from individual traders to commercial bodies, making it an international, multi-level issue that must be tackled from a number of angles. Given the elusiveness of the trade, wildlife experts and customs officials estimate that wildlife seizures only reflect 10% to 20% of the actual trade volume (Boehr, 2014).

The threat to global species is undeniable as evidenced by trade estimates collected by TRAFFIC in the last decade. In fact, the most recent research conducted by WWF and TRAFFIC disturbingly found that, in 2014, one elephant was illegally killed every 15 minutes on average for its tusks. Central African populations have suffered a staggering 64% decline between 2011 and 2013 ("Illegal killing for ivory drives global decline in African elephants", 2015) alone. At the current rate, this species faces extinction in just 10 years. Meanwhile, rhinos have also suffered a massive decline as a result of poaching. As many as 1,215 rhinos were killed for their parts in 2014 (World Wildlife Fund, 2015) compared to the 13 poached in 2007. As of 2015, only an estimated 25,000 African rhinos existed in the wild. Moreover, cheetah populations have been exploited to fuel the exotic pet trade with one of the top demand markets being the Middle East. There are now fewer than 10,000 cheetahs remaining in the wild and any further exploitation could cause irreversible damage to wild cheetah populations.

The ramifications of the trade extend far beyond the threat to global biodiversity. It also presents additional threats, including the risk of disease to both human populations and local wildlife, the destabilisation of national economies, and risks to national security due to the pervasive nature of the crime. The latter may be indicative of corruption among security personnel and potential gaps through which other illegal items may pass undetected. Inaction on this grave issue may dent the UAE's forward-thinking, pioneering reputation, which, in turn, has the potential to negatively impact various consumer-facing industries.



**ON AVERAGE, ONE  
ELEPHANT IS  
ILLEGALLY KILLED  
EVERY 15 MINUTES  
FOR ITS TUSKS**



## OUR UNIQUE ADDED VALUE AND ROLE

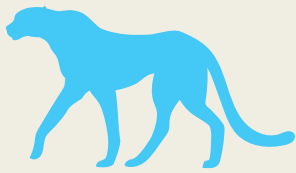
Naturally, tackling this issue will help the UAE as it strides towards a fairer, more sustainable country and world. With a multi-faceted team and dynamic support from a range of UAE stakeholders and the community, we have ample power and expertise to foster transformative change that will contribute towards the wider Wildlife Crime Initiative of WWF. As part of the WWF network, we work to deliver a united global effort in addressing this issue: our programme will amplify the efforts of other WWF offices operating in supply and demand regions of the illegal wildlife trade chain, and, conversely, their operations will aid our efforts to stamp out the trade in the UAE. Furthermore, in many instances, the WTP allows for corporate partnerships to be created and aimed at transformative change.

This thematic initiative will cultivate alliances across sectors and networks, both regionally and globally. It will enhance internal communication with the WWF network and the WWF-TRAFFIC Initiative, circulate readily available resources and expertise, allow for targeted fundraising, and effectively align with WWF Global and National Initiatives, most notably the WCI.

EWS-WWF is uniquely positioned through its partnership with WWF, which is fighting the illegal wildlife trade at a global level. EWS-WWF is the only WWF presence in the region, and this presents an opportunity to pilot novel techniques in an area that drives the trade. We can potentially produce a profoundly positive conservation effect on global species. Locally, our science-based solutions, which are formed from informative and reliable research, will encourage collaborative action at the federal level and build bridges between key stakeholders. The marked success of our previous efforts on CITES-implementation and capacity-building workshops, along with the continued engagement of the CITES Management and Scientific Authorities, will generate momentum. Delivering this programme will markedly enhance our profile as a UAE organisation that makes reliable, robust and meaningful efforts that will also lead to additional financial support and human resource support for our work in the long term.

## 6.6 STRATEGIES OVERALL THEORY OF CHANGE

To reduce negative impacts and the occurrence of illegal wildlife trade in the UAE and the region by 2020 to the greatest extent possible, we have selected top strategies that address the most pivotal aspects of this trade. The strategies are interlocking and, if implemented accordingly, we will assuredly realise our vision to combat the illegal wildlife trade. The trade, too, is an interconnected web. So, to effectively drive change, we must clamp down on all pressure points in a well-timed, strategic manner.



**Only 10,000  
CHEETAHS REMAIN IN  
THE WILD**

Ultimately, we aim to see a drastic reduction in the illegal wildlife trade through the UAE and the entire eradication of the country's role in supplying the demand for the trade. Both goals can be achieved with collaborative efforts by national-level actors and the support of EWS-WWF. Change will be marked by a decrease in the number of UAE nationals and residents owning and or seeking CITES-listed species as pets. It will also be evidenced by an initial increase in confiscated products (which will be indicative of more rigid enforcement practices), followed by a decrease in confiscations (which will indicate success in deterring traders). Making the seriousness of the issue a priority is just the first step. This heightened awareness will trigger enhanced enforcement, monitoring and detection, the education of political figures, consumers, and entities across the trade chain to reduce demand, and the revision of national-level legislation.

The proposed strategies focus on the dual role of the UAE as a consumer of live CITES species and a transit point. The strategies intervene at the trade route, the end consumer market, and at the level of international policy in order to leverage greater systemic change. This section provides a description of the four selected strategies\* :

- 1. Customs enforcement**
- 2. Airline engagement**
- 3. Support for MoEW-led awareness campaign**
- 4. Research**

Not all country-level measures will require the direct intervention of EWS-WWF, but they all have to be captured meticulously through this programme and proposed to the relevant parties for the coordinated and collaborative implementation of CITES to succeed. Our primary role will be to provide support, guidance, and advice, to develop tools, to deliver capacity-building, and to align all actions with the global context. All other pillars will ideally be governed by other agents, with EWS-WWF possibly charting their progress.

## **PROGRAMME STRATEGIES**

### **STRATEGY 1: CUSTOMS ENFORCEMENT**

The goal of this strategy is to enhance the ability of customs to detect, report, and react to incidences of illegal wildlife trade and to implement more stringent enforcement measures. This can be achieved by revising and fine-tuning current training workshops in line with global best practice (inclusive of a formal curriculum structure around CITES), developing a 'smart' user-friendly tool to support

\* For reference: "EWS-WWF strategies" refers to those strategies that EWS-WWF will be involved in driving (not independently, though). "EWS-WWF pillars" refers to the additional areas of focus identified by EWS-WWF that will be driven by other, better-suited local stakeholders.

customs training on CITES species, enhancing data and reporting, and supporting the establishment of specialised CITES customs units. This strategy will be closely implemented with the Ministry of the Environment and Water as the CITES management authority and IFAW as a key player in the field.

### **OBJECTIVE 1**

By Q4, 2016: work with a circle of national and international stakeholders to develop a robust training structure for enforcement personnel.

### **OBJECTIVE 2**

By Q4, 2017: develop dynamic, 'smart' tools and materials for enforcement users.

### **OBJECTIVE 3**

By Q3, 2019: support the establishment of functional and specialised CITES customs units.

### **OBJECTIVE 4**

By Q3, 2019: showcase innovative technology tools at world-renowned platforms such as COP and EXPO.

## **STRATEGY 2:**

### **AIRLINE ENGAGEMENT**

Engaging with UAE-registered airlines to disrupt the illegal wildlife trade chain is the priority of this strategy. The main actions that will lead to success in engaging airlines include creating suitable passenger awareness materials to tackle the global demand; delivering training workshops to increase airline staff's knowledge of 'tell-tale' trade signs, key trade routes, authorities who should be notified, and fraudulent paperwork; and hosting a transport and logistics sector workshop to encourage concrete action from other players in the logistics sector. Furthermore, airlines hold the political power to bring the seriousness of the issue to the government's attention.

### **OBJECTIVE 1**

By Q4, 2016: Showcase passenger awareness materials on designated UAE-based flights.

### **OBJECTIVE 2**

By Q3, 2016: Launch training for airline staff.

### **OBJECTIVE 3**

By Q2, 2018: Launch workshop for transport, supply chain, and logistics sector and witness key stakeholders' commitment to take action.

### **OBJECTIVE 4**

By Q3, 2019: Showcase methodologies as innovative technologies at world-renowned platforms such as CITES Conference of the Parties and EXPO 2020.

## **STRATEGY 3:** **SUPPORT MOEW-LED AWARENESS CAMPAIGN**

To provide guidance and support for the execution of a federal-scale awareness campaign led by the MoEW and targeted at UAE audiences. The ultimate goal is to drive down local demand for CITES-listed species in the exotic pet trade. EWS-WWF will support it by developing the collective strategy, formulating messaging, integrating measures of success, and potentially creating campaign collateral.

### **OBJECTIVE 1**

During 2016: Support message formulation and target audience segmentation

### **OBJECTIVE 2**

During 2016: Witness the launch of the federal-level campaign by the MoEW-led CITES outreach committee

### **OBJECTIVE 3**

By Q1, 2018: Evaluate impact of the campaign

## **STRATEGY 4:** **RESEARCH**

To conduct and assemble research on emerging issues that will eventually be addressed is a key step in the country's continual fight against the illegal trade of wildlife. The research will highlight emerging issues and components not covered by the initial study, for instance, plant species such as sandalwood, sharks (including shark finning), and hunting activities by GCC nationals in African countries.

These topics are important as they may reveal previously undetected gaps in CITES implementation and/or the existence of additional species severely threatened by trade through the UAE. The findings will be compiled and used to inform new conservation efforts. This particular strategy will demonstrate the country's proactive and preventative approach to the threat of wildlife trafficking. In addition, the research will entail a follow-up of the 2013 pet shop survey to gauge the success level of strategies (as indicated by changes in the local market for CITES species).

### **OBJECTIVE 1**

By Q2, 2018: Develop a brief report highlighting the role of the UAE in the identified research area

### **OBJECTIVE 2**

By Q4, 2020: Gauge the success of strategies by replicating the 2010 market monitoring survey

## **6.7 FINANCIAL REQUIREMENTS**

The implementation of the Wildlife Trade Programme is dependent on the successful funding of the programme. This strategy has an approximate cost of 13.8 million dirhams for the next five years.



# CHAPTER 7 - ENVIRONMENTAL EDUCATION AND OUTREACH

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## 7.1. BACKGROUND


Our Earth is home to an abundance of different species whose coexistence makes our planet special and life on it possible. Their intricate weave forms the very fabric of the varied ecosystems that help sustain life on Earth. Worryingly though, according to the WWF Living Planet Report 2014, habitat loss and degradation, overexploitation, and climate change are the main threats facing the planet's biodiversity, which contributed to a staggering 52% worldwide decline of species populations in the wild between 1970 and 2010.

This reality highlights humanity's limited understanding of the link between a healthy planet and human well-being and prosperity. Our failure to understand the irreparable impact of our actions on the planet has driven many decisions that have had negative environmental consequences.

A recent brand study conducted by EWS-WWF shows that, while most of the population think that environment is important, environmental conservation is not considered an essential issue. However, 89% of corporate decision-makers interviewed and 84% of individuals interviewed said that they would like to receive more information on how they could contribute positively for the benefit of the environment.

Developing a correct and concise understanding of environmental issues is important, and it needs to be addressed with a sense of seriousness and urgency. Only with an appreciation for the natural environment and the appropriate level of knowledge can we expect people to care for our planet and adopt conservation measures at the policy level, in their workplaces, or at home.

Adopting sustainability requires a population that is keenly aware of the goals of a sustainable society and has the knowledge, skills, opportunities, and motivation to contribute to these goals. As the UAE and its leaders are promoting a knowledge-based society in which individuals are encouraged to be highly educated and to continue to learn and develop, EWS-WWF believes that developing an understanding of and interest in activities that promote sustainable development is critical.



**84%**

**OF INDIVIDUALS  
WANT MORE  
INFORMATION  
ON HOW THEY  
CAN CONTRIBUTE  
POSITIVELY TO  
THE BENEFIT OF  
ENVIRONMENT**



## 7.2 THE NEED FOR A NEW EDUCATION STRATEGY

Education and awareness programmes have proven to be effective complementary tools that help disseminate conservation messages and promote sustainable actions. We believe that EWS-WWF should roll out an education and outreach strategy that builds on the organisation's past success and increases its informal reach to the community.

Thanks to the assessment of the numerous past and ongoing education initiatives in the UAE, we have identified a need to continue raising the UAE population's awareness of important environmental issues in the areas of marine and terrestrial biodiversity conservation, climate and energy, and wildlife trade as a priority.

To leverage key opportunities pertaining to education and outreach, a dedicated strategy will be developed and finalised in the second half of 2015. This strategy will consider informal education and outreach for selected target audiences such as households, businesses, government officials, media, Emirati students and university students in general. Our education and outreach strategy will be based on analyzing the current gaps and topics selected to match our experience and skills and will complement existing programmes in the country. This could include public awareness campaigns, education for sustainable development initiatives, workshops, and more.

We envision that this approach will enable us to reach out to a wider range of the UAE population, especially the youth, who constitute a significant proportion of the country.

## 7.3 OPPORTUNITIES FOR THE EWS-WWF EDUCATION AND OUTREACH PROGRAMME

We understand the critical role EWS-WWF has to play in introducing solutions that can complement other programmes and initiatives in furthering the country's conservation agenda. This requires an analysis and understanding of current initiatives and programmes. It also requires an understanding of the existing resources and capacity and an analysis of potential synergies with our other programmes. Below are some opportunities that we are studying to develop the strategy.

- We are currently operating the Water Research and Learning Programme in partnership with Fujairah Municipality, HSBC Bank, and Earthwatch Institute. This is a citizen science programme that offers participants hands-on experience in conservation-related research and monitoring. While the programme primarily hosts HSBC employees, it offers a unique platform that can be developed for a business and government component of the Education and Outreach programme at EWS-WWF.

- According to the 2014 UAE Demographics Profile, approximately 17–20% of the population is less than 15 years old, while those between 15 and 24 years old represent about 14% of the population (Indexmundi.com, 2015). Since they include the future leaders and decision-makers of the country, empowering them with the necessary knowledge and skills is a useful way to develop and promote sustainability in the community.
- Related to the point above, as part of the UAE Vision 2021 National Agenda, the UAE aims to raise its ranking in several education-related indicators and has stated its intention to overhaul the education system and build a knowledge based society (Vision2021.ae, 2015). The UAE Ministry of Education (MOE) and the Abu Dhabi Education Council (ADEC), both partners that have supported our education programmes, have made significant progress towards achieving this national goal. This points to an opportunity to formally include the principles of Education for Sustainable Development in the new education system.
- The Ministry of Environment recently launched a comprehensive National Environmental Education and Awareness strategy (2015-2021) that looks at extensive engagement with schools, the business community, and the wider community through campaigns and education programmes. We are keen to continue working in partnership with the ministry not only on conservation and policy issues but also to contribute towards achieving this national strategy through our education and outreach programme.
- According to our brand and barrier study and ongoing engagement with our corporate stakeholders, there is a need to provide accessible information on sustainable action. This need has been articulated by the majority of CSR decision-makers whom we interviewed. We have a strong track record in delivering tools and workshops that build capacity, provide practical scientific knowledge, and inspire action among organisations and businesses. We have developed several creative tools, such as a board game that teaches employees how to select relevant technologies and develop a measurable and affordable energy and water conservation plan in the workplace. We have also developed several presentations and educational videos on a variety of topics that have been positively received. We will look at available tools and explore the need for others, keeping in mind our selected target audiences and their needs while leveraging our previous success and track record.
- There are several other awareness initiatives in the country that aim to advance environmental knowledge. Other environmental NGOs, community-based groups, and businesses have initiated and introduced environmental outreach programmes in public and private schools and among the general public. By working in partnership with them, we can further the reach of these programmes and ensure that they remain relevant to the most urgent environmental issues.

