



**Australian Government**

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**Department of the Environment and Energy**

Assessment of the  
**QUEENSLAND**  
**SEA CUCUMBER FISHERY (EAST COAST)**

**MARCH 2018**



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This report should be attributed as '*Assessment of the Queensland Sea Cucumber Fishery (East Coast)*, Commonwealth of Australia March 2018'.

### Disclaimer

This document is an assessment carried out by the Department of the Environment and Energy of a commercial fishery against the Australian Government *Guidelines for the Ecologically Sustainable Management of Fisheries – 2nd Edition*. It forms part of the advice provided to the Minister for the Environment and Energy on the fishery in relation to decisions under Parts 13 and 13A of the *Environment Protection and Biodiversity Conservation Act 1999*. The views expressed do not necessarily reflect those of the Minister for the Environment and Energy or the Australian Government.

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## **EXECUTIVE SUMMARY OF THE ASSESSMENT OF THE QUEENSLAND SEA CUCUMBER FISHERY (EAST COAST)**

In March 2017, the Queensland Department of Agriculture and Fisheries submitted an application for the Queensland Sea Cucumber Fishery (East Coast) (the Sea Cucumber Fishery) to the Department of the Environment and Energy for assessment under the EPBC Act, against the Australian Government '*Guidelines for the Ecologically Sustainable Management of Fisheries – 2nd Edition*'. A public comment period was open from 6 April 2017 to 26 May 2017, no comments were received.

### **The fishery**

The Sea Cucumber Fishery operates in Queensland waters using hand collection to target sea cucumbers (holothurians). The fishery is managed in accordance with the Queensland *Fisheries Act 1994* and the Queensland Fisheries Regulation 2008. The fishery utilises a total allowable catch quota monitoring system to control the level of take. Rotational zoning is used within the area of the fishery that is within the Great Barrier Reef Marine Park to ensure stocks are not over harvested.

The introduction of the Queensland Sustainable Fisheries Strategy 2017-2027 (which sets out harvest strategies and sets sustainable catch limits) should further lower the risk of this fishery to the target species and surrounding ecosystem.

### **Target stocks**

There are eight species of sea cucumbers that may be harvested in the fishery. The fishing hand collection method is highly selective and there are no ongoing concerns for target stocks. Black teatfish are currently a 'no take' (prohibited) species due to historic overharvesting. While an ecological risk assessment has not been conducted for the fishery, there are no concerns for byproduct, bycatch, protected species and the ecosystem due to the high selectivity of the fishing method. The potential impacts of fishing on the target species has been established through a management strategy evaluation which tested the rotational zoning scheme and determined that if catches remain at current levels (no more than 361 tonnes of landed form – salted/frozen boiled) the risk of localised and overall depletion is reduced. Therefore, at these relatively conservative catch levels, sea cucumbers are unlikely to become overfished.

### **Protected species and ecosystems**

There have been no reported interactions with protected species and interactions are unlikely due to the method of harvesting. The environmental impacts of the fishery are low (due to the hand collection methods used) and managed appropriately.

### **Conclusion**

Following assessment against the Guidelines at Section 2, the Queensland Sea Cucumber Fishery has been found to meet the requirements of the EPBC Act. Product taken in this fishery is therefore recommended for inclusion in the list of exempt native specimens under Part 13A of the EPBC Act until 28 August 2025.



**SECTION 1: ASSESSMENT SUMMARY OF THE QUEENSLAND SEA CUCUMBER FISHERY (EAST COAST) AGAINST THE *GUIDELINES FOR THE ECOLOGICALLY SUSTAINABLE MANAGEMENT OF FISHERIES (2<sup>ND</sup> EDITION)*.**

	Meets	Partially meets	Does not meet	Details
<b>Guidelines</b>				
Management regime	7 of 9	1 of 9	1 N/A	Overall robust management regime. Objectives and performance criteria are not currently regularly measured, however future performance monitoring will be integrated into the Harvest Strategy for this fishery.
Principle 1 (target stocks)	11 of 11			Robust and active management of target stocks.
Principle 2 (bycatch and TEPS)	5 of 12		7 N/A	No bycatch or interactions with protected species due to hand collection method.
Principle 2 (ecosystem impacts)	4 of 5	1 of 5	0 N/A	Currently there is no Ecological Risk Assessment for the fishery to assess the impacts on ecological communities, food chains or the physical environment. However ecosystem impacts are considered to be low due to hand collection.
<b>EPBC requirements</b>				
Part 13	Met			No protected species interactions due to hand collection method.
Part 13A	Met			Based on outcomes of Guidelines assessment, the Objects of Part 13A are considered met, with EPBC consultation requirements also met.



