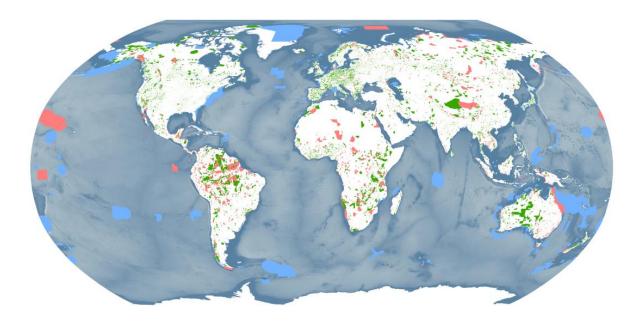
Global Database on Protected Area Management Effectiveness

User Manual 1.0





Global Database on Protected Area Management Effectiveness User Manual 1.0

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List of acronyms

- CBD: Convention on Biological Diversity
- CEPF: Critical Ecosystem Partnership Fund
- CRF: Common reporting format
- DCA: Data Contributor Agreement
- EoH: Enhancing our Heritage
- GD-PAME: Global database on protected area management effectiveness
- **GEF:** Global Environment Facility
- IPBES: Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services
- IUCN: International Union for Conservation of Nature
- METT: Management Effectiveness Tracking Tool
- OECM: Other effective area-based conservation measures
- PA: Protected area
- PAME: Protected area management effectiveness
- RAPPAM: Rapid Assessment and Prioritization of Protected Area Management
- **TNC: The Nature Conservancy**
- UNEP-WCMC: UN Environment World Conservation Monitoring Centre
- WCPA: World Commission on Protected Areas
- WDPA: World Database on Protected Areas
- WWF: World Wide Fund for Nature

Manual at a glance

The Global Database on Protected Area Management Effectiveness (GD-PAME) is the most comprehensive database of protected area management effectiveness (PAME) information. It was originally developed at the University of Queensland, and is now a joint effort of the IUCN World Commission on Protected Areas (WCPA) and UN Environment, managed by UNEP-WCMC. The aim behind the GD-PAME is to compile PAME evaluations for all countries in the world from governments and other authoritative organizations, referred to as data providers. The GD-PAME is hosted on the Protected Planet website, along with the World Database on Protected Areas (WDPA), at <u>www.protectedplanet.net</u>. This website can be used to view and/or request PA effectiveness data in the GD-PAME.

This GD-PAME User Manual provides information and guidance on the GD-PAME and its history, as well as the PA management evaluations it contains, how these are collected, managed and distributed, and how the PAME information should be interpreted and used for analyses and research. The Manual has been prepared for GD-PAME data providers and users. It is structured in four sections and includes four appendices. In this Manual 'PAME evaluations' are also referred to as 'data'.

Section 1 is an introduction to PAME and the GD-PAME.

Section 2 describes the GD-PAME Data Standards that ensure the data are supplied in a common format that is globally interoperable and useable.

Section 3 explains how the GD-PAME is compiled through a quality control process underpinned by the GD-PAME data standards.

Section 4 addresses the use of the GD-PAME, including how it can be accessed and how it should be cited.

The GD-PAME user manual is a dynamic and evolving document. It is recommended that all parties interested in using information from the GD-PAME read these guidelines prior to using the GD-PAME for any research purposes, or for analyses that will inform policy or decision making. For any queries regarding collation, use, or processing of the database, or any feedback regarding this manual please contact protectedareas@unep-wcmc.org.

1. A background on protected area management effectiveness and the GD-PAME

1.1. Background on PAME

There has been significant growth in the global protected area network over the past few decades (Figure 1.1). However, despite this increase in PA coverage, biodiversity continues to decline, even within some PAs (Anthony & Shestackova, 2015). One important factor linked to the underperformance of PAs is their effectiveness and level of management. There is strong evidence that protected areas best conserve biodiversity when they are well-managed. This observation has triggered the development and widespread uptake of **PAME evaluations**, which have been defined as "the assessment of how well protected areas are being managed – primarily the extent to which management is protecting values and achieving goals and objectives" (Hockings et al. 2006, p xiii).

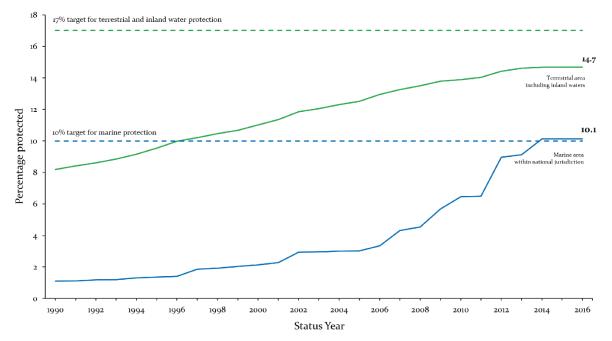


Figure 1.1: Growth of the global protected area network since 1990 (source UNEP-WCMC and IUCN 2016)

Since the 1990s, academics, non-government organizations and protected area agencies across the world have developed a range of methodologies to assess PAME at a site or system level (Leverington et al. 2008). Most of the methodologies are based on self-assessment surveys, containing a number of questions against which progress towards specific management objectives is scored. Many also include components assessed through quantitative data where it is available.

