



## PRIVATELY PROTECTED AREAS: ADVANCES AND CHALLENGES IN GUIDANCE, POLICY AND DOCUMENTATION

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### ABSTRACT

Privately protected areas (PPAs) are increasingly recognized as important conservation initiatives, as evidenced by recent developments that support recognizing and documenting them alongside protected areas under other governance types. Advances in guidance on PPAs have been accompanied by increasing support within international policy arenas, and more PPAs are being reported to the World Database on Protected Areas (WDPA). Despite this, national approaches to recognizing and supporting PPAs vary, as does the extent to which countries report on PPAs to the WDPA. We present recent advances that support PPAs at the international level, summarize the present state of PPA reporting to the WDPA, and discuss the challenges and opportunities that currently characterize the future of PPAs.

Key words: Privately protected areas; World Database on Protected Areas; WDPA; governance

### INTRODUCTION

Protected areas under the governance of private entities, known as privately protected areas (PPAs), have gained attention in recent years (e.g. UNEP/CBD/COP/DEC/XII/19; Borrini-Feyerabend et al., 2013). Their increasing profile in national and global policies reflects a growing understanding of their importance in acting as havens for biodiversity in their own right; as components of coherent landscapes and connectivity; and in complementing protected area networks under other governance types. It further reflects a rising awareness among governments that encouraging, recognizing and reporting on PPAs can facilitate progress towards their international conservation commitments, such as the Convention on Biological Diversity (CBD) Aichi Biodiversity Target 11. Under this Target, governments have agreed on the following global goal: “by 2020, at

least 17 per cent of terrestrial and inland water areas and 10 per cent of coastal and marine areas, especially areas of particular importance for biodiversity and ecosystem services, are conserved through effectively and equitably managed, ecologically representative and well-connected systems of protected areas and other effective area-based conservation measures, and integrated into the wider landscape and seascape” (UNEP/CBD/COP/DEC/X/2). Despite the positive developments described above, PPAs remain under-reported to global data managers including the World Database on Protected Areas (WDPA) and CBD Secretariat. This paper provides a background on recent developments to strengthen PPA policy, documentation and international guidance. It describes the current state of PPAs as reported in the WDPA, and efforts aimed to encourage comprehensive reporting by governments and other actors.

## **GUIDANCE AND POLICY**

Recent studies show that the world's biodiversity is not adequately conserved by the existing network of protected areas. An update to the UNEP-WCMC and IUCN *Protected Planet Report 2016* (UNEP-WCMC & IUCN, 2016a), published in December 2016, reported terrestrial coverage of 14.8 per cent and marine coverage of 5.1 per cent (this figure rises to 12.7 per cent when only areas within national jurisdiction are considered), falling short of the global coverage ambitions of Aichi Biodiversity Target 11 (UNEP-WCMC & IUCN, 2016b). The *Protected Planet Report* found that fewer than half of terrestrial ecoregions are more than 17 per cent protected. In the marine environment, only one third of ecoregions are more than 10 per cent protected. Butchart et al. (2015) also found that 57 per cent of 25,380 species assessed were inadequately covered by protected areas. As such, if Aichi Biodiversity Target 11 is to be met through a system of protected areas that is representative of ecosystems and species, then protection needs to be extended to areas that have not historically been incorporated in the protected area networks maintained by governments. The existence of private governance actors means that this expansion need not rely solely on newly designated areas, and instead can be achieved in part by recognizing existing initiatives. However, if PPAs are to be counted towards biodiversity targets, it is important that they are appropriately recognized and supported, enabling them to persist into the future, and that they are reported in national and international databases, allowing conservation planning exercises to build on an accurate picture of what is already protected.

Recognition of PPAs by the International Union for Conservation of Nature (IUCN) has grown as part of a broader focus on protected area governance which came to the fore at the fifth World Parks Congress in Durban, South Africa in 2003, where a substantial session on PPAs was held. A themed issue on private reserves was

published in *Parks* in 2005 (Mitchell, 2005). As an essential subsequent step in advancing the global recognition of PPAs, IUCN published a report in 2014 entitled *The Futures of Privately Protected Areas* (Stolton et al., 2014). The report sets out a new definition of PPAs, aimed at clarifying and unifying the diverse definitions previously in circulation. This definition, shown in Box 1, is accompanied by further guidance that aligns PPAs with the existing IUCN definition of a protected area (Dudley, 2008)<sup>1</sup>, while also elaborating on how the definition should be applied in the face of challenges specific to PPAs.

PPAs around the world exhibit a wide range of objectives and practices, spanning the spectrum of IUCN management categories. They also encompass a wide range of owners and managers, whose governance regimes and objectives vary. It follows, then, that the challenges associated with them are also diverse. Stolton et al. (2014) frame these challenges around the particular issues of control and long-term persistence of sites. Through discussion of these challenges, Stolton et al. (2014) provide guidance on how they should be dealt with when applying the definition of a PPA.

In the first of these challenges, the governance authorities of PPAs may encounter limits to their level of control for a number of reasons. Stolton et al. (2014) recommend that PPA managers be aware of any use-rights that are not within their control. A notable example is rights to sub-soil resources, which remain with the state regardless of land ownership in many countries (e.g. Adams & Moon, 2013; Fitzsimons, 2015; Hardy et al., 2017). There are also often different actors responsible for different land and water use-rights within a single site, potentially resulting in conflicting objectives for the management of the site (Stolton et al., 2014). In cases where use-rights are not all held by the PPA governance authority, the guidance recommends that every effort be made to ensure that there is no negative effect on the site's conservation objectives or adherence with the IUCN definition of a protected area.

While some PPAs are declared under legislation that ensures long-term security, others are not, presenting a potential obstacle to meeting the definition of a protected area. In the second challenge identified by Stolton et al. (2014), relating to the long-term persistence of sites, the report recommends a focus on long-term intent, meaning the intention to manage the site for conservation in perpetuity, or for 25 years as a minimum. Safeguards should also be put in place to ensure that conservation objectives are retained if ownership changes. Such mechanisms may include easements, conservation

### **Box 1. Definition of a privately protected area (Stolton et al., 2014)**

A privately protected area is a protected area, as defined by IUCN, under private governance i.e.

