

# Protected Areas in the Arabian Peninsula

Khaldoun Al Omari

**Abstract.** Protected areas help conserve key elements of biodiversity, play a significant role in social and economic development, and embody many practical approaches to participatory and collaborative management. Although approximately 230 protected areas have been legally established in the Arabian Peninsula comprising approximately 900,000 km<sup>2</sup>, this system does not fully reflect the diversity of habitats and species, and the level of management greatly varies from one area to the next. The IUCN Protected Areas Programme helps to guide and enhance the development of adequate regional approaches and models for effective protected area management, with a focus on community participation and involvement at all levels.

**Key words.** Protected Areas, Arabian Peninsula, Participatory Approaches, IUCN.

## Overview

A Protected Area (PA) is defined by IUCN as: “A clearly defined geographic space, recognized, dedicated and managed, through legal or other effective means, to achieve the long term conservation of nature with associated ecosystem services and cultural values”. Protected Areas now cover more than 11.5% of the earth’s surface (CHAPE et al. 2008). The number of PAs has increased rapidly in recent years and they are now a major land use in their own right. Well-managed Protected Areas are essential to address biodiversity loss and to protect species – particularly those threatened by habitat loss.

IUCN is recognized as a global leader in relation to protected areas, particularly in relation to standard setting, provision of policy advice and convening key forums and dialogues. IUCN’s mission in relation to PAs is: to promote an effectively managed, representative system of marine and terrestrial protected areas. The key IUCN strengths and activities in relation to protected areas include:

- Knowledge – preparation of practical guidance on a range of management issues, such as through the Protected areas Best Practice Series.
- Convening – major events such as the World Parks Congress, convened by IUCN every 10 years.
- Standard Setting – such as in relation to the IUCN PA Category System.
- Advising Conventions and Agreements: such as the World Heritage Convention and the Convention on Biological Diversity.
- Support for protected areas field projects, such as training PA managers in developing countries.

The main objective of the IUCN Protected Areas Programme is to guide and enhance the development of adequate regional approaches and models for effective protected area

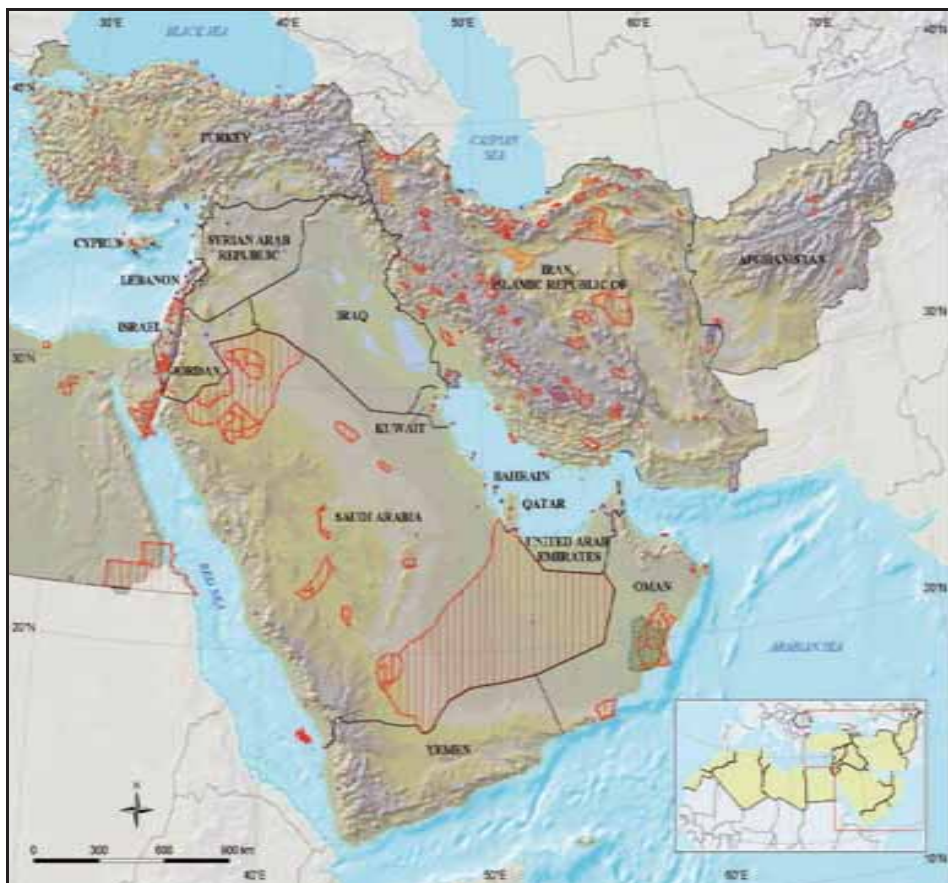


Fig. 1. Protected Areas in the Arabian Peninsula.

management, with a focus on community participation and involvement at all levels. Another objective is to build the region's capacity in protected area management, including the development of sound, and regionally adequate guidelines and mechanisms. To meet this objective we will harmonize the diverse corpus of global knowledge and expertise available through the IUCN network. To further these objectives we also aim to support the regional World Commission on Protected Areas (WCPA) network in achieving its mission, objectives, and outputs.