- EWS-WWF’s communication strategy involves outlining campaigns as a focus for the organisation. Considering a strong community outreach within the communications strategy that align with campaigns and other communications activities, could create the needed buzz and momentum for EWS-WWF’s work while educating the public on key conservation topics.

*Since its establishment in 2001, EWS-WWF has worked to increase environmental awareness in UAE schools as well as in local residents through public campaigns.*

## 7.4 BARRIERS FOR CONSIDERATION

Environmental education is most effective when long-term efforts are applied and when people are updated on and reminded about the importance of their roles as custodians of the planet. It is important to recognise that a very high percentage (approximately 80%) of the population is made up of expatriates of at least 160 nationalities. On top of that, 2008 statistics show that approximately 35% of the total population in the UAE is transient. These complexities contribute significantly to the population’s lowered accountability and sense of responsibility to the country and, thus, contribute to its weak link to conservation issues.

## 7.5 BACKGROUND OF ENVIRONMENTAL EDUCATION AT EWS-WWF

Since its establishment in 2001, EWS-WWF has worked to increase environmental awareness among students in public and private schools as well and local residents through public campaigns.

ENVIRONMENTAL EDUCATION PROJECTS				
YEAR	NAME	TARGET AUDIENCE	DESCRIPTION OF PROGRAMME	MAIN ACHIEVEMENTS
2002-2011	Enviro-Spell-athon	UAE school children, 6 to 14 years old	Inspired by WWF Pakistan’s programme, EWS-WWF and EAD developed this award-winning environmental education programme targeting students across all emirates and providing them with important information about the environment. In 2008, it was transformed into an interactive electronic version.	More than a million students participated in the book-based CD and online versions.

2011-2015	Be'ati Watani	UAE school children, 6 to 14 years old	Based on the Enviro-Spellathon, Be'ati Watani was created as an online bilingual environmental education resource comprising eight courses for school students. Specifically designed with information about the UAE's and Qatar's natural ecosystems and habitats, this course has helped build a greater understanding of environmental issues.	Be'ati Watani was implemented in more than 200 schools across UAE with more than 55,000 students participating in its annual quiz competition.
2014-2015		Qatari school children, 6 to 14 years old		Be'ati Watani Qatar was implemented in 17 schools in Qatar with maximum participation from each school.
2009-2011	Heroes of the UAE	UAE school children	Under the umbrella of the Heroes of the UAE national campaign, a school initiative inspired students to reduce energy and water consumption in their schools and pledge to protect the planet.	More than 70 UAE schools participated in the competition to reduce energy and water consumption. The best achieving school won an environmental makeover for its building—to improve its environmental performance.
2010-2015	Eco Schools	UAE school children	The Eco-Schools programme engaged children and young people in key issues associated with the environment, including sustainability, global citizenship, leadership, and the value of a low carbon future.	60 schools from Dubai and the northern emirates registered for the programme. 18 schools were awarded the international Green Flag.

### OTHER EDUCATION AND AWARENESS INITIATIVES

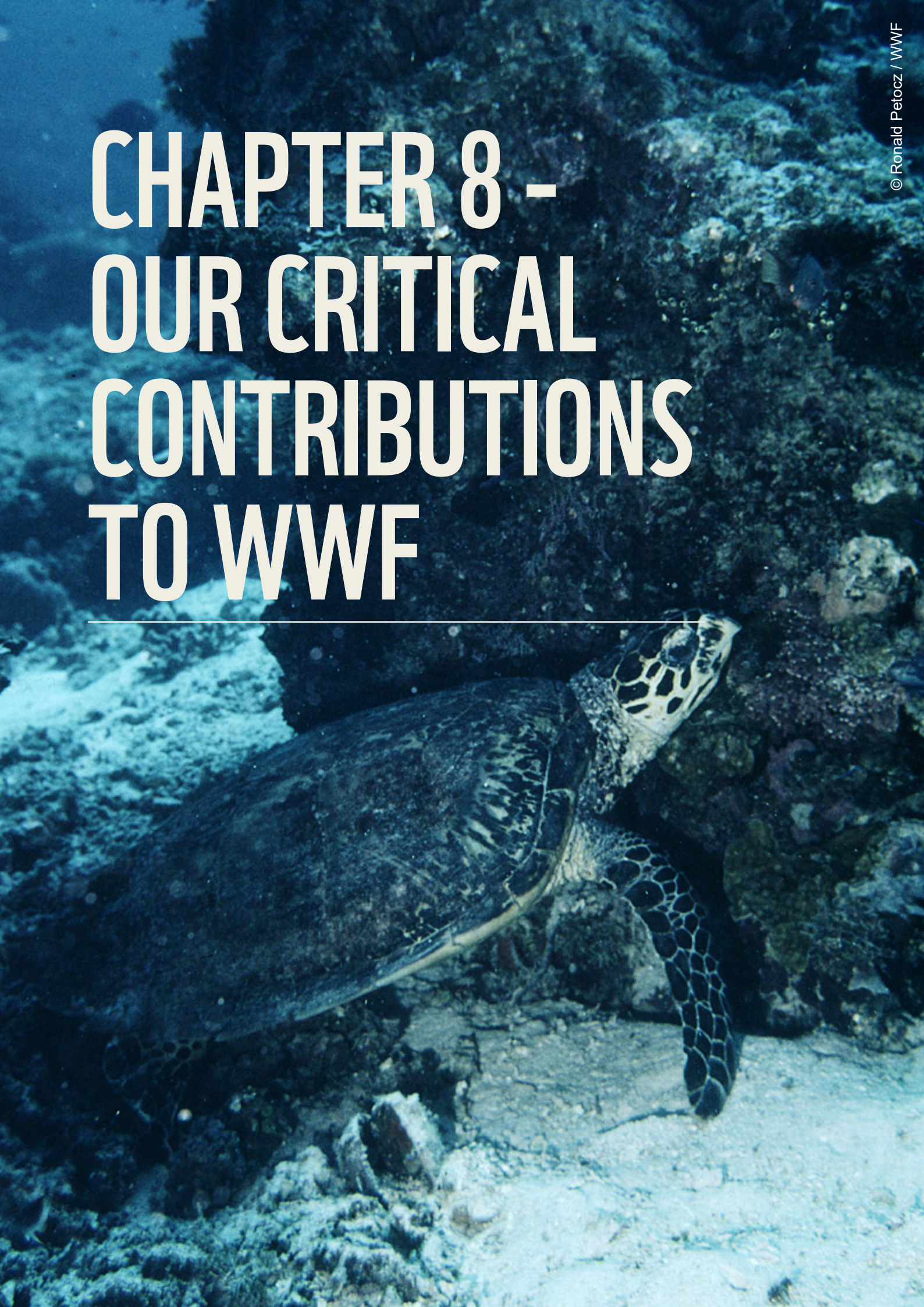
YEAR	NAME	TARGET AUDIENCE	DESCRIPTION OF PROGRAMME	MAIN ACHIEVEMENTS
2006-2008	Ghaf Tree Campaign	General public	The campaign encouraged UAE residents to plant saplings in a virtual garden, and, for every 100 saplings planted, EWS-WWF planted a real ghaf tree in the desert of Sweihan.	National awareness was raised around the need to conserve the Ghaf tree.
2009-2011	Heroes of the UAE	General public	Heroes of the UAE was a national campaign focused on energy and water conservation. This particular version focused on providing households with tips on saving energy and water in the home.	More than 10,800 people pledged to take on sustainable action on the campaign's dedicated website. Three case-study homes were given a green makeover to demonstrate how easy it was for families to save energy and water in their homes just by making simple technological modifications and regular behavioural changes.

2010-2014	Heroes of the UAE	Private sector	To motivate and inspire organisations, the Heroes of the UAE launched a Private Sector Programme in May 2010. It was focused on promoting energy and water conservation in the workplace.	Companies that joined the Corporate Heroes and successfully met the programme's 3 pledges, were able to achieve about 16% reductions in CO <sub>2</sub> emissions through energy- and water-saving measures. The programme developed a comprehensive toolkit to help companies reduce energy and water consumption effectively. The programme also awarded 3 environmental makeovers to businesses to demonstrate that water and energy conservation could bring financial benefits to their bottom line.
2010-2013	Choose Wisely	General public, supermarkets and restaurants	Choose Wisely aimed to raise awareness of the status of UAE fish stocks, and to promote sustainable fisheries.	The campaign was adopted at the national level with top chefs supporting the drive to inspire people to try new sustainable dishes. An award winning cookbook for sustainable fish recipes was published. A fish identification guide was distributed to 20,000 consumers via our partners. 16 hotels and restaurants, and 5 major retailers in the UAE joined the campaign by offering sustainable seafood to their customers and labelling it.
2008-Present	Earth Hour	General Public	Earth Hour is the world's biggest grassroots environmental movement, calling on people and institutions to turn off their lights for one hour in a symbolic gesture to demonstrate that, when everyone on the planet takes action, we can make a big difference. The UAE has been celebrating WWF's Earth Hour every year since 2008.	All 7 emirates officially participate in Earth Hour  In 2014, Earth Hour reached out to 5.2 million UAE residents.
2013-2017	Water Research and Learning Programme	HSBC employees, businesses, and governments	The Water Research and Learning programme is a citizen science programme in which participants help the EWS-WWF team to conduct important scientific research for the ongoing wildlife monitoring and evaluation in Wadi Wurayah National Park. The programme is made possible by a partnership with HSBC Bank, Earthwatch, and Fujairah Municipality.	The programme had over 500 participants, who conducted important fieldwork, including tagging more than 700 dragonflies, analyzing over 500 water samples, and measuring over 800 toads.  Participants pledge to tell 50 people about water conservation issues, and, thus, it is anticipated that the programme will touch at least 14,000 people per year.



# CHAPTER 8 - OUR CRITICAL CONTRIBUTIONS TO WWF

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The world we live in is changing. Pressure on the natural environment is accelerating, and, as a consequence, biodiversity is declining. To have the impact needed, a transformation in the way we think and act is paramount. If we collaborate at an international scale and act in unison to address the global challenges the planet is now facing, big conservation impacts can be made. This understanding was an important factor in the overall strategic process, which helped to further define our priorities. The Critical Contributions exercise developed by WWF International helped define the most conclusive footprint, landscape, and species priorities from a local to a global scale and to identify the wider sources of value that EWS-WWF (as a UAE-based organisation) brings to its global network.

While identifying priority roles, the Critical Contributions process allowed our team to focus on the most compelling issues. At the same time, this process was an important platform, allowing us to build broader, stronger collaboration with the global conservation agenda. We were able to consider areas in which we possessed particular expertise or could add value to bolster WWF's global efforts.

By articulating these Critical Contributions, we can focus on a limited set of strategic objectives and priorities and be better equipped to maximise our impact on the ground. Making strong, collaborative contributions to WWF's global mission and priorities will, in turn, contribute to the conservation of our entire planet.

We began defining EWS-WWF's Critical Contributions to WWF in September 2014. Initially this involved establishing a strategy team, a timeline and an in-depth review of similar exercises from other WWF offices. A first draft of the organisation's Critical Contributions was developed, shared with key individuals within the WWF network, and finalised after a series of workshops, stakeholder engagements, partner surveys, SWOT analyses, and the eventual definition of the priorities. The process of identifying and defining EWS-WWF's Critical Contributions has been fully-intertwined with the development of our five-year strategy.

But what makes a contribution critical? It is important to understand this matter. A Critical Contribution is identified by its level of urgency, the window of opportunity to act on it, its long-term viability, how well-suited EWS-WWF for the task, and how crucial EWS-WWF's involvement is for its success. These areas help to determine whether something is critical as opposed to simply being important.

Following this exercise, with input from our team, stakeholders, and partners, we were able to determine the critical contributions that EWS-WWF was capable of making in the UAE and to the wider WWF network during the strategic period of five years. These contributions include:

## CONSERVING MARINE HABITATS, MARINE TURTLES, & ARABIAN SEA HUMPBACK WHALES

EWS-WWF directly contributes to the WWF Global Marine Turtle Strategy 2020 through a Programme Implementation Agreement. Under this agreement, we will continue to identify critical habitats and work towards the effective protection and management of those already identified. In the next five years, we will continue to highlight the importance of the marine environment as a whole and the need to strengthen conservation action for hawksbill and green turtles in particular. We will also focus on the topic of ‘connectivity’ as a vehicle for the promotion of marine conservation within Marine Protected Areas and beyond. We will continue to work on migratory flagship species like marine turtles and the Arabian Sea humpback whale as a stepping stone to supporting wider marine conservation action and the topic of ‘connectivity’.

In addition, the organisation will begin to engage with the private sector on voluntary standards related to tourism and desalination to reduce the impact that these industries have on the marine environment.

## ELEVATING THE IMPORTANCE OF LOCAL PROTECTED AREAS

It is critical for us to continue collaborating closely with the UAE authorities to maintain the momentum of establishing and conserving the country’s first Mountain Protected Area in the emirate of Fujairah. Wadi Wurayah National Park will provide an unprecedented and high-level best practice example for future protected areas in the UAE and the region by putting in place new processes and institutional knowledge.

## ASSESSING THE ECOLOGICAL FOOTPRINT INDICATOR

While the Ecological Footprint Indicator provides a powerful awareness message, we will continue to assess it in the context of its suitability for Gulf countries given their climatic conditions, high migrant population, oil and gas industry, and desalination requirements. Other complementary indicators that measure the carbon component of the footprint and are suitable to guide decision-making will be evaluated and recommended for the region.

EWS-WWF has embarked on a review of the quality and accuracy of the current indicator for the specific circumstances of the Gulf region, particularly its climatic conditions, high migrant population, oil and gas industry, and desalination requirements. From the work that EWS-WWF has initiated, it is expected that more appropriate indicators may be recommended for the region.

## MITIGATING CLIMATE CHANGE THROUGH ENERGY EFFICIENCY POLICY WORK

Although GCC countries have not proactively engaged in the climate change topic historically, the trend has changed. They are shifting to a more collaborative

approach. For a number of years, EWS-WWF has developed political influence as a science-based organisation delivering concrete results on climate change and energy efficiency. Our deep understanding of the GCC perspective means that we are able to engage on the topic to influence climate change action in the UAE and, increasingly, in the region. By 2020, this work is expected to contribute to the WWF network by facilitating a strong expansion of energy efficiency options in the UAE through channels such as subsidy reform, increased funding for energy efficiency, and more robust and reliable energy efficiency standards.

## **CURBING THE ILLEGAL WILDLIFE TRADE**

We have worked on the wildlife trade issue since our establishment in the country in 2001. Since then, the illegal trade in wildlife has diversified and evolved. It continues to threaten wild populations of some of the world's most iconic species with extinction. Due to its central location between demand countries and supply countries, the UAE has become a transit route for illegal species and products and a demand country for exotic, status-symbol pets such as cheetahs and primates. Over the next five years, EWS-WWF will focus on the clampdown on transit species through targeted work with airlines and by encouraging a higher level of customs enforcement. Additionally, we will support the reduction of the demand by targeting local and international consumers.

## **KNOWLEDGE OF ARABIC LANGUAGE AND CULTURE**

Members of our team are uniquely placed at the heart of the Arab world and, thanks to their intricate understanding of Arabic culture, are ready to convey the WWF message in the Arabic language in a culturally appropriate manner. This exact contribution will see WWF communication and reports being translated into Arabic and distributed to Arab audiences and raising brand awareness among Arabic speakers. We will also advise and provide support to the WWF network on connecting with Arabic-speaking audiences and on related language issues.