- individuals and groups of individuals;
- non-governmental organizations (NGOs);
- corporations – both existing commercial companies and sometimes corporations set up by groups of private owners to manage groups of PPAs;
- for-profit owners;
- research entities (e.g. universities, field stations);
- religious entities.



**Red Kangaroo (*Macropus rufus*) at Neds Corner Station, a 300 km<sup>2</sup> former grazing property in the state of Victoria, Australia, now owned and run as a PPA by the Trust for Nature © James Fitzsimons**

covenants and wills. In cases where a permanent agreement is not an option, existing agreements should be renewable and the intention should be to renew in perpetuity. The ending of an agreement should never prohibit the retention of PPA status. The focus on intent is to recognize that PPAs may not have the same legal protection that is experienced by some, although far from all, state-governed protected areas (e.g. Lausche, 2011). In the case of PPAs, dedication to conservation may be demonstrated through formal agreements with government agencies, formal declarations by the governance authority, publicly-available long-term management plans, and recognition by other bodies, such as national associations of PPAs (Stolton et al., 2014).

Although PPAs may face challenges, they also bring opportunities. Stolton et al. (2014) describe ways in which PPAs are particularly well-placed to complement protected areas under state governance. This includes by responding quickly and without bureaucracy to rapid environmental changes, threats or opportunities; by creating spaces for decentralized individual initiatives that involve a more diverse stakeholder base, and diversified funding mechanisms, in the protected area landscape; and by expanding protection to areas where the state is unable to acquire and/or manage land and waters (see also Pasquini et al., 2011).

This final point lends strong support to the need to recognize and report on PPAs. Based on the statistics from the *Protected Planet Report* (UNEP-WCMC & IUCN, 2016a), there is a strong case for supporting the role of PPAs in contributing coverage in places currently

unprotected by other governance types. This additional coverage has the potential to add value in terms of connectivity and ecosystem representativeness (see e.g. Gallo et al., 2009; Fitzsimons et al., 2013). Private lands can also offer opportunities for ecological restoration, including through collaborative efforts that aim to achieve landscape-level restoration (Holl, 2017). For example, of 108 ecological restoration projects identified in Colombia, one third took place on privately owned lands and indigenous territories (Murcia et al., 2016). Several studies have suggested a shift in focus towards PPAs, among other non-government designations, in order to facilitate the achievement of global biodiversity targets (e.g. Butchart et al., 2015; Lopoukhine & de Souza Dias, 2012).

## PPAS IN RECENT POLICY OUTCOMES

Official policy documents of the CBD have consistently recognized the important role of protected areas, but the CBD Conference of the Parties (CoP) did not formally recognize the contributions of PPAs until 2014. The decisions of the 12<sup>th</sup> CBD CoP “Recognizes the contribution of private protected areas... in the conservation of biodiversity, and encourages the private sector to continue its efforts to protect and sustainably manage ecosystems for the conservation of biodiversity” (UNEP/CBD/COP/DEC/XII/19). Subsequent to the most recent CBD CoP (2016, Mexico) the Secretariat has expressed strong interest in “a more systematic collection of information” on PPAs in the “next two years”, in preparation for reporting to CoP 14 (Sarat Babu Gidda, pers. comm.).

The 2016 IUCN World Conservation Congress (WCC) approved a resolution on supporting PPAs (WCC-2016-Res-036). This resolution acknowledged the “valuable work and the report of the Futures of Privately Protected Areas project and its proposed concept of privately protected area”. Through the resolution, IUCN members recognize the complementarity of PPAs to other governance types, and their ability to contribute to connectivity within the broader conservation estate. The resolution, summarized in Table 1, makes clear that action on PPAs is needed from a range of different actors.

### PPAS IN NATIONAL POLICIES

Although PPAs are gaining support through international policy developments, legislation and policy on PPAs remain highly variable at the national level. The following examples are adapted in part from Stolton et al. (2014).

- **Australia (Fitzsimons, 2014; Fitzsimons, 2015)**

PPAs have been an important policy objective for Australia for several decades, with conservation covenants and land acquisition being the primary mechanisms employed (Fitzsimons & Wescott, 2001; Cowell & Williams, 2006; Fitzsimons, 2006; Pasquini et al., 2011). The Australian Government has supported PPAs through the National Reserve System Program by providing up to two-thirds of the purchase price to private land trusts for strategic land acquisitions. As at late 2013, approximately 140 properties were owned by private land trusts covering approximately 45,941 km<sup>2</sup> (Fitzsimons, 2015). This programme, combined with increased philanthropic support (Taylor, 2012), was critical in enabling land trusts to acquire larger and more remote properties. Tax concessions are also available to landowners who establish covenants in areas of high conservation value, although these are not widely used (Smith et al., 2016). Conservation covenants are perpetual legal agreements between a landholder and a government department or statutory body nominated under the respective covenant legislation to sign covenants. Covenants run with the title of the land, binding all future owners of that land and can typically only be removed by the agreement of both the landholder and relevant government minister. Conservation covenants are increasingly employed to meet national and state governments’ objectives of comprehensiveness, adequacy and representativeness, and to fill gaps in the conservation estate where the government is unable to do so. As at September 2013, there were approximately 5,000 terrestrial properties that could be considered PPAs in Australia, covering some 89,130 km<sup>2</sup> (Fitzsimons, 2015).

The support provided to PPAs varies by jurisdiction, and legislation on conservation covenants differs between states and territories. It is also more difficult to establish covenants on leasehold land compared to freehold land. The relatively high proportion of leasehold land in central Australia has led the distribution of covenants to be skewed towards eastern and southern Australia and Tasmania. Not all jurisdictions provide data on conservation covenants when reporting to Australia’s central protected area database, which is used to report against international agreements and to the WDPA. Table 3 shows the high number of PPAs in Australia relative to other countries, while Figure 1 demonstrates the clustering of PPAs in particular Australian jurisdictions.

- **South Africa (Cumming & Daniels, 2014)**

South Africa allows for a range of governance types within protected area legislation, and permits protected areas to be designated on private land with the consent of the landowner. Although it lacks a formal national-level definition, the term “private protected area” is used to refer to protected areas that are owned by private entities, or to communal land.

