

First Meeting of the Regional Working Group on Seagrass

Teleconference, 3 December 2021

EVALUATION OF SAP IMPLEMENTATIONS OF SEAGRASS FOCAL AREA DURING 2008-2021







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1. INTRODUCTION

OUTCOME 1.3 CONSERVATION, MANAGEMENT AND SUSTAINABLE USE OF 26,036 HA OF KNOWN SEAGRASS AREA IN THE SOUTH CHINA SEA

One of the anticipated outputs from the UNEP/GEF Project entitled "Reversing Environmental Degradation Trends in the South China Sea and Gulf of Thailand" is an up-dated Strategic Action Programme, and the document contains the final text as approved by all countries during the 8th meeting of the Project Steering Committee in Hanoi, Viet Nam, August 2008. It was anticipated that the countries would commence implementation of the envisaged actions in 2008/2009 in parallel with the process in seeking further support from GEF for the SAP implementation.

The UNEP project document for "Implementing the Strategic Action Programme for the South China Sea and Gulf of Thailand" adopted by the GEF Secretariat 2 November 2016 (GEF ID 5538) to assist countries in meeting the targets of the approved Strategic Action Programme (SAP) for the marine and coastal environment of the South China Sea through implementation of the National Action Plans in support of the SAP, and strengthening regional co-ordination for SCS SAP implementation.

Following the adopted project document, in preparation for implementation of the seagrass activities of the SAP, comprehensive site characterization information and data were compiled to establish detailed baselines for the 26 seagrass sites (including Malaysia) identified as priority locations for management within the framework of SAP implementation. These site characterisations contain geographical coordinates, information on the physical environment, environmental state information, socio-economic and resource use information, biological data, and information on the status of existing management at these sites. It is noted that the process in selecting these 26 sites was adopted by the Regional Science and Technical Committee (RTRC) quite early in 2002. The RTRC urged the National Technical Working Groups (NTWG), and national committees in each country to review the data and information collated during the preparatory phase of the project, and to regularly provide updated data and information, particularly in relation to data source. The Regional Working Group (RWG) on Seagrass proceeded to finalise data sets, cluster analyses and ranking procedures according to their significance in terms of biological diversity, threats, and transboundary importance (Anne 1 & 2) via a series of RWG meetings. These outputs were reported for reviews of the RTRC and then proposed for consideration and adoption of the Project Steering Committee (PSC). Ultimately, decisions were taken, both at the national and regional levels, by an appropriately constituted body having authority and responsibility for policy level decision-making: the PSC and Inter-Ministry Committees. Three among 26 seagrass sites were recommended by RTRC and then selected by the Project Steering Committee in 2004 for implementation during the course of SCS Project, including: Hepu (China), Bolinao (Philippines) and Phu Quoc (Vietnam). In addition, Trikoda (Indonesia) was selected for implementation under GEF/MSP mechanism (2008-2012). Given that Malaysia do not participate in the SCS SAP Project, there remain 20 sites for SAP implementation for the seagrass focal area.

The regional activities in implementing the SAP will include: putting twenty seagrass areas totalling 26,036 ha under sustainable management with supporting laws and regulations; amending national management plans for 7 existing MPAs with significant seagrass areas, to include specific seagrass-related management actions; designating 7 new Marine Protected Areas focusing on seagrass areas identified in the prioritized listings of the SCS Project; and establishing mechanisms for monitoring management, ecological and socio-economic indicators at 20 sites.

This evaluation which will be further developed into a publication in 2022 provides evidences on proactive contribution of the participating countries in implementing the SAP and supports to estimate their co-finance

for environment management in the SCS during last decade. The reviews of past activities and outputs would be helpful for seeking the gaps which shall be addressed in implementing the SCS-SAP project in 2022-2023.

Table 1. Seagrass sites and targets identified in the 2008 SAP

Outputs	Cambodia	China	Indonesia	Philippines	Thailand	Viet Nam	TOTAL
1.3.1 Twenty seagrass areas totaling 26,036 ha under sustainable management with supporting laws and regulations 1.3.2 Amended management plans for 7 existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms 1.3.3 Designation of 7 new Marine Protected Areas focusing on seagrass areas 1.3.4 Established mechanism for monitoring management, ecological and socioeconomic indicators at 20 sites	Kampot Kep Beach & Koh Tonsay	Hepu seagrass bed Liusha seagrass bed LiAn seagrass bed Xincun seagrass bed	Medang- Mesanak Temiang East Bintan Mapor Anambas Bangka- Belitung Senayang	Cape Bolinao Puerto Galera Honda Bay	N/A	Phu Quoc archipelago Con Dao Islands Thuy Trieu Tam Giang	20 sites
Total seagrass area in the 20 target sites (ha)	29,740	1,960	3,035	22,984		7,600	65,319
Target for management through the SCS SAP project	11,446	700	2,420	6,920		4,550	26,036

2. STATUS OF SAP IMPLEMENTATION

2.1. CAMBODIA

Seagrass targets in Cambodia based on 2008 SAP

As indicated in the project which was approved for SAP implementation, 2 seagrass sites were proposed for Cambodia as seen in the table below with the total target area around 11,446 ha.