Most PAME methodologies are based around the IUCN WCPA framework for protected area management effectiveness (Hockings et al. 2006). The aim of the framework is to provide overall guidance to managers and encourage standards for PAME assessment and reporting. The WCPA framework includes six key elements: context, planning, inputs, process, outputs and outcomes (Figure 1.2). Examples of PAME methodologies, which are based around this framework, include:

Management Effectiveness Tracking Tool (METT) (Stolton et al. 2007), Rapid Assessment and Prioritization of Protected Area Management (RAPPAM) (Ervin 2003), Enhancing our Heritage (EoH) (Hockings et al. 2008), and the Marine Tracking Tool (Leverington et al. 2008). More information about these methodologies can be found on the Protected Planet website.

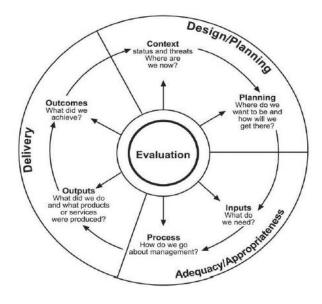


Figure 1.2: The IUCN WCPA Framework for assessing management effectiveness of protected areas (Source: Hockings et al., 2006)

In 2010, the countries of the world adopted the Convention on Biological Diversity (CBD) Strategic Plan 2011-2020 to halt biodiversity loss and ensure the sustainable use of natural resources (CBD 2010). The plan includes twenty Aichi Biodiversity Targets to be met by 2020, and acknowledges the central role of protected areas in meeting biodiversity conservation goals. Target 11 sets out a series of equally important and necessary elements that a global protected area network should deliver: *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 (CBD, 2010).*

1.2. What is the Global Database on Protected Area Management Effectiveness?

In order to compile all of the PAME evaluations undertaken throughout the world, the Global Database on Protected Areas Management Effectiveness was created in 2006. The database now comprises 14,297 assessments, carried out in 6,802 protected areas in 72 countries and territories.

The GD-PAME is managed by UNEP-WCMC, and compiled in collaboration with a wide range of governmental and non-governmental organizations, which submit protected area data to UNEP-WCMC for both databases, the WDPA and the GD-PAME. These are referred to in this document as data providers.

The primary purpose of the GD-PAME is to:

- Indicate whether a protected area in the WDPA has been assessed, and
- Indicate whether the protected area's assessment is publicly-available.

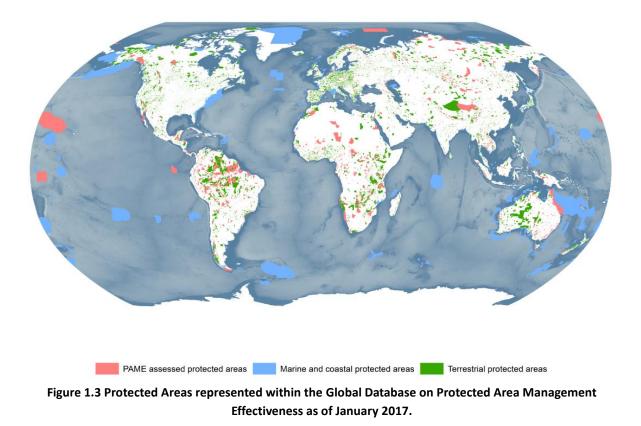
Although further work is needed to improve the completeness of the GD-PAME, it is the most comprehensive global database of PAME assessments of sites. The PAME assessments it holds are linked to protected area records within the World Database on Protected Areas (WDPA), which is the most comprehensive global database on marine and terrestrial protected areas. Both databases are made available online through Protected Planet (www.protectedplanet.net) where the data can be viewed and downloaded. The CBD recognizes the need for information on PAME and the importance of national and regional datasets on PAME information, calling for 'Parties to expand and institutionalize management effectiveness assessments to work towards assessing 60 per cent of the total area of PA by 2015 using various national and regional tools, and report the results into the GD-PAME'.

In order to be included in the GD-PAME, the protected area evaluated through the assessment must also be included in the WDPA. The IUCN definition of a protected area has been the primary criterion for including PAs in the WDPA, although the database is being expanded to include areas that do not meet this definition, but make a positive contribution to conservation (referred to as OECMs). For further information about this, please refer to the WDPA User manual (UNEP-WCMC, 2016).

Data providers should consult with UNEP-WCMC if they wish to provide data for a site that is not yet included in the WDPA. Please contact: protectedareas@unep-wcmc.org.

The GD-PAME data standards are explained in detail in Section 2 of this manual. Section 3 describes how the data is collected, quality-checked, and incorporated into the GD-PAME. Primary users of the PAME assessments include NGOs (e.g. WWF, BirdLife International, CEPF), International Programmes (The World Bank, the GEF), national government agencies and academic institutions (See Section 4).

Figure 1.5 shows protected areas with a management effectiveness assessment recorded in the GD-PAME.