Around thirty per cent of the terrestrial area of the protected area estate in South Africa is made up of PPAs, according to national records (Department of Environmental Affairs, 2016). PPAs are created with the same legislation as state-owned protected areas, and are subject to the same legal requirements. Over the last ten years, many PPAs have been created through provincial biodiversity stewardship programmes, creating partnerships between provincial conservation authorities, landowners, and, in many cases, NGOs. These programmes prioritize areas of high biodiversity importance, provide management assistance, and require annual audits. A range of incentives is also sometimes offered, including management assistance, preferential game sales, and tax deductions. The legal designation of the protected area status is binding on the property irrespective of changes in land ownership. In addition, a legally-binding contract is established with the landowner, committing the landowner to management objectives. These contracts can be as long as 99 years, or in perpetuity, and are seldom less than 30 years.

National Parks in South Africa may also be privately owned. These protected areas, known as Contract National Parks, are mostly established adjacent to state-governed National Parks, and landowners are usually bound by a contract for 50 – 100 years. In many cases, landowners of Contract National Parks delegate management authority to the state, in order for the



**Table 1. Summary of the recommendations of the resolution on supporting privately protected areas, including intended actors.**

Intended actor	Support national governments:	Support PPA governance authorities:	Support PPAs generally:
Director General and Commissions of IUCN	<ul style="list-style-type: none"> <li>Promote the development of policy and legislation that are supportive of PPAs;</li> <li>Provide guidance on incentives and other forms of support;</li> <li>Provide support regarding the contributions of PPAs to the implementation of global and regional conventions</li> </ul>		<ul style="list-style-type: none"> <li>Further develop best-practice guidelines on their establishment and management;</li> <li>Further study their extent, configuration and contributions</li> </ul>
World Commission on Protected Areas		Consider providing advice on gaining protected area status	Build on the work of the Futures of Privately Protected Areas project to develop frameworks and guidance on the voluntary conservation of private lands
IUCN members			In collaboration with owners, report on PPAs, including to the WDPA and CBD
IUCN state members		Create or promote legal or financial incentives	<ul style="list-style-type: none"> <li>Adopt policies that recognize, encourage and monitor PPAs, and integrate them into broader PA systems;</li> <li>Work alongside civil society organizations to establish the importance of PPAs in the public agenda</li> </ul>
UNEP-WCMC	Support reporting by governments to the WDPA		Support reporting by other data providers to the WDPA

Contract National Park and the adjacent state-owned National Park to be managed as a single unit.

The South African government has recently focused on documenting PPAs in order to better assess progress against national and international targets. This focus has enabled South Africa to develop a more strategic and effective National Protected Area Expansion Strategy, and has the potential to help the country allocate resources more efficiently for protected area expansion. The Department of Environmental Affairs maintains records of all protected areas, including PPAs, and reports these to the WDPA. The combination of legal support for PPAs and a central reporting process means that South African PPAs are well-represented in the WDPA relative to other countries (Figure 2).

- Chile (Núñez-Ávila & Corcuera, 2014)**

There is no specific PPA legislation in Chile, but private lands can be recognized as Nature Sanctuaries through Law 17,288. Designation as a Nature Sanctuary has associated requirements for good conservation practices, but incentives are not currently offered to landowners. As represented in Figure 3, the WDPA lists 15 Nature Sanctuaries under private governance in Chile, with a further 29 under other governance types (IUCN & UNEP-WCMC, 2016). A 2013 study, however, suggests that the

true number of private conservation initiatives in the country may exceed 300 (Núñez-Ávila et al., 2013). This implies that the current framework is not capturing the majority of privately governed areas that contribute to conservation in Chile.

- Mexico (Bezaury-Creel, 2014)**

The Mexican government has certified PPAs since 2002 and through this mechanism these properties become legally protected areas at the federal level. The duration of legal protection is specified within the certification document, which also defines the management regime. Although the incentives offered to landowners are quite basic, the use of the Voluntary Conservation Use Area (ADVC - *Áreas Destinadas Voluntariamente a la Conservación*) protected area management category (which also includes indigenous peoples' and community conserved territories and areas) has been successful, reaching a total coverage of over 4,040 km<sup>2</sup> by early 2016 (Ocegüera-Salazar et al., 2016). Nevertheless, by 2012, there were at least 285 uncertified PPAs, potentially encompassing a further 3,589 km<sup>2</sup>, indicating that many landowners prefer to pursue their individual conservation initiatives outside a governmental framework. PPAs that have been reported to the WDPA are shown in Figure 3.



Monhegan Island in Maine is one of the first Land Trusts on the east coast of the USA; a large portion of the small island is owned and managed by local residents, the Monhegan Associates © Kent Redford

## DOCUMENTATION: PPAS IN THE WORLD

### DATABASE ON PROTECTED AREAS

The WDPA is the most comprehensive global database of protected areas, containing records on over 230,000 sites. Parties to the CBD are requested to report to the WDPA on their national protected area systems. The database is used as an indicator for Aichi Biodiversity Target 11, the Sustainable Development Goals, and the Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services (IPBES). International goals and targets are reported on through the publication of the biennial *Protected Planet Report* series (UNEP-WCMC & IUCN, 2016a; Juffe-Bignoli et al., 2014).

**Table 2. Number of privately protected areas (PPAs) in the World Database on Protected Areas, and per cent of total PPA area, by governance sub-type.**

Governance sub-type	Number of records	Per cent of total PPA area
For-profit organisations	33	0.1
Non-profit organisations	7,362	26.8
Individual landowners	5,339	68.9
Unknown (Australia only)	1,562	4.2
<b>Total</b>	<b>14,296</b>	<b>100</b>

Although the database uses the inclusive IUCN governance types (Dudley, 2008), at present 80 per cent of records are for protected areas under the governance of government agencies (IUCN & UNEP-WCMC, 2016). Since the WDPA's primary data providers are governments, the database has historically relied on state recognition and reporting of non-government governance types. This has meant that the WDPA has not received information on PPAs from countries without legal or policy frameworks for recognizing PPAs, or which lack the capacity to report on them. The variation in national policies described in the previous section has resulted in very good reporting on the part of some countries, and limited or no reporting on the part of the majority. This is compounded by a reluctance on the part of some PPA governance authorities to be counted as part of a national or global protected area system. This reluctance may stem from a concern that governments could report on PPAs rather than investing in new protected areas elsewhere, which is seen by some as a way for states to avoid making difficult decisions in order to meet their international obligations (Fitzsimons & Wescott, 2007). Lastly, PPAs in the WDPA may not always be readily identifiable because their governance type has not been reported, or has been misreported.