## **STRENGTHENING OUR IMPACT**

We recognise that there are areas within the organisation that need to be strengthened and developed. We recognise the need for further prioritisation of our conservation programme work. We also see an opportunity in the modification of the global message to fit the local context. It is our belief that initial investment in fundraising, communications, and operations for a fixed period of time will help increase future income. We also believe that working closely with government partners is necessary if we are to attain and maintain high-level influence and are committed to building strong strategic partnerships with government entities. EWS-WWF has identified all of these areas as being critical for its future success, for its critical conservation impact on the UAE's environment, and for its global impact as part of the overarching WWF network.

# CHAPTER 9 - OUR UNIQUE ADDED VALUE AND ROLE

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While Emirates Wildlife Society is a national UAE-based organisation with a local mandate and a local board of directors, it operates in association with WWF and follows its guidelines and international best practice for its work in conservation. EWS-WWF focuses on local and regional action that ultimately leads to global conservation impacts. Therefore, the organisation's role is twofold:

From a national perspective, EWS-WWF is one of the most credible environmental NGOs in the UAE and a key player in the non-profit sector. It is the only representative office of WWF in the GCC countries, and its conservation efforts, especially on marine issues, extend beyond the UAE. EWS-WWF is uniquely positioned to:

- **Drive conservation action:** EWS-WWF initiates dialogue and brings essential environmental challenges to the table to drive solutions for such issues.
- **Outline science-based solutions:** EWS-WWF offers viable and practical science-based solutions to key environmental issues. In addition, EWS-WWF balances on-the-ground conservation work with policy recommendations to ensure long-term impact.
- **Integrate mainstream conservation into policy and legislation:** EWS-WWF understands local context and has the capacity to provide feasible policy solutions that scale up conservation and environmental protection in a fast-growing region.
- **Convene regional expertise and authorities:** As an independent organisation, EWS-WWF is an effective national and regional convener of multiple stakeholders, capable of bringing the right people to the table to initiate critical dialogue for collaborative conservation efforts.
- **Act as an influential stakeholder:** As a federal-level NGO with a credible reputation, EWS-WWF engages effectively with the UAE government at a high level to assist in the development of institutional capacity for sound environmental conservation. Its unbiased position also enables it to reach out to the public, engaging individuals with environmental issues and solutions.
- **Provide support & capacity-building for other organisations:** In a region new to environmental conservation, EWS-WWF brings local and international expertise and provides support and strategic guidance, helping organisations implement and drive environmental sustainability.
- **Operate in a central geographic location:** Geographically, the UAE is located between Africa and Asia, a prime location for focus on local and regional action that ultimately leads to conservation impacts at a global scale.



- **Have a global reach:** As an associate office of WWF, EWS-WWF has significant potential to contribute to global conservation priorities through efforts such as marine conservation as well as conservation in other critical landscapes. Through the WWF global network, EWS-WWF is able to access various forms of expertise and to keep abreast of the latest knowledge concerning environmental conservation.

With nearly 15 years of experience engaging with high-level government officials to influence and engage them on topics important to WWF and the UAE, EWS-WWF has expanded knowledge and built capacity for future environmental action. By developing expertise and credibility among the public and private sectors, EWS-WWF has made a name for itself in facilitating multi-sector partnerships for environmental conservation.

Without doubt, EWS-WWF will continue to be the preferred regional partner for conservation and sustainable development in the Gulf.

# CHAPTER 10 - STRATEGIC PARTNERSHIPS

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## 10.1 PARTNERSHIP CONTEXT

EWS-WWF cannot achieve its goals alone. Strong partnerships with businesses, governments, finance institutions, local communities, academia, and other NGOs are essential for driving change at the scale needed. Since its establishment, EWS-WWF has formed partnerships to achieve conservation goals at the local, national, and regional levels.

This collaborative approach has been essential to the way we work and operate and is one of the key factors in our success. Over the years, we have formed several joint partnerships on projects with key representatives of the public and private sector to align efforts and drive conservation and policy change at the emirate and federal level.

Bringing together stakeholders from different sectors of society has enabled us to foster debate on fundamental environmental issues and promote data sharing, transparency, and science-based decision-making. This role comes naturally, especially given EWS-WWF's independence and its ability to engage with a non-competitive agenda.

***We are committed to build strong strategic partnerships with the government and private sector to further conservation efforts***

Our partners have been essential in facilitating fieldwork by providing access and resources. They have also helped us gain support for our solutions at higher levels within the government. We have been able to scale up our success due to such partnerships, and, thus, we are keen to develop a formal partnership plan that could enhance our collaborative approach.

Developing an official long-term partnership plan will help us engage more strategically with partners to achieve our conservation objectives. Therefore, we consider it a key intervention moving forward. We will map out opportunities that could help us gain commitments for environmental conservation at different levels of government, influence public perception and behaviour, and potentially enhance financial support.

We will focus on progressive “large-scale social change through broad cross-sector coordination” that unites the efforts of different stakeholders to deliver large-scale impacts by collectively advancing towards goals as opposed to working individually (K&K, 2011).

The proven partnership models we are adopting follow four key principles based on best practice examples (K&K, 2011);

- 1) Common agenda** – uniting all partners under a shared vision for change.
- 2) Shared measurement systems** – measuring and reporting on partnership success.
- 3) Mutually reinforcing activities** – grouping actors together to “coordinate their differentiated activities” according to their different capacities and capabilities.

**4) Continuous communication** – developing trust, recognising and appreciating common motivation, and agreeing on priorities.

## GOAL

To increase the conservation impact through the development, proactive maintenance, and nurturing of partnerships.

***EWS-WWF has 15 years of experience in driving environmental conservation in the UAE***

## STRATEGY 1:

### DEVELOP A PARTNERSHIP MANAGEMENT FRAMEWORK AND BUILD CAPACITY AND ACCOUNTABILITY IN PARTNERSHIP MANAGEMENT IN EWS-WWF.

Strategic partners are defined as those with whom we seek to develop a long-term formal alliance and engagement plan to achieve joint objectives. Strategic partners have common or aligned goals that support the implementation of our conservation strategy by unlocking support for a particular environmental topic or across different topics. Developing such partnerships would enable us to influence decision-making and development plans, prioritise policies, gain political buy-in and drive positive change in public perception and behaviours.

Nurturing partnerships requires careful management. We will be looking at developing best practice guidelines to improve effectiveness and accountability in partnership management. These will include the development of a partnership portfolio, the establishment of a communication plan for each partner, the documentation of the partnership, and the evaluation of success. Regular monitoring and evaluation will also be implemented. This will include an annual review of the partnership portfolio to derive the lessons learned, monitor success, accommodate the changes in the external context, and ultimately to improve collaborative efforts.

## OBJECTIVE 1

By Q4, 2015: Appoint team members to manage and oversee specific strategic partnerships or engagement opportunities.

## OBJECTIVE 2

By Q4, 2015: Develop EWS-WWF guidelines for strategic partnerships that are based on best practice.

## OBJECTIVE 3

By Q4, 2016: Complete staff development training on building and maintaining partnerships, ongoing relationship management, and the documentation of partnership engagement on Salesforce.

## STRATEGY 2:

### FORMALISE EXISTING PARTNERSHIPS AND ESTABLISH NEW STRATEGIC PARTNERSHIPS WITH GOVERNMENT, SEMI-GOVERNMENT, AND THE PRIVATE SECTOR.

A substantial effort has been put forward to identify suitable partners with whom to achieve the long-term goals of the different programmatic areas of EWS-WWF. This includes mapping potential new partners, developing existing relationships, and analysing opportunities to mobilise partnership support in our strategy.



**BRINGING TOGETHER  
STAKEHOLDERS FROM  
DIFFERENT SECTORS  
OF SOCIETY PROMOTES  
DATA SHARING,  
TRANSPARENCY  
AND SCIENCE-BASED  
DECISION-MAKING**

#### OBJECTIVE 1

By Q4, 2015: Rollout a partnership portfolio governed by a clear monitoring and evaluation structure on Salesforce. This portfolio is to be assessed and analysed on an annual basis.

#### OBJECTIVE 2

By Q2, 2016: Formalise key strategic partnerships and ensure that they are managed following EWS-WWF guidelines for strategic partnerships. Build accountability by monitoring and evaluating relationship management on a quarterly basis.

#### OBJECTIVE 3

By Q2, 2017: Utilise existing strategic partnerships with EWS-WWF's government or private sector stakeholders to support the development of two governmental policies in line with EWS-WWF's conservation agenda.

#### OBJECTIVE 4

By Q2, 2017: Identify and establish a strategic partnership with one or two new key governmental partners that are aligned with EWS-WWF conservation strategy, integrating key components of environmental conservation within the federal governmental agenda.

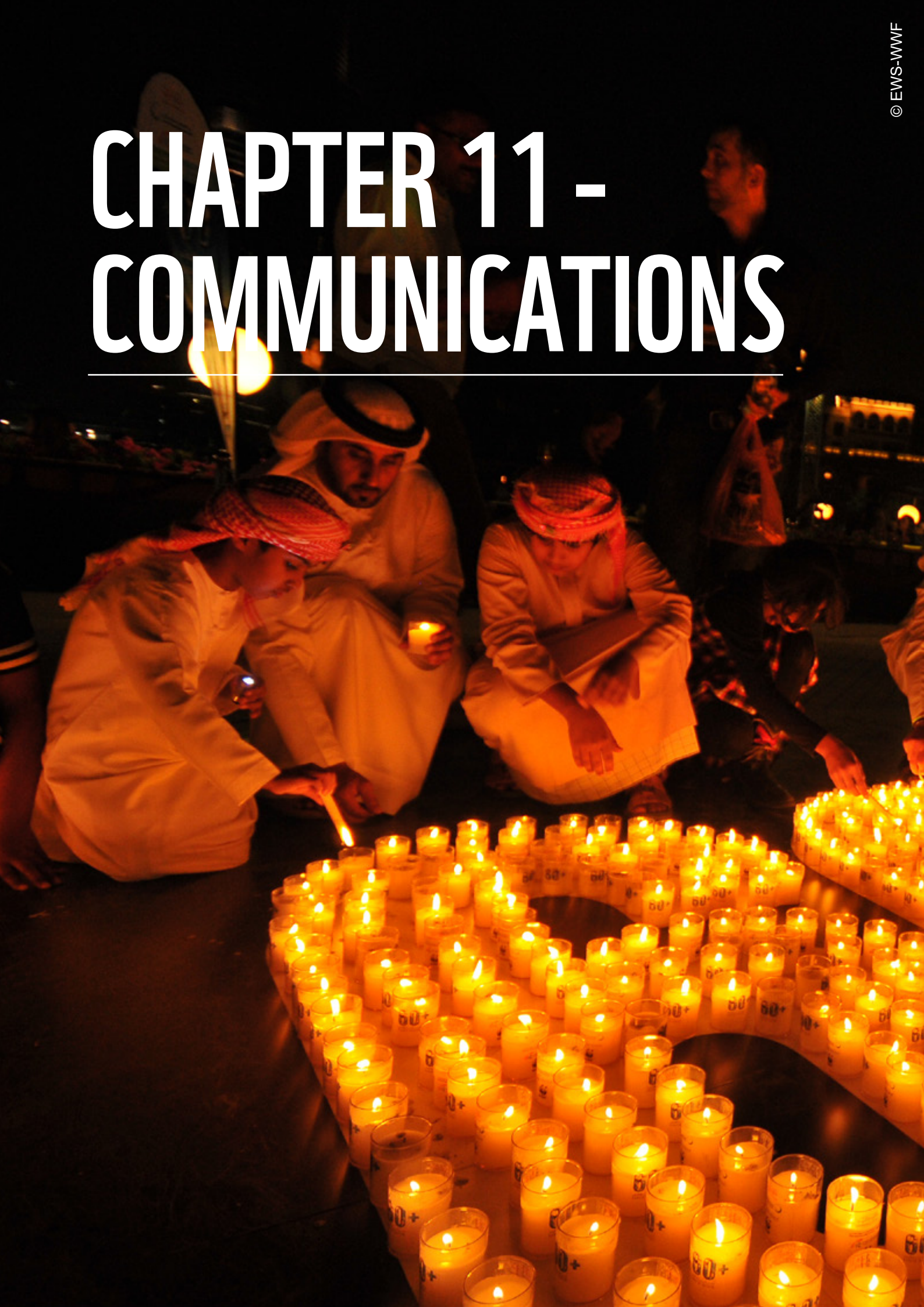
#### OBJECTIVE 5

By Q4, 2016: Develop partnerships with NGO networks and coalitions to further drive EWS-WWF conservation priorities and leveraging civil society groups with similar agendas, acting as key advocates.



# CHAPTER 11 - COMMUNICATIONS

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## 11.1 COMMUNICATIONS CONTEXT/MACRO ENVIRONMENT

The UAE is a small rich country that has developed extremely rapidly. On the one hand, the desire and ability to continue to develop the country exist; on the other hand, there are delicate life-sustaining ecosystems that require careful custodianship.

Economic growth is the clear local priority, and it is unlikely to slow down. It will probably be escalated further on account of EXPO 2020, which will be hosted in the country. While conservation and environmental issues are known and constitute part of ministerial priorities, the garnering of public support has been slow and diffused in its activation. Environmental conservation as a key agenda is still at the developing stage. Hence, there is initial, although limited, interest in the topic among the general public, the media, and corporates.

NGOs working on poverty alleviation are closer to the public's heart and do better on brand recall scores than pure environmental agencies. While this is similar to brand challenges that WWF faces elsewhere in the network, EWS-WWF has an especially complicated "visiting card" due to its dual brand and the lack of buy-in concerning the role of NGOs when it comes to environmental agencies.

In addition, the UAE is a highly diverse country with an 80% percent expatriate population. While English is widely spoken by most, Arabic remains the official language in the country. Other languages such as Urdu, Hindi, and Tagalog are also widely spoken. The diversity and the transient nature of most of the population complicate the landscape from a brand communication perspective.

Environmental media is still developing. This is reflected in the low traction and prioritisation of conservation and environmental news, especially in Arabic media. Given that it is a developing market, media space is not yet saturated. Limited media autonomy is a factor, and interest in investigative journalism is still in its infancy.

### OPPORTUNITIES

Recognising that our brand is one of our most important assets, we will devote more time and resources to the process of building a stronger one in the UAE.

- Given that EWS-WWF is the only conservation and environmental NGO with a plethora of work in the UAE, it has the unique opportunity to garner a niche position.
- So far, this region is a relatively new territory for well-executed, supporter-generating campaigns with the push of a global network.
- With one of the highest degrees of smartphone penetration in the world, the UAE has a highly developed mobile and digital media scene. With this growing digital population, it would be opportune and beneficial to communicate in a more interactive way.

**THERE IS AN  
INITIAL, ALTHOUGH  
LIMITED, INTEREST  
IN ENVIRONMENTAL  
TOPICS AMONGST THE  
GENERAL PUBLIC, MEDIA  
AND CORPORATES**

- Issues such as sustainability, renewable energy, and the future readiness of the country are surfacing in recent media and communication. This presents the opportunity for EWS-WWF to use the current rhetoric to push for more ambitious conservation and climate agendas.
- According to a comprehensive study on the awareness, barriers, and motivations of the ‘EWS-WWF’ brand, there is an expressed need for information related to sustainable lifestyles and sustainable businesses. Eighty-nine percent of the respondents to a survey targeting CSR decision-makers and 84% of respondents to a survey targeting the general public said that they would like to receive more information on how to contribute to or help the environment. Solution-oriented and informative messages and campaigns are likely to be welcomed in the UAE.