Table 2. Cambodia - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
Kampot	25.240	0	10,096
Kep Beach & Koh Tonsay	4,500	0	1,350
TOTAL CAMBODIA	33,814	0	11,446

Table 3. Cambodia - Changes in management and restoration of key agreed sites since 2008

	Kampot	
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.	
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?	
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe	
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.	
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to loca community	
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.	
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding	
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications	
	Kep Beach & Koh Tonsay	
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.	
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?	

Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe	
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.	
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community	
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.	
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding	
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications	

Table 4. Cambodia - Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling <i>11,446 ha</i> under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names
1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

2.2. CHINA

Seagrass targets in China based on 2008 SAP

As indicated in the project which was approved for SAP implementation, 4 seagrass sites were proposed for China as seen in the table below with the total target area around 700 ha.

Table 5. China - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
Hepu seagrass bed	540	150	150
Liusha seagrass bed	900	No	200
LiAn seagrass bed	320	No	200
Xincun seagrass bed	200	No	150
TOTAL CHINA	1,960	150	700

Table 6. China - Changes in management and restoration of key agreed sites since 2008

	Нери		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
Improvement of site management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term fun		
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications		
	Liusha		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		

National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		
Recommendation	 Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications 		
	THE SAME TEMPLATE FOR MORE SITES		
	LiAn WEGGYON		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications		
	Xincun		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
Improvement of site management	Who is responsible for day-today management of the site? Mention number or persons.		
	Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		
Recommendation	Select one of the following recommendations regarding the site: • Under effective management, no more support needed for the site		

•	Further support to implement prior activities in SCS SAP Project (list of priorities)
•	Replace by another site or cancel: Please provide justifications

Table 7. China - Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling 700 ha under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names
1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

2.3. Indonesia

Seagrass targets in Indonesia based on 2008 SAP

As indicated in the project which was approved for SAP implementation, 7 seagrass sites were proposed for Indonesia as seen in the table below with the total target area around 2,420 ha.

Table 8. Indonesia - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
East Bintan	2,000	No	1,500
Temiang	5	No	5
Medang-Mesanak	5	No	5
Mapor	275	No	275
Anambas	150	No	35
Bangka-Belitung	350	No	350
Senayang	250	No	250
TOTAL INDONESIA	3,035	0	2,420

Table 9. Indonesia - Changes in management and restoration of key agreed sites since 2008

East Bintan			
Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.			
Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?			
Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe			
Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.			
Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community			
Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.			
Please outline budget sources for activities and any mechanism developed to sustain long term funding			
Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications			
Temiang			
Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.			
Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?			
Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe			
Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.			
Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community			
Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.			
Please outline budget sources for activities and any mechanism developed to sustain long term funding			
 Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications 			
Medang-Mesanak			

	Mention number or persons. Is management and enforcement adequate/weak/lacking?
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications
	Mapor
-	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.
Improvement of site management	Who is responsible for day-today management of the site? Mention number or persons.
	Is management and enforcement adequate/weak/lacking? Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in
Participation engagement	conservation and sustainable use. YES/NO? If yes, describe
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications
	Anambas
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.
Monitoring and trends of changes	Has the site been monitored? YES/NO

	If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications		
	Bangka-Belitung		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications		
	Senayang		
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.		
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?		
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe		
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.		
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community		
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.		
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding		

	Recommendation	Select one of the following recommendations regarding the site: • Under effective management, no more support needed for the site • Eight or support to implement prior activities in SCS SAP Project (list of priorities)
Replace by another site or cancel: Please provide justifications	Recommendation	 Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications

Table 10. Indonesia - Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling 2,420 ha under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names
1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

2.4. PHILIPPINES

Seagrass targets in the Philippines based on 2008 SAP

As indicated in the project which was approved for SAP implementation, 3 seagrass sites were proposed for the Philippines as seen in the table below with the total target area around 6,720 ha.