**Table 3. Number and area of PPAs in countries and territories for which data are available in the WDPA.**

Country/territory	Number of PPAs	Area of PPAs (km <sup>2</sup> )	PPA area as percentage of country/ territory's total PA area (marine & terrestrial)
USA	8,731	21,821.3	0.46
Australia	2,751	47,756.1	1.10
South Africa	959	26,044.6	9.30
UK	601	1,396.4	0.65
Canada	379	231.8	0.02
Mexico	330	4,036.3	1.14
Colombia	292	803.0	0.45
Guatemala	93	7,028.3	19.60
Peru	71	28,795.0	10.28
Puerto Rico	18	401.6	0.24
Cayman Islands	16	13.4	10.81
Chile	15	3,725.4	0.62
Kenya	11	1,914.6	2.61
Virgin Islands	5	1.4	0.38
Bonaire, St. Eustatius and Saba	3	77.3	48.95
Nepal	3	11,656.9	33.40
Fiji	3	17.5	0.13
Madagascar	2	2,113.2	5.95
Falkland Islands (Malvinas)	2	6.3	5.58
Marshall Islands	2	98.1	1.81
Mauritius	2	2.5	1.67
Namibia	2	2,898.7	0.90
Belize	2	42.2	0.35
Philippines	2	0.4	0.00
Botswana	1	752.3	0.44

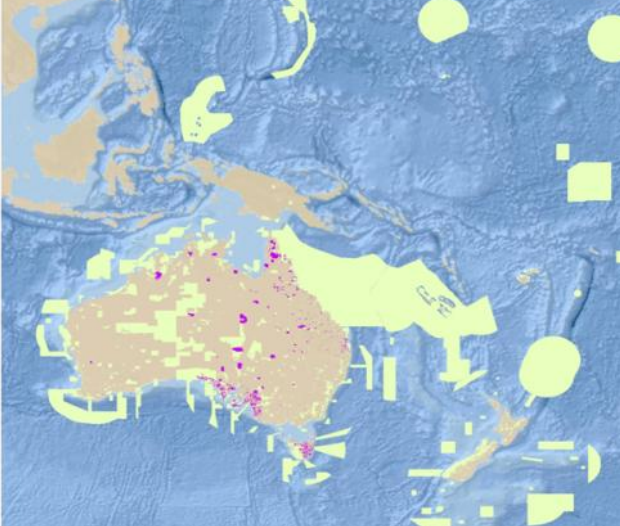
As a result of the above factors, the proportion of designated PPAs in the WDPA currently stands at just 6.25 per cent of the total number of protected areas, with representation in only 25 countries and territories<sup>2</sup>. The distribution of these sites is heavily skewed towards a few countries, with just nine countries hosting 99.38 per cent of the sites. A breakdown of PPAs in the WDPA by governance sub-type is given in Table 2, reflecting an abundance of sites governed by individual landowners and non-profit organizations relative to for-profit organizations. Table 3 shows the number and area of PPAs for all countries and territories that have designated PPA data reported in the WDPA. The USA has the highest number of PPAs, and Australia has the greatest area. Bonaire, St. Eustatius and Saba have the highest proportion of their protected area coverage contributed by PPAs.

Those PPAs currently listed in the database occupy 161,634 km<sup>2</sup>, contributing 0.42 per cent<sup>3</sup> of the total global coverage of protected areas. 5.7 per cent of the area occupied by PPAs overlaps with protected areas of other governance types (for further information on overlapping protected areas, consult UNEP-WCMC,

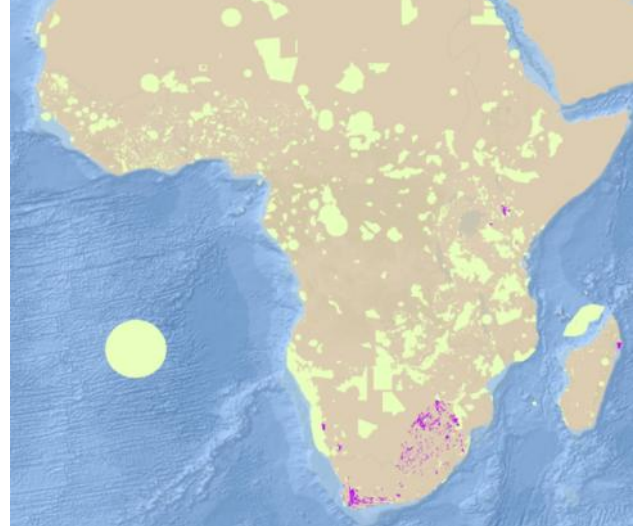
2016). Figures 1 to 6 show PPAs (identified using the governance type (GOV\_TYPE) field) alongside other protected areas (all other governance types) by region<sup>4,5</sup>. PPAs are shown with a border for increased visibility. While not represented in the statistics presented, proposed PPAs are shown in Figures 1 to 6. Polar Regions, Russia, the Arabian Peninsula, Central Europe, Central Asia and Eastern Europe are not shown, due to the absence of PPAs in the WDPA for these regions. The figures demonstrate the low coverage and spatial clustering of PPAs in the WDPA in comparison with some other governance types. For example, in North East Asia, South Asia, South East Asia, and Mashriq collectively, PPAs reported to the WDPA are limited to Nepal and the Philippines, with the addition of one proposed PPA in Jordan, totalling six sites (Figure 4). In the case of Nepal, these sites nevertheless constitute a large proportion of the country's protected area coverage (Table 3). By contrast, North America reports large numbers of designated PPAs to the WDPA, with the USA reporting 8,731 and Canada reporting 379 (Figure 5). In both countries, PPAs contribute a relatively small proportion of total protected area coverage (Table 3).