## KEY TARGET GROUPS

We will spend more time and effort engaging with the following audiences in the UAE in as many interconnected conversations as possible and be will be “out there” to a greater extent than before. We will spend more time finding the right messages and work harder on inspirational stories and pitches that resonate with each different audience group.

Given the nature of EWS-WWF’s complex conservation and environmental work, it is imperative to interact with a range of target groups using different levels of engagement.

- **Key stakeholders:** These are important opinion leaders and decision-makers in the government or in key partner organisations. They can play an important role in shaping and/or pushing environmental conservation work and the associated agenda. We aim to establish EWS-WWF as a knowledgeable, relevant, and credible partner organisation whereby key stakeholders will support our conservation work. We will focus on in-depth communication to accelerate conservation efforts through press engagement, report launches, and other strategic opportunities.
- **Corporate Sector:** This includes private corporations as well as government organisations. We will target private sector companies and some government authorities for partnerships and use their corporate communications as potential channels for EWS-WWF brand communications. Their employees could be a potential group of supporters for our cause and potential facilitators of partnerships for the organisation in the future. We see this not only as an opportunity to drive brand awareness but also as one to enhance fundraising and sponsorship work that will help us establish EWS-WWF as the environmental organisation to support.
- **Households:** These are urban families, usually with school-aged children. Most are educated and comfortable with the English language, but our com-



munications would have an Arabic-inclusive strategy. That is, it would not only be aligned with language but also with cultural values and aspirations. It is possible that, by addressing such a wide demographic, our communications will reach a spectrum of professionals, students, and housewives. These households will see our brand and messages through the mass media/digital space. Some will be exposed to it at their workplaces via our corporate partners. We aim to create multiplier effects a few times a year through campaigns and fundraising communications. We feel that this will be important in creating ‘buzz’ around critical topics, thus complementing our conversations with our key stakeholders and accelerating environmental wins.

## OVERALL COMMUNICATIONS STRATEGIC GOAL

Our overall communications goal is to establish EWS-WWF as a credible NGO to partner with, to drive the conservation and environmental agenda in the UAE.

We will do this by first using a “visiting card communications approach” and defining “Who we are, what we do and how we do it” baseline messaging.

We will then generate buzz and a multiplier effect using the conservation stories as content: We will use a multi-channel approach to deliver our messages, tell inspiring stories to capture new audiences, adjust our pitch and language to increase different target groups’ understanding of key topics that we work on, seek platforms and channels to increase exposure to the EWS-WWF brand, collect support for our cause through targeted campaigns, and use a synergistic approach to cascade the benefits back to EWS-WWF’s brand image.

## OVERALL STRATEGIC OBJECTIVES FOR COMMUNICATION

(1) Increase top-of-mind awareness of environmental topics and EWS-WWF’s brand by preparing the ground for the “ask” (call for an environmental action). Increasing instant awareness will do this, as will enhancing logo recognition in key markets through campaigns, employee engagement programmes, selected media, and outreach initiatives for the general public and households. This is the first step of brand-building as we prepare the ground for the “ask”.

(2) Become the partner of choice for support by the government and the private sector, either financially or by providing pro-bono services. We will do this by supporting the fundraising objectives with a view to engaging employees so that the corporates see the undeniable value of engaging with our brand and, at the same time, so that we can spread environmental messages to employees and their families.

(3) Engage with key stakeholders consistently on issues that matter to EWS-WWF, and work at influencing them towards critical decisions concerning conservation.

These strategic objectives will require close collaboration and a partnership approach with the business development and conservation teams. They will also require a different operation model—one that can facilitate effective delivery.

**Our overall communications goal is to “establish EWS-WWF as a credible NGO to partner with, in order to drive the conservation and environmental agenda in the UAE”.**

**These key objectives will be delivered through the following strategies:**

## STRATEGY 1:

### INVEST TIME AND EFFORT TO ARRIVE AT A STRONG BRAND POSITION/GENERATE A CLEAR, UNIFIED BRAND POSITION.

EWS-WWF has a complex brand scenario whereby the local-global relationship and association is not fully understood among the general public according to a recent brand survey. Coupled with low media (advertising) exposure and no outlet to raise funds from individuals, this results in a brand with limited awareness and recognition, and unclear perception. We want to re-examine all key brand parameters to arrive at a EWS-WWF brand DNA which is relevant for the local context *yet also* in line with the global WWF brand. We want to continue to develop messages that portray the brand as being knowledgeable, optimistic, determined, and engaging. For this region we would like to work harder at developing inspiring messages within the wider environmental context.

Objectives	2015	2016	2017	2018	2019	2020
Study the target audience drivers, motivators, and barriers for insights and develop clearer and more targeted messaging in the future.	●					
Build internal capacity and understanding of the brand identity and the importance and holistic merits of brand custodianship across the wider EWS-WWF team.		●				
Develop and set brand KPIs and brand-tracking frequency.	●					
Develop a clear visiting card, succinctly defining who we are, what we do, and why we do it.	●					
Develop a new logo and name for EWS that reflects the breadth of the organisation’s work.	●					
Deliver a new brand campaign for EWS-WWF in order to re-launch the brand with a new logo (EWS logo) and message, raise the share of mind, and create a greater understanding of what we do. Incorporate the new brand message into all current communications from the fundraising and programme streams. This will also serve as a good example of how the communications strategy would be operated.		●				



## STRATEGY 2:

### SINGLE-MINDEDLY INCREASE MEDIA COVERAGE OPTIONS

We want to increase brand awareness and logo recognition among the key audiences by maintaining a consistent push on outreach opportunities through a mix of internal and external media channel options at a national and regional level. We will explore and develop media channel options through corporate partners and media companies to add volume and drive to our communication efforts and generate a bank of media space for future use.

OBJECTIVES	2015	2016	2017	2018	2019	2020
Sign up at least one annual media partnership for a flagship campaign.		●				
Build a bank of pro-bono media favours through corporate channels and media partnerships in order to use them for EWS-WWF campaign engagements, including digital pro-bono placement through corporate partners, key websites, and blogs.		●				

## STRATEGY 3:

### INCREASE REACH AMONG THE EMPLOYEES AND STAKEHOLDERS OF OUR PARTNERS USING INTERNAL CHANNELS

We see the potential for deepening engagement with corporate employees. We want to increase our engagement opportunities to align them as campaign supporters, community fundraisers, and potential online donors. We will prioritise communications support of partners where we see the potential to achieve a greater impact on reach and/or profile-raising work. We will look at strengthening communications support of corporate partners by developing strong media assets and working closely with the Development Team to align the partners' needs with ours.

OBJECTIVES	2015	2016	2017	2018	2019	2020
Deliver a joint communication exercise with a sponsor or a partner (setting an example).	●					
Launch at least one employee awareness and engagement campaign with a key corporate partner through corporate employee communication channels.		●				
Define a process whereby the communications team plays a more active role in pitching for sponsorship or support and in negotiating a partnership agreement.	●					
With the EWS-WWF Management Team, put a process in place to ensure that delivery of partners expectations is well-resourced and that the exploration of joint communication initiatives is taken into account during proposal pitching.	●					

## STRATEGY 4:

### ENHANCE IMPACT THROUGH CAMPAIGNS.

We have seen how targeted communications recounted in an inspiring way can generate tremendous interest and create buzz around the brand.

We want to develop capacity in order to use the campaign approach to raise our profile and push awareness scores upwards. Using this approach, we want to support one super campaign annually, chosen for its ability to engage in a topic of strategic relevance, relevant to a range of target groups, and of interest for influencing stakeholders. We will support such a campaign with the cumulative weight of all our available media channels to generate a substantial spike.

Objectives	2015	2016	2017	2018	2019	2020
Develop internal capacity and understanding of impactful and effective campaigning that can accelerate conservation wins, garner financial support, and increase brand awareness and reach.	●	●				
Develop a strategy for Earth Hour so that it can increasingly contribute to EWS-WWF work and brand awareness.	●	●	●	●	●	●
Plan and launch one flagship campaign per year that has clear links to programme needs		●	●	●	●	●

## STRATEGY 5:

### DEVELOP INTEGRATED DIGITAL COMMUNICATIONS STRATEGY THAT CONTRIBUTES TO INCREASING THE SHARE OF VOICE (REACH) AND SHARE OF INFLUENCE (INSPIRING STORIES/SUPPORTERS' GROWTH)

We will keep up with the GCC/global online media trends and expand our online presence significantly. We will begin by strengthening the EWS-WWF website and social media platforms. We will increase our engagement with and reach to new audiences, build a growing supporter base, and connect with online donation platforms.

We will embed an experimental approach in our digital strategy to stay up-to-date and relevant in a region where Internet, social media, and smartphone penetration passed the 75% threshold in 2014.

Objectives	2015	2016	2017	2018	2019	2020
Study the UAE digital footprint in depth and define a set of prioritised digital platforms that will provide us with optimum engagement with and reach to our different target audiences.	●					

Procure monitoring and data analysis tools to build the knowledge necessary for the ongoing evaluation and testing of our digital communications.	●	●				
Improve our digital presence by restructuring our website to increase the retention of visitors.	●	●	●	●	●	●
Build internal capacity and knowledge in digital communication, data analysis, and content creation suitable for the digital age.	●	●	●	●	●	●
Increase reach through digital presence on the Internet and social media by using innovative digital campaigns and inspiring narratives.		●	●	●	●	●
Deliver a digital initiative to increase the reach of the brand		●	●	●	●	●

## STRATEGY 6:

### INCREASE “SHARE OF INFLUENCE” AMONG STAKEHOLDERS BY WORKING WITH PROGRAMME TEAMS ON 2020 OBJECTIVES

<p>We will undertake research among the key stakeholders to understand their motivations and the barriers to their engagement with EWS-WWF. We will support the programme teams in their objectives to increase engagement among the more influential stakeholders by developing comprehensive communication plans for the programmes. We will build deep relations with the media and press to influence these stakeholder groups and drive our success stories to the forefront. We will develop scientific, engaging, and inspiring reports and papers to generate dialogue on key topics and drive conservation change in the country.</p>						
OBJECTIVES	2015	2016	2017	2018	2019	2020
Develop an annual timeline for report launches, key engagement opportunities with stakeholders, editorial/press-ready content, and potential campaigns.	●					
Develop a strong PR strategy to support programme communications.	●					
Implement at least one press-driven engagement targeting key stakeholder groups.	●	●				
Cascade programme conservation stories to different target audiences through digital communication, employee engagement opportunities, and brand communications.	●	●	●	●	●	●

## STRATEGY 7:

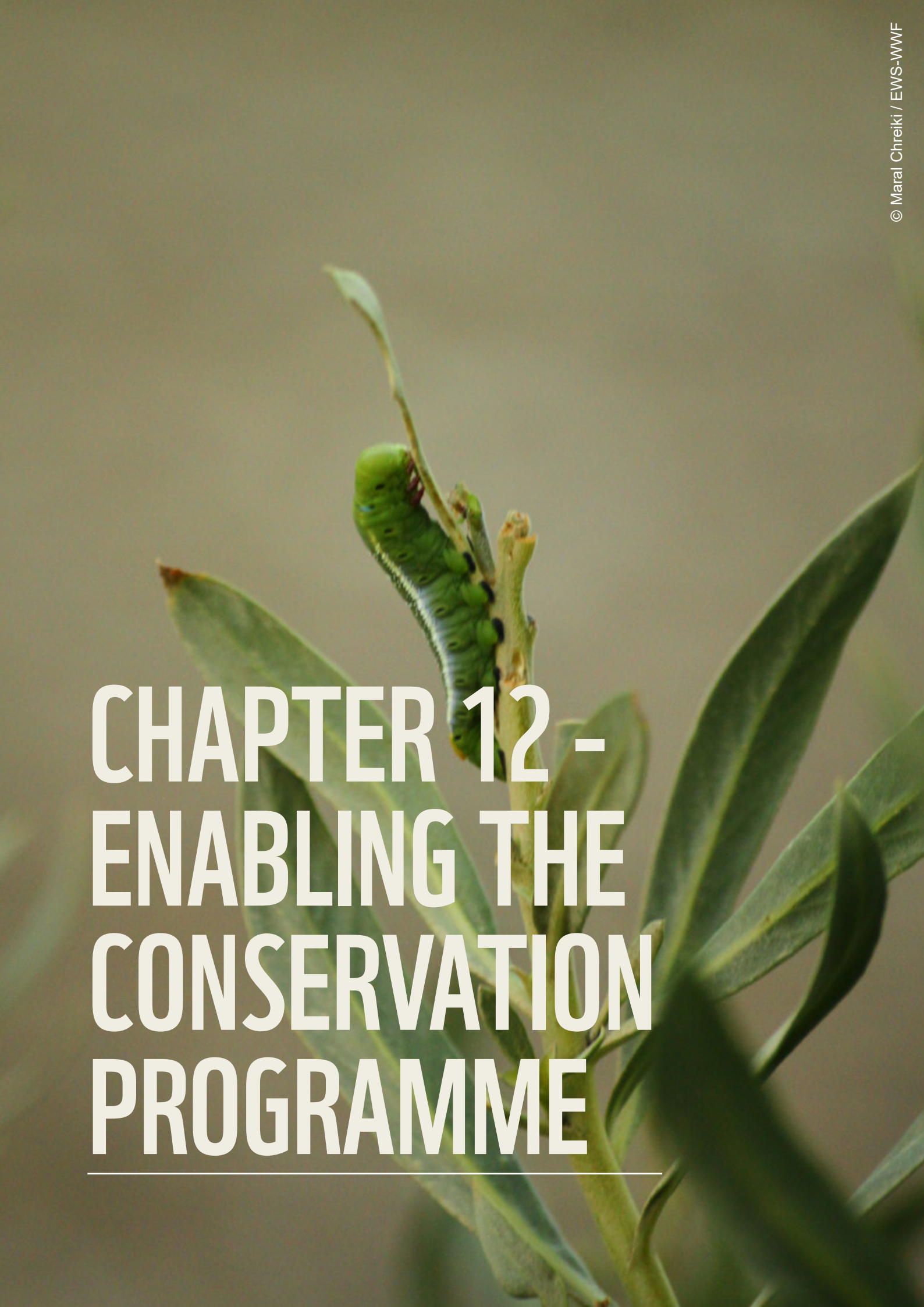
### BUILD A STRONG COMMUNICATION TEAM WITH NECESSARY SKILL SET FOR SUCCESSFUL DELIVERY OF THE THREE KEY STRATEGIC OBJECTIVES.

Communications play an important role in catalysing conservation change and garnering support for EWS-WWF. In order to deliver quality communication initiatives, we will seek to build a strong and diverse skill set. We will establish clear roles and responsibilities to deliver the three key strategic objectives for communications. We will adopt an account management style of delivery that will provide a sense of ownership. We will maintain a balance between in-house and out-of-house skills in a structure that can respond to changes in scope quickly and efficiently.

OBJECTIVES	2015	2016	2017	2018	2019	2020
Develop a manpower plan for an entrepreneurial communication team with well-defined roles and responsibilities. The manpower plan should ensure agility, easy scaling, and specialising.	●					
Key core skills are in place to support different communication initiatives.		●				
Build strong relationships with a creative agency to help shape the brand.	●	●				
Hire a PR agency to help deliver strong messages that are in line with the strategy across programmes.		●				

## MONITORING AND EVALUATION

ITEM	KPIs	METHOD	FREQUENCY
<b>Brand</b>	Brand awareness level	Awareness survey (country report)	Annually – first conducted in 2017
<b>Website</b>	Number of visitors, source of visits, bounce rate	Google Analytics	Quarterly
<b>Social media</b>	Followers, shares, views, and likes	Facebook API and stats UberVu (or similar monitoring tool)	Quarterly
<b>Traditional media</b>	Reach and accuracy of coverage	Media Watch (or similar service) Qualitative analysis of coverage	Bi-annually
<b>Campaigns</b>	Awareness of topic	Basic awareness survey (before/during peak)	Per campaign

A close-up photograph of a vibrant green caterpillar with dark spots, clinging to a thin, light-colored plant stem. The caterpillar is positioned in the upper center of the frame. Surrounding it are several large, elongated, green leaves with prominent veins, some in sharp focus and others blurred in the background. The overall lighting is soft and natural, highlighting the textures of the caterpillar and the plant.

