Sian Ka'an

1. World Heritage Property Data

1.1 - Name of World Heritage property
Sian Ka'an

1.2 - World Heritage property details

1.3 - Geographic information table

Name	Coordinates	Property (ha)	Buffer zone (ha)	Total (ha)	Inscription year
Sian Ka'an	19.383 / -87.792	528000	0	528000	1987
Total (ha)		**528000**	**0**	**528000**	

Comment
There is no a buffer zone submitted and acknowledged by the World Heritage Committee. But there is in fact a functional buffer zone, composed by Ejidos José María Morelos, Chunyaxché, Tres Reyes, Felipe Carrillo Puerto, X Hazil sur, Andrés Quintana Roo and El Cafetal. Ejidos is the name of a form of land owners, composed by rural populations. The area named influence zone in the Management Program has a surface of 227 043 hectares. It is located outside of the property.

1.4 - Map(s)

Title	Date	Link to source
Sian Ka'an - Map of the World Heritage property	2013	

1.5 - Web and Social Media data of the property (if applicable)

1. Natural site datasheet from WCMC

2. Other Conventions/Programmes under which the World Heritage property is protected (if applicable)

2.1 - Records indicate that your World Heritage property (in whole or in part) is designated and/or protected under the Conventions/programmes shown in the prefilled table below. Please check and amend as necessary.

		The World Heritage property (in whole or in part) is designated and/or protected under this convention/programme	The World Heritage property (in whole or in part) is not designated and/or protected under this convention/programme
2.1.1	**International Register of Cultural Property under Special Protection** (1954 Hague Convention for the Protection of Cultural Property in the Event of Armed Conflict)		✖
2.1.2	**List of Cultural Property under Enhanced Protection** (Second Protocol to the 1954 Hague Convention for the Protection of Cultural Property in the Event of Armed Conflict)		✖
2.1.3	**The List of Wetlands of International Importance (The Ramsar List)** (Convention on Wetlands of International Importance (Ramsar Convention))	✖	
2.1.4	**World Network of Biosphere Reserves** Man and the Biosphere (MAB) Programme	✖	
2.1.5	**Global Geoparks Network** UNESCO Global Geoparks		✖

2.2 - Please provide comments on 2.1 if necessary
Two additional criteria that contribute to consolidating the idea that Sian Ka'an has a preponderant ecological relevance are the facts that the Sian Ka'an Biosphere Reserve was the fifth Mexican Natural Protected Area incorporated into the World List of Biosphere Reserves of the Man and the Biosphere (MAB) Program of UNESCO, in 1986; and the second is that the Sian Ka'an Biosphere Reserve, was inscribed on the Ramsar Convention's List of Wetlands of International Importance.

2.3 - Do your national authorities intend to request the granting of Enhanced Protection (if relevant) under the Second Protocol to the 1954 Hague Convention for the Protection of Cultural Property in the Event of Armed Conflict for the World Heritage property in the next three years?
Not applicable

2.4 - Do your national authorities intend to designate whole or part of the World Heritage property for inclusion in the List of Wetlands of International Importance (The Ramsar List), if relevant, in the next three years?
Not applicable

2.5 - Do your national authorities intend to designate whole or part of the World Heritage property as a Man and Biosphere Reserve (if relevant) in the next three years?

No

2.6 - Do your national authorities intend to apply for whole or part of World Heritage property to be designated as a UNESCO Global Geopark (if relevant) in the next three years?

No

2.7 - Please indicate the level of cooperation at property level between designations under different Conventions/Programmes

2.7.1	**1954 Hague Convention for the Protection of Cultural Property in the Event of Armed Conflict**	
2.7.1	There is **no contact** with the Focal Point(s) of this designation/programme.	✖
2.7.2	The World Heritage Site Manager **occasionally** communicates with the Focal Point(s) of this designation/programme.	
2.7.3	The World Heritage Site Manager **regularly** communicates with the Focal Point(s) of this designation/programme.	
2.7.4	The World Heritage Site Manager **also manages** this designation/programme.	
2.7.2	**Second Protocol to the 1954 Hague Convention for the Protection of Cultural Property in the Event of Armed Conflict**	
2.7.1	There is **no contact** with the Focal Point(s) of this designation/programme.	✖
2.7.2	The World Heritage Site Manager **occasionally** communicates with the Focal Point(s) of this designation/programme.	
2.7.3	The World Heritage Site Manager **regularly** communicates with the Focal Point(s) of this designation/programme.	
2.7.4	The World Heritage Site Manager **also manages** this designation/programme.	
2.7.3	**Convention on Wetlands of International Importance (Ramsar Convention)**	
2.7.1	There is **no contact** with the Focal Point(s) of this designation/programme.	
2.7.2	The World Heritage Site Manager **occasionally** communicates with the Focal Point(s) of this designation/programme.	
2.7.3	The World Heritage Site Manager **regularly** communicates with the Focal Point(s) of this designation/programme.	
2.7.4	The World Heritage Site Manager **also manages** this designation/programme.	✖
2.7.4	**Man and the Biosphere (MAB) Programme**	
2.7.1	There is **no contact** with the Focal Point(s) of this designation/programme.	
2.7.2	The World Heritage Site Manager **occasionally** communicates with the Focal Point(s) of this designation/programme.	
2.7.3	The World Heritage Site Manager **regularly** communicates with the Focal Point(s) of this designation/programme.	
2.7.4	The World Heritage Site Manager **also manages** this designation/programme.	✖
2.7.5	**UNESCO Global Geoparks**	
2.7.1	There is **no contact** with the Focal Point(s) of this designation/programme.	✖
2.7.2	The World Heritage Site Manager **occasionally** communicates with the Focal Point(s) of this designation/programme.	
2.7.3	The World Heritage Site Manager **regularly** communicates with the Focal Point(s) of this designation/programme.	
2.7.4	The World Heritage Site Manager **also manages** this designation/programme.	

2.8 - Please add any further comments on cooperation with the other designation(s)/programme(s)

Regarding international agreements, Sian Ka'an also has a twinning with the Guanacahabibes Biosphere Reserve, in Cuba, it is part of the Mesomerican Reef System (MRS) and is considered a platform site for the United Nations Foundation (UNF), the United Nations Development Program (UNDP) and the United Nations Environment Program (UNEP).

2.9 - Are you aware of any elements associated with the World Heritage property that have been inscribed on the Representative List of the Intangible Cultural Heritage?

No

2.10 - Please list any elements associated with the World Heritage property inscribed under the Convention for the Safeguarding of the Intangible Cultural Heritage of which you are aware

There are no comments.

2.11 - Are you aware of any documentary heritage listed under the Memory of the World Programme associated with the World Heritage property?

No

2.12 - Please list any documentary heritage associated with the World Heritage property listed under the Memory of the World

Programme of which you aware.

It does not apply.

3. Statement of Outstanding Universal Value

3.1 - Statement of Outstanding Universal Value for the property as adopted by the World Heritage Committee

Statement of Outstanding Universal Value

Brief Synthesis

Thousands of years ago the original Maya inhabitants appreciated the exceptional natural beauty of this stretch of coastline, naming it Sian Ka´an, or “Origin of the Sky". Located on the Eastern coast of the Yucatan Peninsula in the State of Quintana Roo, Sian Ka´an is one of Mexico's largest protected areas, established to manage 528,148 hectares of intricately linked marine, coastal and terrestrial ecosystems. Along its roughly 120 kilometres of coastline, the property covers over 400,000 hectares of land ranging from sea level to only ten m.a.s.l. The property boasts diverse tropical forests, palm savannah, one of the most pristine wetlands in the region, lagoons, extensive mangrove stands, as well as sandy beaches and dunes. The 120,000 hectares of marine area protect a valuable part of the Mesoamerican Barrier Reef and seagrass beds in the shallow bays. The lush green of the forests and the many shades of blue of the lagoons and the Caribbean Sea under a wide sky offer fascinating visual impressions.

The diversity of life in Sian Ka'an is exceptional. The tropical forests are home to charismatic mammals such as Jaguar, Puma, Ocelot and Central American Tapir. The property also provides habitat for a large number of resident and migratory bird species. There is a great diversity of marine life, including the West Indian Manatee, four species of nesting marine turtles and hundreds of fish species. About a third of the property is comprised of highly diverse and productive mangrove communities, of vital importance to fisheries in the broader region. Hundreds of forested islands, locally known as "Petenes", emerge from the flooded marshes, some reaching over a kilometre in diameter. A geological, biological and cultural particularity are the "Cenotes", deep natural sinkholes harbouring fascinating life forms, many of them endemic. This karst phenomenon results from collapsing limestone exposing groundwater.

Criterion (vii): The aesthetics and beauty of Sian Ka´an derive from the relatively undisturbed interface of sea and land along a well-conserved coastline. The mosaic of landscape elements is diverse in shapes, forms and colours allowing intriguing views and impressions. Noteworthy and rare natural phenomena include the "Cenotes", water-filled natural sinkholes hosting specialised communities of life and the "Petenes", tree islands emerging from the swamps. Both are connected by underground freshwater systems, jointly forming an invaluable and fragile treasure for future generations.

Criterion (x): The scale and conservation status of Sian Ka'an and its ecosystem diversity support a fascinating range of life forms. Over 850 vascular plants, including 120 woody species, have been confirmed in what is assumed to be a still incomplete inventory. In terms of fauna, noteworthy representatives among the more than 100 documented mammals include endangered species like Black-handed Spider Monkey, Yucatan Black Howler Monkey and the Central American Tapir. A small population of the vulnerable West Indian Manatee occurs in the coastal waters. Some 330 bird species have been recorded, 219 of them breeding in Sian Ka'an. Amphibians and reptiles are represented by more than 40 recorded species, among them the vulnerable American Crocodile and four of the six turtle species found along the Mexican coast, all reproducing within the property. The isolation of some of the "Cenotes" led to the evolution of several species which are locally endemic to single sinkholes. With some 80 recorded species of reef-building coral the portion of the Mesoamerican Reef within the property is one of the richest in Mexico. Jointly with the many other aquatic habitats it harbours more than 400 species of fish and a wealth of other marine life.

Integrity

The extensive property covers a large wetland complex, tropical forests, a diverse coastline, mangroves and a fascinating marine area with noteworthy corals and seagrass beds, all in a good overall state of conservation. Large tracts of the dense forests, mangroves and marshland are difficult to access and the poor soils and the vulnerability to storms and flooding have contributed to maintaining the mosaic of ecosystems. Many of the boundaries coincide with landscape features, such as the natural edge of the marshes in the South-East or the limits of the Espiritu Santo Bay catchment in the South. In the ocean, a depth of 50 metres has been defined as the Eastern boundary of Sian Ka'an. The property is of great importance to support the continuity of the intricate connections between terrestrial, marine and freshwater ecosystems and their rich flora and fauna. Sian Ka'an embraces a self-protecting system that is characteristic of the coast of the Yucatan Peninsula: the Mesoamerican Reef shelters the landward mangroves and seagrass beds, while the mangroves trap sediments, filter pollution and serve as nurseries for many vertebrates and invertebrates in the reef. In other words, these major landscape and seascape features are of vital importance to each other. It is therefore indispensable to consider them jointly in management and conservation, as is the case in Sian Ka'an. The contiguity with the almost 90,000 hectares protected as Uaymil Flora and Fauna Protection Area to the South and other important marine and terrestrial protected areas nearby likewise contribute to the integrity of Sian Ka'an.