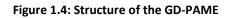


1.3. GD-PAME Data Structure

The GD-PAME is stored as an SQL database comprising one main database table (basic information), the raw assessments and a source table (Figure 1.6).

- **Basic information:** basic tabular information on protected area management effectiveness key attributes (See section 2).
- **Raw assessments:** the raw assessments, if submitted, are stored separately in a document management system.
- **Source table:** the GD-PAME source table describes the source of the data in the GD-PAME, containing information on the data provider, date of submission and other metadata (See section 2).





The GD-PAME and WDPA share the same unique identifier, the WDPA ID, for individual protected areas. The ID is specific to a protected area in a specified geographical space, and does not change over time unless the designation for that protected area changes or the site is degazetted.

It is important to note that different designations of protected areas may occupy the same geographical space. In these cases, the two designations have different WDPA IDs, despite overlapping geographically. For example, Yellowstone National Park in the United States is a National Park, but it is also a natural World Heritage site. Each designation has a different WDPA ID. If both designations have undergone separate PAME assessments, these assessments will be stored separately in the GD-PAME.

2. GD-PAME Data standards

Data in the GD-PAME must meet the GD-PAME data standards. These were developed in 2016, and are reviewed regularly to ensure consistency in the way the assessments are compiled, managed, and presented, to facilitate reporting as well as to ensure consistency with information reported in the WDPA.

Standards are important to ensure all information is supplied in a common format that is interoperable and useful for a wide variety of reporting and analytical purposes. Box 2.1 summarizes the three key requirements that must be met for data to comply with the GD-PAME data standards. This section provides specific details for each of these requirements.

Box 2.1. Three requirements to meet the GD-PAME data standards

- 1. The protected area assessed must be included in the WDPA (and therefore be assigned a WDPA ID)
- 2. The original source of information must be provided
- 3. The GD-PAME Data Contributor Agreement must be signed

2.1. Basic information

The current version of the GD-PAME stores seven fields, refered to as data attributes, which describe each record in the GD-PAME. All the current attributes have been classified as *minimum*, meaning that they are **all mandatory for any PAME evaluation to be integrated in the GD-PAME**.

The GD-PAME data attributes are summarised in Table 2.1 and described in detail in Appendix 1

Table 2.1 Summarized description and permitted values for the GD-PAME attributes. For detailed descriptions see <u>Appendix 1</u>.

No	Requirement	Provided by	Field Name	Туре	Length	Accepted values
1	Minimum	UNEP-WCMC	WDPAID	Number (Double)	N/A	Assigned by UNEP-WCMC. Unique identifier for a protected area. Links to WDPA.
2	Minimum	UNEP-WCMC	ASS_ID	Number (Double)	N/A	Assigned by UNEP-WCMC. Unique identifier of the PAME assessment.
3	Minimum	Data provider	ISO3	Text (String)	20	Permitted values: ISO 3166-3 character code of country or territory where the PA is located.
4	Minimum	Data provider	METHOD	Text (String)	254	Name of the assessment methodology/ies
5	Minimum	Data provider	YR_ASS	Number (Long Integer)	12	Year the assessment was completed.
6	Minimum	Data provider	LINK_ASS	Text (String)	254	Link to raw assessment. Restricted use.
7	Minimum	UNEP-WCMC	METADATA ID	Number (Long Integer)	12	Assigned by UNEP-WCMC. Links to source table.

2.2. Source information

Recording accurate source information in the GD-PAME is important to ensure that ownership of the data is maintained and traceable. Source information includes details on the assessment provider. This information is stored in the GD-PAME Source Table and linked to the GD-PAME by the Metadata ID. A data submission will only be accepted if the source information is provided. The source table is completed by UNEP-WCMC in collaboration with the assessment provider.

No.	Requirement	Field Name	Full Name	Туре	Length	Description
1	Assigned by UNEP- WCMC	METADATAID	Metadata ID	Number (double)	N/A	An ID assigned by UNEP-WCMC that is used to link each protected area record in the GD- PAME main attribute table to the GD-PAME Source Table.
2	Minimum	DATA_TITLE	Data Set Title	Text (string)	254	The title of the dataset, e.g. PAME assessment of Mercantour National Park.
3	Minimum	RESP_PARTY	Responsible Party	Text (string)	254	The organization, consultancy, national government, private company or other entity that claims ownership/authorship of the data or that is providing the data on behalf of the ownership/authorship entity.
4	Minimum	RESP_EMAIL	Responsible Party Contact E- mail(s)	Text (string)	254	Contact e-mail address of the organization listed as the responsible party which maintains the ownership/authorship of the data.
5	Minimum	YEAR	Year	Number (Long integer)	50	The reference date, as a four digit year, indicating the year when the dataset was first submitted to the GD-PAME.
6	Minimum	LANGUAGE	Dataset Language	Text (string)		Language(s) used within the dataset. 'Not Reported' is used when this data is not available.

2.3. Raw assessment

The raw assessment(s) provided is/are stored in the GD-PAME. The assessments are made available on the Protected Planet website in cases where permission for sharing has been granted by the data provider. In cases where such permission has not been granted, the assessments are maintained internally for archive and analytical purposes.