Part 12	Met			Operates in the Coral Sea Marine Region, where there is no Bioregional Plan currently in place. Highly selective fishing method is unlikely to have an impact on ecological values.
Part 16	Met			Precautionary measures in place include hand collection method, TACs and rotational zoning.

### **Notes:**

#### **Assessment history:**

1<sup>st</sup> assessment finalised in 2004 – WTO with three conditions and ten recommendations

2<sup>nd</sup> assessment finalised in 2007 – WTO with three conditions three recommendations

3<sup>rd</sup> assessment finalised in 2011 – WTO with four conditions and five recommendation

4<sup>th</sup> assessment finalised in 2014 – WTO with three conditions and five recommendations

Full assessments of the fishery were completed in 2004, 2007, 2011 and 2014. Ongoing issues over these assessments include management of sea cucumber stocks and vulnerability to overfishing, development of appropriate management measures, commitment to research, appropriate triggers and management responses.

#### **Fishery reporting:**

Annual report – last provided in 2016. Reports received by department each year since last assessment in 2013.

Protected species interactions – Provided to the department on a quarterly basis through MOU. Annual Species of Conservation Interest (SOCI) reports provided in 2015 and 2016.

#### **Key links:**

##### **Fishery information:**

Fishery information page on agency website - <https://www.daf.qld.gov.au/fisheries/monitoring-our-fisheries/data-reports/sustainability-reporting/queensland-fisheries-summary/sea-cucumber-fishery-east-coast>

Further fishery information page - <https://www.daf.qld.gov.au/fisheries/commercial-fisheries/queenslands-commercial-fisheries/harvest-fisheries>



**Enforcing legislation:**

Queensland *Fisheries Act 1994* - <https://www.legislation.qld.gov.au/LEGISLTN/CURRENT/F/FisherA94.pdf>

Queensland Fisheries Regulation 2008 - [https://www.legislation.qld.gov.au/LEGISLTN/SLS/RIS\\_EN/2008/08SL083E.pdf](https://www.legislation.qld.gov.au/LEGISLTN/SLS/RIS_EN/2008/08SL083E.pdf)

**Harvest strategy:**

Harvest Strategy Policy and Guidelines - <https://www.daf.qld.gov.au/fisheries/sustainable-fisheries-strategy/harvest-strategy>

**Stock assessments:**

Current stock status assessment - <https://www.daf.qld.gov.au/fisheries/monitoring-our-fisheries/data-reports/sustainability-reporting/stock-status-assessments/stock-status-assessment-2015>

**Other relevant documents:**

Management strategy evaluation of the East Coast Sea Cucumber Fishery -

<https://www.environment.gov.au/system/files/pages/2fc0a44f-4171-46ef-8735-224f4afaa06f/files/evaluating-rotational-harvest-strategies.pdf>

Performance Measurement System for the Sea Cucumber Fishery -

[https://www.daf.qld.gov.au/data/assets/pdf\\_file/0007/52774/Fisheries-PMS-Beche-de-mer-2008.pdf](https://www.daf.qld.gov.au/data/assets/pdf_file/0007/52774/Fisheries-PMS-Beche-de-mer-2008.pdf)

Queensland Sustainable Fisheries Strategy - <https://www.daf.qld.gov.au/fisheries/consultations-and-legislation/sustainable-fisheries-strategy>

The Queensland RIS guidelines can be found on the Queensland Department of Treasury website

<https://www.treasury.qld.gov.au/publications-resources/ris-system-guidelines/ris-system-guidelines.pdf>

FRDC paper on harvest strategies for sea cucumber fisheries <https://www.environment.gov.au/system/files/pages/2fc0a44f-4171-46ef-8735-224f4afaa06f/files/evaluating-rotational-harvest-strategies.pdf>



## SECTION 2: DETAILED ANALYSIS OF THE QUEENSLAND SEA CUCUMBER FISHERY (EAST COAST) AGAINST *THE GUIDELINES FOR THE ECOLOGICALLY SUSTAINABLE MANAGEMENT OF FISHERIES (2<sup>ND</sup> EDITION)*.