Requirements for protection and management

After the historic abandonment of the area, inaccessibility, frequent flooding and poor soils allowed for centuries of natural regeneration, until governmental schemes encouraged timber extraction and land clearing for cattle pastures in the 20th Century. The undesired effects of uncontrolled development led to the creation of a nature reserve in 1982, consolidated in 1986 when the area was categorized a national biosphere reserve by Presidential Decree and also internationally recognised. More recently, Sian Ka'an was also recognised as part of a vast Wetland of International Importance under the Ramsar Convention. The large property is federally owned with the exception of a small patch of private land of around one percent of the total area on the Northern coast. Today, Mexico's National Protected Areas Agency (CONANP) under the Ministry of the Environment (SEMARNAT) is in charge of management, cooperating with partners at all levels of government. A management programme is to guide all activities and zoning. The involvement of local communities, governmental representatives, Academia and non-governmental organisations in management is promoted through an Advisory Council.

Sian Ka'an is susceptible to frequent and heavy tropical storms. The barrier reef provides natural protection for the coast, a telling example of conservation contributing to disaster preparedness. As for human impacts, the inaccessibility protects large tracts of the property. Besides the coastal fishing villages of Punta Allen and Punta Herrero, there are few permanent residents in the property. Hunting, fishing and collection of forest products, however, are widespread. Sport fishing and commercial fishing to supply nearby tourism centres has resulted in marked declines of some species, notably the Spiny Lobster. Management responses are needed. Agriculture north of the property bears pollution risks pollution and fires set to clear land have repeatedly spread into the property. Alien invasive species are reported, mostly along the dirt tracks on land but also in the ocean. The main economic sector directly and indirectly impacting on the property, however, is tourism. Fishing lodges and clubs, small hotels, cabins and trailer parks are the visible manifestations within the property. Tourism has reached proportions of mass tourism along parts of the Yucatan Coast and the property is in the vicinity of Tulum and Cancun, two of Yucatan’s major tourist attractions. Associated coastal urbanisation with, for example, well-documented garbage and sewage problems, require monitoring and management responses. Attempts to encourage low impact forms of tourism in the property to promote public awareness and visitor education but also as a source of conservation funding deserves consolidation.

3.2 - Please list the key attributes of Outstanding Universal Value of your property and give an assessment of their condition. As a guideline, it is suggested to focus on approximately five key attributes (no more than 15 overall).

	Brief identification of attribute	Preserved	Compromised	Seriously compromised	Lost

3.2.1	The aesthetics and beauty of Sian Ka´an derive from the relatively undisturbed interface of sea and land along a well-conserved coastline	✖			
3.2.2	The mosaic of landscape elements is diverse in shapes, forms and colours allowing intriguing views and impressions	✖			
3.2.3	Noteworthy and rare natural phenomena include the Cenotes, water-filled natural sinkholes hosting specialized communities of life and the Petenes, tree islands emerging from the swamps	✖			
3.2.4	The scale and conservation status of Sian Ka'an and its ecosystem diversity support a fascinating range of life forms	✖			
3.2.5	Over 850 vascular plants, including 120 woody species, have been confirmed in what is assumed to be a still incomplete inventory	✖			
3.2.6	In terms of fauna, noteworthy representatives among the more than 100 documented mammals include endangered species like Black-handed Spider Monkey, Yucatan Black Howler Monkey and the Central American Tapir.	✖			
3.2.7	A small population of the vulnerable West Indian Manatee occurs in the coastal waters	✖			
3.2.8	Some 330 bird species have been recorded, 219 of them breeding in Sian Ka'an	✖			
3.2.9	Amphibians and reptiles are represented by more than 40 recorded species, among them the vulnerable American Crocodile and four of the six turtle species found along the Mexican coast, all reproducing within the property.	✖			
3.2.10	The isolation of some of the Cenotes led to the evolution of several species which are locally endemic to single sinkholes	✖			
3.2.11	With some 80 recorded species of reef-building coral the portion of the Mesoamerican Reef within the property is one of the richest in Mexico.		✖		
3.2.12	Jointly with the many other aquatic habitats is harbours more than 400 species of fish and a wealth of other marine life.		✖		
3.2.13	Cenotes and Petenes are connected by underground freshwater systems, jointly forming an invaluable and fragile treasure for future generations.	✖			
3.2.14					
3.2.15					

3.3 - Comments, conclusions and/or recommendations related to Statement of Outstanding Universal Value

The relevance of Sian Ka'an for the development of science is clear from the very history of the area. A list covering almost 60 national and international research institutions, 385 main authors and 966 publications. Recently the National Commission for the Knowledge and Use of Biodiversity updated the study called Mangroves of Mexico, in this document 83, 791 hectares are reclassified from previously classified as "other wetlands" to mangrove.

4. Factors Affecting the Property

4.1. Buildings and Development

4.1.1 - Housing

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.1.2 - Commercial development

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.1.3 - Industrial areas

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.1.4 - Major visitor accommodation and associated infrastructure

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Negative, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.1.5 - Interpretative and visitation facilities

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.1.6 - Please comment as necessary on how the factors selected as relevant in 4.1 are affecting the property either negatively or positively

The development of urban and hotel infrastructure in the municipality of Tulum has been increasing exponentially in the last 10 years, without adequate development planning for the tropical forest, wetlands, mangrove, underground rivers and coral reef ecosystems, that exist in the buffer zone of the property. The increase in the construction of hotels and homes is directly linked to the increase in the influx of tourists to the region. Which is happening without planning.

4.2. Transportation Infrastructure

4.2.1 - Ground transport infrastructure

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖		↘		
Negative ✖		✖		✖			↗

4.2.2 - Underground transport infrastructure

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.2.3 - Air transport infrastructure

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖			↗

4.2.4 - Marine transport infrastructure

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Inside, Outside

Relevant	✖ Not relevant

4.2.5 - Effects arising from use of transportation infrastructure

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.2.6 - Please comment as necessary on how the factors selected as relevant in 4.2 are affecting the property either negatively or positively

There are government projects for the construction of a commercial and military airport in the area of influence of Sian Ka'an, less than two kilometers away from the estate of the property. In addition to planning the construction of a tourist and cargo train that will be located along the entire polygon (limits) of the property. So there will be impacts on the connectivity of the ecosystems that make up Sian Ka'an.

4.3. Services Infrastructures

4.3.1 - Water infrastructure

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.3.2 - Renewable energy facilities

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Potential, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖				↗
Negative							

4.3.3 - Non-renewable energy facilities

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖			↗

4.3.4 - Localised utilities

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.3.5 - Major linear utilities

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.3.6 - Please comment as necessary on how the factors selected as relevant in 4.3 are affecting the property either negatively or positively

A photovoltaic system has been installed that generates electricity for the town known as Punta Allen, inside the property of Sian Ka'an. This system will reduce the use of diesel in the population. In the area of influence of Sian Ka'an it is intended to install a gas pipeline to distribute natural gas in the urban and hotel developments of the coast of the municipality of Tulum.

4.4. Pollution

4.4.1 - Pollution of marine waters

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Potential, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.4.2 - Ground water pollution

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.4.3 - Surface water pollution

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.4.4 - Air pollution

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.4.5 - Solid waste

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.4.6 - Input of excess energy

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖			↗

4.4.7 - Please comment as necessary on how the factors selected as relevant in 4.4 are affecting the property either negatively or positively

It has been estimated that the arrival of solid waste to the beaches of Sian Ka'an is 2.5 tons of solid waste per linear kilometer, the waste comes from 45 countries. Being the plastic waste that contributes the largest volume. The exponential development of urban infrastructure and tourism in the area of influence is causing damage to the underground aquifer system due to inadequate disposal of wastewaters. There are studies that reveal the presence of pathogenic microorganisms in the underg

4.5. Biological resource use/modification

4.5.1 - Fishing/collecting aquatic resources

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.5.2 - Aquaculture

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖		→	

4.5.3 - Land conversion

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.5.4 - Livestock farming/Grazing of domesticated animals

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.5.5 - Crop production

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.5.6 - Commercial wild plant collection

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.5.7 - Subsistence wild plant collection

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖			✖		→	
Negative							

4.5.8 - Commercial hunting

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.5.9 - Subsistence hunting

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.5.10 - Forestry/Wood production

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖			✖		→	
Negative							

4.5.11 - Please comment as necessary on how the factors selected as relevant in 4.5 are affecting the property either negatively or positively

Fishermen's cooperatives working within Sian Ka'an are internationally recognized for sustainable fishing for spiny lobster (Panulirus argus). Nets are no longer used to catch fish, this has been achieved through the implementation of a program of diversification of productive activities, alternative to fishing. In Sian Ka'an there have been large forest fires caused by illegal hunting in the savannah and tropical forest area. Illegal hunting is the main threat to terrestrial ecosystems.

4.6. Physical resource extraction

4.6.1 - Mining

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.6.2 - Quarrying

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.6.3 - Oil and gas

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.6.4 - Water (extraction)

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.6.5 - Please comment as necessary on how the factors selected as relevant in 4.6 are affecting the property either negatively or positively

The development of urban and tourist infrastructure in the municipality of Tulum, as well as the population growth of this municipality, causes the extraction of water from underground rivers to have increased. Inadequate wastewater management causes pollution of underground rivers, which flow into the sea and into the coral reefs of Sian Ka'an, causing pollution of this ecosystem.

4.7. Local conditions affecting physical fabric

4.7.1 - Wind

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.7.2 - Relative humidity

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.7.3 - Temperature

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.7.4 - Radiation/Light

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.7.5 - Dust

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.7.6 - Water (rain/water table)

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖			→	
Negative							

4.7.7 - Pests

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖		→	

4.7.8 - Micro-organisms

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖		→	

4.7.9 - Please comment as necessary on how the factors selected as relevant in 4.7 are affecting the property either negatively or positively

Erosion on coastal beaches and dunes is documented by a study of satellite images from the period 1986-2016. The intensity of the waves and the rise in sea level have caused erosion at certain sites on the coast of Sian Ka'an. Two weather stations are installed in the property that monitor climatic and wave factors permanently. 82 alien and invasive species have been identified within Sian Ka'an, some of which have the potential to affect some ecosystems.