# CHAPTER 12 - ENABLING THE CONSERVATION PROGRAMME

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## 12.1 FUNDRAISING CONTEXT

According to the United Nations, the UAE may be considered the most diversified economy in the region (UNEP, 2013). With an urban population of 85% and a per capita gross national income (GNI) of 58,090 USD, the country ranks as 'high income' (WBG, 2014). The UAE seeks to continue growing its economy, and, thus, businesses are increasingly gaining importance as important players in tackling environmental challenges and reducing its high per capita carbon emissions.

Delivering conservation has a cost, and EWS-WWF is funding its Conservation Programme and operations in the UAE through partnerships with governmental and private institutions in the country. The ease with which we can seek funding is somewhat restricted by the legal framework, which limits the sources of contributions to the private and public sector. As part of the WWF network, we follow WWF standards on funding and operate according to the Global Corporate Guidelines that encourage partnerships, which helps companies advance their sustainability agenda.

We have forged strong links with the private sector, and such partnerships are fruitful as they offer more than just financial gain. Through these partnerships, we drive businesses to adopt sustainability measures and join hands in awareness efforts. Seeking opportunities to connect with some of the fastest growing sectors, including tourism, retail, finance, education, and telecommunications is vital.

Ensuring that we can deliver on an ambitious and effective conservation strategy that brings benefits to the UAE and its people requires the investment of efforts in growing current sponsorship and partnerships and building new ones. Many global WWF offices have proven that investing further in such efforts helps to generate an even bigger conservation impact. We will prioritise the securing of programme sponsors, the growth of unrestricted funding through our Corporate Membership Programme, and the targeting of some of the fastest growing sectors.

## 12.2 FINANCIAL TARGETS

The financial targets are based on not-yet-secured funding for the delivery of the planned conservation programmes and operations plan. The numbers are presented in United Arab Emirates dirhams.

AED	2015	2016	2017	2018	2019	2020
<b>CONSERVATION PROGRAMMES (AED)</b>						
Climate & Energy	3,366,300	7,287,650	9,413,700	5,912,800	6,266,500	6,407,500
Marine Conservation	1,496,500	6,517,500	7,605,500	7,707,500	6,123,500	8,389,500
Wildlife Trade Programme	1,384,500	2,772,500	2,827,500	1,667,500	1,716,500	1,724,500
Terrestrial	1,117,000	2,567,000	2,834,500	3,158,500	2,850,500	2,713,500
Water Research and Learning Programme		1,600,000	1,400,000	3,100,000	3,100,000	3,100,000
Education and Outreach	TBD	TBD	TBD	TBD	TBD	TBD
Total Programme	7,364,300	20,744,650	24,081,200	21,546,300	20,057,000	22,353,000
Communication and Development	5,535,300	7,618,800	6,400,800	6,813,300	6,453,600	6,271,600
Finance and Admin		2,100,000	2,400,000	2,100,000	2,100,000	2,200,000
TOTAL	12,899,600	30,463,450	32,882,000	30,459,600	28,610,600	30,824,600

## STRATEGIES

Improving the quality and diversity of our funding from different sectors and growing a high percentage of unrestricted funds to deliver our conservation strategy is our ultimate goal. We will do this by diversifying our income streams, identifying the most cost-effective revenue channels, and improving integration with conservation and communication units.

Our initial focus will be to fully fund the conservation programmes in parallel to our overall aim of growing a higher level of unrestricted funds. Through strong brand awareness, increased transparency, improved M&E, and a stronger conservation impact, EWS-WWF will be recognised as the leading partner environmental NGO for the public and private sector, and this will require increased investment in fundraising. By 2020, we aim to be the chosen recipient for environmental giving in the country.

Three strategies have been identified to leverage support from the private sector, public sector, and individuals, and they will be delivered using an integrated organisation-wide approach.

### STRATEGY 1

To enhance corporate support through improved reach and stakeholder management, and an integrated strategic direction for communication in support of fundraising.

### STRATEGY 2

To diversify support from the public sector by nurturing existing partnerships and applying for grants from private foundations.

### STRATEGY 3

To build and grow a steady base of supporters who are increasingly engaged and willing to support environmental conservation.



# CHAPTER 13 - FINANCIAL MANAGEMENT AND ADMINISTRATION

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*The finance department is an integrated team of professionals who deliver the highest quality services to support and improve the conservation efforts of EWS-WWF*

## 13.1 OPERATIONS AT EWS-WWF

While EWS-WWF has grown in recent years, our operations function has remained relatively small. It is evident that the organisation would benefit from investments to this area in order to increase its future effectiveness. We acknowledge that some of the main challenges our operations team faces are in the areas of support for line management in people development, managing finance, and legal, to the extent that it is better to support the programme and development function with the available up-to-date data.

During the strategic planning, a SWOT analysis was conducted in each area of operation and finance, and the strategies and objectives outlined here were developed to tackle gaps and weaknesses, and to eliminate future threats. Based on the analysis, several objectives and strategies have been formulated to address the aforementioned issues.

To ensure the success of the overall operation strategy, as a matter of priority, EWS-WWF will hire a Director of Operation in Q3 2015. This new position will oversee this critical area of operation, including finance, admin, legal and human resources.

## 13.2 CURRENT SITUATION

Since 2010, EWS-WWF has aligned itself with the Financial Standards of WWF and is reporting to the World Wide Overview. The organisation is audited annually by an independent international consultant and, at the same time, is subject to audits by the Ministry of Social Affairs, to which it also reports on a yearly basis.

Currently, our financial management is focused on daily administrative financial tasks. The finance department produces monthly expense reports and quarterly finance reports per department, programme, and project. This is in line with the requirements for current project governance.

Moving forward, however, the finance function will be more strategic. It will exist in strong collaboration with programmes and the other organisation functions to develop quality budgets and apply greater financial accountability with tighter resource control. There is also a need for improved financial reporting to the Management Team, Board of Directors, and donors.

## 13.3 OPPORTUNITIES, GAPS AND CHALLENGES

### THE FINANCIAL MANAGEMENT SYSTEM

- Improved clarity on the operation of financial management systems and processes, as well as the adequate manpower needed in order to operate such systems efficiently.
- The organisation will benefit from better collaboration between the finance department and other functions, such as programme, communication and fundraising to develop budgets and forecasts, as well as promote good stewardship among all budget holders and managers.
- Improved use of accounting software with less time spent on manual data input will result in more frequent and up to date reporting.

### 13.4 FINANCIAL REPORTING

- Donor reporting does not happen regularly throughout the organisation, and there is little involvement from the Finance Department. We received feedback from donors, who found it difficult to understand our financial reports.
- The Management Team meets on a quarterly basis to review the budget and financial accounts. The Management Team has requested a new financial report format, which will be implemented from Q1, 2015, with the purpose of providing a clearer overview of where and how the finances are being spent.



## 13.5 POLICIES AND PROCEDURES

- EWS-WWF does not have an approved Financial Manual. Such a document should be developed and implemented as part of the Operation Manual.
- There is only one accountant, who processes and approves the payments in the financial system.
- EWS-WWF has a detailed Delegation of Authority matrix, which is clear on who can approve certain purchases. This is being followed well by the finance department.

## 13.6 FINANCIAL ISSUES

- Unrestricted funding in 2014 was 12%.
- EWS-WWF has managed to build up a reserve of funds since 2008 to satisfy its reserve policy. At the end of 2014, this reserve was sufficient for continuing basic operations for at least six months.
- Since 2008, EWS-WWF has received a grant from the UAE government that can partly be spent on operations and has helped the organisation grow. However, it is important for EWS-WWF to diversify its funding and not become dependent on specific grants or donors. This issue must be addressed in the fundraising strategy.
- Around 44% of income is currently in the form of short-term project funding—i.e. funding that is restricted and time limited (for one to three years). Long-term funding contracts for projects have reduced in the last year as some projects have drawn to a close and the new wave of programme fundraising has not yet started. Longer-term programme funding will need to be prioritised and tackled within the fundraising strategy.
- In the past, some projects have not paid their way with regards to staff and office support costs. Although this situation has improved recently with increased transparency concerning the real cost of projects, it is important not to take on projects in the future unless all costs are fully funded.
- As a result of the financial situation, funds have been used to fill the financing gap for some ongoing activities. This is not sustainable in the long-term and makes key operational services vulnerable to cut-backs or termination.
- While important and relatively successful, some past fundraising initiatives were time-consuming and contributed small sums compared to the input needed to operate them. Good collaboration between finance and fundraising is critical for the accurate up-to-date monitoring of fundraising efficiency.

**Goal: The Finance Department is an integrated team of professionals who deliver the highest-quality services to support and improve the conservation efforts of EWS-WWF.**

## STRATEGY 1

**IMPLEMENT EXCELLENT FINANCIAL MANAGEMENT IN ACCORDANCE WITH INTERNATIONAL BEST PRACTICES.**

### OBJECTIVE 1

Develop Financial Manual by Q4, 2015, as part of the overall Operational Manual to be implemented and adhered to from Q4

### OBJECTIVE 2

Implement strict cost recovery policies on all programmes and projects and introduce measures to highlight problems, such as unfunded projects or activities, before they become financial burdens.

### OBJECTIVE 3

Develop the future annual, programme, and project budgets to a high and accurate standard through increased collaboration between the Finance Department and other functions, such as programme, communication, and fundraising.

### OBJECTIVE 4

Produce monthly expenses report for all departments, programmes, and project managers and quarterly finance reports. Discuss and agree on donor reporting at the point of contract signing.

### OBJECTIVE 5

Prepare the quarterly financial report for submission to the Management Team within three weeks of every quarter for them to review and offer input.

### OBJECTIVE 6

Revisit the delegation of authority matrix biannually. Unit Directors should recommend improvements based on feedback from users and change in the organisation. The Management Team should provide approval.

## STRATEGY 2

**ASSESS THE CAPABILITIES AND MANPOWER NEEDED TO CREATE AN OPTIMAL FINANCE FUNCTION FOR EWS-WWF THROUGH MANPOWER PLANNING IN Q2, 2015, AND DEVELOP AN ACTION PLAN FOR FINANCE TO DELIVER HIGH QUALITY SERVICES BY Q1, 2016.**

### OBJECTIVE 1

Recruit Operation Director with strong financial background by Q3, 2015.

### OBJECTIVE 2

Continue to examine structure and processes to identify and eliminate administrative inefficiencies and redundancies.

### OBJECTIVE 3

Demonstrate flexibility and creativity through the Finance Department to meet the challenges and changing needs of internal and external stakeholders.

### OBJECTIVE 4

Review and put into action donor reporting requirements with a continuous focus on improved transparency and communication.

### OBJECTIVE 5

Incorporate best practice from WWF and keep up-to-date with improvements and new financial trends as they arise.

### OBJECTIVE 6

Train finance staff on accounting standards and practices, as well as accounting software implementation and reporting.

## STRATEGY 3

**PROMOTE CLOSER COLLABORATION BETWEEN FINANCE DEPARTMENT AND OTHER FUNCTIONS OF EWS-WWF, ESPECIALLY THE PROGRAMME AND FUNDRAISING STAFF.**

### OBJECTIVE 1

Incorporate accountability in managing resources across the organisation by linking it directly with appraisals. Train employees in Finance & Administration on related policies and procedures.

### OBJECTIVE 2

Review financial support to 'budget holders' biannually with continuous focus on improved communication, efficiency, and effectiveness.

## STRATEGY 4

**IMPROVE THE USE OF AND PURSUE NEW TECHNOLOGIES AND SOFTWARE TO IMPROVE FINANCE & ADMINISTRATION SERVICES AND MEET THE EVOLVING NEEDS OF THE ORGANISATION.**

### OBJECTIVE 1

Leverage current software to provide more efficient and cost-effective financial services. Incorporate SAGE 50 with Salesforce to chart donations and other financial information by Q4, 2015.

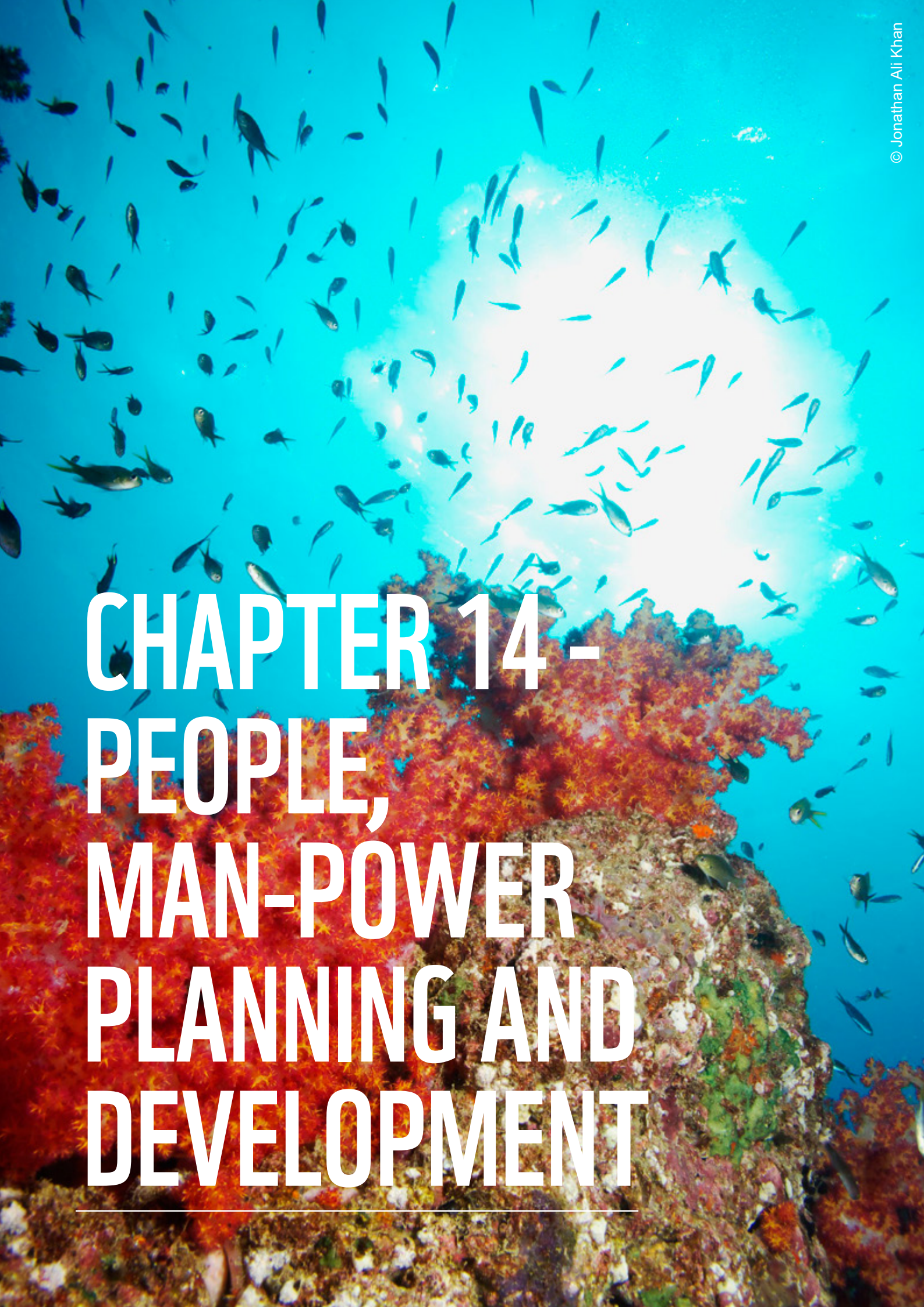
### OBJECTIVE 2

Research and install upgraded equipment, operating and/or management systems, and computer hardware or software to provide more efficient and cost-effective financial services.