Guidelines for the Ecologically Sustainable Management of Fisheries (2nd edition)	Comment
<b>THE MANAGEMENT REGIME</b>	
The management regime does not have to be a formal statutory fishery management plan as such, and may include non-statutory management arrangements or management policies and programs. The regime should:	
Be documented, publicly available and transparent	<p><b>Meets</b></p> <p>The fishery is managed by the Queensland Department of Agriculture and Fisheries (QDAF) under the Queensland <i>Fisheries Act 1994</i> and Fisheries Regulation 2008. Legislation can be found at <a href="http://www.legislation.qld.gov.au">www.legislation.qld.gov.au</a>.</p> <p>The fishery is also co-managed with the Great Barrier Reef Marine Park Authority (GBRMPA) under permits to operate in the Marine Park.</p>
Be developed through a consultative process providing opportunity to all interested and affected parties, including the general public	<p><b>Meets</b></p> <p>The original management arrangements were developed with industry and relevant stakeholders. There is a statutory process in place for public consultation and advisory committees. A Regulatory Impact Statement (RIS) process is used as the main mechanism for ongoing consultation. The Queensland RIS guidelines can be found on the Queensland Department of Treasury website (link above).</p> <p>The Queensland Sustainable Fisheries Strategy 2017-2027 (link above) sets out priorities for future engagement with stakeholders through working groups.</p>
Ensure that a range of expertise and community interests are involved in individual fishery management committees and during the stock assessment process	<p><b>Meets</b></p> <p>Consultation is completed through a formal RIS and/or show cause process under Section 63 of the Queensland <i>Fisheries Act 1994</i>. There is ongoing scientific research and management expertise within QDAF. Working groups with relevant experts and community members were introduced as part of the Sustainable Fisheries Strategy. The working group for this fishery currently has no representation from the community, however membership is welcomed from all sectors.</p>
Be strategic, containing objectives and performance criteria by which the effectiveness of the management arrangements are measured	<p><b>Partially meets</b></p> <p>Objectives and performance criteria are contained in the <i>Fisheries Act 1994</i> and the fishery Performance Measurement System. Currently, these are not regularly measured, however future performance monitoring will be integrated into the Harvest Strategy for this fishery. This is due to be completed by 2018 as part of the Sustainable Fisheries Strategy.</p>
Be capable of controlling the level of harvest in the fishery using input and/or output controls	<p><b>Meets</b></p> <p>The fishery uses a mixture of input controls (licence restrictions, spatial closures, minimum size requirements, gear restrictions (hand harvest only) and output controls (Total Allowable Catch (TAC) and Individually Transferable Quotas (ITQ)) to control the level of take.</p>