4.8. Social/Cultural uses of heritage

4.8.1 - Ritual/Spiritual/Religious and associative uses

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.8.2 - Society's valuing of heritage

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Potential, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive ✖	✖		✖	✖		→	
Negative							

4.8.3 - Indigenous hunting, gathering and collecting

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.8.4 - Changes in traditional ways of life and knowledge system

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.8.5 - Identity, social cohesion, changes in local population and community

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖			↗

4.8.6 - Impacts of tourism/Visitation/Recreation

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖			→	
Negative ✖	✖			✖			↗

4.8.7 - Please comment as necessary on how the factors selected as relevant in 4.8 are affecting the property either negatively or positively

Sian Ka'an is located in the Mayan area of the Yucatan Peninsula, in this area there are a large number of rural villages inhabited by Mayans. The dynamics of the tourism industry in the north of the Yucatan Peninsula caused many Mayan people to migrate to the big cities, often losing their traditions. The tourist activities inside Sian Ka'an are carried out according to the management program of the area, so there are rules and areas of use, which allow sustainable development with direct bene

4.9. Other human activities

4.9.1 - Illegal activities

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive							
Negative ✖	✖		✖	✖			↗

4.9.2 - Deliberate destruction of heritage

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.9.3 - Military training

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.9.4 - War

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.9.5 - Terrorism

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.9.6 - Civil unrest

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.9.7 - Please comment as necessary on how the factors selected as relevant in 4.9 are affecting the property either negatively or positively

Illegal hunting is the biggest threat to the site. Poachers use fire to remove vegetation from savannas, so they can have open spaces for hunting. Other hunters, bake animals in fire ovens, buried. Both customs cause large forest fires that affect huge tracts of savannas and rainforests.

4.10. Climate change and severe weather events

4.10.1 - Storms

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖			✖			↗
Negative ✖	✖			✖			↗

4.10.2 - Flooding

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.10.3 - Drought

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.10.4 - Desertification

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.10.5 - Changes to oceanic waters

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive							
Negative ✖	✖			✖			↗

4.10.6 - Temperature change

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive							
Negative ✖		✖		✖			↗

4.10.7 - Other climate change impacts

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive							
Negative ✖	✖			✖			↗

4.10.8 - Please comment as necessary on how the factors selected as relevant in 4.10 are affecting the property either negatively or positively

Sian Ka'an is located in the impact zone of tropical storms and hurricanes, so with the effects of climate change the frequency of storms and hurricanes has increased. There is evidence of the change in the coastline of the site, in some areas the beach has been lost due to erosion derived from a more intense waves. The human settlements Punta Allen, Punta Herrero and María Elena are among the sites with the greatest loss of beach due to rising sea levels.

4.11. Sudden ecological or geological events

4.11.1 - Volcanic eruption

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.11.2 - Earthquake

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.11.3 - Tsunami/Tidal wave

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.11.4 - Avalanche/Landslide

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.11.5 - Erosion and siltation/Deposition

Previous answer Cycle 2 (31/07/2012):

- Not relevant

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖				↗

4.11.6 - Fire (wildfire)

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Potential, Inside, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖			↗

4.11.7 - Please comment as necessary on how the factors selected as relevant in 4.11 are affecting the property either negatively or positively

Over 36 years since the establishment of the NPA, there is a record of 109 forest fires, which have affected 37,450 hectares, of which 27,214 are of savanna ecosystems that are considered an ecosystem adapted to fire. 258 hectares of mangrove forest, 2,606 hectares of low thorn forest, 9 hectares of low subdeciduous forest, 87 hectares of subperenifolia low forest, 2,665 hectares of medium subperenifolia forest have been affected. All fires are caused by illegal human activities.

4.12. Invasive/alien species or hyper-abundant species

4.12.1 - Translocated species

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖			✖		→	

4.12.2 - Invasive/Alien terrestrial species

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖		✖	✖		→	

4.12.3 - Invasive/Alien freshwater species

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖		→	

4.12.4 - Invasive/Alien marine species

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Current, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖	✖	✖	✖	✖		→	

4.12.5 - Hyper-abundant species

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.12.6 - Modified genetic material

Previous answer Cycle 2 (31/07/2012):

- Relevant, Negative, Potential, Outside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	**Current**	**Potential**	**Inside**	**Outside**	**Decreasing**	**Stable**	**Increasing**
Positive							
Negative ✖		✖		✖		→	

4.12.7 - Please comment as necessary on how the factors selected as relevant in 4.12 are affecting the property either negatively or positively

82 species have been identified, of which 41 are exotic, 26 invasive exotic, 7 native with invasive behavior and 8 invasive exotics with potential for introduction. Sian Ka'an has an Early Detection Protocol for Invasive Alien Species. In addition, a Program for the early rapid detection of invasive aquatic species has been implemented through the methods of barcode of life and analysis of environmental DNA. Sian Ka'an has an invasive alien species management program.

4.13. Management and institutional factors

4.13.1 - Management system/Management plan

✖ Relevant	Not relevant

	Impact	Origin	Trend of impact

Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖			→	
Negative							

4.13.2 - Legal framework

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖			→	
Negative							

4.13.3 - Governance

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖	✖		→	
Negative							

4.13.4 - Management activities

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Potential, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖			→	
Negative							

4.13.5 - Financial resources

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖	✖	↘		
Negative							

4.13.6 - Human resources

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖		↘		
Negative							

4.13.7 - Low impact research/monitoring activities

Previous answer Cycle 2 (31/07/2012):

- Relevant, Positive, Current, Inside

✖ Relevant	Not relevant

	Impact		Origin		Trend of impact		
Impact	Current	Potential	Inside	Outside	Decreasing	Stable	Increasing
Positive ✖	✖		✖	✖		→	
Negative							

4.13.8 - High impact research/monitoring activities

Previous answer Cycle 2 (31/07/2012):

- Not relevant

Relevant	✖ Not relevant

4.13.9 - Please comment as necessary on how the factors selected as relevant in 4.13 are affecting the property either negatively or positively

Sian Ka'an has financial resources from the Federal Government that cover the costs of basic operation and protection, in addition to financial resources from the Mexican Fund for the Conservation of Nature, GIZ, KfW, NAWCA, which are destined to projects of protection, restoration and community strengthening. However, the federal government's budget and staff has been reduced in recent years.

4.14. Other factor(s)

4.14.1 - Other factor(s)

No other factors.

4.15. Factors Summary Table

4.15.1 - Factors Summary Table

Name	Impact			Origin		Trend
4.1 Buildings and Development						
4.1.1 Housing						
	⊖	👎			🌿	↗
4.1.2 Commercial development						
	⊖	👎			🌿	↗
4.1.4 Major visitor accommodation and associated infrastructure						
	⊖	👎			🌿	↗
4.1.5 Interpretative and visitation facilities	⊕	👎		◎		→
4.2 Transportation Infrastructure						
4.2.1 Ground transport infrastructure	⊕	👎		◎		↘
	⊖		👎		🌿	↗
4.2.2 Underground transport infrastructure						
	⊖	👎			🌿	↗
4.2.3 Air transport infrastructure						
	⊖		👎		🌿	↗
4.2.5 Effects arising from use of transportation infrastructure						
	⊖	👎			🌿	↗
4.3 Services Infrastructures						
4.3.1 Water infrastructure						
	⊖	👎			🌿	↗
4.3.2 Renewable energy facilities	⊕	👎		◎		↗
4.3.3 Non-renewable energy facilities						
	⊖		👎		🌿	↗
4.4 Pollution						
4.4.1 Pollution of marine waters						
	⊖	👎		◎	🌿	↗
4.4.2 Ground water pollution						

	⊖	↓			↻	↗
4.4.3 Surface water pollution						
	⊖	↓			↻	↗
4.4.5 Solid waste						
	⊖	↓			↻	↗
4.4.6 Input of excess energy						
	⊖		↓		↻	↗
4.5 Biological resource use/modification						
4.5.1 Fishing/collecting aquatic resources	⊕	↓		○		→
4.5.2 Aquaculture						
	⊖		↓		↻	→
4.5.3 Land conversion						
	⊖	↓			↻	↗
4.5.7 Subsistence wild plant collection	⊕	↓			↻	→
4.5.8 Commercial hunting						
	⊖	↓		○	↻	↗
4.5.9 Subsistence hunting						
	⊖	↓		○	↻	↗
4.5.10 Forestry/Wood production	⊕	↓			↻	→
4.6 Physical resource extraction						
4.6.4 Water (extraction)						
	⊖	↓			↻	↗
4.7 Local conditions affecting physical fabric						
4.7.1 Wind						
	⊖	↓		○	↻	↗
4.7.2 Relative humidity	⊕	↓		○		→
4.7.3 Temperature	⊕	↓		○		→
4.7.4 Radiation/Light	⊕	↓		○		→
4.7.6 Water (rain/water table)	⊕	↓		○		→
4.7.7 Pests						
	⊖	↓			↻	→
4.7.8 Micro-organisms						
	⊖		↓		↻	→
4.8 Social/Cultural uses of heritage						
4.8.2 Society's valuing of heritage	⊕	↓		○	↻	→

4.8.3 Indigenous hunting, gathering and collecting						
	⛔	👎		⚙	🌿	↗
4.8.4 Changes in traditional ways of life and knowledge system						
	⛔	👎			🌿	↗
4.8.5 Identity, social cohesion, changes in local population and community						
	⛔	👎			🌿	↗
4.8.6 Impacts of tourism/Visitation/Recreation	➕	👎		⚙		→
	⛔	👎			🌿	↗
4.9 Other human activities						
4.9.1 Illegal activities						
	⛔	👎		⚙	🌿	↗
4.10 Climate change and severe weather events						
4.10.1 Storms	➕	👎			🌿	↗
	⛔	👎			🌿	↗
4.10.5 Changes to oceanic waters						
	⛔	👎			🌿	↗
4.10.6 Temperature change						
	⛔		👎		🌿	↗
4.10.7 Other climate change impacts						
	⛔	👎			🌿	↗
4.11 Sudden ecological or geological events						
4.11.5 Erosion and siltation/Deposition						
	⛔	👎		⚙		↗
4.11.6 Fire (wildfire)						
	⛔	👎		⚙	🌿	↗
4.12 Invasive/alien species or hyper-abundant species						
4.12.1 Translocated species						
	⛔	👎			🌿	→
4.12.2 Invasive/Alien terrestrial species						
	⛔	👎		⚙	🌿	→
4.12.3 Invasive/Alien freshwater species						
	⛔		👎		🌿	→
4.12.4 Invasive/Alien marine species						
	⛔	👎	👎	⚙	🌿	→
4.12.6 Modified genetic material						
	⛔		👎		🌿	→
4.13 Management and institutional factors						
4.13.1 Management system/Management plan	➕	👎		⚙		→
4.13.2 Legal framework	➕	👎		⚙		→
4.13.3 Governance	➕	👎		⚙	🌿	→

4.13.4 Management activities						
4.13.5 Financial resources						
4.13.6 Human resources						
4.13.7 Low impact research/monitoring activities						

Legend	Current	Potential	Negative	Positive	Inside	Outside

4.16. Assessment of current and potential positive and negative factors

4.16.1 - Assessment of current and potential negative and positive factors

4.1 Buildings and Development

Name	**Impact**			**Origin**		**Trend**
4.1.1 Housing						

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread
	Temporal scale - Occurence of the impact
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
	Impact - Impact on the attributes
✖	Insignificant
	Minor
	Significant
	Major
	Management response - Capacity of management to respond
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
	Trend - Developement over the last 6 years
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.1.2 Commercial development						