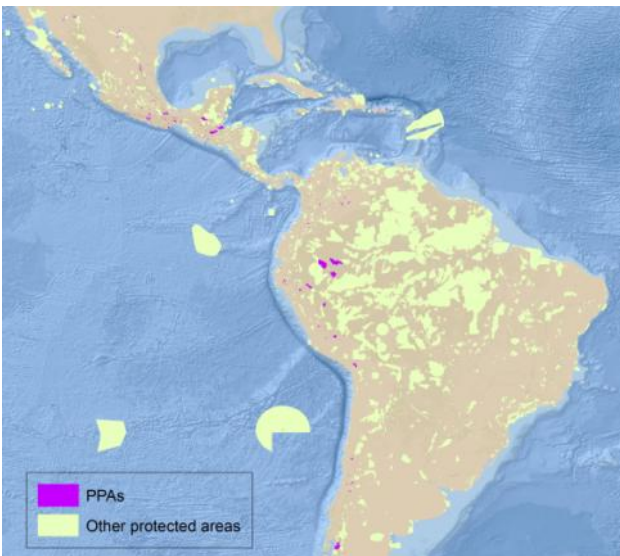
Larger versions of all the maps below can be downloaded as supplementary online material



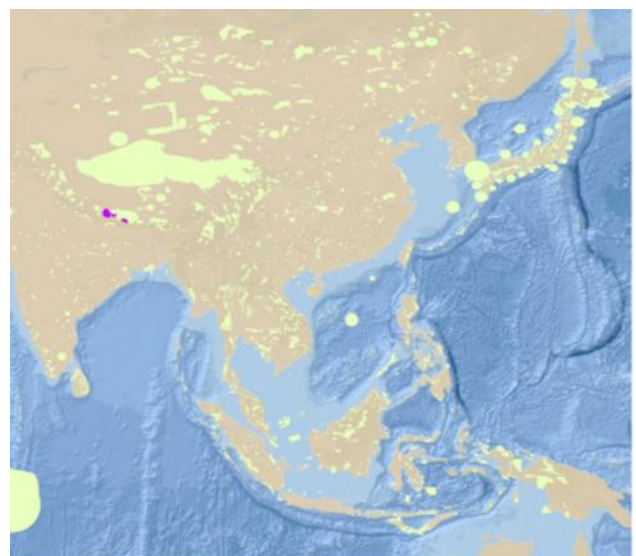
**Figure 1. Australia, New Zealand and South Pacific: protected areas in the WDPA, December 2016, with the addition of South Australian Heritage Agreements as PPAs**



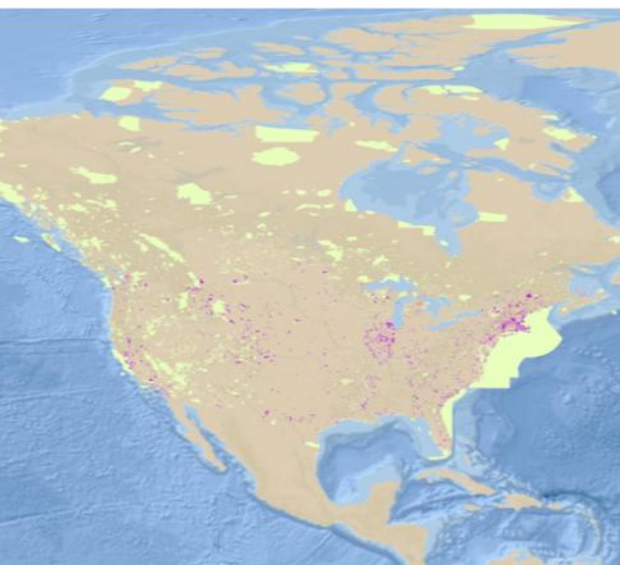
**Figure 2. Africa: protected areas in the WDPA, December 2016, with South African Biosphere Reserve buffer zones removed**



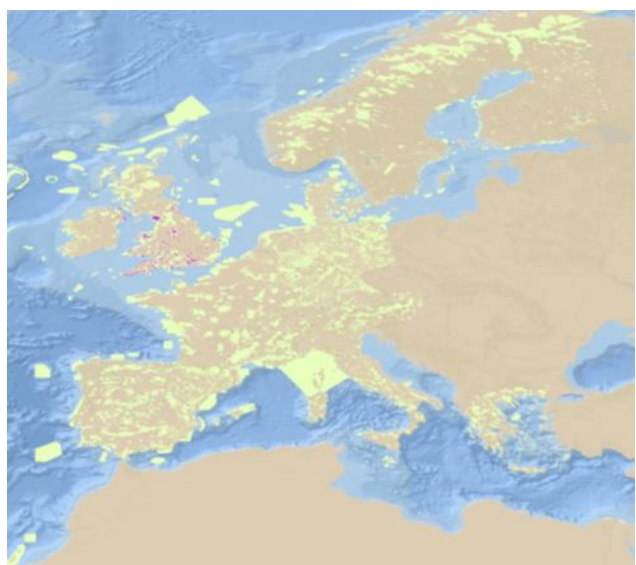
**Figure 3. Latin America and the Caribbean: protected areas in the WDPA, December 2016**



**Figure 4. North East Asia, South Asia and South East Asia: protected areas in the WDPA, December 2016**



**Figure 5. North America: protected areas in the WDPA, December 2016**



**Figure 6. Western Europe: protected areas in the WDPA, December 2016**



Work done by country experts and included in Stolton et al. (2014) suggests strongly that this reporting in the WDPA is a major underestimate of the number and area of PPAs. For example, the report estimates that Australia could have 5,000 terrestrial PPAs, in contrast to the 2,751 designated PPAs currently reported across Australia's terrestrial and marine area.

A second example is the United Kingdom, where significant work has been undertaken in recent years to map PPAs. The Putting Nature on the Map project run by the IUCN National Committee UK (Crofts et al., 2014) aims to identify all areas in the UK that meet the IUCN definition of a protected area, and to assign IUCN management categories. The collaborative project has received input from multiple NGOs and from the UK government, and has resulted in the addition of almost 800 PPAs and sites under joint and community governance to the WDPA<sup>6</sup>. The impact of this project on the UK's data in comparison with other Western European countries can be clearly seen in Figure 6.