Table 11. Philippines - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
Cape Bolinao	22,400	6,000	6,720
Puerto Galera	114	60	50
Honda Bay	470	320	150
TOTAL PHILIPPINES	23,245		6,920

Table 12. Philippines - Changes in management and restoration of key agreed sites since 2008

	Cape Bolinao	
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.	
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?	
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe	
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.	
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community	
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.	
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding	
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications	
	Puerto Galera	
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.	
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?	
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe	
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.	
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community	
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.	
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding	
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications	
	THE SAME TEMPLATE FOR MORE SITES	

Table 13. Philippines - Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling 6,920 ha under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names
1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

2.5. THAILAND

Seagrass targets in Thailand based on 2008 SAP

There was no target for management of seagrass through the project approved for implementing the SAP in Thailand. The table below provides data on recorded seagrass area and area under management in 2008.

Table 14. Thailand - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
Kung Krabane Bay	700	700	0
Tungka Bay	1,080	1,080	0
Sarat Thani	500	0	0
Pattani Bay	273	0	0
TOTAL THAILAND	2,553	1,780	0

Summary of activities and outputs of the period 2008-2021

In addition to the seagrass management at the priority sites of the SAP, additional key achievements towards the SCS SAP outcomes and outputs should be reported.

Table 15. Thailand - Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling <i>0 ha</i> under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names
1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

2.6. VIET NAM

Seagrass targets in Viet Nam based on 2008 SAP

As indicated in the project which was approved for SAP implementation, 4 seagrass sites were proposed for the Viet Nam as seen in the table below with the total target area around 4,550 ha.

Table 16. Viet Nam - Proposed Seagrass sites and targets from 2008 SAP

Country & site name	Total Seagrass area (ha)	Area under management (2008)	SAP Target for management
Phu Quoc archipelago	4,600	2,050	3,000
Con Dao Islands	200	200	200
Thuy Trieu lagoon	800	50	350
Tam Giang – Cau Hai lagoon	2,000	No	1,000
TOTAL VIETNAM	8,040	2,300	4.550

Table 17. Viet Nam - Changes in management and restoration of key agreed sites since 2008

	Phu Quoc
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.
management	Who is responsible for day-today management of the site? Mention number or persons.

	Is management and enforcement adequate/weak/lacking? Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in				
Participation engagement	conservation and sustainable use. YES/NO? If yes, describe				
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.				
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community				
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.				
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding				
Recommendation Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of prior Replace by another site or cancel: Please provide justifications					
	Con Dao				
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.				
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?				
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe				
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.				
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community				
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.				
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding				
Recommendation	 Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications 				
	Thuy Trieu lagoon				
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.				
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?				
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe				
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.				
Monitoring and trends of changes	Has the site been monitored? YES/NO				

	If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community			
National initiatives and Projects	Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any key references, reports on achievements.			
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding			
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications			
	Tam Giang – Cau Hai lagoon			
Improvement of site	Is there any new management plan or regulation established at the site. YES/NO? Mention type and year established.			
management	Who is responsible for day-today management of the site? Mention number or persons. Is management and enforcement adequate/weak/lacking?			
Participation engagement	Is there a mechanism to engage participation of communities, private sector, foundations, NGOs in conservation and sustainable use. YES/NO? If yes, describe			
Rehabilitation	Have any actions been undertaken for the rehabilitation of seagrasses at the site. YES/NO? If yes, describe actions and number of hectares rehabilitated.			
Monitoring and trends of changes	Has the site been monitored? YES/NO If yes, please describe monitoring design (ecological & socio-economic indicators), monitoring practices and trends of changes related to habitat degradation and loss as well as influences to local community			
National initiatives and Projects Have any national initiatives and/or projects been executed at the site? YES/NO? If yes, please mention initiative project, dates executed and budget (if available). Plus any references, reports on achievements.				
Fund raising and sustainable financial mechanisms	Please outline budget sources for activities and any mechanism developed to sustain long term funding			
Recommendation	Select one of the following recommendations regarding the site: Under effective management, no more support needed for the site Further support to implement prior activities in SCS SAP Project (list of priorities) Replace by another site or cancel: Please provide justifications			

Table 18. Viet Nam Key achievements towards the SCS SAP implementation

SAP Output/Target	Implication at the national level	Details at sites
1.3.1 Twenty seagrass areas totalling <i>4,550 ha</i> under sustainable management with supporting laws and regulations	Total area (ha) of seagrass beds were under sustainable management	Site names & area (ha) at each site
1.3.2 Amended management plans for existing MPAs with significant seagrass areas, to include specific seagrass-related management actions and policy, legal & institutional reforms	Number of sites where management plan of MPAs amended	Site names

