Report prepared for the Ministry of Foreign Affairs and Trade

Evaluation of New Zealand's fisheries sector work in the Pacific

Evaluation report

9 August 2013

sapere research group

Evaluation team

Our evaluation team comprised the following Sapere staff and independent experts:

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Acknowledgements

We are particularly grateful to the large number of people who made themselves available for interviews, sometimes at short notice and often in the middle of pressing schedules. We have also appreciated the time and effort people have made to responding to follow-up questions from the team, such as requests for data and resources.

Quality assurance

This evaluation was supported by a Steering Group and a Technical Reference Group, comprising staff from the Ministry of Foreign Affairs and the Ministry for Primary Industries. We would also like to thank the members of these groups for their input and assistance.

Specialist input and quality assurance was provided to the evaluation team by an internal reference group comprising **David Moore** (Managing Director, Sapere), **David Shand** and **Dr Kevin Stokes**.

Quality assurance to the Ministry of Foreign Affairs and Trade was provided by an independent external reviewer, **Crick Carleton** of Nautlius Consultants.

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Abbreviations

CIMRIS	Cook Islands Marine Resources Institutional Strengthening
DAC	Development Assistance Committee of the OECD
EEZ	Exclusive Economic Zone
EIA	Environmental Impact Assessment
FFA	Forum Fisheries Agency
FFC	Forum Fisheries Committee
FSM	Federated States of Micronesia
IS	Institutional strengthening
IUU	Illegal, unreported and unregulated
MCS	Monitoring, control and surveillance
MFAT	Ministry of Foreign Affairs and Trade
IDG	Ministry of Foreign Affairs and Trade's International Development Group
MCS	Monitoring, control and surveillance
MFMR	Solomon Islands Ministry of Fisheries and Marine Resources
MMR	Cook Islands Ministry of Marine Resources
MSSIF	MekemStrong Solomon Islands Fisheries
MSC	Marine Stewardship Council
MSG	Melanesian Spearhead Group (Fiji, PNG, Solomon Islands, Vanuatu)
MSY	Maximum sustainable yield
NES	Cook Islands National Environment Service
NGO	Non-governmental organisation
ODA	Official development assistance
OECD	Organisation for Economic Cooperation and Development
PICs	Pacific Island Countries
PNA	Parties to the Nauru Agreement (Parties: Tuvalu, Kiribati, Papua New Guinea, Solomon Islands, Nauru, Palau, Marshall Islands, Federated States of Micronesia)

PNG	Papua New Guinea
PS	Permanent Secretary
SIMROS	Solomon Islands Marine Resources Organisational Strategy
SPC	Secretariat of the Pacific Community
TA	Technical Advisor
TVM	Te Vaka Moana Arrangement (Participants: Niue, Cook Islands, Tokelau, Samoa, Tonga, New Zealand)
VDS	Vessel Day Scheme
VMS	Vessel monitoring system
WCPFC	Western and Central Pacific Fisheries Commission
WCPO	Western and Central Pacific Ocean

Executive summary

What we were commissioned to do

We were commissioned by the Ministry of Foreign Affairs and Trade (MFAT) to undertake a strategic evaluation of the New Zealand Aid Programme's support for Pacific fisheries. The purpose of the evaluation was to provide:

- A retrospective evaluation of the New Zealand Aid Programme's fisheries spending and Activities in the Pacific that were undertaken from 2003-2010, in particular an assessment of the impacts of the sector programme and whether it achieved its stated objectives.
- Advice and recommendations on what has worked well and what hasn't, including critical success factors, and lessons for the focus of future support, to assist the on-going and future New Zealand Aid Programme's support for Pacific fisheries Activities.

The Activities in scope of this evaluation were:

- New Zealand's support for the Forum Fisheries Agency (FFA) and the fisheries-related work of the Secretariat of the Pacific Community (SPC). This included looking at project-specific efforts (the observer programme and the SPC tuna tagging work).
- Solomon Islands institutional strengthening (IS) through the Solomon Islands Marine Resources Organisational Strategy (SIMROS), MekemStrong Solomon Islands Fisheries (MSSIF) programmes, plus the WorldFish rural livelihoods development Activity.
- Cook Islands Marine Resources Institutional Strengthening (CIMRIS).