A further example is Spain, which has an estimated 3,097 km<sup>2</sup> of conservation initiatives under private governance (Rafa, 2014), but no reported PPAs in the WDPA. It is unclear whether all of these initiatives would meet the IUCN definition of a protected area, though Rafa (2014) suggests that many of them could. It is likely that this could be the case for many countries where PPA data are not fully recognized or reported, underscoring the value of national-level projects such as Putting Nature on the Map. Stolton et al. (in Dudley, 2008, p.14) provide guidance on best practices for projects of this nature.

Technical issues and data management capacity also contribute to under-reporting. Since 1990, the Brazilian Environment Agency (Instituto Brasileiro do Meio Ambiente e dos Recursos Naturais Renováveis) has recognized the designation of Private Natural Heritage Reserves (Reservas Particular do Patrimônio Natural – RPPNs), establishing regulations as well as restrictions on land use and benefits to landowners (Rambaldi et al., 2005). A national confederation of RPPN maintains a database of 1,371 reserves covering over 7,660 km<sup>2</sup> nationally. However, only 372 are currently included in the WDPA, and they are reported as under the governance of government.

The example of Brazil highlights the issue that PPAs may not always be identifiable in the WDPA by their governance type. A second example is New Zealand, which has over 4,500 conservation covenants protecting more than 1,800 km<sup>2</sup> (Queen Elizabeth II National Trust, 2016). Around 800 of these conservation covenants have

been reported to the WDPA, but the governance type provided in all cases is 'Collaborative governance'. Although this may be an accurate reflection of the governance arrangement, it highlights the fact that expert or local knowledge may sometimes be needed in order to identify PPAs in the database. In other cases, the governance type of PPAs may be misreported or not reported at all.

These examples demonstrate that the absence of PPAs from many countries or jurisdictions in the WDPA does not necessarily reflect an absence on the ground.

## **EFFORTS TO ENCOURAGE REPORTING**

The WCC resolution discussed above requested that UNEP-WCMC support government and non-government data providers in supplying data on PPAs. IUCN's Director General and Commissions are asked to further study the extent, configurations and contributions of PPAs, and IUCN members are requested to report on PPAs to the WDPA. The success of these actions in improving reporting on PPAs will depend on strong data-collation protocols and guidance, and on alignment of efforts.

To address under-reporting of non-state governance types, including PPAs, the WDPA now has revised protocols for accepting data from non-government sources, including directly from individuals, NGOs, businesses, and academics who are involved in PPA governance. These data are verified by members of the World Commission on Protected Areas (WCPA), and are tagged as 'expert verified' in the WDPA. This tag means that users can easily differentiate data from government and non-government sources, and that statistics can be produced that demonstrate the contributions of these areas. With the agreement of the data-provider, reporting to the WDPA can also act as a first step in gaining government recognition. Data that are provided by non-government sources and later verified by the national government are listed as 'state verified'. This is the pathway being taken by the UK's Putting Nature on the Map project. This optional stage is represented by the dotted arrow in Figure 7, which summarizes the WDPA reporting process.

Governments remain the WDPA's primary data providers. The WDPA provides guidance to governments through the WDPA User Manual, provided in English, French and Spanish (UNEP-WCMC, 2016). The manual provides information on the IUCN governance types, discusses the protocols described above and their relationship to PPAs, and encourages governments to report on governance.

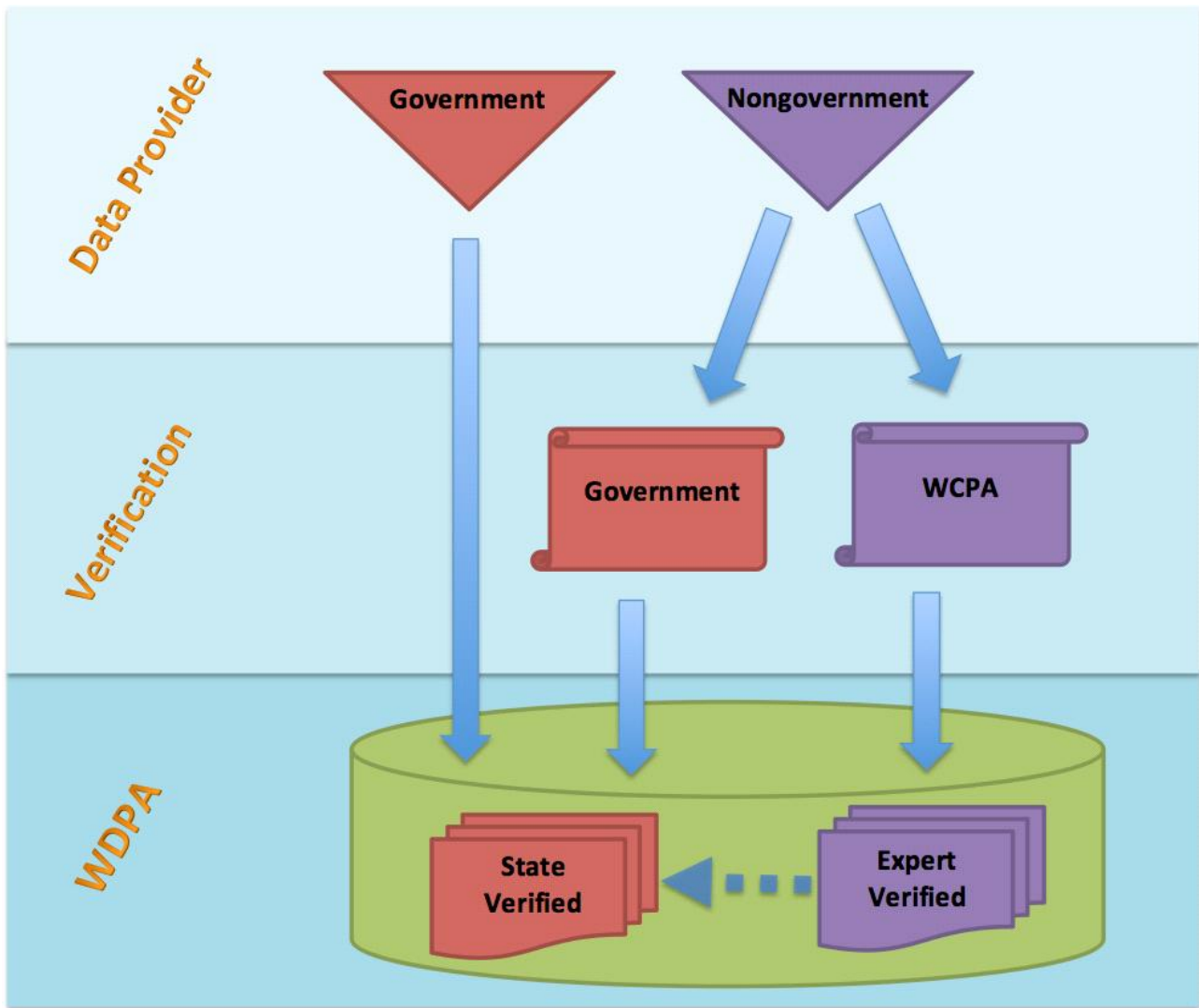


Figure 7. Schematic diagram of revised protocols for accepting data from non-government sources to the WDPA