Some of the tangible results sought by this programme include: increasing the development of protected areas in the region through the reviewing of regional guidelines, training of local stakeholders and sustainable funding of these areas. Establish a network of pilot sites documents, fed into national and regional policies and legislations and shared among all partners in the region. Support the implementation of protected areas within significant biodiversity areas or those established to protect threatened species. Commit initiatives with community welfare and livelihood thanks to sustainable and local management.

Table 1. Protected areas in the Arabian Peninsula and adjacent areas.

Country	Land area (km <sup>2</sup> )	Total area protected (km <sup>2</sup> )	Number of sites
Bahrain	690	60	4
Egypt	1,001,450	103,939	48
Iran	1,633,190	112,878	142
Iraq	438,320	5	8
Jordan	89,210	9,734	36
Kuwait	17,820	597	7
Lebanon	10,400	78	24
Oman	212,460	29,828	6
Qatar	11,000	137	13
Saudi Arabia	2,149,690	826,432	81
Syria	185,180	3,583	28
Turkey	774,820	33,352	474
United Arab Emirates	83,600	4559	19
Yemen	527,970	Approx. 28,000	4
<b>Total</b>	<b>7,135,800</b>	<b>1,153,412</b>	<b>894</b>

## Protected Areas in the Arabian Region

One of the key concerns for the Arabian region is the lack of a rationalised network of effectively managed protected areas that includes key areas of high biodiversity, endemism, and representative habitats (SEDDON et al. 2008, 2009). Some countries of the region have extensive protected area networks, but to date there has been no systematic regional planning for protected areas across all countries of the Arabian Peninsula (see also HOLNESS et al. 2011). Protected areas help to conserve key elements of biodiversity, play a significant role in social and economic development, and embody many practical approaches to participatory and collaborative management. The 11 countries of the Arabian Peninsula region are united by common strands of geology, climate, and ecology, as well as culture, history, and traditions. Geologically the region covers the entire Arabian Plate with most of the region consisting of drylands and deserts.

Efforts to protect the landscapes of the Arabian region date back to ancient history. The Roman Emperor Hadrian (AD 117-138) was reported to have demanded protection for some of the remaining cedar forests on Mount Lebanon (though only a few remnants remain today). Even further back in time, the traditional form of land management, known as *al hema* (*hima*, *hurah*, or *ahmia*) (DRAZ 1969), has been used for more than 2 000 years, and was given a clear legal status by the Prophet Mohammed (صلى الله عليه و سلم) (LLEWELLYN 1998). Forest reserves and hunting reserves were declared in the 18th and 19<sup>th</sup> centuries when wide parts of this region fell under the Ottoman Empire, however, most of the formal protected areas have been established since the 1970s and 1980s.

Today there are approximately 230 protected areas in the Arabian Peninsula region (or 894 when adjacent areas such as Egypt, Iran and Turkey are taken into account) covering an estimated 15% of the land area (Table 1). A few countries (Saudi Arabia, Oman, and

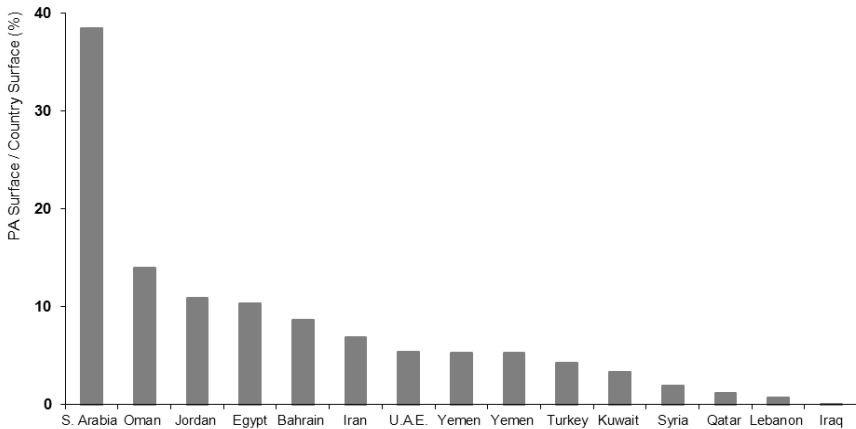


Fig. 2. Size of area under protection given as percentage of total surface area of the country.