2.4. Data Contributor Agreement

Data contributors who provide PAME evaluations for inclusion in the GD-PAME are requested to sign the GD-PAME Data Contributor Agreement. This ensures that there is a written record of the agreement that the data will be included in the GD-PAME, and allows the data provider to specify the terms under which it is made available. The agreement specifically states how the data provided will be used and that and redistribution or use of the data by third parties will be subject to the Protected Planet Terms of Use.

A PAME evaluation will only be accepted if the GD-PAME Data Contributor Agreement is signed. A template of the agreement is available in Appendix 2, or on request from <u>protectedareas@unep-wcmc.org</u>.

3. How is the GD-PAME compiled?

After PAME information has undergone quality-checking, and has been formatted and integrated in the GD-PAME, it is made available on Protected Planet. Protected Planet is updated with new data twice a year: <u>www.protectedplanet.net</u> (Figure 3.1).

This section describes the different types of data providers, explains the frequency at which new data is requested by UNEP-WCMC, and describes the process for submitting and validating the data included in the GD-PAME.

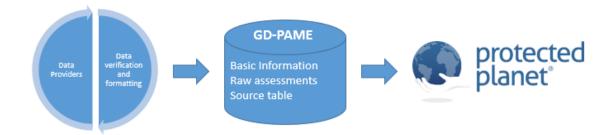


Figure 3.1 The GD-PAME workflow: UNEP-WCMC works with closely with data providers to ensure the PAME evaluations provided comply with the GD-PAME data standards. Data is then formatted and integrated into the GD-PAME and made available online through <u>www.protectedplanet.net</u>.

3.1. Data providers

The GD-PAME is contributed to by a wide range of data providers, from governments to individuals. All data is provided by the entity with the intellectual property (IP) rights to the data itself, and these rights are not conferred to UNEP-WCMC, IUCN or any third-party user of the GD-PAME. All IP rights-holders are protected by the GD-PAME Terms of Use (section 4.2). There are currently five main data provider types for the GD-PAME:

- **1. Governments**: these include national governments and sub-national agencies that manage statutory protected area data and information.
- 2. International secretariats: secretariats of international conventions and agreements such as the Ramsar Convention, World Heritage Convention and UNESCO Man and the Biosphere Programme.
- **3. Regional entities:** These include organizations that manage data and information on regional protected area networks, such as the European Environment Agency which manages Europe's Natura 2000 database.
- **4. NGOs:** these include NGOs that manage protected areas themselves, or in collaboration with other governance actors, such as a private landowners or government agencies.

5. Other entities or individuals: this category includes the range of data providers that govern or manage protected areas outside of the primary types listed above. This can include individual landowners, communities or indigenous peoples managing protected areas, or other institutions outside of a statutory protected area network.

3.1.1 Benefits for countries of submitting PAME evaluations

In addition to being a global data depository of individual PAME evaluations, the GD-PAME is used to calculate indicators related to several international processes. This includes indicators for the Convention on Biological Diversity and the Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services (IPBES) (See Box 4.1). These indicators enable the progress of global agreements to be tracked. Moreover, there are several ways in which individual countries can benefit from undertaking PAME evaluations and providing data to the GD-PAME:

- Collating data from diverse sources: At the national level, protected areas (and protected area management effectiveness information) might be managed by different institutions and/or governmental agencies, including community groups and private organizations. The GD-PAME brings information from these multiple sources together, enabling countries to have a clearer picture of the extent to which their protected area network has been assessed. Furthermore, countries can access their PAME information on request by contacting protectedareas@unep-wcmc.org or accessing the Protected Planet website (www.protectedplanet.net). It also offers a data-management option for countries that do not have sufficient capacity to sustainably manage this information.
- **Informing adaptive management practices:** PAME information helps, for example, to determine which aspects of management are most effective within a protected area.
- **Prioritizing resource allocation:** Comparing the PAME evaluations for a site will help ensure the issues highlighted in the assessments are being responded to with adequate funding and will help prioritize protected areas that need more attention.
- **Reporting against conservation targets:** The need for PAME information is recognized in conservation policy (Aichi Target 11: 'effectively and equitably managed'). The CBD calls on its parties to provide information to the GD-PAME. A comprehensive set of PAME information in the database will generate more accurate national reporting on management effectiveness.

3.1.2. Frequency of requests to data providers and selection criteria

Although data providers are welcome to submit PAME assessments whenever these are available, UNEP-WCMC aims to update PAME information for each country at least every 5 years. This is consistent with the minimum update frequency of the WDPA.

In addition, UNEP-WCMC also focuses its efforts on contacting **countries for which less than 5% of the PA network reported in the WDPA has PAME information in the GD-PAME**.

3.1.3. Submitting PAME evaluations to the GD-PAME

The process by which a data provider submits PAME evaluations to the GD-PAME varies depending on whether the protected area in question is already reported in the WDPA or not.