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread
	Temporal scale - Occurence of the impact
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
	Impact - Impact on the attributes
✖	Insignificant
	Minor
	Significant
	Major
	Management response - Capacity of management to respond
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
	Trend - Developement over the last 6 years
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.1.4 Major visitor accommodation and associated infrastructure						

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread
	Temporal scale - Occurence of the impact
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going

Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.1.5 Interpretative and visitation facilities						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
✖	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

4.2 Transportation Infrastructure

Name	Impact			Origin		Trend
4.2.1 Ground transport infrastructure						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.2.2 Underground transport infrastructure						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic

	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.2.3 Air transport infrastructure						
	⛔		👎		👍	↗

Spatial scale - Area affected by the factor	
	Restricted
✖	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
✖	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing

	Static
✖	Increasing

Name	Impact			Origin		Trend
4.2.5 Effects arising from use of transportation infrastructure						
	⛔	👎			↻	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.3 Services Infrastructures

Name	Impact			Origin		Trend
4.3.1 Water infrastructure						
	⛔	👎			↻	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare

✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.3.2 Renewable energy facilities						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	

	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.3.3 Non-renewable energy facilities						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.4 Pollution

Name	Impact			Origin		Trend
4.4.1 Pollution of marine waters						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	

✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.4.2 Ground water pollution						
						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources

Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.4.3 Surface water pollution						
	⛔	👎			↩	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread

Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going

Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major

Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources

Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.4.5 Solid waste						
	⛔	👎			↩	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread

Temporal scale - Occurence of the impact

	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.4.6 Input of excess energy						
	⛔					↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources

Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.5 Biological resource use/modification

Name	Impact			Origin		Trend
4.5.1 Fishing/collecting aquatic resources						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread

Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going

Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major

Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources

Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.5.2 Aquaculture						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread

Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.5.3 Land conversion						
						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity

	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.5.7 Subsistence wild plant collection						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.5.8 Commercial hunting						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread

Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.5.9 Subsistence hunting						
						

Spatial scale - Area affected by the factor	
	Restricted
✖	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
✖	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity

	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.5.10 Forestry/Wood production						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

4.6 Physical resource extraction

Name	Impact			Origin		Trend
4.6.4 Water (extraction)						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive

	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.7 Local conditions affecting physical fabric

Name	Impact			Origin		Trend
4.7.1 Wind						
						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity

	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.7.2 Relative humidity						→

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.7.3 Temperature						→

Spatial scale - Area affected by the factor	
	Restricted
	Localised

	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.7.4 Radiation/Light						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
	High capacity

	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.7.6 Water (rain/water table)						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
✖	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.7.7 Pests						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised

	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.7.8 Micro-organisms						
						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity

	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

4.8 Social/Cultural uses of heritage

Name	Impact			Origin		Trend
4.8.2 Society's valuing of heritage						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.8.3 Indigenous hunting, gathering and collecting						

Spatial scale - Area affected by the factor	
✖	Restricted

	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.8.4 Changes in traditional ways of life and knowledge system						
	⛔	👎			↩	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	

	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.8.5 Identity, social cohesion, changes in local population and community						
	⛔	👎			↗	

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.8.6 Impacts of tourism/Visitation/Recreation	⊕	👎				→
	⛔	👎			↗	

Spatial scale - Area affected by the factor	
✖	Restricted

	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.9 Other human activities

Name	Impact			Origin		Trend
4.9.1 Illegal activities						
	⛔	👎		⊙	↩	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major

Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.10 Climate change and severe weather events

Name	Impact			Origin		Trend
4.10.1 Storms						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
✖	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.10.5 Changes to oceanic waters						

Spatial scale - Area affected by the factor	
	Restricted
✖	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant
✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.10.6 Temperature change						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor

	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.10.7 Other climate change impacts						
	⛔	🔨			↻	↗

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.11 Sudden ecological or geological events

Name	Impact	Origin	Trend

4.11.5 Erosion and siltation/Deposition						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
	Low capacity
✖	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

Name	Impact			Origin		Trend
4.11.6 Fire (wildfire)						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
	Insignificant

✖	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
	Static
✖	Increasing

4.12 Invasive/alien species or hyper-abundant species

Name	Impact			Origin		Trend
4.12.1 Translocated species						
	⛔					➡

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.12.2 Invasive/Alien terrestrial species						
	⛔	👎		⊙	↻	→

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread

	Temporal scale - Occurence of the impact
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going

	Impact - Impact on the attributes
✖	Insignificant
	Minor
	Significant
	Major

	Management response - Capacity of management to respond
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources

	Trend - Developement over the last 6 years
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.12.3 Invasive/Alien freshwater species						
	⛔		👎		↻	→

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread

	Temporal scale - Occurence of the impact
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going

	Impact - Impact on the attributes

✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.12.4 Invasive/Alien marine species						

Spatial scale - Area affected by the factor	
	Restricted
✖	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact	Origin	Trend

4.12.6 Modified genetic material						

Spatial scale - Area affected by the factor	
✖	Restricted
	Localised
	Extensive
	Widespread
Temporal scale - Occurence of the impact	
✖	One off or rare
	Intermittent or sporadic
	Frequent
	On-going
Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

4.13 Management and institutional factors

Name	Impact			Origin		Trend
4.13.1 Management system/Management plan						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going

Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.13.2 Legal framework						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.13.3 Governance						

	Spatial scale - Area affected by the factor
	Restricted
	Localised
	Extensive
✖	Widespread
	Temporal scale - Occurence of the impact
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
	Impact - Impact on the attributes
	Insignificant
	Minor
	Significant
✖	Major
	Management response - Capacity of management to respond
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
	Trend - Developement over the last 6 years
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.13.4 Management activities						

	Spatial scale - Area affected by the factor
	Restricted
	Localised
	Extensive
✖	Widespread
	Temporal scale - Occurence of the impact
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going

Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

Name	Impact			Origin		Trend
4.13.5 Financial resources						

Spatial scale - Area affected by the factor	
	Restricted
	Localised
	Extensive
✖	Widespread
Temporal scale - Occurence of the impact	
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
Impact - Impact on the attributes	
	Insignificant
	Minor
	Significant
✖	Major
Management response - Capacity of management to respond	
	High capacity
✖	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
✖	Decreasing
	Static
	Increasing

Name	Impact			Origin		Trend
4.13.6 Human resources						

	Spatial scale - Area affected by the factor
	Restricted
	Localised
	Extensive
✖	Widespread
	Temporal scale - Occurence of the impact
	One off or rare
	Intermittent or sporadic
	Frequent
✖	On-going
	Impact - Impact on the attributes
	Insignificant
	Minor
	Significant
✖	Major
	Management response - Capacity of management to respond
	High capacity
	Medium capacity
✖	Low capacity
	No capacity and / or resources
	Trend - Developement over the last 6 years
✖	Decreasing
	Static
	Increasing

Name	Impact			Origin		Trend
4.13.7 Low impact research/monitoring activities						

	Spatial scale - Area affected by the factor
✖	Restricted
	Localised
	Extensive
	Widespread
	Temporal scale - Occurence of the impact
	One off or rare
✖	Intermittent or sporadic
	Frequent
	On-going

Impact - Impact on the attributes	
✖	Insignificant
	Minor
	Significant
	Major
Management response - Capacity of management to respond	
✖	High capacity
	Medium capacity
	Low capacity
	No capacity and / or resources
Trend - Developement over the last 6 years	
	Decreasing
✖	Static
	Increasing

4.17. Serial inscriptions (national or transnational)

4.17.1 - If your property is a serial inscription (national or transnational) please identify which components of the property are impacted by each factor

It is not a serial property.

4.18. Prediction of the state of conservation at next cycle of Periodic Reporting.

4.18.1 - Please predict what the state of conservation of each attribute will be approximately 6 years from now (at the time of the next cycle of Periodic Reporting)

	Attribute	Preserved	Compromised	Seriously compromised	Lost
4.18.1.1	The aesthetics and beauty of Sian Ka´an derive from the relatively undisturbed interface of sea and land along a well-conserved coastline	✖			
4.18.1.2	Noteworthy and rare natural phenomena include the Cenotes, water-filled natural sinkholes hosting specialised communities of life and the Petenes, tree islands emerging from the swamps	✖			
4.18.1.3	The scale and conservation status of Sian Ka'an and its ecosystem diversity support a fascinating range of life forms	✖			
4.18.1.4	In terms of fauna, noteworthy representatives among the more than 100 documented mammals include endangered species like Black-handed Spider Monkey, Yucatan Black Howler Monkey and the Central American Tapir.	✖			
4.18.1.5	With some 80 recorded species of reef-building coral the portion of the Mesoamerican Reef within the property is one of the richest in Mexico.	✖			

5. Protection and Management of the Property

5.1. Boundaries and Buffer Zones

5.1.1 - Are the boundaries of the World Heritage property adequate to maintain the property's Outstanding Universal Value?

The boundaries are **adequate to maintain** the property's Outstanding Universal Value

5.1.2 - Are the boundaries of the World Heritage property known and recognised?

The boundaries **are known by both** the management authority and local communities/landowners

5.1.3 - Are the buffer zone(s) of the World Heritage property adequate to maintain the property's Outstanding Universal Value?

The property has **no buffer zone, but there is a need for one**

5.1.4 - Are the boundaries of the buffer zones known and recognised?

The buffer zones of the World Heritage property **are known and recognised by both** the management authority and local communities/landowners

5.1.5 - Comments, conclusions and/or recommendations related to boundaries and buffer zones of the World Heritage property

There is no a buffer zone submitted and acknowledged by the World Heritage Committee. But there is in fact a functional buffer zone, composed by Ejidos José María Morelos, Chunyaxché, Tres Reyes, Felipe Carrillo Puerto, X Hazil sur, Andrés Quintana Roo and El Cafetal. Ejidos is the name of a form of land owners, composed by rural populations. The area named influence zone in the Management Program has a surface of 227 043 hectares. It is located outside of the property.

5.2. Protective Measures

5.2.1 - Protective designation (legal, regulatory, contractual, planning, institutional and/or traditional).

Sian Ka'an fut déclarée réserve de la biosphère le 20 janvier 1986 par le gouvernement fédéral, 99% de l a réserve est la propriété du gouvernement fédéral.

Source: Evaluation des Organisations consultatives

5.2.2 - Please list any legislation and other measures (regulatory -including spatial planning- contractual, institutional or traditional) not included in 5.2.1 and indicate the category

1986 / Decreto presidencial que crea la Reserva de la Biosfera Sian Ka'an /
Decreed link https://simec.conanp.gob.mx/pdf_decretos/97_decreto.pdf 1988 /

Ley General del Equilibrio Ecológico y la Protección al Ambiente /
General Law link https://www.diputados.gob.mx/LeyesBiblio/pdf/LGEEPA.pdf 2014 / Programa de Manejo del Complejo Sian Ka'an: Reserva de la Biosfera Sian Ka'an, Área de Protección de Flora y Fauna Uaymil y Reserva de la Biosfera Arrecifes de Sian Ka'an. /

5.2.3 - Is the legal framework (i.e. legislation and/or regulation including spatial planning) adequate for maintaining the Outstanding Universal Value including conditions of Integrity and/or Authenticity of the property?