1.3.3 Designation of new Marine Protected Areas focusing on seagrass areas	Number of sites where new MPA established	Site names
1.3.4 Established mechanism for monitoring management, ecological and socio-economic indicators at 21 sites	Number of sites where monitoring was practiced	Evidence of changes (degradation rate at each site, positive/negative)

ANNEXES

ANNEX 1 INDICATORS AND WEIGHT FOR SEAGRASS SYSTEMS OF BIOLOGICAL DIVERSITY, TRANSBOUNDARY, REGIONAL AND GLOBAL SIGNIFICANCE

Class of Indicator			Indicator scale					
			Score					
1. Area maximum 25 points								
1.1 T	Total area (ha) maximum 15 points	<20	21-100	101- 300	301- 500	>500		
S	core	3	6	9	12	15		
1.2 P	Percent coverage maximum 10 points	<20	21-40	41-60	61-80	>80		
S	Score	2	4	6	8	10		
	2. Biological div	ersity 6	0 points					
2.1 S	species diversity Score maximum 52 point	s						
2	1.1 Seagrass species	<2	3-4	5-6	7-8	>8		
	Score Maximum 15 points	3	6	9	12	15		
2	.1.2 Gastropods	<20	21-40	41-70	71-100	>100		
	Score Maximum 5 points	1	2	3	4	5		
2	.1.3 Penaeid shrimps	0	1-3	4-5	6-7	>7		
	Score Maximum 8 points	0	2	4	6	8		
2	1.4 Sea Urchins	0	1-2	>2				
	Score Maximum 4 points	0	2	4				
2.	2.1.5 Siganids	0	1-2	3-4	>4			
	Score Maximum 8 points	0	2	5	8			
2	1.6 Holothurians	0	1-5	>5				
	Score Maximum 8 points	0	4	8				
2	.1.7 Starfish	0	1-3	>3				
	Score Maximum 4 points	0	2	4				
2.2 C	Community diversity Score maximum 8 po	oints						
2	.2.1 Number of other aquatic ecosystems	1	2	>2				
	Score Maximum 8 points	3	5	8				
	3. Transboundary s	ignifica	nce 5 poin	nts				
3.1 N	Number of migratory aquatic species							
S	core Maximum 5 points		score	1 point per	species			
	4. Regional/Global si	gnifica	nce 10 poi	nts				
4.1 N	Number of endangered & critically endang	gered ac	quatic spe	cies				
S	Score Maximum 10 points score 1 point per species							

ANNEX 2. INDICATORS FOR SOCIO-ECONOMIC CONSIDERATIONS OF SEAGRASS SYSTEMS TO BE USED IN THE RANKING OF SEAGRASS SITES BORDERING THE SOUTH CHINA SEA

Class of Indicator		Indicator scale					
	Class of Indicator	Score					
1. Reversibility of Threats maximum 10 points							
1.1	From destructive fishing	Low	Medium	High			
	Score – max 5	1	3	5			
1.2	From pollution	Low	Medium	High			
	Score – max 5	1	3	5			
	2. National significance/priority-Government support maximum 16 points						
2.1	National priority	Low	Medium	High			
	Score – max 16	5	10	16			
	3. Financial consideration	s /co-financing n	naximum 22 j	points			
3.1	Project cost (\$US)	>150,000	150,000	<150,000			
	Score – max 10	3	6	10			
3.2	Co-financing commitment	<1/1	1/1	>1/1			
	Score – max 12	4	8	12			
	4. Stakeholders in	volvement maxi	mum 22 poin	ts			
4.1	Local government (in cash/in-kind)	Low	Medium	High			
	Score – max 6	2	4	6			
4.2	Central government (in cash/in-kind)	Low	Medium	High			
	Score – max 4	1	2	4			
4.3	NGOs/Civil Society (in cash/in-kind)	Low	Medium	High			
	Score – max 6	2	4	6			
4.4	Private Sector (in cash/in-kind)	Low	Medium	High			
	Score – max 6	2	4	6			
	5. Management	potential maxim	um 30 points				
5.1	Accessibility	Low	Medium	High			
	Score – max 10	3	6	10			
5.2	Existing institutional framework	Low	Medium	High			
	Score – max 10	3	6	10			
5.3	Existing information	Low	Medium	High			
	Score – max 10	3	6	10			