If the protected area is already reported in the WDPA:

The data provider can submit the PAME assessment(s) of the sites, provided the GD-PAME standards are met. For more information on the GD-PAME standards, see section 2. The assessments and related compulsory information should be sent to <u>protectedareas@unep-wcmc.org</u>.

If the protected area is not already reported in the WDPA:

The inclusion of a protected area in the WDPA is a requirement for its PAME evaluation to be added to the GD-PAME. If this is not the case, the data provider should contact UNEP-WCMC and provide the protected area boundary and related information for integration in the WDPA. Once the site has been added to the WDPA, the PAME evaluation can be added to the GD-PAME. For more information on how to submit a site to the WDPA, refer to the <u>WDPA User Manual</u> (UNEP-WCMC 2016) or contact protectedareas@unep-wcmc.org.

3.2. Data collation and formatting

3.2.1. Interactions with data provider

This phase involves liaising with the data provider(s) in order to obtain data (for both the WDPA and the GD-PAME). This phase can take between a few weeks to months depending on the particular support needs of the data provider. UNEP-WCMC maintains long term contact with data providers, and keeps records of their details through Data Contributor Agreements and source information, as explained in section 2.4.

3.2.2. Quality checking and data formatting

Information required with the submission of the PAME assessment is subject to a series of quality checks and reformatting to ensure it meets the GD-PAME data standards (see section 2). The process involves checking that:

- The protected area is already included in the WDPA
- The information provided is complete
- The source information is complete
- The Data Contributor Agreement has been signed

3.2.3. Integrating Evaluations into the GD-PAME

Once the information submitted along with the PAME evaluation has been formatted and conforms to the GD-PAME Data Standards, it is integrated into the GD-PAME.

When a protected area is removed from the WDPA, the related PAME evaluation is left in the GD-PAME. This is useful in order to keep records of historical information.

In the coming years, UNEP-WCMC plans to release an updated version of the shareable information in the GD-PAME every six months. It will be made available through the Protected Planet webpage (<u>http://www.protectedplanet.net</u>). Each release will include a brief summary on the new additions (and removal if applicable) of PAME evaluations in the GD-PAME. New methodologies previously not reported in the GD-PAME will also be indicated, in addition to national statistics.

3.3. Assessing the quality of the GD-PAME

The quality of the GD-PAME is assessed through the calculation of two indicators:

Indicator 1: Percentage of protected area records with PAME information

For each country, this indicator measures the number of protected areas with PAME information in the GD-PAME, as a proportion of the total number of protected areas reported for that country in the WDPA. The ideal result would be to have PAME information for every protected area in the WDPA.

Indicator 2: Percentage of records updated in the last five years

As with the WDPA, UNEP-WCMC aims to update PAME information in the GD-PAME at least once every five years. Accurate and up to date PAME information is fundamental to inform decisions.

4. Using the GD-PAME

It is intended that the GD-PAME will be used by a wide range of groups including scientists, NGOs, private sector and international bodies, in order to answer questions on how well protected areas are being managed after designation. The database is also fundamental for fulfilling several global reporting mechanisms, and for developing indicators and tracking progress towards protected areas targets (Box 4.1). This section provides guidance on how to access, cite and use the GD-PAME.

Box 4.1. Use of the GD-PAME for selected global reporting mechanisms and periodic reports

- 4.1.1 CBD Global Biodiversity Outlook : A summary status of biological diversity and an analysis of steps being taken by the global community to ensure that biodiversity is conserved and used sustainably is published by the CBD and available at www.cbd.int/gbo/
- 4.1.2 Protected Planet Report: The Protected Planet Report series reviews progress towards the achievement of the protected area targets of the Convention on Biological Diversity (CBD), among other targets. More information at http://wcmc.io/Protected_PlanetReport2016
- 4.1.3 IPBES: Information in the GD-PAME is used for the indicator on protected area management effectiveness which is one of the indicators approved by this process. <u>http://www.ipbes.net/sites/default/files/factsheet_wcmc_protected_area_managemen_t_effectiveness.pdf</u>

4.1. Accessing the data

Basic information stored in the database will be made available online through the Protected Planet website during the course of 2017 (<u>www.protectedplanet.net</u>). At present, the database is still incomplete. It must be used with caution and a full understanding of the caveats and fitness for use of the database. Raw assessments provided by countries will not be made available unless permission for sharing is given by the data provider.

4.2. Terms of Use

The use of the GD-PAME data is subject to Terms of Use which are available online at <u>http://www.protectedplanet.net/terms</u>.

4.3. Citing the GD-PAME

In accordance with the GD-PAME Terms of Use, UN Environment and IUCN ask that copies of any published analyses that use the GD-PAME are submitted to UNEP-WCMC (protectedareas@unep-wcmc.org). This allows the GD-PAME team to track use of the dataset and identify any issues highlighted in analyses. The GD-PAME team also appreciates being contacted where omission of valid data are noted by users, as they can then prioritize follow-up with the protected areas authorities responsible for the omitted sites.

The following citation should always be clearly reproduced in any publication, presentation or analysis involving the GD-PAME:

UNEP-WCMC and IUCN (year), Protected Planet: The Global Database on Protected Area Management Effectiveness (GD-PAME) [On-line], [insert month/year of the version downloaded]. Cambridge, UK: UNEP-WCMC. Available at: www.protectedplanet.net.