### OBJECTIVE 3

Ensure that staff receives adequate training in the use of financial systems and software.





# CHAPTER 14 - PEOPLE, MAN-POWER PLANNING AND DEVELOPMENT

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## 14.1 CURRENT STATUS

Through the passion and dedication of our people, we will be able to take the environmental change we want to see in the UAE and turn it into reality. Our current structure has evolved organically since 2001 to accommodate the region's increasing conservation needs. We are fortunate that our team represents the cultural diversity typically found in many UAE workforces. With 45 staff from as many as 22 different nationalities, we are proud to say that we openly embrace local Emirati culture, while bringing to the table a wealth of skill levels, mindsets, values, and behaviours from around the globe. Sometimes, this melting pot can also cause challenges, which will be addressed in the new strategic plan.

*Further development of personal effectiveness, teamwork and leadership impact through strong personal development plans, increased accountability and technical expertise will be a focus area*

Our main challenge is to build and attract the right level of expertise, maintain the cultural diversity that we have, and, at the same time build a strong organisational culture that provides a sense of belonging and purpose. We must operate under a set of common guiding principles that align our collaborative efforts towards achieving our organisational goals and maximising conservation impacts.

Also, in the past, limited success has been achieved in covering the costs of programme staff from corporate sponsorship, subsequently limiting the investment in staff development and salary increases.

## 14.2 GOAL

With an increased understanding of the importance of people and what is required to develop a high performance culture, ensuring that our team members are fully engaged in the role they play is paramount.

Further development of personal effectiveness, teamwork, and leadership impact through strong personal development plans and increased accountability and technical expertise will be an area of focus.

We will also aim to have the right staff in the right place at the right time because that will ensure that deliverables are met.

The identification and embracing of behaviours and attitudes that can be embedded in our daily work culture will be prioritised as will the strengthening of our Arabic capacity and communication capability so that we can continue to build strong relations with influencers and decision-makers.

In parallel, it is also important for us to 'walk the talk' as we continue to promote sustainable practices in the UAE. We need to ensure that our operations have sustainability at their core and will need to actively show this through the hearts and minds of all our team members.

Our desired outcome is an integrated, skilled, and motivated workforce that is focused on delivering the EWS-WWF strategy as one team, working in synergy whilst living our values.



## STRATEGY 1

Determine our unique operating framework and embrace organisational culture through the consistent demonstration of the organisation's core values. Aligning the whole team towards our strategic goals through improved teamwork, efficiency, accountability, and adaptability will enable us to make giant leaps forward in delivering our aspirational ambitions.

### OBJECTIVE 1

By the end of Q4, 2015: Undertake a baseline assessment of current culture and demonstrated behaviours in order to determine desired work culture.

### OBJECTIVE 2

By the end of Q4, 2015: Develop a defined set of core values and an associated action plan to embed EWS-WWF core values into everyday operational procedures and brand decisions in 2016 and beyond.

### OBJECTIVE 3

By the end of Q4, 2016: Observe a change in staff alignment and motivation. Undertake a follow-up assessment to highlight the adoption of core values and any changes in demonstrated behaviours.

## STRATEGY 2

Develop and enhance our organisation's structure, compensation packages, policies, and procedures. Further define the roles, skills, and behavioural and technical competencies required to achieve current and future goals so that we can address any talent gaps that will lead to the design and implementation of a strategic talent transition and acquisition plan, with an increasing emphasis on partnering with specialist consultants. Ensure salaries are competitive so that staff remain motivated through effective reward, remuneration, and favourable working conditions. Create internal awareness around the value and total rewards of being an EWS-WWF employee.

### OBJECTIVE 1

From mid-2015 to mid-2018: Appoint a part-time human resources specialist consultant for an initial three-year period to lead on HR matters. Identify gaps in the HR process and implement strategic improvements in best practice to spearhead the transition to a high-performance culture.

### OBJECTIVE 2

By the end of 2015: Deliver a Strategic Manpower Plan, including the design of job families for EWS-WWF, the review and enhancement of existing job descriptions, the design of new role descriptions, and the development and enhancement of the overall organisational structure and talent management and acquisition strategies.

### OBJECTIVE 3

By the end of 2015: Revise grading and salary matrix by conducting a salary and working conditions benchmarking exercise.

### OBJECTIVE 4

By the end of 2016: Review and enhance the HR Policy and Procedure Manual.

### STRATEGY 3

Work with strategic HR partner to optimise internal and WWF network resources to ensure continuous staff development and improved development plans. Identify High Potential Individuals for future job fit and succession planning. Prioritise the development of competencies, skills, and leadership potential. Continue to build upon our external orientation competency to ensure that we embrace innovation and best practice while staying relevant locally and globally. Further embed the WWF Programme and Project Management Standards across the conservation team. Build a strong team of effective People Managers through improved knowledge-sharing, increased transparency, reinforcement of the importance of prioritising people and their performance to achieve our mission and develop a healthy feedback culture that drives our overall improved performance.

### OBJECTIVE 1

By the end of 2016: Create a clear development journey and map an associated career transition path to be used as a development tool.

### OBJECTIVE 2

By March 2017: Ensure that all staff have a strong annual personal development plan in place and adequate on-the-job learning, including learning from others and attending formal learning programmes in line with their career paths at EWS-WWF.

### OBJECTIVE 3

By mid-2016: Develop in-house learning opportunities or identify them externally to support organisation-wide core skills development. This could include People and Project Management, communication skills, personal effectiveness, and presentation or storytelling skills.

### OBJECTIVE 4

By the end of 2017: Build internal capacity by improving technical knowledge through stronger alignment with WWF's global offices, tap into the network's best practice, and explore mentorship opportunities.

### STRATEGY 4

In line with the UAE's Emiratization vision, further embrace our Arabic cultural identity and capacity by prioritising the development of native Arabic speakers'

communication abilities. Empower Arabic speakers with increased confidence as they collaborate with our partners and Arabic audiences.

### **OBJECTIVE 1**

By the end of 2015: Increase Arabic speaking and written language capacity over the next five years through a targeted language development programme, inclusive of lessons from an external provider.

### **OBJECTIVE 2**

Appoint a project leader to head the development of a strategic in-house Arabic language and culture programme.

### **OBJECTIVE 3**

Maintain a minimum of 5% Emirati employees through strong connections with our strategic partners and prioritise the development of high-performing Emirati staff members towards taking on senior roles to help achieve our mission.

### **STRATEGY 5**

Increase our commitment to conservation and lead by example through the reduction of carbon emissions and environmental impacts, and embed sustainability practices into our operations and organisational culture.

### **OBJECTIVE 1**

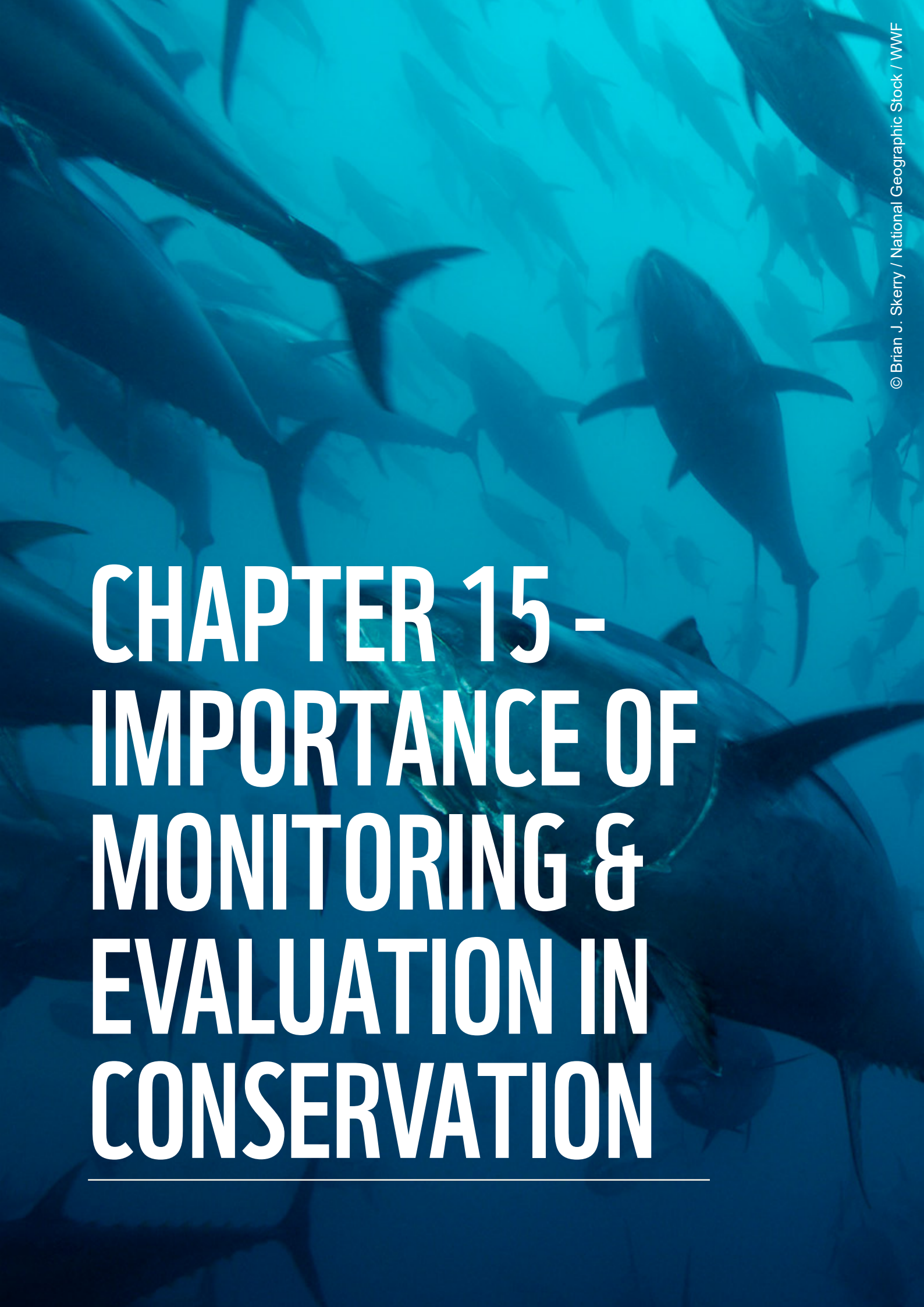
By the end of Q4, 2015: Appoint a project lead from the operations department to create a cross-functional Green Team with shared responsibility.

### **OBJECTIVE 2**

By Q2, 2016: Develop a robust strategy to implement best practice sustainability actions, led primarily by the EWS-WWF Green Team and including measurable, ambitious targets, indicators, and environmental systems in order to manage, track, and improve the organisation's environmental performance and culture.

### **OBJECTIVE 3**

By Q4, 2016: Implement measurable and ambitious actions in line with the Green Team strategy and continue to consistently capture and improve upon KPIs. Begin regular and periodic reporting of environmental indicators.



# CHAPTER 15 - IMPORTANCE OF MONITORING & EVALUATION IN CONSERVATION

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## 15.1 IMPORTANCE OF MONITORING & EVALUATION IN CONSERVATION

The fundamental principles of Monitoring and Evaluation (M&E) involve tracking progress and evaluating the appropriateness of a given course of action in reaching the desired goal. M&E play a significant role in assisting conservationists to achieve conservation goals and ensuring that resources employed have a significant conservation impact. M&E are utilised to establish clear links between past, present, and future activities and interventions, and outcomes and impacts\*.

### **Regular monitoring and evaluation will help us answer the following questions:**

- Adaptive Management: Are ongoing activities still on target or do they require fine-tuning or reorientation? Are our decisions based on sound information?
- Accountability: Were the planned objectives reached? If not, why not?
- Impact: Have we had the impact we envisioned?
- Efficiency: Were the planned activities and interventions appropriately resourced?
- Knowledge Management: Were the successes, obstacles, and processes undertaken shared effectively within the organisation to ensure best practice examples that could be replicated and the avoidance of future obstacles?

These basic principles can be used by both conservation and non-conservation functions within EWS-WWF. Without effective planning, monitoring, and evaluation, it would be very difficult to judge whether the work we had undertaken was progressing in the right direction, whether progress and success were the results of the interventions put in place, and how future interventions and use of resources (such as staff and financial resources) might be improved. The central goal of M&E is to ensure that we achieve the greatest possible impact with the inputs utilised.

Using international best practice, we will monitor and evaluate our efforts at every turn in planning, outcomes, and the overall impact made across the entire scope of our mandate. The following figure (Figure 15.1) depicts a results (or strategic) framework, highlighting the relationships between interventions and results. As illustrated, M&E at EWS-WWF will occur at the output, outcome, and impact level.

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\*Suitable definitions of M&E from the United Nations Development Programme (Handbook on Monitoring and Evaluation, (2011):

Monitoring: "(the) continuing function that aims primarily to provide the management and main stakeholders of an ongoing intervention with early indications of progress, or lack thereof, in the achievement of results."

Evaluation: "Evaluation is a selective exercise that attempts to systematically and objectively assess progress towards and the achievement of an outcome. Evaluation is not a one-time event, but an exercise involving assessments of differing scope and depth carried out at several points in time in response to evolving needs for evaluative knowledge and learning during the effort to achieve an outcome."



**Figure 15.1:** Generic Results Framework Used at EWS-WWF



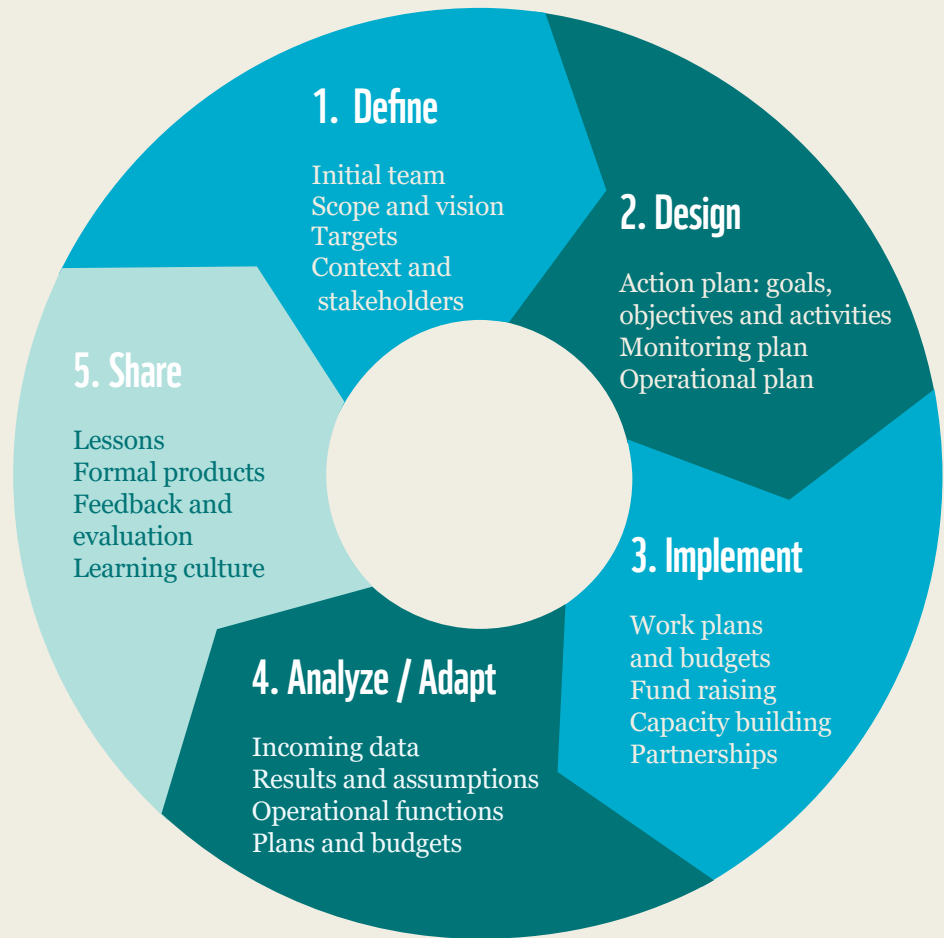
Figure 15.2: Shows how the results framework operates in practice; illustrating the framework used to map the results of a recent EWS-WWF conservation project that sought to identify sensitive turtle habitat areas in the Arabian Gulf.