The **legal framework** for maintaining of the Outstanding Universal Value including conditions of Authenticity and/or Integrity of the World Heritage property provides an **adequate basis for effective management and protection**

5.2.4 - Is the legal framework (i.e. legislation and/or regulation) adequate in the buffer zone for maintaining the Outstanding Universal Value including conditions of Integrity and/or Authenticity of the property?

The **legal framework** in the buffer zone for maintaining the Outstanding Universal Value including conditions of Authenticity and/or Integrity of the World Heritage property **is inadequate**

5.2.5 - Is the legal framework (i.e. legislation and/or regulation) in the broader setting of the World Heritage property adequate for maintaining the Outstanding Universal Value including conditions of Integrity and/or Authenticity of the property?

The **legal framework** for the broader setting of the World Heritage property provides an **adequate basis for** effective management and protection of the property, contributing to the maintenance of its Outstanding Universal Value including conditions of Authenticity and/or Integrity

5.2.6 - Can the legal framework (i.e. legislation and/or regulation) be enforced?

There is **acceptable capacity/resources** to enforce legislation and/or regulation in the World Heritage property but some deficiencies of enforcement remain

5.2.7 - Please provide a short summary of how the legislation, including spatial planning and other regulation, works in practice

Sian Ka'an has a management program which is implemented by federal authorities in coordination with the residents of the site. There are coordinated work programs with other authorities at the federal level such as the National Guard and the Secretariat of the Navy, which collaborate in the protection of the site.

5.2.8 - Comments, conclusions and/or recommendations about the information related to the measures taken to protect the World Heritage property

It is necessary to strengthen the enforcement of environmental laws that protect the site. As well as increasing the number of park rangers working in Sian Ka'an, in order to have a presence throughout the site. This will help the implementation of the Management Program, as well as the coordinated work with the inhabitants. There are urban, tourist and infrastructure development projects that will be developed in the area of influence of the site and that will promote population growth.

5.3. Management System/Management Plan

5.3.1 - Please check the box which most closely match the character of the governance and management system of the property

Public management system at national level

If 'Other', please specify

5.3.2 - Management System: Please indicate which of the various management tools listed below are used to help protect the property.

A statutory Management Plan or zoning plan for the property.

Other forms of statutory or non-statutory plans (e.g. strategic plans)

Mechanisms to promote equal participation among and within groups, including different levels of authority, local communities, indigenous people, women and men, and other specific groups

A framework for inclusive economic development, including equal access and distribution of resources and opportunities arising from the protection of the property

A code of practice developed by local communities or other groups

An integrated management plan combining World Heritage and any other designations

A management plan

An annual work plan or business plan

A visitor/visitation management plan

An assessment of biological and cultural diversity and ecosystem services provided by the property

5.3.3 - Please give a brief description of the management system currently in place at your property

Sian Ka'an Management Program incorporates the results of research, administrative experiences and planning instruments developed in recent years of management and adapts this instrument to the terms of reference that govern the conservation and management actions of the National Commission of Natural Protected Areas.

5.3.4 - Management Documents

5.3.5 - Has any use been made of the 2011 Recommendation on the Historic Urban Landscape in developing policies and best practices for the protection of this property?

The 2011 Recommendation on the Historic Urban Landscape is **not relevant** to this property

5.3.6 - If the Historic Urban Landscape Recommendation has been used at this property, please describe briefly what has been done.

Does not apply

5.3.7 - Has any use been made of the Policy Document on the Impacts of Climate Change on World Heritage Properties at the property?

No use has been made of the World Heritage Policy for Climate Change

5.3.8 - If the Climate Change policy has been used, please briefly describe what has been done along with any research on the impacts of Climate Change on the property:

Given the importance of reducing the effects of climate change on Mexico's ecosystems, as well as contributing to the reduction of greenhouse gases due to the loss of vegetation, the National Commission of Natural Protected Areas developed the Climate Change Strategy for Protected Areas, which allows the incorporation of the climate change component in the policies and actions of the Commission, strengthen the institution's capacities and respond to the commitments established by Mexico.

5.3.9 - Has any use been made of the Strategy for Reducing Risks from Disasters at World Heritage Properties at the property ?

No use has been made of the Strategy for Reducing Risks from Disasters at World Heritage Properties

5.3.10 - If the Strategy for Reducing Risks from Disasters at World Heritage Properties has been used, please briefly describe what has been done

It does not apply.

5.3.11 - Rate the coordination between the various levels of administration (i.e. national/federal; regional/provincial/state; local/municipal etc.) involved in the management of the World Heritage property

There is **adequate coordination** between all bodies/levels involved in the management of the property

5.3.12 - Is the management system/plan adequate to maintain the property's Outstanding Universal Value?

The management system/plan is **fully adequate** to maintain the property's Outstanding Universal Value

5.3.13 - Is the management system being implemented?

The management system is being **fully implemented and monitored**

5.3.14 - Is there an annual work/action plan and is it being implemented?

An annual work/action plan **exists and all of its activities are being implemented and monitored**

5.3.15 - Does the management system include formal mechanisms and procedures that ensure participation and contribution of the following groups, living within or near the World Heritage property and/or buffer zone in management decisions that maintain the Outstanding Universal Value of the property?

		Not applicable	No mechanisms for participation	Some participation	Direct participation	Transformative participation in all relevant decision processes
5.3.15.1	Local communities				×	
5.3.15.2	Local authorities				×	
5.3.15.3	Landowners in the property and the buffer zone				×	
5.3.15.4	Indigenous peoples				×	
5.3.15.5	Women				×	
5.3.15.6	Other specific groups	×				
	If you selected, 'Other specific groups' please specify					

5.3.16 - Please rate the cooperation/relationship between the World Heritage property managers/coordinators/staff and the following groups

		Not applicable	Non-existent	Poor	Fair	Good
5.3.16.1	Local communities					×

5.3.16.2	Local/Municipal authorities					✖
5.3.16.3	Indigenous peoples					✖
5.3.16.4	Landowners					✖
5.3.16.5	Women					✖
5.3.16.6	Youth/Children				✖	
5.3.16.7	Researchers					✖
5.3.16.8	Local Visitors/Tourists					✖
5.3.16.9	National/International tourists					✖
5.3.16.10	Tourism Industry				✖	
5.3.16.11	Local businesses and industries				✖	
5.3.16.12	NGOs					✖
5.3.16.13	Other specific groups	✖				
	If you selected 'Other specific groups', please specify					

5.3.17 - Please rate the extent to which the management system of your property contributes towards achieving the objectives of the World Heritage Committee's Policy for the Integration of a Sustainable Development Perspective into the Processes of the *World Heritage Convention*

		Not applicable	No contribution	Limited	Significant	Full achievement
5.3.17.1	The management system of the property contributes to gender equality				✖	
5.3.17.2	The management system of the property provides ecosystem services/benefits to the local community (e.g. fresh air, water, food, medicinal plants)					✖
5.3.17.3	The management system of the property contributes to social inclusion and equity, improving opportunities for all, irrespective of age, sex, disability, ethnicity, origin, religion or economic or other status					✖
5.3.17.4	The management system of the property integrates a human rights-based approach					✖
5.3.17.5	The management system of the property contributes to fostering inclusive local economic development, and to enhancing livelihood					✖
5.3.17.6	The management system of the property contributes to conflict prevention, including respect for cultural diversity within and around the World Heritage property					✖

5.3.18 - Please provide further details on the ratings of the management system given in the table above

Sian Ka'an provides environmental services that are assets of social interest, such as climate regulation, conservation of hydrological cycles, nitrogen fixation, soil formation, carbon sequestration, erosion control, plant pollination, biological pest control, degradation of organic waste and mitigation of the effects of climate change. In addition, the production of food, water, wood, fuels and fibers, among others, depend on the conservation of biodiversity and ecological processes.

5.3.19 - Comments, conclusions and/or recommendations related to the management system/plan

Sian Ka'an management program constitutes the guiding instrument of planning and regulation that establishes the activities, actions and basic guidelines for the management and administration of Sian Ka'an. It has five specific objectives that encompass actions of protection, management, restoration, knowledge, culture and management. Establishes policies, strategies and programs, in order to determine activities and actions aimed at meeting the objectives of conservation.

6. Financial and Human Resources

6.1. Funding

6.1.1 - If your funding sources do not exactly fit those shown, put the relevant amounts against the funding type that most closely represents your situation, and use the comment box below to provide more details.

		Project costs	Running costs
6.1.1.1	Multilateral funding (GEF, World Bank, etc.)	20 %	0 %
6.1.1.2	Bilateral international funding	20 %	0 %
6.1.1.3	World Heritage Fund (International Assistance)	0 %	0 %
6.1.1.4	Contribution from other conventions and programmes	0 %	0 %
6.1.1.5	International donations (NGOs, foundations, etc.)	20 %	0 %
6.1.1.6	Governmental (national/federal)	0 %	60 %
6.1.1.7	Governmental (regional/provincial/state)	0 %	0 %

6.1.1.8	Governmental (local/municipal)	0 %	0 %
6.1.1.9	In-country donations (NGOs, foundations, etc.)	40 %	40 %
6.1.1.10	Individual visitor charges (e.g. entry, toilets, parking, camping fees, etc.)	0 %	0 %
6.1.1.11	Commercial activities (e.g. merchandising and catering, filming permit, concessions, etc.)	0 %	0 %
6.1.1.12	Other	0 %	0 %
		Total 100 %	Total 100 %

6.1.2 - Please comment here on any other aspects of funding sources not covered in the table above

The Mexican federal government through the National Commission of Natural Protected Areas provides resources for basic operation as well as a team of public officials, as well as resources to promote sustainable productive projects in the communities of the site. International cooperation projects provide resources for activities aimed at the protection of natural resources and the promotion of productive activities undertaken by the inhabitants of the communities.

6.1.3 - Is the current budget sufficient to manage the World Heritage property effectively?

The available **budget is acceptable** but **could be further improved** to fully meet the management needs

6.1.4 - Are the existing sources of funding secure and likely to remain so?

The existing sources of funding are **secure over both the medium- and long-term**

6.1.5 - Comments, conclusion, and/or recommendations related to finance and infrastructure

The resources of the federal government and the Mexican Fund for Nature Conservation are assured in the medium and long term. There are international cooperation projects with medium-term objectives and activities, these projects promote conservation activities that have a long-term impact on communities within and in the area of influence of the site. More human and financial resources are required to strengthen the operation of the site.

6.1.6 - Estimate the distribution of men and women involved in the management, conservation, interpretation of the World Heritage properties and the extent to which they are drawn from local communities.