Our main findings

High quality advice and services from regional agencies

Support for the regional agencies (FFA and SPC) accounted for around 60% of spending over the evaluation period (around $34m out of a total $59m). We interviewed stakeholders in a selection of member countries, and encountered widespread views that these agencies' services and advice are of high quality and reflect the priorities of Pacific Island Countries (PICs). This finding is consistent with the conclusions of the recent independent reviews of these agencies. FFA was also widely acknowledged as assisting members to participate more actively and confidently in regional negotiations.

New Zealand's support for these agencies has contributed to the management and assessment of tuna stocks. FFA's support for tuna management measures (such as the development of Tuna Management Plans) has assisted PICs to increase their government revenues from licensing arrangements.

SPC's tuna stock assessments are regarded by stakeholders as being of a high standard, and are routinely subject to peer review. They show that stocks of two key tuna species are reaching sustainable limits. New Zealand's support for tuna tagging was considered instrumental in kick-starting this programme, which contributed to tuna stock assessments.

Project-specific funding for the regional observer programme has assisted in training observers to collect data that may be used in both scientific research and compliance enforcement, with improvements to compliance data management currently being investigated.

Mixed results from Institutional Strengthening programmes

Funding for the IS programmes comprised over a third of total support over the period ($20.6m). New Zealand's support for these programmes has been appreciated by partner countries, with both being credited by some interviewees to a lift in organisational capability and reputation.

- In Solomon Islands, the programmes supported the development of tuna management policies and processes that led to a substantial increase in licence fees. However, implementation of policy work in community-based fisheries management appears to have been hampered by lack of capacity and resources at the provincial level.
- In the Cook Islands, the IS support funded the development of oceanic plans and regulations, but otherwise focused largely on coastal water quality. It supported the development of foundational initiatives to manage the Takitumu lagoon, but water quality is yet to improve. The programme ultimately delivered little in the way of oceanic fisheries management outcomes, leading to some disappointment from local stakeholders.

Both programmes assisted with the introduction of corporate systems such as financial management and HR processes, but these have proven vulnerable to disruption at political and management levels. We found a number of factors that are critical to the on-going success of IS programmes, some of which are outside a donor's control, but others which can be managed more effectively (such as the selection process for in-country Technical Advisors, and the application of best practice IS principles).

Little evidence of direct economic development benefits

While PIC government revenues from licence fees increased over the period, this is largely attributable to much broader foundational initiatives, in particular the work of the Parties to the Nauru Agreement (PNA) and its Vessel Day Scheme, and assisted by the continued work of FFA. That said, support for IS programmes can assist individual countries in realising the gains from national-level implementation of these arrangements (i.e. through better management of the access of foreign vessels to their domestic oceanic fishery) – something which was evident in Solomon Islands.

Over the evaluation period, New Zealand directly supported one economic development Activity, providing $1.4m over five years for a project delivered by WorldFish to train villagers in Western Province in Solomon Islands to grow giant clams and coral for export to the US aquarium trade. For a variety of reasons which are expounded in our report, this project, which was never economically viable, failed to achieve its objectives. It did, however, generate some unexpected spin-off benefits, and New Zealand's rapid commitment to Solomon Islands immediately after the ethnic tensions was widely recognised and appreciated.

We found a lack of up-front analysis and planning for on-going sustainability, including the donor exit strategy. This was particularly evident in the WorldFish project, and we also heard concerns about the sustainability of the observer programme when New Zealand funding ceases in 2014. More rigorous ex ante project appraisal and application of project management disciplines would help avert these problems in future.

Individual staff members who benefit from strengthening become attractive to the regional agencies and other governments, and are often headhunted – though sometimes return home, bringing with them new skills and perspectives.

Lack of strategic coherence...