**Figure 15.2:** Results Framework of our Marine Turtle Conservation Project.



In the example provided in Figure 15.2, M&E at the output level focused on ensuring that resources were used effectively, budgets allocated appropriately, and the work plan undertaken effectively. The outcomes in this example are medium to long-term (three to five years), which means that they are starting to occur now. The impact (as with most conservation impacts) is measured in the long term, that is, over ten or more years.

We have adopted conservation management principles called the ‘Open Standards,’ which are a set of conservation standards developed by leading global environmental organisations, including WWF, Foundations of Success, and The Nature Conservancy. Each organisation modified these standards to suit its own requirements. EWS-WWF follows the standards developed by WWF, the Project and Programme Management Standards (PPMS), which are used to support the WWF’s Results-Based Management (RBM) approach to conservation, as illustrated in Figure 15.3.



**Figure 15.3:** The Main Elements of the Standards for Conservation Project & Programme Management

## WWF'S CONSERVATION PROJECT / PROGRAMME CYCLE

Source: WWF International, the Standards for Conservation Project & Programme Management

The principles of PPMS were first adopted by EWS-WWF for the development of this strategy and have been used extensively since we began to incorporate M&E in a more structured manner. This chapter of the strategy describes how the PPMS will be further utilised to assess the conservation impact of the EWS-WWF five-year strategy. Incorporation of a sound project and programme management system is a fundamental requirement, given the higher-level of ambition of the Strategy and the need to allocate resources appropriately to reach the higher conservation impact.

By nurturing an adaptive management culture, we can concisely and consistently reflect on whether the current course of action is still the best approach to achieving our desired results. An important component of the PPMS is the continuum of the approach, with each step flowing into the next, and, crucially, the results of the intervention are 'shared' to ensure that lessons are captured, successes shared, and future obstacles mitigated or avoided.

## 15.2 MONITORING & EVALUATION FOR THE 2015-2020 STRATEGIC PLAN

Since its inception, EWS-WWF has conducted its monitoring and evaluation via quarterly progress reports, monthly financial reconciliation reports and updates, and portfolio evaluations across the entire organisation. However, since our ambitions have increased significantly, there is a pressing need for more formal, in-depth processes that allow us to achieve our desired impacts through a continual cycle of reflection and improvement. Figure 15.4 outlines how we envisage new processes to be established, implemented, and adapted.



**Figure 15.4:** Monitoring and Evaluation at EWS-WWF over the 2015-2020 Strategic Plan

### Monitoring & Evaluation Plans

***M&E is utilised to establish clear links between the past, present, and future activities and interventions, to outcomes and impacts***

At this stage (FY2015) of the Strategic Plan 2015-2020, clear monitoring and evaluation plans have been developed for conservation programmes and support units, such as communications, finance and administration, and business development. The plans guide each unit to address the areas of accountability, efficient use of resources, and the sharing of knowledge.

Captured within the M&E plans for each programme or unit are its objectives, respective key performance indicators, sources of data, baseline data points, planned intermediate results (outputs/outcomes), and projected 2020 results (outcomes/impacts). The M&E plans provide a clear summary of what the programme or unit is aiming to achieve (its objective), how success will be measured (an indicator), where the data is from (source), the location and frequency of data collection, the provider and users of the data, baseline data information, the planned intermediate results, and the final 2020 result (an outcome in some cases and an impact in others). Detailed M&E plans can be provided upon request.

To enact the respective plans, monitoring and evaluation goals and objectives have been developed and will be followed during the course of our Strategic Plan 2015-2020.

## 15.3 GOAL

Monitoring and evaluation is both a tool and a reference that will provide EWS-WWF with the information required to obtain impactful conservation.

## 15.4 OBJECTIVES

**The monitoring and evaluation of our operations will be realised by achieving the following objectives:**

### OBJECTIVE 1

**Through the implementation of the EWS-WWF Project Governance Standards (PGS), adaptive management is ingrained into the culture of EWS-WWF.**

The yet-to-be-developed PGS will closely follow the WWF Project and Programme Management Standards (PPMS). While adapted to fit the organisation's requirements, they will be rooted in adaptive management principles. The PGS will cover how conservation programmes and operational units will operate, be governed, and report. Elements such as accountability of the programme/project staff (and EWS-WWF as a whole), along with the sustainability, and exit strategy of the intervention will be clearly outlined. This will provide the necessary guidance for fundraising and resource allocation. These standards will enhance our accountability and transparency both internally and with external bodies such as financial supporters, WWF International, and stakeholders.

Interconnecting with the M&E plans, the PGS will outline the framework for the implementation of conservation programmes and operational units, provide decision-makers with the guidance required to make informed decisions, and the flexibility to determine whether the current course of action is still appropriate for the conservation goals strived for. The PGS will be in place and operational for FY2016.

### OBJECTIVE 2

**Accountability, highlighted by the implementation of respective M&E plans, is promoted as a mechanism for empowering EWS-WWF organisation units.**

With effective reporting and the use of M&E plans and information, our conservation and operation units will be empowered to promote the key successes and best practices developed at EWS-WWF. In the event when a programme or unit is identified as not having the intended impacts, any necessary changes will be easy to identify. Accountability will be fostered by using the results framework (illustrated in Figure 15.1), and referring to the monitoring and evaluation plans developed for each unit.

## OBJECTIVE 3

**Develop an organisation-wide culture of knowledge management and learning by implementing the PGS.**

*Using international best practice, we will monitor and evaluate our efforts at every turn, in planning, outcome and overall impact made*

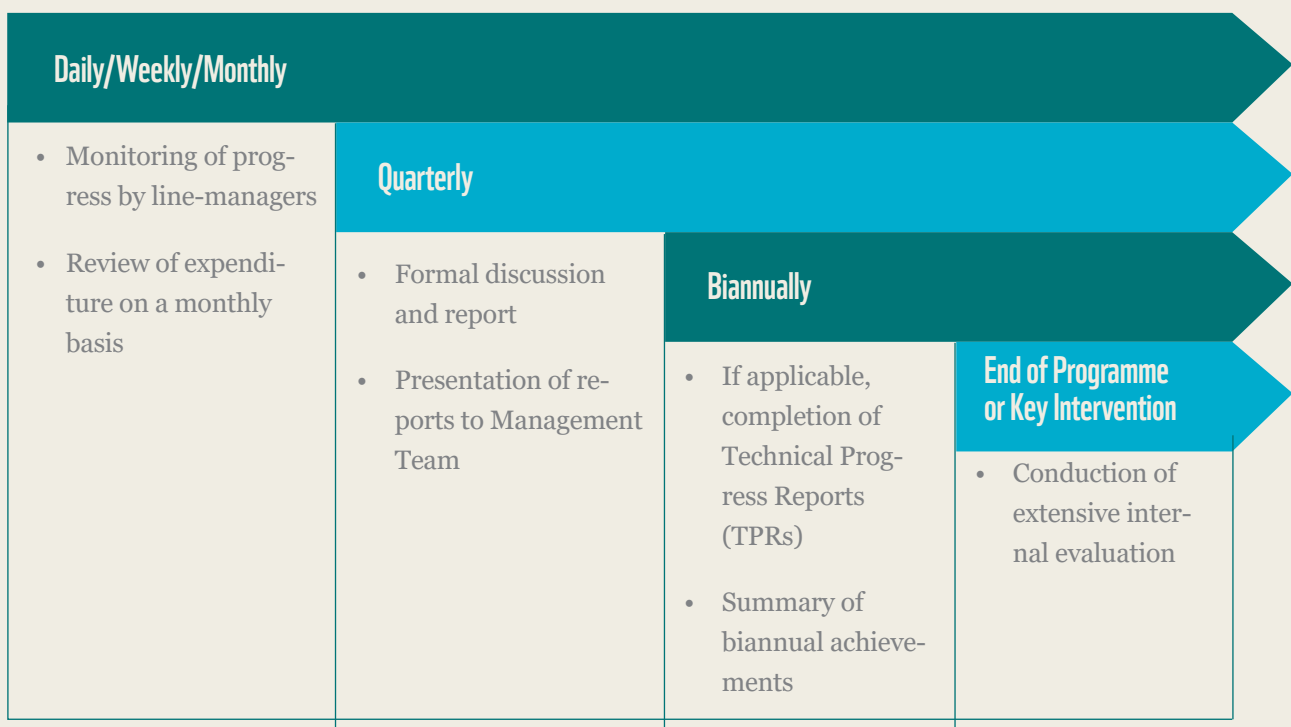
A crucial step of the PPMS and a principle of M&E is knowledge sharing (as outlined in Step 5 of the PPMS). Knowledge sharing should be integrated into daily operations as capturing and sharing lessons learned can reveal good or best practices and suggest how and why different strategies work in different situations. This is valuable information that can increase impact in similar or different areas of focus. Fundamentally, the sharing of this knowledge contributes to enabling a culture of innovation to flourish at EWS-WWF.

This objective will be realised through the strategy’s M&E plans and by having all the required information uploaded to the Conservation Project Management system (CPM – hosted by WWF International) by the end of Q2, 2016. Sharing our knowledge internationally will promote the conservation goals of EWS-WWF, enable us to access others’ learning, and offer the opportunity to achieve greater impact in the UAE in line with international best practices.

## 15.5 MONITORING & EVALUATION REPORTING

Monitoring and Evaluation reporting will be fully outlined in the yet-to-be-defined EWS-WWF PGS, but will resemble Figure 15.5 and provide a clear process for the achievement of our objectives.

**Figure 15.5:** Monitoring and Evaluation Reporting Flow at EWS-WWF for the 2015-2020 Strategic Plan.





### **Daily/Weekly/Monthly**

Leaders will monitor their own work and that of their subordinates. On a monthly basis, they will review their respective financial statements to monitor and analyse metrics such as expenditure and 'burn-rate'.

Operational units will provide monthly updates on identified key performance indicators to the Director General and Management Team, informing and empowering these decision-makers with a clear picture.

### **Quarterly**

The progress of each conservation programme and respective interventions will be reported to the Conservation & Climate Director, who, at the same time, will determine whether the Management Team should convene to discuss any arising issues. The same approach will be followed by the operation units.

### **Biannually**

The conservation programmes which contribute directly to the WWF's global priorities will submit Technical Progress Reports in accordance with network guidelines. They will also summarise the previous two quarterly reports into a concise biannual update for the Management Team. Unless requested by the Director General, operational units will not be required to produce a biannual update.

### **End of Programme or Key Intervention**

At the end of a conservation programme or a key intervention, an extensive internal evaluation will be conducted to determine the resulting impact and the lessons learned. This evaluation will contribute towards the sustainability of our efforts.



# CHAPTER 16 - GOVERNANCE AND MANAGEMENT

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## 16.1 CURRENT SITUATION

WWF was invited by the UAE government to establish itself in the country at the turn of the millennium in order to help build capacity in on-the-ground conservation issues. Emirates Wildlife Society (EWS) was established as the local partner of WWF and is registered as a society of public interest under the Ministry of Social Affairs (MOSA). EWS has been working in association with WWF since February 2001. Working together under one umbrella, we are referred to as WWF-UAE within the WWF network and as EWS-WWF nationally.

EWS is just one of few legally registered environmental NGOs in the region, and, in order to operate at a federal level, it has to adhere to MOSA's regulations.

This setup poses a number of challenges, one of the most significant being that we are not permitted to raise funds from individuals. This restriction makes EWS increasingly dependent on funding from the private sector. The securing of funds from the private sector can be challenging to navigate as it poses risks for our brand, credibility, and reputation. It also makes adherence to WWF guidelines on private sector engagement more difficult, especially in an economy driven by the oil and gas industry: According to the guidelines, we cannot engage with this sector.

There are also several MOSA requirements for reporting, for instance, seeking permission before any member of staff travels outside the UAE. All letters and emails sent and received must also be kept on file, and there is an annual MOSA reporting requirement and audit. While the option of being registered with MOSA is currently considered the best option, the Management Team should scout for other legal setups to mitigate any risks that may result from future legislation changes.

EWS signed a cooperation agreement with WWF International in 2010 to work as its exclusive representative in the Gulf Cooperation Council (namely, the UAE, Bahrain, Kuwait, Oman, Qatar and Saudi Arabia). The agreement includes a licensing agreement for EWS to use, and it ensures that the organisation adheres to the WWF brand. EWS-WWF has invested a lot of effort into raising the brand awareness of WWF and is engaging with all sectors in the region to mobilise action towards a more sustainable future.

## 16.2 GOVERNANCE STRUCTURE

There are two management bodies at EWS-WWF:

### ***Board of Directors:***

The Board of Directors consists entirely of UAE nationals, as required by MOSA. It sets the direction of and approves the strategic plan. The board, which represents five of the seven emirates (Abu Dhabi, Dubai, Fujairah, Sharjah and Ras

Al Khaimah) is composed of the Chairman, the Deputy Chairman, the Secretary, and the Treasurer, as well as up to eight additional members.

### **Management Team:**

Our management team makes decisions on daily operational issues and is formed by the Director General. It consists of the Managing Director, the Director General, the Deputy Director General, Unit Directors, and up to two additional members. The objectives of the Management Team are to establish a realistic five-year Strategic Plan and to develop and implement the annual action and operating plan, which is based on the overarching strategic plan. Developing and submitting yearly budgets to the Board of Directors for approval and evaluating organisational performance to ensure high impact and effectiveness are other focal areas of responsibility for this team.

## **16.3 REPORTING TO WWF**

As an associate office, EWS-WWF reports to WWF International in line with the World Wide Overview. The conservation programme in the UAE is developed and monitored according to the PPMS. The UAE office is closely connected to other WWF offices and shares information and best practices across several functions, including conservation, project management, HR, fundraising, and finance.

EWS-WWF has recently completed the WWF process identifying its critical contributions to the WWF network over the next five years and will be prioritising conservation work, which adds value both locally and globally. EWS-WWF will continue to promote the WWF brand and relevant positions across the UAE and the region and to roll out WWF campaigns such as Earth Hour and the Marine Campaign.

## **STRATEGY 1**

Improving the governance of EWS-WWF to create a long-term vision for the organisation and its operation to better deliver impactful conservation in the UAE.

### **OBJECTIVE 1**

By August 2016, an agreement will be established between EWS and WWF International on the terms for the renewal of the Cooperation Agreement in line with the current agreement, for signing before October 26, 2016.