		From local communities %	From elsewhere %
6.1.6.1	Men	80 %	70 %
6.1.6.2	Women	20 %	30 %
		Total 100 %	Total 100 %

6.1.7 - Are available human resources adequate to manage the World Heritage property?

Human resources **partly meet** the management needs of the World Heritage property

6.1.8 - Considering the management needs of the World Heritage property, please rate the availability of professionals in the following disciplines

Conservation	Good
Environmental sustainability	Good
Community participation and inclusion	Fair
Risk preparedness	Not available
Capacity development and education	Fair
Administration	Good
Research and monitoring	Poor
Awareness raising and public information/communication	Poor
Marketing and promotion	Poor
Interpretation	Poor
Visitor management/tourism	Fair
Enforcement (custodians, police)	Fair

6.1.9 - Please rate the availability of training opportunities for the management of the World Heritage property in the following disciplines

Conservation	Good
Environmental sustainability	Good
Community participation and inclusion	Good
Risk preparedness	Fair
Capacity development and education	Fair
Administration	Fair

Research and monitoring	Good
Awareness raising and public information/communication	Fair
Marketing and promotion	Not available
Interpretation	Good
Visitor management/tourism	Good
Enforcement (custodians, police)	Fair

6.1.10 - Has any use been made of the World Heritage Strategy for Capacity Building at the property?

No use has been made of the World Heritage Strategy for Capacity Building

6.1.11 - If the World Heritage Strategy for Capacity Building has been used, please briefly describe what has been done.

It has not been used.

6.1.12 - Are there site-specific capacity building plans or programmes that develop local expertise and that contribute to the transfer of skills for the conservation and management of the World Heritage property?

A site-based capacity building plan or programme is in place and partially implemented; some technical skills are being transferred to those managing the property locally, **but most technical work is carried out by external staff**

6.1.13 - Comments, conclusions and/or recommendations related to human resources, expertise and training

Sian Ka'an is part of the Marine Program of World Heritage Sites. Sian Ka'an participated in the elaboration of the guide called: Managing effectively the world's most iconic Marine Protected Areas. This guide is a primer on how to accomplish effective, pro-active management to ensure the long-term conservation and sustainable development of World Heritage marine sites. It also lays the groundwork toward establishing a common standard for effective management and pro-active decision-making.

7. Scientific Studies and Research Projects

7.1 - Is there adequate knowledge (scientific or traditional) about the values and attributes of the World Heritage property to support planning, management and decision-making to ensure that Outstanding Universal Value is maintained?

Knowledge about the values and attributes of the World Heritage property is **adequate**

7.2 - Is there a planned programme of research at the property which is directed towards management needs and/or improving understanding of Outstanding Universal Value?

There is a **comprehensive, integrated programme** of research, which is relevant to management needs and/or improving understanding of Outstanding Universal Value

7.3 - Are results from research programmes publicly available and disseminated?

Research results **are shared** widely **with active outreach** to local communities and national and international audiences

7.4 - Comments, conclusions and/or recommendations related to scientific studies and research projects

Sian Ka'an has developed more than 1000 scientific publications, developed by more than 80 national and international research institutions. These range from contributions to books, scientific journals, theses, popular literature, book chapters, etc. The information generated by the research projects has been used to develop and improve management and conservation strategies for the site. It is necessary to disseminate the results of some research projects with the inhabitants.

8. Education, Information and Awareness Building

8.1 - Please rate the awareness and understanding of the existence and justification for inscription of the World Heritage property amongst the following groups

Local communities	Good
Local/municipal authorities	Good
Indigenous peoples	Good
Landowners	Good
Women	Good
Youth/children	Fair
Researchers	Good
Local visitors	Fair
National/international tourists	Fair
Tourism industry	Good
Local businesses and industries	Good
NGOs	Good
Other specific groups	Not applicable

If you selected 'Other specific groups', please describe	

8.2 - Does the property have a heritage education programme(s) for children and/or youth, that can contribute to a better understanding of heritage, promote diversity and foster intercultural dialogue?

There is a **limited and ad hoc education** and awareness programme for children and/or youth

8.3 - Who are the target audiences for education and awareness programmes at your property?

Local communities
Indigenous peoples
Landowners
Local Visitors
Local businesses and industries

8.4 - Please rate the adequacy of the following visitor facilities and services at the World Heritage property for education, information, interpretation and awareness building

Visitor centre	Good
Site museum	Not needed
Information booths	Not needed
Guided tours	Good
Trails/routes	Good
Printed information materials	Good
Online (website, social media, etc.)	Fair
Transportation facilities	Good
Other	Not needed
If 'Other' is selected, please specify	

8.5 - Comments, conclusions and/or recommendations related to education, information and awareness building

The site is understaffed to implement a permanent program of environmental education and outreach. It has a strategy and dissemination material, as well as a puppet play that disseminates messages of conservation of the tropical forest and the fauna that inhabits it. Civil society organizations have been responsible for implementing various education and awareness actions.

9. Visitor Management

9.1 - Please provide estimated annual visitor numbers (including national and international visitors) since the last Periodic Report

114263 / 80820 / 152493 / 180129 / 160522 /

9.2 - What information sources are used to collect visitor statistics?

Entry tickets and registries
Tourism industry
Control points

9.3 - What is the average length stay of a visitor to the World Heritage property?

One day (no overnight stay)

9.4 - Please provide the source of information

Eco-tourism activities in Sian Kaan generate a significant economic increase contributing to the strengthening of alternative tourism businesses, which, together with lobster fishing, constitutes the main economic income for families living in the protected area; diversifying productive activity, and reducing pressure on the ecosystems of the area. The monitoring program of tourist activities provides information on the tourist use of the site.

9.5 - What is the approximate average daily visitor expenditure? (Please provide an estimated monetary figure in USD)

150 / 50 / 100 / 4.5 / 0 / nd /

9.6 - Please provide the source of information

In Sian Ka'an various tourist activities are developed such as observation tours of marine flora and fauna aboard small boats, snorkeling in the reef system, trekking, kayaking, flotation in natural water channels and sport fishing of catch and release, this activity being the one that leaves a greater economic spill in the communities inside the property. The monitoring program of tourist activities provides information on the tourist use of the site.

9.7 - Does the management system/plan for the World Heritage property include a strategy with an action plan to manage visitors, tourism activity and its derived economic, socio-cultural and environmental impacts?

There is a planned and **effective strategy** to manage visitors, tourism activity and its derived impacts on the World Heritage property

9.8 - Please provide any comments relating to the answer provided above in question 9.7

Sian Ka'an's management program includes administrative rules regulating tourism activities, these rules are the result of five studies of carrying capacity and acceptable change limit. The estimation of the tourist carrying capacity depends on the characteristics of the site and the desired conditions for it. In this way, the conditions of greater fragility of the site are expressed in the social and physical limitations to carry out the tourist tours in the system and the desired conditions.

9.9 - Is visitor use effectively managed to maintain the Outstanding Universal Value of the property?

Visitor use of the World Heritage property is **effectively managed and does not impact its Outstanding Universal Value**

9.10 - Is the effectiveness of tourism management regularly monitored?

Yes, using a different system

If a different system, please specify

Indicators have been established in each of the studies of carrying capacity and acceptable change limit, which are directly related to the health of ecosystems. Geographic information systems are also used to analyse the impact of tourism activities on the site

9.11 - How does the tourism industry cooperate with the site management to improve visitor experiences and maintain the Outstanding Universal Value of the World Heritage property?

There **is limited cooperation** between those responsible for the World Heritage property and the tourism industry **to present the Outstanding Universal Value and increase appreciation**

9.12 - How well is the information on the Outstanding Universal Value of the property presented and interpreted?

The presentation and interpretation of the Outstanding Universal Value of the property **is acceptable but improvements could be made**

9.13 - At how many locations is the World Heritage emblem displayed at the property?

In **many locations**, but **not easily visible** to visitors

9.14 - How does visitor/tourism revenue (e.g. entry charges, permits) contribute to the management of the World Heritage property?

Fees are collected, and make **some contribution** to the management of the World Heritage property

9.15 - Are there locally driven sustainable tourism initiatives?

Yes

If 'Yes', please specify

Fly fishing catch and release is one most important activities.

9.16 - Are the benefits of tourism shared with local communities?

Yes

If 'Yes', please specify

9.17 - Comments, conclusions and/or recommendations related to visitation/tourism/public use of the World Heritage property

Inside the site, authorization from the federal government is required to carry out tourist activities According to Mexican environmental legislation, only local companies (cooperatives and family businesses) can obtain authorization to carry out tourist activities for profit.

10. Monitoring

10.1 - Is there a monitoring programme at the property directed towards management needs and/or towards improving the understanding of the Outstanding Universal Value?

There is a **comprehensive, integrated programme of monitoring**, which is relevant to management needs and/or improving understanding of the Outstanding Universal Value

10.2 - Is necessary information available in order to define key indicators for measuring the state of conservation and are they used in monitoring how the Outstanding Universal Value of the property is being maintained?

Information on the values of the World Heritage property is **adequate and key indicators have been defined but monitoring of the status of indicators could be improved**

10.3 - Are key indicators defined and in place for the following principal aspects of the property?

	Extend of indicators	Not applicable	No indicators	Indicators have been defined but are not yet in use	Indicators are in place and in use since the last Periodic Reporting cycle
10.3.1	State of conservation				✖
10.3.2	Effectiveness of the management system				✖
10.3.3	Character of governance			✖	
10.3.4	Appropriate synergy with other conservation designations			✖	
10.3.5	Contribution to sustainable development				✖
10.3.6	Capacity development				✖

10.4 - Please provide information on relevant key indicators adopted at the property

Sian Ka'an has a Monitoring Program that was developed with the methodology of Planning for the Conservation of Areas (PCA), based on conservation objects at the community-ecosystem level: coral reefs, freshwater wetlands, brackish wetlands, tropical forests (low and medium subdeciduous and subperennifolia forests), bays and seagrasses, beaches and coastal dunes. At the level of population-species: pumas and jaguars.

10.5 - Please rate the level of involvement in monitoring of the following groups:

World Heritage managers/coordinators and staff	Good
Local/municipal authorities	Non-existent
Local communities	Good
Indigenous peoples	Good
Landowners	Non-existent
Women	Fair
Researchers	Good
Tourism industry	Non-existent
Local businesses and industry	Poor
NGOs	Good
Other specific groups	Not applicable
If you selected 'Other specific groups', please specify	nd.

10.6 - Has the State Party implemented relevant recommendations arising from the World Heritage Committee?

Implementation is complete

10.7 - Please provide comments relevant to the implementation of recommendations from the World Heritage Committee.

The relevant recommendations made by the World Heritage Committee have been implemented.

10.8 - Comments, conclusions and/or recommendations related to Monitoring

The National Commission of Natural Protected Areas in coordination with national and international Research Institutions, civil society organizations implement biological, environmental and social monitoring protocols that generate information on the conservation status of the site. As well as the conservation and sustainable development strategies that are implemented at the site. It is necessary to strengthen social and economic monitoring.