Historically, there has not been programme-level selection and prioritisation of Activities within the sector programme. This reflects its origins as a collection of bilateral IS programmes and support for regional agencies, rather than a strategic, sector-based programme. Support for the various Activities has evolved from various drivers, but appears to have been largely reactive. Some funding (such as support for Cook Islands) appears to reflect New Zealand's foreign policy goals as much as fisheries objectives.

Despite greater clarity in overall sector programme direction since 2009, we still found a lack of explicit intervention logic linking the composite Activities to the sector programme objectives. Stakeholders were generally unclear as to why particular Activities have been selected, why they are priorities for fisheries, and how they contribute to the sector programme-level objectives. This appeared to relate to the evaluation period as well as current day.

... and co-ordinated sector programme management

In our view, New Zealand's support for Pacific fisheries has not been run as a formal, co-ordinated programme in any traditional sense. There is no overarching programme-level governance and decisions, including those relating to funding, appear to be made in an ad hoc fashion across different MFAT divisions. It seemed to us unnecessarily difficult to establish the full costs of the sector programme; and the costs of managing the sector programme have not been attributed or tracked at all.

Basic project cycle management also weak

Deficiencies in project cycle management were also apparent. Amongst the particular weaknesses we identified was a dearth of meaningful measurement of baselines and impacts, lack of adequate documentation and absence of a feedback loop from evaluation into the selection and design of future Activities. In addition, stakeholders expressed concerns with the high turnover of MFAT desk staff, and the lack of analytical depth and expertise in MFAT.

Mixed views on the tenor of New Zealand's engagement

New Zealand's contribution to improved governance of the regional agencies has been valuable, but lacks clarity on the end state. More broadly, New Zealand is acknowledged as

having multiple roles in Pacific fisheries, which are generally perceived as being well managed. Though partner countries had mixed views on the tenor of New Zealand's engagement, with some considering New Zealand's attitude becoming a bit more '*big brother*'.

Scope to improve value for money

The services and advice provided by the regional agencies are viewed by members as representing good value for money. In our view, there are clear arguments for on-going regional provision of some services, particularly where there are obvious economies of scale and scope and a lack of national capacity (e.g. monitoring, control and surveillance). In light of this, and member countries' positive perceptions of the value of services from the regional agencies, we think the continued support by New Zealand for these agencies is entirely appropriate.

The IS efforts in Solomon Islands appear to have delivered better value for money than CIMRIS. The long-term 'residential' approach appears to have assisted in this regard, as well as a clearer focus on oceanic fisheries management. Value for money could be enhanced in future IS efforts by:

- Focusing on countries where there is sufficient national capacity to justify stand-alone national fisheries administrations, and
- Providing support at a lower intensity but over a longer time period, to ensure support is within the absorptive 'bandwidth' of the country, to minimise the gaps that open up when the support ends and to provide plenty of time for the benefits to be realised.

The WorldFish project delivered poor value for money as it was not commercially viable and did not achieve its objectives. Value for money in economic development projects could be improved in the future by:

- Undertaking more robust ex ante project appraisal that includes supply chain analysis and considers the on-going operational requirements and costs, and
- Using this analysis to select development projects on the basis of social and economic viability (i.e. that are likely to succeed).

Gender considerations have not featured in the sector programme

Gender considerations have not featured in the sector programme; indeed some interviewees told us that New Zealand has explicitly said it's not interested in funding '*hand waving and gender rights*'. None of the Activities had an explicit objective to address gender issues and improve the quality of life for women in the Pacific, and we did not find evidence of local women being actively encouraged to participate in the development and governance of Activities. We did uncover a temptation to superficially brand projects that happened to involve women as 'gender projects'.

Employment opportunities for women in oceanic fisheries are primarily on-shore (canneries and loining factories), around which there are general concerns about employment conditions. Employment as observers on vessels reportedly poses safety and human rights issues for both men and women. There are also concerns that the presence of fishing crews encourages prostitution.

In coastal fisheries, we heard concerns that the ability of women to gather fish for food and to generate cash income is being impeded by a lack of basic facilities and reduced catch of coastal fish.