Contain the means of enforcing critical aspects of the management arrangements	<b>Meets</b> Each mothership has a Vessel Monitoring System (VMS) installed and fishers are required to complete logbooks as part of their licence requirements. The <i>Queensland Fisheries Act 1994</i> contains provisions for the enforcement of the management arrangements for the fishery. Compliance capacity should increase in future, according to commitments made in the Sustainable Fisheries Strategy. Compliance and enforcement activities are carried out by the Queensland Boating and Fisheries Patrol. Catch dockets must also be kept for five years for auditing purposes.
Provide for the periodic review of the performance of the fishery management arrangements and the management strategies, objectives and criteria	<b>Meets</b> The stock status of primary target species is reviewed annually, and the susceptibility of risk to minor species is also reviewed annually.
Be capable of assessing, monitoring and avoiding, remedying or mitigating any adverse impacts on the wider marine ecosystem in which the target species lives and the fishery operates	<b>Meets</b> The fishery has restrictions on harvest methods and only allows harvest by hand. This is a highly selective harvest method that reduces impacts to the wider marine ecosystem. Spatial restrictions and quota allocation is used to reduce other impacts where detected. There are also effort restrictions applied voluntarily to spatial areas to ensure localised depletion does not occur. While the management regime has not been constructed to easily assess ecosystem impacts from the harvest, the impacts of this fishery are considered very small and low risk.  The Sustainable Fisheries Strategy outlines further monitoring and research that will inform management needs and fill information gaps.
Requires compliance with relevant threat abatement plans, recovery plans, the National Policy on Fisheries Bycatch, and bycatch action strategies developed under the policy	<b>N/A</b> The fishery has no bycatch, and the harvest method does not threaten any other species.
<b>PRINCIPLE 1</b> - A fishery must be conducted in a manner that does not lead to over-fishing, or for those stocks that are over-fished, the fishery must be conducted such that there is a high degree of probability the stock(s) will recover.	
<b>Objective 1</b> - The fishery shall be conducted at catch levels that maintain ecologically viable stock levels at an agreed point or range, with acceptable levels of probability.	
<b>Information requirements</b>	
<b>1.1.1</b> There is a reliable information collection system in place appropriate to the scale of the fishery. The level of data collection should be based upon an appropriate mix of fishery independent and dependent research and monitoring.	<b>Meets</b> Catch in the fishery is monitored in real time via the Quota Monitoring System (e-Logs). Fishers are able to monitor their unused quota balance when reporting. Fishers are required to complete a logbook at the end of each fishing day and submit that to QDAF within 15 days of the end of each month. All primary vessels are monitored using VMS.



<b>Assessment</b>	
<p><b>1.1.2</b> There is a robust assessment of the dynamics and status of the species/fishery and periodic review of the process and the data collected. Assessment should include a process to identify any reduction in biological diversity and /or reproductive capacity. Review should take place at regular intervals but at least every three years.</p>	<p><b>Meets</b></p> <p>White teatfish and burrowing blackfish were assessed by QDAF under their stock status assessments (link above) in 2015 and 2017 as sustainable. This was based on catch data and a Management Strategy Evaluation. Three minor sea cucumber species were assessed using a susceptibility analysis in 2016; curryfish (<i>Stichopus hermanni</i> and <i>Stichopus vastus</i>), sandfish (<i>Holothuria scabra</i>) and prickly redfish (<i>Thelenota ananus</i>). These species were assessed to have a low susceptibility from fishing pressure and moderate ability to recover from fishing impact. The remaining three species may be assessed using this tool in the future. The current management arrangements should be sufficient to manage the low level of sustainability risk identified for these species.</p> <p>A 2014 scientific paper by the Fisheries Research and Development Corporation (FRDC) on the management of sea cucumber fisheries provides biomass estimates and other stock information. In general, management arrangements were found to present low risk to most species and reduced the risk of localised depletion. It was noted that there are still risks to some highly targeted species and there are information gaps that could reduce uncertainty.</p> <p>The Queensland Harvest Strategy Policy and Guidelines (link above) states that all target species will be managed at biomass levels equivalent to maximum sustainable yield (BMSY) by 2020 with a future target of 60 per cent of virgin biomass by 2027.</p>
<p><b>1.1.3</b> The distribution and spatial structure of the stock(s) has been established and factored into management responses.</p>	<p><b>Meets</b></p> <p>The distribution and spatial structure of sea cucumber stocks was considered in the FRDC paper described above, Management responses include specific strategies to mitigate risk of localised depletion, including spatial closures, voluntary effort restrictions, and rotating fishing zones.</p>
<p><b>1.1.4</b> There are reliable estimates of all removals, including commercial (landings and discards), recreational and indigenous, from the fished stock. These estimates have been factored into stock assessments and target species catch levels.</p>	<p><b>Meets</b></p> <p>Recreational, charter and indigenous fishing are estimated to be zero, or very limited. The fishery is managed as a commercial fishery only, which is appropriate for this species.</p>
<p><b>1.1.5</b> There is a sound estimate of the potential productivity of the fished stock/s and the proportion that could be harvested.</p>	<p><b>Meets</b></p> <p>There is a population density estimate for species, and an understanding of the habitat occupied by each species.</p> <p>Biological parameters are not known exactly due to the challenges from the biology of the species (shrinkage, difficult to measure etc.). There is a minimum size limit, effort restrictions, closed areas, and rotating zones which are used to ensure sustainability. In addition catch data is monitored through log books.</p>
<b>Management responses</b>	
<p><b>1.1.6</b> There are reference points (target and/or limit), that trigger management actions including a biological bottom line and/or a catch or effort upper limit beyond which the stock should not be taken.</p>	<p><b>Meets</b></p> <p>There is a maximum level of effort prescribed for each zone, and an overall TAC with ITQs.</p> <p>The Queensland Harvest Strategy Policy and Guidelines sets out how future management will include suitable reference points, decision rules and performance indicators.</p>
<p><b>1.1.7</b> There are management strategies in place capable of controlling the level of take.</p>	<p><b>Meets</b></p> <p>The level of take is maintained through a TAC using ITQs, limited entry, spatial management, closures and hand collection method.</p>