The WDPA/GD-PAME team also produces country and global statistics that can be accessed at protectedplanet.net. The correct citation for the GD-PAME online statistics is:

UNEP-WCMC (year), Protected Planet: The Global Database on Protected Area Management Effectiveness (GD-PAME) statistics. Cambridge, UK: UNEP- WCMC. Accessed on: [insert day/month/year when the webpage was accessed].

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Appendix 1 History of GD-PAME

The GD-PAME began as a research database at the University of Queensland and UN Environment World Conservation Monitoring Centre (UNEP-WCMC), under a programme jointly funded by WWF and The Nature Conservancy (TNC). It is now a joint project between the UN Environment and the International Union for Conservation of Nature (IUCN) and its World Commission on Protected Areas (WCPA). Since 2014 it has been compiled and managed by UNEP-WCMC and IUCN-WCPA, in collaboration with data providers from governments, non-governmental organizations, academia and industry.

The original version of the GD-PAME contained many interlinked tables that stored a wide range of information, including details of the methodologies used, and results of the assessments. Based on a review of over 2,000 questions from more than 40 methodologies, 36 headline indicators were developed. Each indicator was characterized as a score on a scale from 0 to 1. The scores between 0 and 1 reflected a continuum from no management up to perfect management (Leverington et al. 2010).

Assessments reported in the GD-PAME are carried out through many different types of methodologies, most of which are developed around the IUCN WCPA framework. Therefore, while still centred around the six main elements of the IUCN framework, the assessments' questions may vary from one methodology to another. A 'common reporting format' was created to allow the cross analysis of PAME information from a wide range of different assessment methodologies.

The integration of the assessments' information in the GD-PAME was done through a two-step translation process:

Step 1 – Similar questions from different methodologies were combined into single 'advanced attributes' in the GD-PAME (common reporting format) (Figure 1.3)

Step 2 – The scores assigned to the original questions were translated, based on predefined translation rules, to the standardized 0-1 scale. The new scores were entered into the GD-PAME against the relevant 'advanced attribute' (Figure 1.4).

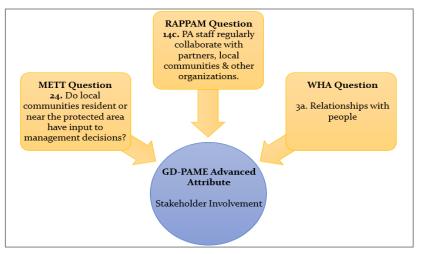


Figure 1: Step 1 of the translation process: allocation of assessment methods' questions to the GD-PAME advanced attributes

Method	Scoring System	Poor Management			Good Management
METT	Original	0	1	2	3
METT	Translation	0	0.33	0.67	1

Figure 2: Step 2 of the translation process: conversion of the original questions' scores to the standardized 0-1 GD-PAME scale

In 2016, the schema of the GD-PAME was simplified from 77 fields to seven fields. This change was made because an increasing number of methodologies meant that the challenge of translating assessments to the common reporting format was becoming greater. The process was also open to a high degree of subjectivity. Furthermore, consistency demanded that the translation of new methodologies be carried out by individuals who had been involved in the translation of the earlier methodologies. This required extensive and time-consuming consultation, and was unsustainable on the long term.

Appendix 2 GD-PAME attributes description

This Appendix explains in detail each of the attributes used in the GD-PAME and in the GD-PAME source table.

GD-PAME attributes

1. WDPA ID

Field name: WDPA_ID

Level of requirement: Minimum

Provided by: UNEP-WCMC

Accepted Values	Description
	The WDPA and GD-PAME use unique identification numbers to accurately track protected
	areas within the databases over time. UNEP-WCMC assigns a WDPA ID to each new protected
Number (Long Integer)	area at its first listing in the WDPA. The WDPA ID is a unique, persistent, globally unique identifier. The WDPA ID is not unique to the geography of a protected area but to the
12 characters	designation of the protected area. There can be many overlapping forms of protection for any geographical area, and therefore there can be overlapping protected areas with different
The WDPA ID is generated by UNEP-	WDPA IDs. However there can be no other protected area with the same identifier. The WDPA ID remains unchanged throughout the life time of the protected areas.
WCMC.	Once a protected area has been assigned a WDPA ID, it should be provided with that ID in all subsequent updates to the WDPA for that protected area. For more information on WDPA IDs please contact <u>protectedareas@unep-wcmc.org</u>

2. Assessment ID

Field name: ASS_ID

Level of requirement: Minimum

Provided by: UNEP-WCMC

Accepted Values	Description
Number (Long Integer)	The Assessment ID is a unique identification number assigned to each new assessment to be integrated in the GD-PAME. It differentiate between assessments that have been done for the
12 characters	same site in the same year.
The ASS_ID is generated by UNEP-WCMC.	For more information on Assessment ID please contact protectedareas@unep-wcmc.org

3. ISO3 Code

Field name: ISO3

Level of requirement: Minimum

Provided by: Data provider

Accepted Values	Description
ISO 3166-1 alpha-3 code	
Examples:	The ISO3 field is used to define countries, territories, as identified by their ISO 3166-1 alpha-3 code. The ISO-3 character country code is defined by the International Organization for
The island of Martinique has an ISO3 code of MTQ.	Standardization (ISO). For example the ISO 3166 code for French Guiana ISO3 is GUF.