A further improvement to the WDPA has been the addition of a field recording ownership type. As the field becomes more populated, it may assist in efforts to tease out complex relationships between governance, management and ownership. For example, South Africa has state-owned land held in trust for communities, and considered to be PPAs, as well as land managed by the state on behalf of private landowners. The new field may also help in identifying potential PPAs where the governance type has been misreported or not reported.

Lastly, the WDPA accepts data with restrictions on use and dissemination. In cases where data on PPAs are considered sensitive by the data provider, this means that the data can be used by WDPA managers for analyses, but not shared further. This is especially important in countries where rural governance structures are weak or have deteriorated due to illegal activities. For example, during the compilation of a PPA database for Mexico (Bezaury-Creel et al., 2012), concerns were raised by some private landowners that the misuse of

information by others could lead to instances of blackmail. In other cases, landowners questioned whether PPAs might be perceived by local communities as disused or unproductive land, that could be better used to provide short-term benefits to local populations, without due regard to the broader range of environmental services potentially provided by PPAs in the long term.

A recommendation of the *Futures of Privately Protected Areas* report (Stolton et al., 2014) is for “structures and incentives to report on PPAs both nationally and to the WDPA”. The report goes on to provide a background on the WDPA and the challenges around PPA data. This integration of advice on the WDPA into more general guidance on PPAs is essential to improving reporting, and should remain a key consideration as further guidance is developed. Related to this is the need to build and enhance relationships between the holders of PPA data and the WDPA, so that the best existing data can be incorporated.

## DISCUSSION

Governments may not include PPAs in their national inventories and global reporting for a number of reasons. In some countries, PPAs may not exist at all where legislation or policy does not provide for management of protected areas by non-state entities (e.g. India (Stolton et al. 2014)). In others, there may be a lack of capacity to document PPAs, a lack of understanding that private initiatives can be considered protected areas at the international level, or privacy restrictions (Fitzsimons, 2015). In still others, private conservation initiatives may be valued for their contributions to conservation, while not being considered protected areas. The formulation of the CBD text on 'other effective area-based conservation measures', and subsequent interest from parties in the development of a definition of this category of land conservation (Jonas et al., 2014), suggests that countries are keen to explore the possibility of reporting conservation areas that they do not count among their protected areas. For some countries (e.g., Brazil) PPAs are included in the WDPA but not tagged as under private governance. Lastly, PPA managers themselves may not wish to be counted among their country's protected areas for a range of reasons. For example, Fitzsimons and Wescott (2007) found some managers of properties identified as PPAs in south-eastern Australia did not want their properties reported as part of a national reserve system, with one citing "concern that figures contributing to (the National Reserve System) may justify land clearing to continue elsewhere in the region". Other owners of PPAs have expressed concern that counting their properties towards national and international targets relieves governments of their CBD commitments.

The challenges described above have resulted in under-reporting on PPAs to the WDPA. Their absence from the WDPA and from national databases means that their contributions to conserving biodiversity at a global scale, and to connecting state protected areas, are largely unknown. This has potential implications for national and regional conservation planning as well as potentially for the owners and managers of these lands. Without an accurate picture of the areas already conserved by PPAs, planning exercises will not achieve the best possible outcomes for biodiversity or for people. A further impact of neglecting to document PPAs is that they themselves may become vulnerable to conversion to other, biodiversity-incompatible, land-use types. By appropriately recognizing PPAs (and indeed other private land conservation mechanisms that might not qualify as PPAs, e.g. Fitzsimons & Wescott, 2001), governments are in a better position to support them and ensure that their positive outcomes persist into the

future. Furthermore, governments will be better able to meet their international commitments and targets if they provide support to PPAs, and document them with the consent of PPA owners and managers. Integral to supporting this process will be the implementation on Stolton et al.'s (2014) recommendation for structures and incentives to encourage reporting. For the governance authorities of PPAs, these incentives could include support from the state or NGOs, increased security, or recognition-based incentives including increased ecotourism or the sale of 'green' products. For governments, incentives could include improved spatial planning for conservation and other land-use decision-making, and the ability to count PPAs towards their international commitments.

Achieving these commitments and targets, and understanding where to go next, depends on the availability of accurate data. Some studies suggest that progress towards Aichi Target 11 could be significantly boosted simply by recognizing protected areas that are already there (e.g. Butchart et al., 2015), and several positive steps have been taken recently to support this. Firstly, Stolton et al.'s definition of PPAs (2014) provides an international standard, helping to clarify issues around what should and should not be counted. Secondly, the revised procedures for integrating non-government data into the WDPA mean that a more complete picture of PPA extent globally can be built.

In addition to recognizing existing sites, the contributions of PPAs to conservation can be enhanced by promoting PPAs so that new sites are designated, and by providing guidance on good governance and management. It is clear from the policy changes and country case studies presented here that this will require a collaborative approach, involving governments, NGOs, and private governance actors.

Finally, there are on-going developments at the international level that have the potential to support PPAs. There are possibilities for increased recognition of PPAs through the development of IUCN's Green List of Protected and Conserved Areas. The Green List recognizes success in protected areas of all governance types, based on the principles of good governance, sound design and planning, effective management, and successful conservation outcomes. Guidance is available on committing to the Green List standard and implementing its rules and procedures (IUCN, 2016). The IUCN WCPA Specialist Group on Privately Protected Areas and Nature Stewardship presents further opportunities for collaboration on PPAs. The group is expanding its membership, and reaching more private





Children visiting Attenborough Nature Centre, England, UK, a site managed by the Nottingham Wildlife Trust © Equilibrium Research

governance actors through an online discussion group. In response to a request from the IUCN World Conservation Congress, it is also developing best practice guidance on the governance and management of PPAs. These developments have the potential to draw attention to the significant benefits offered by PPAs, to encourage states to recognize and support them, and to facilitate the implementation of best practices by PPA governance authorities.