1.1.8 Fishing is conducted in a manner that does not threaten stocks of byproduct species.	<b>Meets</b> There are no byproduct species taken in the fishery and due to the fishing method used (hand collection).
(Guidelines 1.1.1 to 1.1.7 should be applied to byproduct species to an appropriate level)	
1.1.9 The management response, considering uncertainties in the assessment and precautionary management actions, has a high chance of achieving the objective.	<b>Meets</b> There is a high chance that the management actions will achieve the objective of maintaining target and byproduct species at appropriate levels.
<b>If overfished, go to Objective 2:</b> <b>If not overfished, go to PRINCIPLE 2:</b>	
<b>Objective 2</b> - Where the fished stock(s) are below a defined reference point, the fishery will be managed to promote recovery to ecologically viable stock levels within nominated timeframes.	
<b>Management responses</b>	
1.2.1 A precautionary recovery strategy is in place specifying management actions, or staged management responses, which are linked to reference points. The recovery strategy should apply until the stock recovers, and should aim for recovery within a specific time period appropriate to the biology of the stock.	<b>Meets</b> The black teatfish, which appears likely to have been historically overfished, has been subject to a quota of zero since 1999. This is considered an appropriate precautionary response. While the performance measurement system (PMS) for this fishery has not been used to regularly assess the ongoing performance of the fishery, the PMS does contain decision rules that are used to ensure that fished sea cucumber species are maintained at sustainable levels. The performance measure to remove the zero quota of black teatfish is for the stock to be at least 70 per cent of the unfished population density. An industry funded survey in late 2015 demonstrated that black teatfish had exceeded the minimum biomass level for the northern part of the fishery. The survey met the required scientific standards and industry requested QDAF to consider opening these reefs to fishing of black teatfish under a reduced spatially based TAC. The initial request was denied based on concerns for that section of the reef following the severe coral bleaching event of 2016. Negotiations are continuing between industry, QDAF and GBRMPA regarding reopening of this section to fishing.
1.2.2 If the stock is estimated as being at or below the biological and / or effort bottom line, management responses such as a zero targeted catch, temporary fishery closure or a 'whole of fishery' effort or quota reduction are implemented.	<b>Meets</b> As described above, a zero quota is in place for black teatfish with commercial fishing prohibited since 1999.
<b>PRINCIPLE 2</b> - Fishing operations should be managed to minimise their impact on the structure, productivity, function and biological diversity of the ecosystem.	
<b>Objective 1</b> - The fishery is conducted in a manner that does not threaten bycatch species.	
<b>Information requirements</b>	
2.1.1 Reliable information, appropriate to the scale of the fishery, is collected on the composition and abundance of bycatch.	<b>Meets</b> While there are currently no requirements to record discarded bycatch species in logbooks, interactions with protected species are reported in SOCI logbooks. There have been no reported interactions with protected species, which is consistent with the highly selective and low impact fishing method (hand collection).
<b>Assessments</b>	
2.1.2 There is a risk analysis of the bycatch with respect to its vulnerability to fishing.	<b>N/A</b> There is no bycatch as the method of collection is very targeted to the species collected, therefore no risk analysis for bycatch is required at this time.
<b>Management responses</b>	