If the protected area is by designation a trans-boundary site (i.e., it is a collaborative designation by more than one country or territory) the ISO3 field should include the ISO3 codes of both/all countries or territories, separated by ";" (e.g. "FRA;ESP" for a transboundary site that spans between France and Spain).

4. Methodology

Field name: METHOD

Level of requirement: Minimum

Provided by: Data provider

Accepted Values	Description
Text (String)	
254 characters	The name of the methodology the site has been assessed with (provided in English). Only one methodology should be listed here.
Examples:	A list of main methodologies is provided in annex 4.
METT, RAPPAM	

5. Year of assessment

Field name: YR_ASS

Level of requirement: Minimum

Provided by: Data provider

Accepted Values	Description
	The year in which the assessment was completed. If the assessment was completed over several years, the year it was finalized should be reported.

6. Link to the raw assessment

Field name: LINK_ASS

Level of requirement: Minimum

Provided by: Data provider

Accepted Values	Description
	Accepted values: 'Only viewable', 'For storage only', 'link to assessment'.
	Depending on the sharing agreement restriction:
254 characters	If the site assessment can be viewed by external users but not downloaded, 'Only viewable' is reported.
	If the site assessment is provided for storage only (and used to report progress against international targets) and cannot be viewed by external users, 'For storage only' is reported.
	If the site assessment can be viewed and downloaded by external users, a link to the assessment is provided and enables the document to be viewed and downloaded.

7. Metadata ID

Field name: METADATAID

Level of requirement: Minimum

Provided by: UNEP-WCMC

Accepted Values	Description
Number (Long Integer)	The metadata ID is the number that links the GD-PAME attribute table with the GD-PAME
12 characters	Source table.

Appendix 3 GD-PAME data contributor agreements

This document is a template. The most up to date data contributor agreement (DCA) template is available by contacting from protectedareas@unep-wcmc.org.

Data Contributor Agreement

[Insert Name of Organization

Address

Telephone Number

Email Address]

1. On behalf of *[insert organization/agency name]*, I/we the undersigned are providing the following dataset to UNEP-WCMC for integration into the Global Database on Protected Area Management Effectiveness (GD-PAME): *[insert name of dataset]*. The dataset includes information on Protected Areas Management Effectiveness (PAME) relating to *[insert name of country/region/state etc.]*.

Dataset description (including information on the: study scale, methodology, number of assessments, data format etc.):

The Global Database on Protected Area Management Effectiveness (GD-PAME) is a joint project between the UN Environment and the International Union for Conservation of Nature (IUCN). The GD-PAME was started as a research database at the University of Queensland in 2006 under a programme jointly funded by the World Wildlife Fund (WWF) and The Nature Conservancy (TNC) and is now managed and maintained by the UN Environment World Conservation Monitoring Centre (UNEP-WCMC), in collaboration with governments, non-governmental organizations, academia and industry. The GD-PAME is a global database, comprising many thousands of assessments of protected area management effective (PAME) collated from around the world, that provides a 'common reporting format' allowing the cross analysis of PAME information from a range of different assessment methodologies. The GD-PAME is fundamental for fulfilling several global reporting mechanisms, developing indicators and tracking progress towards protected area targets and through the unique World Database on Protected Area (WDPA) identifying code the GD-PAME can be linked to the WDPA which can be viewed and downloaded at: www.protectedplanet.net. Unless otherwise stated, this dataset is being provided 'free of restrictions'¹. We, the undersigned, agree and understand that by providing data for inclusion within the GD-PAME it will, in accordance with the terms of use available on <u>http://www.protectedplanet.net/terms</u>, be made viewable and downloadable online through websites operated by UNEP-WCMC and IUCN, be included within analyses, and be re-distributed to third parties for use on other platforms.

2. UNEP-WCMC will recognize and respect the intellectual property rights of the data provider and its partners and will maintain proper attribution and source information of the data as provided to UNEP-WCMC.

The designations of geographical entities in any dataset do not imply the expression of any view or opinion whatsoever on the part of UNEP-WCMC or the data provider concerning the legal status of any country, territory, or area, or of its authorities, or concerning the delimitation of its frontiers or boundaries.

If the dataset is found to have been provided without the permission of the relevant stakeholders and right holders, it will be removed from the GD-PAME with immediate effect.

UNEP-WCMC reserves the right to seek verification of the dataset from its partners, and to remove or withhold any information from the GD-PAME that cannot be verified.

I/We hereby give permission to UNEP-WCMC for the integration of this dataset into the GD-PAME.