## CONCLUSIONS

Although there have been major developments in policy and guidance on PPAs, including an international definition, national-level approaches to PPAs remain diverse. PPAs are reported to the WDPA by a small proportion of countries, and those countries that do provide data may do so for only a subset of existing PPAs. Ongoing work to support recognition, documentation and best-practice in PPAs will bring further positive contributions, but additional collaborative work, involving governments, NGOs, and PPA governance authorities, continues to be needed.

Concerted efforts to map PPAs at the national level, both by governments and NGOs, have been instrumental in improving datasets for some countries. Examples include the Putting Nature on the Map project in the UK, and the decision taken by the South African government to focus on documenting PPAs in order to better measure progress towards national and international targets. The revision of WDPA protocols to support documentation of PPAs has been an important step in the implementation of the WCC resolution on PPAs (WCC-2016-Res-036),

and one that has the potential to encourage further countries to implement the resolution by adopting strategies on mapping PPAs.

Next steps could include national-level assessments of different mechanisms that support PPAs to establish which are most effective in incentivizing and supporting conservation by private entities. Such assessments could potentially inform the development of mechanisms in countries that currently lack effective PPA-support frameworks. Secondly, the relatively low reporting of protected areas governed by for-profit organizations to the WDPA suggests that increased efforts are needed to identify and document such initiatives.

## SUPPLEMENTARY ONLINE MATERIAL

**Appendix S1.** Map (see figure 1) Australia, New Zealand and South Pacific: protected areas in the WDPA, December 2016, with the addition of South Australian Heritage Agreements as PPAs

**Appendix S2.** Map (see figure 2) Africa: protected areas in the WDPA, December 2016, with South African Biosphere Reserve buffer zones removed

**Appendix S3.** Map (see figure 3) Latin America and the Caribbean: protected areas in the WDPA, December 2016

**Appendix S4.** Map (see figure 4) North East Asia, South Asia and South East Asia: protected areas in the WDPA, December 2016

**Appendix S5.** Map (see figure 5) North America: protected areas in the WDPA, December 2016

**Appendix S6.** Map (see figure 6) Western Europe: protected areas in the WDPA, December 2016

## ENDNOTES

<sup>1</sup> A protected area is a clearly defined geographical 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.

<sup>2</sup> The figures and maps presented here have been generated using the December 2016 release of the WDPA. However, the data for South Africa and Australia have been edited to reflect changes requested by their governments that have not yet been made in the WDPA. For Australia, the change is the reclassification of 1,562 South Australian Heritage Agreements, previously listed as joint governance, as private governance. As shown in Table 2, their governance sub-type is not yet known. For South Africa, the change is the removal of the buffer zones of eight Biosphere Reserves.

<sup>3</sup> This figure was generated using the methodology outlined in the Protected Planet Report 2016 (UNEP-WCMC & IUCN, 2016a). This methodology involves removing sites where the Status field is 'Proposed' or 'Not Reported'. The methodology removes 57 PPAs, which cover an additional 32,895 km<sup>2</sup> globally. Swaziland and Jordan have only proposed PPAs, and are not represented in Table 3 for this reason.

<sup>4</sup> The designations employed and the presentation of material on these maps do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries.

<sup>5</sup> Regions/sub-regions are derived from a dataset combining Exclusive Economic Zones (EEZ: VLIZ, 2014) and terrestrial country boundaries (World Vector Shoreline, 3rd edition, National Geospatial-Intelligence Agency). A simplified version of this layer has been published in the *Nature Scientific Data* journal (Brooks et al., 2016a; Brooks et al., 2016b).

<sup>6</sup> Further data on PPAs in the UK have been collected by the Putting Nature on the Map project and are currently being formatted to comply with the WDPA data standards.

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**A guanaco (*Lama guanicoe*) in Karukinka on the island of Tierra del Fuego; this 2,980 km<sup>2</sup> area is the largest donation of private land for conservation in Chile © Kent Redford**

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## RESUMEN

Las áreas bajo protección privada (APP) son consideradas cada vez más como instrumentos de gran importancia para la conservación, tal y como se demuestra en los esfuerzos recientes que apoyan su reconocimiento y documentación a nivel nacional e internacional, a la par de áreas naturales protegidas bajo otros esquemas de gobernanza. Los avances en la definición de los lineamientos para caracterizar las APP, han ido acompañados de un apoyo cada vez mayor en el ámbito de las políticas internacionales, situación que se ha reflejado en un incremento del número de APP que han sido integradas en Base de Datos Mundial sobre Áreas Protegidas (WDPA). A pesar de ello, los esfuerzos nacionales para reconocer y apoyar las APP aún son muy dispares, al igual que el empeño de los países para reportar sus APP a la WDPA. En este artículo: se presentan los avances recientes que respaldan las APP a nivel internacional; se resume el estado actual de los informes sobre APP a la WDPA; y, se discuten los retos y oportunidades que caracterizan actualmente el futuro de las APP.

## RÉSUMÉ

On reconnaît de plus en plus l'importance des initiatives de conservation menées par les aires protégées privées (APPs), comme en témoignent de récents développements qui préconisent leur identification et leur enregistrement au même titre que les aires protégées sous d'autres types de gouvernance. Les avancées des directives pour les APPs ont été accompagnées et soutenues par les instances politiques internationales. Ainsi, de plus en plus d'APPs sont inscrites à la Base de Données Mondiale sur les Aires Protégées (WDPA). Cependant, au niveau national, le niveau de soutien aux APPs est variable, tout comme les inscriptions des APP à la WDPA. Nous faisons état des récents progrès au niveau international en faveur des APPs, puis décrivons l'état actuel des inscriptions des APPs à la WDPA, et enfin nous exposons les défis et opportunités qui caractérisent actuellement l'avenir des APPs.