<b>2.1.3</b> Measures are in place to avoid capture and mortality of bycatch species unless it is determined that the level of catch is sustainable (except in relation to endangered, threatened or protected species). Steps must be taken to develop suitable technology if none is available.	<b>Meets</b> Due to the nature of the harvesting method (hand collection), there is no capture of bycatch. If unwanted species are collected, they can be released immediately.
<b>2.1.4</b> An indicator group of bycatch species is monitored.	<b>N/A</b> Monitoring of an indicator group of bycatch species is not necessary due to the low risk posed by the harvesting method.
<b>2.1.5</b> There are decision rules that trigger additional management measures when there are significant perturbations in the indicator species numbers.	<b>N/A</b> There are no specific decision rules in place that trigger additional management measures - which is appropriate given the low risk posed to bycatch species.
<b>2.1.6</b> The management response, considering uncertainties in the assessment and precautionary management actions, has a high chance of achieving the objective.	<b>Meets</b> The management arrangements are likely to have a high chance of achieving the objective of fishing being conducted in a manner that does not threaten bycatch.
<b>Objective 2</b> - The fishery is conducted in a manner that avoids mortality of, or injuries to, endangered, threatened or protected species and avoids or minimises impacts on threatened ecological communities.	
<b>Information requirements</b>	
<b>2.2.1</b> Reliable information is collected on the interaction with endangered, threatened or protected species and threatened ecological communities.	<b>Meets</b> All operators are required to report any interactions with threatened, endangered and protected species and there are no threatened ecological communities in the area of the fishery. Logbooks are considered reliable as the harvesting method is hand collection.
<b>Assessments</b>	
<b>2.2.2</b> There is an assessment of the impact of the fishery on endangered, threatened or protected species.	<b>N/A</b> As the harvesting method (hand collection) means there are no interactions with protected species, an assessment of the impacts of the fishery is not required.
<b>2.2.3</b> There is an assessment of the impact of the fishery on threatened ecological communities.	<b>N/A</b> There are no threatened ecological communities in the area of the fishery.
<b>Management responses</b>	
<b>2.2.4</b> There are measures in place to avoid capture and/or mortality of endangered, threatened or protected species.	<b>N/A</b> Due to targeted collection method, protected species interactions are considered negligible therefore no mitigation strategy is required.
<b>2.2.5</b> There are measures in place to avoid impact on threatened ecological communities.	<b>N/A</b> There are no threatened ecological communities in the area of the fishery.
<b>2.2.6</b> The management response, considering uncertainties in the assessment and precautionary management actions, has a high chance of achieving the objective.	<b>Meets</b> The management arrangements stipulate collection methods that are likely to have a high chance of achieving the objective of ensuring that fishing is conducted in a manner that avoids mortality of, or injuries to, endangered, threatened or protected species and avoids or minimises impacts on threatened ecological communities



<b>Objective 3</b> - The fishery is conducted, in a manner that minimises the impact of fishing operations on the ecosystem generally.	
<b>Information requirements</b>	
<b>2.3.1</b> Information appropriate for the analysis in 2.3.2 is collated and/or collected covering the fishery's impact on the ecosystem and environment generally.	<b>Meets</b> Information is collected for target species, however no specific information is collected on the fishery's impact on the ecosystem and environment generally. The impact on the ecosystem and environment is considered to be low due to the highly selective fishing method.
<b>Assessment</b>	
<b>2.3.2</b> Information is collected and a risk analysis, appropriate to the scale of the fishery and its potential impacts, is conducted into the susceptibility of each of the following ecosystem components to the fishery. 1. Impacts on ecological communities <ul style="list-style-type: none"> <li>• Benthic communities</li> <li>• Ecologically related, associated or dependent species</li> <li>• Water column communities</li> </ul> 2. Impacts on food chains <ul style="list-style-type: none"> <li>• Structure</li> <li>• Productivity/flows</li> </ul> 3. Impacts on the physical environment <ul style="list-style-type: none"> <li>• Physical habitat</li> <li>• Water quality</li> </ul>	<b>Partially meets</b> Currently there is no ERA for the fishery to assess the impacts on ecological communities, food chains or the physical environment.  The Sustainable Fisheries Strategy commits to completing ERA's for all fished stocks.
<b>Management responses</b>	
<b>2.3.3</b> Management actions are in place to ensure significant damage to ecosystems does not arise from the impacts described in 2.3.1.	<b>Meets</b> Although there is no ERA in place, due to the highly selective harvesting method (hand collection) it is likely that the fishery is not having an adverse impact on the ecosystem.
<b>2.3.4</b> There are decision rules that trigger further management responses when monitoring detects impacts on selected ecosystem indicators beyond a predetermined level, or where action is indicated by application of the precautionary approach.	<b>Meets</b> The collection of data through logbooks, quota monitoring and validation enables QDAF to implement any appropriate management response, if a response is required. There are currently no other formal decision rules to trigger further management responses, however given the  The Queensland Harvest Strategy Policy and Guidelines sets out how future management will include suitable reference points, decision rules and performance indicators.
<b>2.3.5</b> The management response, considering uncertainties in the assessment and precautionary management actions, has a high chance of achieving the objective.	<b>Meets</b> The management arrangements, considering any precautionary management actions, have a high chance of achieving the objective of ensuring that the fishery is conducted in a manner that minimises the impact of fishing operations on the ecosystem generally.



