## Concept Plan SP 2013-006

# The influence of macroalgal fields on coral reef fish

### Marine Science

### Project Core Team

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|---|---|
| **Supervising Scientist** | Shaun Wilson |
| **Data Custodian** | |
| **Site Custodian** | |

### Project status as of Sept. 30, 2020, 1:54 p.m.

Approved and active

### Document endorsements and approvals as of Sept. 30, 2020, 1:54 p.m.

| | |
|---|---|
| **Project Team** | granted |
| **Program Leader** | granted |
| **Directorate** | granted |

# The influence of macroalgal fields on coral reef fish

## Biodiversity and Conservation Science Program

Marine Science

## Departmental Service

Service 6: Conserving Habitats, Species and Communities

## Aims

## Expected outcome

The project will improve understanding of how natural processes, influence the distribution and abundance of macroalgae. The project will also identify aspects of macroalgal meadows that promote diversity and productivity of ecologically and commercially important species.

## Strategic context

Corporate Plan: The objectives of the project align with the vision, mission and responsibilities of DEC outlined in the DEC Corporate Plan (2007 -2009). The project also partly addresses the following Strategies outlined in the Corporate Plan (2007-2009):
Strategy 1.5 Incorporate consideration of climate change impacts upon biodiversity conservation in all planning and introduce adaptive management where feasible.
Strategy 1.6 Ensure that all use of native plants and animals is sustainable
Strategy 8.4 Develop and maintain close working partnerships between the department's scientists and operational groups, and with external research organisations.
Science Division Strategic Plan for Biodiversity Conservation Research: the project specifically addresses the following goals and strategies:
G1. Understand the composition of, and patterning in, terrestrial and marine biodiversity
G2. Understand the threats to biodiversity and develop evidence-based actions to ameliorate threats
G6. Monitor and evaluate the condition and trends of species, populations and communities in terrestrial and marine ecosystems
S3. Expand research capability by building strategic partnerships
Ningaloo Marine Park and Muiron Islands Marine Management Area Management Plan:
The following strategies outlined in the above management plan are addressed within the context of this project:
- Undertake research to better characterise the diversity, distribution and abundance of seagrass and macroalgal communities within the reserves (CALM, DoF) (H).
- Educate users of the important ecological role of seagrass and macroalgal communities and the potential impacts of human activities, particularly vessel mooring, and nutrient and pollution inputs on these communities (CALM) (M).
- Undertake research to support the development of management targets for commerciallyand recreationally targeted finfish species (DoF, CALM) (H-KMS)

## Expected collaborations

Martial Depczynski AIMS (0.1 FTE), Ben Radford AIMS (0.1 FTE), Thomas Wernberg UWA (0.1 FTE), Christopher Fulton ANU (0.1 FTE)

## Proposed period of the project

June 12, 2013 – None

## Staff time allocation

| Role | Year 1 | Year 2 | Year 3 |
|---|---|---|---|
| Scientist<br>Technical<br>Volunteer<br>Collaborator | | | |

## Indicative operating budget

| Source | Year 1 | Year 2 | Year 3 |
|---|---|---|---|
| Consolidated Funds (DPaW)<br>External Funding | | | |