11. Identification of Priority Management Needs

11.1 - Identification of Priority Management Needs

5.1	**Boundaries and Buffer Zones**	
5.1.3	The property has **no buffer zone, but there is a need for one**	✖
5.2	**Protective Measures**	
5.2.4	The **legal framework** in the buffer zone for maintaining the Outstanding Universal Value including conditions of Authenticity and/or Integrity of the World Heritage property **is inadequate**	✖
5.2.6	There is **acceptable capacity/resources** to enforce legislation and/or regulation in the World Heritage property but some deficiencies of enforcement remain	✖
5.3	**Management System/Management Plan**	
5.3.7	**No use** has been made of the Policy Document on the Impacts of Climate Change on World Heritage Properties at the property	✖
5.3.9	**No use** has been made of the Strategy for Reducing Risks from Disasters at World Heritage Properties at the property	✖
6.1	**Funding**	
6.1.3	The available **budget is acceptable** but **could be further improved** to fully meet the management needs of the World Heritage property	
6.1.7	Human resources **partly meet** the management needs of the World Heritage property	✖
6.1.10	**No use** has been made of the World Heritage Strategy for Capacity Development at the World Heritage property	✖
6.1.12	**A site-based** capacity building plan or programme is in place and partially implemented; some technical skills are being transferred to those managing the property locally, **but most technical work is carried out by external staff**	
8	**Education, Information and Awareness Building**	
8.2	There is a **limited and ad hoc education** and awareness programme for children and/or youth	✖
9	**Visitor Management**	

9.11	There **is limited cooperation** between those responsible for the World Heritage property and the tourism industry **to present the Outstanding Universal Value and increase appreciation**	
9.12	The presentation and interpretation of the Outstanding Universal Value of the property **is acceptable but improvements could be made**	✖
10	**Monitoring**	
10.2	Information on the values of the World Heritage **property is adequate and key indicators have been defined but monitoring of the status of indicators could be improved**	✖

Please select 0 more issues.

Please save this question to reflect changes

12. Summary and Conclusions

12.1. Summary - Factors affecting the Property

12.1.1 - Summary - Factors affecting the Property

4.2	**Transportation Infrastructure**						
4.2.1	Ground transport infrastructure	vii, x. In recent years the size of the roads around the site has increased, this causes the connectivity of the ecosystems to be lost, the landscape is affected, there is a large amount of fauna (mammals and birds) that are run over by the vehicles	Promote the Territorial Ecological Planning Program, which allows to manage the use of the land in the area of influence of the site, considering as conservation elements the connectivity of the ecosystems of tropical forest and wetlands .	Monitoring through satellite image analysis to assess the rate of habitat transformation. Monitoring of populations of large mammals such as the jaguar and tapir. Monitoring of impacts on biodiversity derived from human activities.	Annual analysis of satellite images with reference in 1986. Permanent analysis of large mammal populations.	National Commission of Natural Protected Areas, Enviromental Ministry, Non-governamental organizations, Research Institutes, Universities,	The increase in the construction of urban and tourist infrastructure in the nearby city of Tulum has caused an increase in the traffic of the roads that are in the area of influence of the site, it is expected that this activity will not decrease.
4.2.3	Air transport infrastructure	x .In the coming months the construction of a civil airport will begin less than two kilometers from the limits of the site, the connectivity of the ecosystems will be affected, there will be an impact on the populations of birds, mammals and wetlan	Aircraft routes should not fly over the site, routes should be located outside the Sian Ka'an influence area. Promote the Ecological Planning Program of the Territory to avoid negative impacts on the property	Monitoring of Sian Ka'an bird populations, monitoring of water quality in the underground aquifer system, monitoring with satellite imagery (landscape), increasing surveillance at the boundaries of the site.	Permanent	National Commission of Natural Protected Areas, Enviromental Ministry, Non-governamental organizations, Research Institutes, Universities, National Commission for the Knowledge and Use of Biodiversity.	The construction of the civil and military airport includes the construction of roads, the creation of a new city, with which the pressure on ecosystems and especially the underground aquifer will increase. Exponential population growth is expected
4.4	**Pollution**						
4.4.5	Solid waste						
4.5	**Biological resource use/modification**						
4.5.3	Land conversion						
4.5.9	Subsistence hunting	x. Illegal hunting is the main threat to the ecosystems of Sian Ka'an, hunters cause forest fires that affect large areas of savannas, jungles, mangroves, causing damage to the biodiversity and integrity of the site.	A forest fire prevention strategy has been designed and implemented that includes signage, dusty road closures, surveillance using drones, watchtowers have been built. Military cameras will be installed in the savannas and wetlands.	Through community monitoring and surveillance groups, it has been possible to reduce the number of fires in the last year. Civil society organizations and research institutes have monitored the natural restoration of sites affected by fires.	Permanent	National Commission of Natural Protected Areas, Enviromental Ministry, Non-governamental organizations, Research Institutes, Universities, National Commission for Knowledge and Use Biodiversity. Federal Research Institutes. National Com. Forest.	A strategy of diversification of productive activities is being implemented that includes the creation of wildlife management units, with the aim of reducing hunting inside the site, the beneficiaries are the inhabitants of the area of influence.
4.7	**Local conditions affecting physical fabric**						

4.7.1	Wind	x. Sian Ka'an is located in the impact zone of tropical storms and hurricanes, these are natural agents of change, rains and winds help maintain the regimes of the ecosystems of the site. However, the frequency of storms has increased.	The federal government, through CONANP, has a attention program to environmental contingencies. Civil society organizations have resources to implement restoration actions.	Monitoring of the conservation status of the coral reef, monitoring of the conservation status of coastal dunes and beaches using satellite images. Monitoring of benthic coverage through the use of satellite imagery	Annual from 1990 for coral reef. Annual from 1986 for dunes and beaches.	National Commission of Natural Protected Areas, Enviromental Ministry, Non-governamental organizations, Research Institutes, Universities, National Commission for the Knowledge and Use of Biodiversity.	The frequency and intensity of tropical storms has increased in recent years, this can cause the resilience of ecosystems to be affected. Wind is one of the main agents of change and regulation in tropical ecosystems.

4.8	**Social/Cultural uses of heritage**

4.8.6	Impacts of tourism/Visitation/Recreation						

4.10	**Climate change and severe weather events**

4.10.6	Temperature change	x. Tropical storms and hurricanes keep Sian Ka'an's ecosystems healthy, by providing rainfall that feeds wetlands and the underground aquifer system, winds help renew forest cover. On the reef, storms promote reproduction by fragmentation of corals	The federal government, through CONANP, has a attention program to environmental contingencies. Civil society organizations have resources to implement restoration actions.	Sian Ka'an there are two weather stations installed, one in the tropical forest ecosystems and one in the sea. A meteo-mareographic station was installed in the marine area that provides real-time information. Both stations are connected to national	From 1992 to permanent	National Commission of Natural Protected Areas, Enviromental Ministry, National Commission of Knowledge and Biodiversity Use, National Meteorological Service, National Mareographic Service, Institute of Geology UNAM .	The information provided by both stations is used for forest fire prevention actions. Historical information on atmospheric temperature, humidity, rain, tides and wind is available. The information is available on the websites of the institutions.

4.11	**Sudden ecological or geological events**

4.11.5	Erosion and siltation/Deposition	vii. Sian Ka'an coast has some areas of erosion, beach width has been lost and in some places, coastal dunes have been affected, losing nesting areas for sea turtles and birds. However, there are other areas where storms have generated more beach	The management program establishes rules that regulate activities throughout the Biosphere Reserve, including the coastal area. The development of housing in this area is strictly regulated, thus protecting the ecosystems of coastal dunes	A study of the conservation status of coastal dunes and beaches throughout the site was conducted, using satellite imagery from 1986 to 2016. In addition to making a description of the plant communities of the coastal dune. The study should be updat	From 1986 to 2016 using satellite imagery	National Commission of Natural Protected Areas, Enviromental Ministry, National Commission of Knowledge and Biodiversity Use, United Nations Development Program. National Commision Forestry	The rise in sea level, as well as in the frequency of storms and hurricanes have caused changes in the coast of Sian Ka'an, among the most evident is the loss of beach, the erosion of coastal dunes, as well as the massive arrival of sargassum.

4.12	**Invasive/alien species or hyper-abundant species**

4.12.4	Invasive/Alien marine species						

Question not completed

12.2. Summary - Management Needs

12.2.1 - Summary - Management Needs

5.1	**Boundaries and Buffer Zones**				
		Actions	**Timeframe**	**Lead agency (and others involved)**	**More info / comment**
5.1.3	The property has **no buffer zone, but there is a need for one**				

5.2	**Protective Measures**				
5.2.4	The **legal framework** in the buffer zone for maintaining the Outstanding Universal Value including conditions of Authenticity and/or Integrity of the World Heritage property **is inadequate**	It is necessary to elaborate a Program of Land Ecological Planning of the zone of influence of the property. Programs of Land Ecological Planning are the instrument of environmental policy.	Annual	Enviromental Ministery of Mexico, Local Goverment (Municipal and State), Research institutions, local people.	The creation and implementation of coordination mechanisms between the dependencies and entities of the Federal Public Administration and the state, municipal and Federal District governments and their delegations is needed.
5.2.6	There is **acceptable capacity/resources** to enforce legislation and/or regulation in the World Heritage property but some deficiencies of enforcement remain	Environmental law authorities require initiating processes where laws and regulations are enforced. More human resources are needed to monitor compliance with environmental laws. It is necessary to improve coordination between authorities.	Permanent	Federal Attorney for Environmental Protection, Attorney General's Office, National Commission of Protected Natural Areas, State and Municipal Government	Community participation should be strengthened to monitor compliance with environmental protection laws and regulations.
5.3	**Management System/Management Plan**				
5.3.7	**No use** has been made of the Policy Document on the Impacts of Climate Change on World Heritage Properties at the property	Link the National Climate Change Strategy with the documents and guides that are part of the World Heritage Strategy for Climate Change. Sian Ka'an has a strategy of adaptation measures to Climate Change.	Permanent	National Institute of Ecology and Climate Change, Enviromental Ministery of México, National Commission of Natural Protected Areas, Local government	Ecological Management Programs, Urban Development Programs should consider the National Climate Change Strategy. The state coast of Quintana Roo has erosion from tropical storms and rising sea levels.
5.3.9	**No use** has been made of the Strategy for Reducing Risks from Disasters at World Heritage Properties at the property	Link the National Risk Reduction Strategy with the World Heritage Strategy for Risk Reduction. Society Civil Organizations through international cooperation projects have developed local strategy papers for risk reduction.	Permanent	National Institute of Ecology and Climate Change, Enviromental Ministery of México, National Commission of Natural Protected Areas, Local government; Civil Protection National Coordination	The State Government in coordination with the Federal Government should promote the development of a Local Disaster Risk Reduction Strategy.
6.1	**Funding**				
6.1.7	Human resources **partly meet** the management needs of the World Heritage property	The Federal Government should increase the budget allocated to the National Commission of Natural Protected Areas. The current budget only covers the basic operation of the property.	Permanent	Ministry of Finance, Chamber of Senators and Deputies, Ministry of the Environment, National Commission of Natural Protected Areas.	In recent years the national budget for the environmental issue has been decreasing, in the same way the number of public officials who work in environmental agencies has decreased, this causes greater difficulties in achieving the objectives
6.1.10	**No use** has been made of the World Heritage Strategy for Capacity Development at the World Heritage property	Communication between national focal points and the World Heritage Center needs to be strengthened to implement the strategy in World Heritage Sites	Permanent	National Commission of Natural Protected Areas, World Heritage Centre, World Heritage Marine Programme	The Marine World Heritage Program has promoted various strategies to strengthen the capacities of World Heritage Site managers, generating various cientific an non cientific documents
8	**Education, Information and Awareness Building**				
8.2	There is a **limited and ad hoc education** and awareness programme for children and/or youth	The Federal Government should increase the budget allocated to the National Commission of Natural Protected Areas. The current budget only covers the basic operation of the site.	Permanent	Ministry of Finance, Chamber of Senators and Deputies, Ministry of the Environment, National Commission of Natural Protected Areas	In recent years the national budget for the environmental issue has been decreasing, in the same way the number of public officials who work in environmental agencies has decreased, this causes greater difficulties in achieving the objectives.
9	**Visitor Management**				