### SECTION 3: ASSESSMENT OF THE QUEENSLAND SEA CUCUMBER (EAST COAST) FISHERY AGAINST THE REQUIREMENTS OF THE EPBC ACT.

**Please Note** – the table below is not a complete or exact representation of the EPBC Act. It is intended as a checklist of relevant sections and components of the EPBC Act to provide advice on the fishery in relation to decisions under Part 13 and Part 13A.

#### Part 12

	Comment
<b>Section 176 Bioregional Plans</b>	
(5) Minister must have regard to relevant bioregional plans	<p>The fishery operates in the Coral Sea Marine Region and overlaps slightly with the Temperate East Marine Region. There is no bioregional plan currently in place for the Coral Sea Marine Region.</p> <p>There is no evidence to suggest any systematic change to species diversity or richness caused by these fisheries, indicating fishing effort is not having a material impact on the food chain or trophic structure. Given the low impact fishing methods used in the fishery and the mitigation measures in place, impact to key ecological features is considered low.</p>

#### Part 13

	Comment
<b>Accreditable plan, regime or policy (Division 1, Division 2, Division 3, Division 4)</b>	
s. 208A (1) (a-e) , s.222A (1) (a-e), s.245 (1) (a-e), s.265 (1) (a-e) Does the fishery have an accreditable plan of management, regime or policy?	<p><b>Yes</b>, there is an accreditable management regime.</p> <p>The Queensland Sea Cucumber Fishery (East Coast) will be managed under the Queensland <i>Fisheries Act 1994</i> and the Fisheries Regulation 2008. This regime was last accredited under Part 13 in 2014 and this accreditation remains valid and in place.</p>
<b>Division 1 Listed threatened species, Section 208A Minister may accredit plans or regimes</b>	
(f) Will the plan, regime or policy require fishers to take all reasonable steps to ensure that members of listed threatened species (other than conservation dependent species) are not killed or injured as a result of the fishing?	<b>Yes</b> , the management regime requires that all reasonable steps are taken to avoid interactions through gear limitations (hand collection) and any interactions are reported to the Department.
(g) And, is the fishery likely to adversely affect the survival or recovery in nature of the species.	<b>No</b> . No interactions have been historically reported and the risk to threatened species is considered low due to the fishing method employed (hand collection).
<b>Division 2 Migratory species, Section 222A Minister may accredit plans or regimes</b>	
(f) Will the plan, regime or policy require fishers to take all reasonable steps to ensure that members of listed migratory species are not killed or injured as a result of the fishing?	<b>Yes</b> , the management regime requires that all reasonable steps are taken to avoid interactions through gear limitations (hand collection) and any interactions are reported to the Department.
(g) And, is the fishery likely to adversely affect the conservation status of a listed migratory species or a population of that species?	<b>No</b> . No interactions have been historically reported and the risk to threatened species is considered low due to the fishing method employed (hand collection).
<b>Division 3 Whales and other cetaceans, Section 245 Minister may accredit plans or regimes</b>	
(f) Will the plan, regime or policy require fishers to take all reasonable steps to ensure that	<b>Yes</b> , the management regime requires that all reasonable steps are taken to avoid interactions through gear limitations (hand collection) and any interactions are reported to the Department.