Signature

Title

Date

¹ UNEP-WCMC is happy to accept data with restrictions. This includes data that is available for onward release but not for use by or on behalf of a commercial entity, and data that is made available only to UNEP-WCMC, UN Environment and IUCN, and is not for onward release. If you wish to place restrictions on data, or require further information, please contact <u>protectedareas@unep-wcmc.org</u>

Appendix 4 List of some common methodologies used around the world

Method Short Name	Method Long Name	Study Location
METT	Management Effectiveness Tracking Tool	
Birdlife IBA	Important Bird and Biodiversity Area Monitoring	
RAPPAM	Rapid Assessment and Prioritisation of Protected Area Management	
WHA Outlook Report	World Heritage Outlook Assessments	Global
GOBI survey	Governance of Biodiversity Research Project	
MPA MEE	How is Your Marine Protected Area Doing?	
Enhancing our Heritage	Enhancing our Heritage	
Marine tracking tool	WWF-World Bank Marine Protected Area score card	
Wetland tracking tool	Wetland tracking tool	
PROARCA/CAPAS	Proyecto Ambiental Regional de Centroamerica (PROARCA)/ Central America Protected Area System (CAPAS)	Central America
PIP Site consolidation	Parks in Peril Site Consolidation Scorecard	Latin America & Caribbean
Parks profiles	Parks profiles	Latin America
European diploma	European diploma of Protected Areas	Europe
Stockholm BR Survey	Stockholm Biosphere Reserve Survey	Europe
PANPARKS	Protected Area Network (PAN) Parks Europe	Europe
Asean MEE	Association of South East Asian Nations Management Effectiveness Evaluation	South East Asia
Africa rainforest study	African Rainforest Study	Africa
West Indian Ocean MPA	West Indian Ocean Marine Protected Area toolkit	Caribbean
WWF/CATIE	WWF/CATIE Evaluation Methodology	Latin America
Netherlands quality test	Natuurmonumenten Quality Test, Netherlands	Netherlands
AEMAPPS	Análisis de Efectividad de Manejo de Areas Protegidas con Participación Social	Colombia
Belize MEE	Belize Management Effectiveness Evaluation	Belize
Venezuela Vision	Venezuela Vision	Venezuela (Bolivarian Republic of)
Brazil 1999	Protected Areas or Endangered Spaces? Brazil 1999 evaluation	Brazil
SIMEC	Sistema de Información, Monitoreo y Evaluación para la Conservación	Mexico
German Nature Parks	Nature Park Quality Campaign, Germany	Germany
Korea SOP	Korea State of Parks Management Effectiveness Evaluation	Republic of Korea
USA SOP	USA State of Parks	United States of America
MEMS	Metodología de Evaluación de Efectividad de Manejo (MEMS) del SNAP de Bolivia	Bolivia (Plurinational State of)
Valdiviana	Valdiviana Ecoregion Argentina	Argentina

Method Short Name	Method Long Name	Study Location
MEE Indian	Indian Management Effectiveness Evaluation	India
India Tiger Reserve Assessment	India Tiger Reserve Assessment	India
Korea METT	Korea survey on protected area management status	Republic of Korea
Ecuador MEE	Indicadores para el Monitoreo y Evaluación del Manejo de las Áreas Naturales Protegidas del Ecuador	Ecuador
METT-RAPPAM crossover	METT-RAPPAM crossover	Bahamas
Parks Canada	Parks Canada	Canada
Central African Republic	Status of protected areas of the Central African Republic	Central African Republic
Schrader German BR	German Biosphere Reserves evaluation	Germany
CI tracking tool	Conservation International Management Effectiveness Tracking Tool	Bolivia (Plurinational State of)
French National Parks	Contrat d'Objectifs (French National Parks)	France
NPAPA England	National Park Authority Performance Assessment (UK)	UK
PA Consolidation index	Índice de Consolidación de Áreas Protegidas	Bolivia (Plurinational State of)
European SCS	European Site Consolidation Scorecard	Austria
Italy quality park project	Italy quality park project	Italy
MARIPA-G	Monitoring and Assessment with Relevant Indicators of Protected Areas of the Guianas (MARIPA-G)	Guyana
NSW SOP	New South Wales (Australia) State of Parks	New South Wales, Australia
Victorian SOP	Victorian (Australia) State of Parks	Victoria, Australia
Qld Rapid Assessment	Queensland Rapid Assessment	Queensland, Australia
Catalonia MEE	Evaluation of the system of protected areas of Catalonia, Spain	Catalonia, Spain
Scenery matrix	Scenery matrix	Brazil
Scotland LNR	Evaluation of Local Nature Reserves in Scotland	Scotland, UK
NTMEE	Parks and Wildlife Northern Territory Management Effectiveness, Australia	Northern Territory, Australia
Padovan 2002	Padovan 2002	Brazil
Tasmanian WHA	Tasmanian World Heritage Management Effectiveness Evaluation	Tasmania, Australia
Galápagos MEE	Manual para la evaluación de la Eficiencia de Manejo del Parque Nacional Galápagos	Galapagos, Ecuador
GBRMPA outlook report	Great Barrier Reef (GBR) Outlook Report	GBR, Australia
1		