### **OBJECTIVE 2**

The Management Team at EWS-WWF revisits the legal framework in the UAE on a yearly basis and evaluates the existence of alternative options for EWS-WWF to be set up legally with the increased opportunity to gain financial support for conservation purposes.

### **OBJECTIVE 3**

The EWS-WWF Board of Directors is engaged with the EWS-WWF mission and attends the annual board meetings. By Q3 2015, two new members of the Board of Directors will have been selected by the Chairman and put in place with stronger representation from the private sector.

### **OBJECTIVE 4**

By Q2, 2016, a new Advisory Board will be in place, providing input, advice, and support to the Management Team. The Advisory Board will be open for experts globally.

### **OBJECTIVE 5**

Ongoing: EWS-WWF is building a strong relationship with MOSA and meeting its requirements, which include the election of the EWS-WWF Board of Directors every four years, an annual general assembly meeting, and the preparation and submission of reports to MOSA.



# CHAPTER 17 - OVERALL RISK TO THE 2020 STRATEGIC PLAN AND MITIGATION

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The UAE has experienced tremendous change since the discovery of oil. It has quickly developed from a poor and sparsely populated country to an important oil exporter and trading hub with over nine million residents and with aims to receive over 20 million tourists a year. The UAE will continue its development in the coming decades. It is evident that the country is going through growth and change and, as it is located in a region of conflict and unrest, it will always experience some amount of uncertainty and risk.

This risk assessment is based on the overall work presented in the 2020 Strategic Plan. Although the matrix aims to capture a breadth of risks that can affect EWS-WWF, it is by no means comprehensive. Programme- and operation-specific risks will be captured under their respective risk assessments.

RISK CATEGORY	TYPE OF RISK	EXAMPLE	MITIGATION
OPERATIONAL	<ul style="list-style-type: none"> <li>• Delays in delivery of activities, programmes.</li> <li>• Termination of activities in work plans.</li> <li>• Underestimation or overestimation of required resources and budgets.</li> <li>• Inability to respond to changes in prioritisation.</li> </ul>	<ul style="list-style-type: none"> <li>• Delays caused by internal work processes.</li> <li>• Delays caused by partners, for example approvals.</li> <li>• Delays caused by lack of funding.</li> <li>• Delays for reasons beyond EWS-WWF’s control—caused by external stakeholders or forces.</li> </ul>	<ul style="list-style-type: none"> <li>• Conducting reality checks when planning.</li> <li>• Ensuring full alignment with stakeholders on priorities and expectations.</li> <li>• Development of a good monitoring and evaluation system to detect and flag problems at an early stage.</li> <li>• Implementation of EWS-WWF-specific Project &amp; Programme Governance Standards (PPGS) that provide a system of adaptive management practices, allowing the organisation to change its priorities and direction quickly.</li> <li>• Systematic (and regular) communication with stakeholders to manage and communicate change effectively.</li> </ul>
HUMAN RESOURCES	<ul style="list-style-type: none"> <li>• Loss of expertise.</li> <li>• Inability to recruit needed expertise.</li> <li>• Issues affecting productivity and staff motivation in the team.</li> <li>• Staff overemployment or underemployment.</li> </ul>	<ul style="list-style-type: none"> <li>• Experienced staff leaving EWS-WWF or the country (if expatriates).</li> <li>• Salary and compensation not competitive with private or government sectors.</li> <li>• Poor people managers and team leaders.</li> <li>• Staff in roles for which they are either too qualified or not qualified enough.</li> </ul>	<ul style="list-style-type: none"> <li>• Ensuring that experienced staff are satisfied in their respective roles (through employee engagement such as regular surveys) to reduce staff turnover.</li> <li>• Internal capacity building and succession planning.</li> <li>• Monitoring of staff morale and investment in training and development.</li> <li>• Building a good working environment by promoting accountability, strengthening organisation’s culture, and internal communication.</li> <li>• Improving HR processes to ensure that staff are appropriately positioned within the organisation</li> <li>• Reviewing current staff ethos to determine staff’s ‘belief’ in EWS-WWF and contribution to the culture of EWS-WWF, thus ensuring that EWS-WWF is an employer of choice.</li> </ul>

<p>POLITICAL</p>	<ul style="list-style-type: none"> <li>• Changes in laws.</li> <li>• Loss of political support.</li> <li>• Regional instability.</li> <li>• Deprioritisation of environmental issues.</li> <li>• Global economic downturn (as a result of the European Union crisis, Chinese stock market panic, etc.).</li> <li>• Shift in demand for UAE and GCC fossil fuel supply.</li> </ul>	<ul style="list-style-type: none"> <li>• Emergence of new laws that make our operation difficult.</li> <li>• Emergence of new laws that may put current conservation efforts at risk.</li> <li>• Growing crisis of Iranian nuclear agreements, rise of ISIS organisation regionally, etc.; creating great economic uncertainty in UAE and the region (resulting in capital flight and potential funders retaining EWS-WWF-destined funds.)</li> <li>• Japan is the UAE’s largest importer of oil, with Asia as a whole receiving 96% of UAE oil exports; a downturn in the Japanese and Chinese economies could significantly affect the UAE economy, and, subsequently, EWS-WWF funding sources.</li> </ul>	<ul style="list-style-type: none"> <li>• Building good relationships at the government level, especially with regulatory bodies.</li> <li>• Emphasising the importance of laws for the long-term protection and conservation of the environment.</li> <li>• Raising awareness and promoting best practice in environmental policies to create momentum among stakeholders in support of sound environmental legislation.</li> <li>• Diversifying income base to ensure EWS-WWF is not too dependent on one or two major income streams.</li> <li>• Continuing to communicate with high-level funders regarding future economic outlook to prepare EWS-WWF for any potential income flow issues.</li> <li>• By diversifying the income base and staying informed about UAE export trends, EWS-WWF is able to target potential income sources and mitigate the risk of declined income partnerships.</li> </ul>
<p>FINANCIAL</p>	<ul style="list-style-type: none"> <li>• Over-budgeting or under-budgeting.</li> <li>• Bad investment of reserves.</li> <li>• Increase in cost of products or services between budgeting and purchase.</li> <li>• Losses due to non-payment.</li> <li>• Inflation.</li> </ul>	<ul style="list-style-type: none"> <li>• Expected income less than predicted and does not match expenditure.</li> <li>• Agreements not being honoured by sponsors.</li> <li>• Increase in the cost of goods and services (as well as staff).</li> </ul>	<ul style="list-style-type: none"> <li>• Diligent budgeting and forecasting by following adaptive management practices.</li> <li>• Ensuring that fundraising efforts have a long-term perspective.</li> <li>• Quarterly finance reporting to the management team.</li> <li>• Implementation of effective cost recovery and development of legally sound written contracts for all funding prospects and agreements.</li> <li>• Cutting back on expenses in case of no payment.</li> <li>• Implementation of EWS-WWF-specific PPGS that provide a system of adaptive management practices, allowing the organisation to change its priorities and direction quickly.</li> <li>• Hiring a dedicated Director of Operations to oversee financial KPIs and raise issues before they become serious problems.</li> <li>• Keep up-to-date with inflationary indices, ensuring that any cost (internal and external) are effectively budgeted for in fundraising proposals.</li> </ul>

IT	<ul style="list-style-type: none"> <li>• Malfunctioning of IT, telephones, or other technologies.</li> <li>• Increase in hardware and/or software costs.</li> <li>• Loss of data.</li> <li>• Security breach.</li> </ul>	<ul style="list-style-type: none"> <li>• Computer viruses.</li> <li>• Bad IT management.</li> <li>• Increase in prices of free or low-cost software in current use.</li> </ul>	<ul style="list-style-type: none"> <li>• Prioritising IT maintenance and management and adhering to safe practices to eliminate risks of virus infections.</li> <li>• Ensuring solid back-up systems for important data.</li> <li>• Ensuring that sensitive data is secured.</li> <li>• Inclusion of contingency for unexpected costs.</li> <li>• Implementation of IT best practices/systems, guidelines introduced by IT provider to limit security breaches and ensure financial data is firewalled.</li> </ul>
FUNDING RESOURCES	<ul style="list-style-type: none"> <li>• Dependence on few streams or sources of funding.</li> <li>• Legal restrictions on fundraising from some sources and in some emirates.</li> <li>• External factors (political, see above) that affect ability of sponsors to fulfil agreements.</li> </ul>	<ul style="list-style-type: none"> <li>• Dependence on government grant and few corporate investors.</li> <li>• New fundraising laws in UAE.</li> <li>• Fundraising restrictions from the Ministry of Social Affairs.</li> <li>• Downturn in global/regional economy, limiting cash flow of income partners.</li> </ul>	<ul style="list-style-type: none"> <li>• Diversification of funding sources.</li> <li>• Ensuring compliance with legislation on fundraising.</li> <li>• Working with local authorities to find suitable legal ways to raise funds.</li> </ul>
PROGRAMMATIC	<ul style="list-style-type: none"> <li>• Change in political support for certain topic or area of conservation.</li> <li>• Lack of funding to match deliverables.</li> <li>• Rapid degradation of a habitat and destruction of its value for conservation.</li> <li>• Excessively ambitious programmatic plans.</li> </ul>	<ul style="list-style-type: none"> <li>• Deprioritisation of a certain topic by key stakeholders.</li> <li>• Difficulties in raising funds for effective programme implementation.</li> <li>• Destruction of high priority habitats (because of fast development or dredging) before there is an opportunity to intervene.</li> <li>• Programme or project focus changes.</li> </ul>	<ul style="list-style-type: none"> <li>• Prioritising communication on programmes as well as high priority topics and areas to create momentum on conservation and ensure public commitment of support by key stakeholders.</li> <li>• Implementation of EWS-WWF-specific PPGS that provide a system of adaptive management practices, allowing the organisation to change its priorities quickly.</li> </ul>
COMPLIANCE	<ul style="list-style-type: none"> <li>• Non-compliance with local law.</li> <li>• Non-compliance with WWF principles.</li> </ul>	<ul style="list-style-type: none"> <li>• Failure to fulfil requirements by Ministry of Social Affairs.</li> <li>• Corruption and conflict of interest.</li> </ul>	<ul style="list-style-type: none"> <li>• Diligent auditing, internally and by third party external auditors.</li> <li>• Following the Delegation of Authority matrix to ensure sign off at the right level with 2 people viewing agreements, payments, reports etc.</li> <li>• Providing appropriate training for people managers, especially on conflict of interest issues.</li> <li>• Enforcement of zero tolerance for corruption in alignment of EWS-WWF and WWF principles.</li> <li>• Reporting to the Ministry of Social Affairs as required.</li> </ul>

<p>Reputation</p>	<ul style="list-style-type: none"> <li>• Damaged reputation and lack of trust in the organisation.</li> </ul>	<ul style="list-style-type: none"> <li>• Not delivering on commitments.</li> <li>• Poor science.</li> <li>• Poor behaviour of staff, poor preparation.</li> <li>• Partnership with the wrong organisations or individuals.</li> </ul>	<ul style="list-style-type: none"> <li>• Careful planning and budgeting.</li> <li>• Implementation of EWS-WWF-specific PPGS that provide a system of adaptive management practices, allowing the organisation to change its direction quickly.</li> <li>• Recruitment of appropriate expertise (internal or outsourced).</li> <li>• Appropriate assessment of staff to ensure that they are not under-qualified for the tasks that they are required to perform.</li> <li>• Training and development of staff, ensuring they always do their utmost to deliver high quality and act professionally and with tolerance and respect for all cultures.</li> <li>• Due diligence of partners and associates, and choosing to work with those that are good matches to enhance delivery.</li> </ul>
<p>Brand</p>	<ul style="list-style-type: none"> <li>• Greenwashing of organisation.</li> <li>• Bad brand reputation locally and globally.</li> <li>• Not seen as independent or credible.</li> </ul>	<ul style="list-style-type: none"> <li>• Partnering with organisations that are not truly sustainable and are using the EWS-WWF brand for green-washing.</li> <li>• A damaged WWF brand reputation elsewhere that affects us locally.</li> <li>• Close relationship with government sometimes being misread as an indication that we are not an independent organisation.</li> </ul>	<ul style="list-style-type: none"> <li>• Careful gatekeeping of brand and following of brand guidelines as well as guidelines on how to work with business and industry.</li> <li>• Consistent communication of independence consistently and the ensuring of its clear statement in all agreements and partnership contracts.</li> <li>• Due diligence of partners and associates, and choosing to work with those that are good matches to enhance delivery and impact.</li> <li>• Increased collaboration with WWF International to ensure EWS-WWF follows best practice when conducting due diligence of potential sources of income.</li> </ul>
<p>Fundraising</p>	<ul style="list-style-type: none"> <li>• Failure to meet funding targets, legal restrictions on fundraising in the local market.</li> <li>• Dependence on corporate funding.</li> </ul>	<ul style="list-style-type: none"> <li>• Not enough funding/ sponsorship to roll out conservation programmes.</li> <li>• Financial difficulties and budget cuts in companies.</li> <li>• Legal restrictions when it comes to fundraising from individuals, thus limiting fundraising sources.</li> <li>• Lack of local fundraising expertise and difficulty recruiting experienced fundraisers.</li> </ul>	<ul style="list-style-type: none"> <li>• Ensuring that fundraising efforts have a long-term perspective and prudent management of reserves.</li> <li>• Utilisation of the WWF network for building local capacity on fundraising.</li> <li>• Implementation of EWS-WWF-specific PPGS that provide a system of adaptive management practices, allowing the organisation to change its priorities and direction quickly. Diligent budgeting and forecasting.</li> <li>• Quarterly finance reporting to the management team.</li> </ul>



## ACRONYMS

ADEC – Abu Dhabi Education Council  
AFED – Arab Forum for Environment and Development  
AGEDI - Abu Dhabi Global Environment Data Initiative  
CITES – Convention on the Illegal Trade of Endangered Species  
CO<sub>2</sub>e – CO<sub>2</sub> equivalent or carbon dioxide equivalent  
EAD – Environment Agency Abu Dhabi  
EE – Energy Efficiency  
EE/WE – Energy Efficiency and Water Efficiency  
EFI – Ecological Footprint Initiative  
ETIS – Elephant Trade Information System  
EWS-WWF – Emirates Wildlife Society in association with WWF  
ESD – Education for Sustainable Development/Environmental Education for Sustainable Development  
GCC – Gulf Cooperation Council  
GDP – Gross Domestic Product  
GHG – Greenhouse Gas  
GNI – Gross National Income  
HR – Human Resources  
IFAW – International Fund for Animal Welfare  
IWT – Illegal Wildlife Trade  
IUCN: The International Union for the Conservation of Nature  
KEI – Knowledge Economy Index  
KEA – Key Ecological Attributes  
KHDA – Knowledge and Human Development Authority  
M&E – Monitoring and Evaluation  
MoEW – Ministry of Environment and Water  
MOE – Ministry of Education  
MPA – Mountain Protected Area  
NGO – Non-Governmental Organisation  
PGS – Project Governance Standards  
PPMS - Project and Programme Management Standards  
RBM – Results-Based Management  
QCC - Quality and Conformity Council – Abu Dhabi  
SMART – Specific, Measurable, Attainable, Realistic, Timely  
TRAFFIC - The wildlife trade monitoring network; a joint programme of WWF and IUCN  
UAE – United Arab Emirates  
USD – US Dollars  
UNDP - United Nations Development Programme  
UNESCO – United Nations Educational, Scientific and Cultural Organization  
UNEP – United Nations Environment Programme  
WCI – Wildlife Crime Initiative  
WWF – World Wide Fund for Nature  
WTP – Wildlife Trade Programme  
WWNP – Wadi Wurayah National Park  
WRLP – Water Research and Learning Programme

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