cetaceans are not killed or injured as a result of the fishing?	
(g) And is the fishery likely to adversely affect the conservation status of a species of cetacean or a population of that species?	<b>No.</b> No interactions have been historically reported and the risk to threatened species is considered low due to the fishing method employed (hand collection).
<b>Division 4 Listed marine species, Section 265 Minister may accredit plans or regimes</b>	
(f) Will the plan, regime or policy require fishers to take all reasonable steps to ensure that members of listed marine species are not killed or injured as a result of the fishing?	<b>Yes,</b> the management regime requires that all reasonable steps are taken to avoid interactions through gear limitations (hand collection) and any interactions are reported to the Department.
(g) And is the fishery likely to adversely affect the conservation status of a listed marine species or a population of that species?	<b>No.</b> No interactions have been historically reported and the risk to threatened species is considered low due to the fishing method employed (hand collection).
<b>Section 303AA Conditions relating to accreditation of plans, regimes and policies</b>	
(1) This section applies to an accreditation of a plan, regime or policy under section 208A, 222A, 245 or 265.	The Department recommends that the management regime for the <b>Queensland Sea Cucumber Fishery remains accredited</b> under sections 208A, 222A, 245 and 265. Interactions with protected species are negligible under existing arrangements.
(2) The Minister may accredit a plan, regime or policy under that section even though he or she considers that the plan, regime or policy should be accredited only: (a) during a particular period; or (b) while certain circumstances exist; or (c) while a certain condition is complied with.  In such a case, the instrument of accreditation is to specify the period, circumstances or condition.	No conditions required
(7) The Minister must, in writing, revoke an accreditation if he or she is satisfied that a condition of the accreditation has been contravened.	N/A

## Part 13A

<b>Section 303BA Objects of Part 13A</b>	
(1) The objects of this Part are as follows: (a) to ensure that Australia complies with its obligations under CITES and the Biodiversity Convention; (b) to protect wildlife that may be adversely affected by trade; (c) to promote the conservation of biodiversity in Australia and other countries; (d) to ensure that any commercial utilisation of Australian native wildlife for the purposes of export is managed in an ecologically sustainable way; (e) to promote the humane treatment of wildlife; (f) to ensure ethical conduct during any research associated with the utilisation of wildlife; and (h) to ensure the precautionary principle is taken into account in making decisions relating to the utilisation of wildlife.	
	<b>Comment</b>
<b>Section 303DC Minister may amend list (non CITES species)</b>	
(1) Minister may amend the List of Exempt Native Specimens (LENS) by: (e) including items;	



<ul style="list-style-type: none"> <li>(f) deleting items; or</li> <li>(g) imposing a condition or restriction to which the inclusion of a specimen is subject; or</li> <li>(h) varying or revoking a condition or restriction to which the inclusion of a specimen is subject.</li> </ul>	
(1A) In deciding to amend LENS, Minister must rely primarily on outcomes of Part 10, Div 1 Or 2 assessment	<b>N/A</b> – not a Commonwealth fishery
(1C) The above does not limit matters that may be considered when deciding to amend LENS.	<b>Meets</b> - through the above assessment at Section 2 against the Guidelines, the Department has taken into account all matters relevant to making an informed decision to amend the list of exempt native specimens to include product taken in this fishery.
(3) Before amending LENS, Minister must consult: <ul style="list-style-type: none"> <li>(a) other Minister or Ministers as appropriate; and</li> <li>(b) other Minister or Ministers of each State and self-governing Territory as appropriate; and</li> <li>(c) other persons and organisations as appropriate.</li> </ul>	<b>Meets</b> – submission was available on the Department's website from 6 April – 25 May 2017. No comments were received.

## Part 16

	Comment
<b>Section 391 Minister must consider precautionary principle in making decisions</b>	
(1) Minister must take account of precautionary principle	
(2) The precautionary principle is that lack of full scientific certainty should not be used as a reason for postponing a measure to prevent degradation of the environment where there are threats of serious or irreversible environmental damage.	<b>Meets</b> - given the controlled catch and effort in the fishery, the method of catch (hand collection), the annual monitoring of stocks against historic catch and effort, and the use of real time quota monitoring, precautionary measures are considered to be in place to prevent serious or irreversible environmental damage being caused by this fishery. The Precautionary principle is identified in the Queensland <i>Fisheries Act 1994</i> .