9.12	The presentation and interpretation of the Outstanding Universal Value of the property **is acceptable but improvements could be made**					
10	**Monitoring**					
10.2	Information on the values of the World Heritage **property is adequate and key indicators have been defined but monitoring of the status of indicators could be improved**	The Federal Government should increase the budget allocated to the National Commission of Natural Protected Areas. The current budget only covers the basic operation of the site	Permament	Ministry of Finance, Chamber of Senators and Deputies, Ministry of the Environment, National Commission of Protected Natural Areas, Research Institutions, Non-Governamental Organizations, Local Universities, Local Communities.	The Federal Government should increase the budget allocated to the National Commission of Natural Protected Areas. The current budget only covers the basic operation of the site.

Summary - Management Needs completed

12.3. Conclusions on the State of Conservation of the Property

12.3.1 - Following the analysis undertaken for this report, what is the current state of Authenticity of the World Heritage property?

Not applicable (sites inscribed exclusively under criteria vii to x (natural World Heritage properties)

12.3.2 - Following the analysis undertaken for this report, what is the current state of Integrity of the World Heritage property?

The Integrity of the World Heritage property is **intact**

12.3.3 - Following the analysis undertaken for this report, what is the current state of the World Heritage property's Outstanding Universal Value?

The World Heritage property's Outstanding Universal Value has been **maintained**.

12.3.4 - What is the current state of the property's other values?

Other important cultural and/or natural values and the state of conservation of the World Heritage property are **intact**

12.3.5 - Comments. conclusions and/or recommendations related to the state of conservation of the property.

It is necessary to reinforce management actions throughout the site, there is urban and tourist growth that could compromise exceptional universal values, it is necessary to have more human and financial resources to strengthen the conservation and management of Sian Ka'an. It is necessary to have an ecological land planing that gives certainty to the conservation of off-site ecosystems. It is necessary to conserve the connectivity of tropical forest and wetlands to the coral reef.

13. Impact of World Heritage Status

13.1 - Please rate the impacts of World Heritage status of the property in relation to the following areas

Conservation	Very positive
Research and monitoring	Very positive
Management effectiveness	Positive
Quality of life for local communities and indigenous peoples	Positive
Recognition	Positive
Education	Positive
Infrastructure development	Positive
Funding for the property	Positive
International cooperation	Positive
Political support for conservation	Very positive
Legal/Policy framework	Very positive
Advocacy	Very positive

Institutional coordination	Positive
Security	No impact
Gender equality	No impact
Provision of ecosystem services/ benefits to local communities	Very positive
Social inclusion and equity, and improvement of opportunities for all, irrespective of age, sex, disability, ethnicity, origin, religion, or economic or other status	Positive
Fostering inclusive local economic development and enhancing livelihood	Very positive
Contributing to conflict prevention, including respect for cultural diversity within and around heritage properties	Positive
Other	Not applicable
If 'Other', please specify	nd.

13.2 - Comments, conclusions and/or recommendations related to World Heritage status and its impacts

In 2009 an evaluation of the social, economic and environmental impact of the inscription of sites on the World Heritage List in Mexico was carried out, only one natual site (Sian Ka'an) participated in this evaluation, the study was not finalized, however there were some results that demonstrated the impact of the inscription on the communities that live inside the site and in its area of influence. UNESCO's involvement in local policies for the protection of WHS should be strengthened.

14. Good Practice in the Implementation of the World Heritage Convention

14.1 - Example of good practice in World Heritage protection, identification, conservation or management at the property level

Sian Ka'an fishing cooperatives are recognized worldwide for conducting lobster fishing in a sustainable manner, they are an example of good governance, leadership and organization. The inhabitants of Sian Ka'an have diversified their productive activities, finding in tourism an option to improve their quality of life. In the area of influence of the site, more than ten community groups have been organized to collaborate in monitoring, surveillance, prevention and combating of forest fires. The monitoring of the conservation status of the ecosystems of Sian Ka'an is carried out by various national and international institutions that together provide useful information for improving the management of the site. There is information on the ecosystems that constitute Sian Ka'an, from underground rivers to coral reefs. The creation of youth groups in the Mayan zone has been promoted, which disseminate the importance of taking care of the underground aquifer system, as the ecosystem that sustains the tropical forest, wetlands and coral reefs of the region. International cooperation projects have reinforced the activities of protection of the forest improving the operation of the site, training the inhabitants in improving the productive activities they develop in the tropical forest. Non-governmental organizations and local governments have supported the creation of a community tourism destination brand that has as its main attraction the culture and richness of the ecosystems of the Sian Ka'an region. Recently, through federal and state government resources, a renewable energy system (solar) was installed that will provide electricity to the largest population inside the site.

14.2 - Define which topics are covered by this example of best practice at the property level

Sustainable Development
Synergies
State of Conservation
Management
Governance
Capacity Building

15. Assessment of the Periodic Reporting Exercise

15.1. Relevance of Periodic Reporting

15.1.1 - Has the Periodic Reporting process improved the understanding of the following?

The concept of Outstanding Universal Value
The property's Outstanding Universal Value
The concept of Integrity and/or Authenticity
The property's Integrity and/or Authenticity
Management effectiveness to maintain the Outstanding Universal Value

15.1.2 - Please rate the follow-up to conclusions and recommendations from previous Periodic Reporting exercise by the following entities

State Party	Good
Site Managers	Good
UNESCO World Heritage Centre	Fair
Advisory Bodies (ICOMOS, IUCN, ICCROM)	Fair

15.2. Use of Data

15.2.1 - How do the authorities in charge of the property plan to use the data recorded from this cycle of Periodic Reporting?

Revision of priorities/strategies/policies for the protection, management and conservation of heritage
Update of management plans
Fundraising
Awareness raising
Advocacy

15.2.2 - Comments on use of data from the Cycle of Periodic Reporting

The information in the periodic report should be used to strengthen national strategies for the management and conservation ofWorld Heritage Sites. There must also be coordination between other national and international entities that affect the Site. The reports should help the State Party strengthen the management of the site by providing support in training, human and financial resources that are applied in the basic conservation actions of the site.

15.3. Timing and resources

15.3.1 - Entities involved in the filling out of this online questionnaire (tick as many boxes as applicable)

Governmental institutions responsible for cultural and natural heritage
Site Manager/Coordinator World Heritage property staff
Focal points of other international conventions/programmes

15.3.2 - Has a gender balanced contribution and participation been considered in the filling out of this questionnaire?

Gender balance has **not been explicitly** considered or implemented in the process.

15.3.3 - Were you given adequate time (i.e. roughly ten months) to gather necessary information and to fill in this questionnaire?

Yes

15.3.4 - Please estimate the time (working hours) needed to complete this questionnaire

80 / 40 / 80 /

15.3.5 - Did you mobilise any additional resources to fill out this questionnaire?

	Additional resources	No	Yes
15.3.5.1	Human resources	✖	
15.3.5.2	Financial resources for organizing consultation meetings/ training	✖	

15.4. Format and content of the Periodic Report

15.4.1 - How accessible was the information required to complete this questionnaire?

All required information was accessible.

15.4.2 - Was the questionnaire easy to use and clear to understand?

		Very Difficult	Difficult	Easy	Very easy
15.4.2.1	Ease of use of questionnaire				✖
15.4.2.2	Clarity of questions				✖

15.4.3 - Please provide suggestions for improvement of the Periodic Reporting questionnaire

It is important that there is a part of the report where the site manager can upload information to the system, such as databases, research reports, publications, final reports of studies, etc. That they support what is poured into the questionnaire.

15.5. Training and Guidance

15.5.1 - Please rate the level of support in terms of training and guidance from the following entities in completing this questionnaire

UNESCO World Heritage Centre	Fair
UNESCO (other sectors/field offices)	Fair
UNESCO National Commission	Not applicable
ICOMOS International	Not applicable
IUCN International	No support
ICCROM international/regional	Not applicable
ICOMOS national/regional	Not applicable
IUCN national/regional	No support

15.5.2 - Please rate the level of support for completing the Periodic Reporting questionnaire from the following entities

UNESCO World Heritage Centre	Poor
State Party Representative (national Focal Point)	Poor
UNESCO other sectors (e.g. field office)	No support
National Commission for UNESCO	No support
ICOMOS International	Not applicable
ICCROM International/regional	Not applicable
ICOMOS national/regional	Not applicable
IUCN national/regional	No support
IUCN International	No support

15.5.3 - Were the online training resources prepared by the World Heritage Centre regarding Periodic Reporting adequate for you to complete this questionnaire?

Yes

15.5.4 - If you found that the online training resources were not adequate, what changes would you like to see implemented?

No changes to be implemented.

15.6. Actions that will require formal consideration by the World Heritage Committee

15.6.1 - Summary of actions that will require formal consideration by the World Heritage Committee

- **Geographic information table**

  Reason for update: There is no a buffer zone submitted and acknowledged by the World Heritage Committee. But there is in fact a functional buffer zone, composed by Ejidos José María Morelos, Chunyaxché, Tres Reyes, Felipe Carrillo Puerto, X Hazil sur, Andrés Quintana Roo and El Cafetal. Ejidos is the name of a form of land owners, composed by rural populations. The area named influence zone in the Management Program has a surface of 227 043 hectares. It is located outside of the property.

Changes to these items will need to go through the proper processes.

15.7. Comments, conclusions and/or recommendations related to the Assessment of the Periodic Reporting Exercise

15.7.1 - Comments, conclusions and/or recommendations related to the Assessment of the Periodic Reporting Exercise

It is important that there is a part of the report where the site manager can upload information to the system, such as databases, research reports, publications, final reports of studies, etc. That they support what is poured into the questionnaire.

15.7.2 - Thank you for having filled in all the questions. Please contact your National Focal Point for validation.