Jordan) have extensive protected area networks, while Turkey, Kuwait, Syria, Qatar, Lebanon and Iraq have less than 5% of their land area contained within some form of protected area.

## Current Issues

Current issues in PA management in the Arabian Peninsula include please (cf. CHAPE et al. 2008):

- Lack of skilled staff is a major constraint on the effective establishment and management of protected areas.
- Disciplines such as protected area planning and management, wildlife management, and environmental sociology are not yet widely recognized by the region's academic institutions.
- There are almost no university courses or degree programs in the subjects most closely related to protected area management.
- Most countries have some protected area legislation, but the legislative basis for protected areas is still weak in the region.
- There are also few provisions to involve local citizens as participants in the establishment and management of protected areas.

In many instances, implementation and enforcement are given insufficient attention. There is an acute need to:

- Expand the protected area systems through a systematic conservation planning process to represent unprotected ecosystems in a cost efficient way.
- Conserve endangered, endemic and remaining species of plants and animals, as well as species of special ecological, economic, or cultural value.
- Conserve key sites of biological productivity – wetlands, mountains, and woodlands, and coastal sites – that constitute the habitats of the majority of the region's flora and fauna.



Fig. 3. Entrance to the Jebal Bura'a Protected Area in Jemen, one of the few remaining forest areas in the Arabian Peninsula (photograph: Max KASPAREK).

One of the most promising ways for protected areas to generate tangible and sustainable benefits is from nature-based tourism.

- Ecotourism can provide a meaningful incentive and economic justification for conservation, as it depends on the maintenance of unspoiled nature and thriving communities of wild plants & animals.
- In addition, it can generate an influential and articulate clientele who can serve as advocates for the conservation of protected areas.
- If it is not managed very carefully, however, nature-based tourism tends to degrade the resources upon which it depends.

### Future Directions

Further development of protected area networks in the region will involve four priority steps:

1. Address the impacts of climate change, particularly through developing landscape-level initiatives that link protected areas with other land uses.
2. Target expansion of protected areas in poorly represented biomes. Increasing the protection of the marine environment is a major current priority.
3. Strengthen management effectiveness (capacity building and protected area financing). The IUCN Management Effectiveness Framework is a tool being used in many countries.
4. Involve local communities in protected area design and management. Protected areas managed by local communities have become increasingly important in securing long-term local support and sustainability.



Fig. 4. The Arabian Peninsula is surrounded by seas which is home to rare and endangered habitats for wildlife (photograph: Max KASPAREK).

## References

- CHAPE S., M. SPALDING & M. D. JENKINS (2008): *The World's Protected Areas*. Prepared by the UNEP World Conservation Monitoring Centre. – University of California Press, Berkeley, USA.
- DRAZ, O. (1969): *The Hima system of range reserves in the Arabian Peninsula: its possibilities in range improvement and conservation projects in the Middle East*. – Food and Agriculture Organisation (FAO), Rome.
- HOLNESS, S., M. KNIGHT, M. SORENSON, & Y. R. A. OTHMAN (2010): *Towards a systematic conservation plan for the Arabian Peninsula*. – *Zoology in the Middle East Supplementum 3 (Biodiversity Conservation in the Arabian Peninsula): 197-207*.
- LLEWELLYN, O. A. (1998): *The basis for a discipline of Islamic Environmental Law*. – Unpublished draft manuscript. NCWCD, Riyadh, 29 pp.
- SEDDON, P., M. KNIGHT & J. EDMONDS (Eds) (2008): *Proceedings of the 9<sup>th</sup> Conservation Workshop for the Fauna of Arabia: Protected Area Systems in the Arabian Peninsula*. – Environment and Protected Areas Authority, Sharjah (UAE).
- SEDDON, P., M. KNIGHT & K. BUDD (Eds) (2009): *Proceedings of the 10<sup>th</sup> Conservation Workshop for the Fauna of Arabia: Progress and Partnerships for the Protected Areas in the Arabian Peninsula*. – Environment and Protected Areas Authority, Sharjah (UAE).

**Author's address:** Khaldoun Al Omari, Protected Areas Program Officer, Regional Office for West Asia (ROWA), IUCN (International Union for Conservation of Nature), Um Uthaina, Tohama Str. No. 6, Amman, Jordan. – Email: khaldoun.alomari@iucn.org.