Coastal fisheries a significant gap

The sector programme has had an emphasis on fisheries management over development, and also on oceanic over coastal fisheries – largely as a result of the high proportion of spending on regional agencies. Over the evaluation period, coastal fisheries was a significant gap, both in New Zealand's programme of funding, and in the work programmes of regional agencies.

A focus on oceanic fisheries translates into general revenues at the central government level (through increased licence fees), whereas successful livelihoods development efforts are likely to have more direct benefits for locals. Many PIC communities are highly dependent on their coastal fisheries – both for food security and sustainable livelihoods as well as economic sectors such as tourism. The critical importance of coastal fisheries, combined with their fragility, suggests that greater priority on coastal fisheries management and sustainable development would be appropriate and timely.

The way forward

We have identified a number of ways in which the decision-making processes around the sector programme could be improved to make more coherent and evidence-based decisions about what to fund and where. We believe that implementing these changes would improve the efficiency and effectiveness of the sector programme, and help deliver more sustainable results for partner countries. Our recommendations for change are grouped into the following categories.

1. **Run the sector programme as a programme**. At its heart, this recommendation is about ensuring deliberate and explicit decision-making across the portfolio of Activities, and across project lifecycles. It involves establishing a central oversight group, with governance structures and decision-making process more in line with standard programme management disciplines. This group would be responsible for making deliberate and explicit decisions across the Pacific fisheries investment portfolio, i.e. co-ordinating fisheries-related decision-making (including funding decisions) across the bilateral programmes and the support for regional agencies, and employing a consistent set of decision-making criteria.

2. **Pick a niche and design an investment portfolio**. We recommend using this centralised programme governance to move towards a single coherent theme for the Pacific fisheries sector programme, based on a specialist niche where New Zealand can add value and around which it can build a reputation. Quantitative geographic and sectoral analysis is required to inform choices around the geographic spread of support. Strategic analysis is required to select a niche and design an investment portfolio that matches New Zealand's specialisation to the development needs of PICs.

3. **Ensure the disciplined application of robust project management cycle processes**. This includes committing to more rigorous ex ante project appraisal, more participatory planning processes that incorporate the donor exit strategy, and more formalised processes for project changes. This will improve the evidence base for

decision-making and improve the likelihood of successful development outcomes. We understand that MFAT is committed to improvements in this area and is already implementing results-based and Activity and programme management processes across the organisation. We emphasise that the focus should be on the *quality* of these processes, and ensuring that analysis and processes are *proportionate* with the size of the projects.

4. **Simplify and improve monitoring and reporting**. Reporting should be focused on metrics that matter, and are more relevant and realistic in terms of intervention logic. We strongly encourage MFAT to commit to the quantitative measurement of baselines and project progress, and to hardwire in a feedback loop to governance processes so that mistakes are not repeated and successes can be built upon.

5. **Build MFAT capability to support and implement these system changes**. Expertise in economics and commercial analysis, as well as in participatory planning and community development will be required to enable MFAT to effect these changes and ensure they deliver lasting improvements to the design and delivery of the sector programme.

1. Introduction

1.1 Purpose of this evaluation

We were commissioned by the Ministry of Foreign Affairs and Trade (MFAT) to undertake a strategic evaluation of the New Zealand Aid Programme's support for Pacific fisheries.

The purpose of the evaluation was to provide:

- A retrospective evaluation of the New Zealand Aid Programme's fisheries spending and Activities[1] in the Pacific that were undertaken from 2003-2010.
- Information and advice to support the on-going and future New Zealand Aid Programme Pacific fisheries Activities, including the overall strategic direction, programming, partnership arrangements and policy engagement.

This report presents the findings from our evaluation, which focused on assessing what the impacts of the sector programme have been and whether it has achieved its stated objectives. It also provides advice and recommendations on what has worked well and what hasn't, including critical success factors, and lessons for the focus of future support.

1.2 Scope

In considering whether particular Activities should be within scope of the evaluation, we took into account their relative significance in terms of both historical financial contributions and intended future funding. We also sought to secure a reasonable balance of different types of Activities. On this basis, the retrospective component of our evaluation examined the impact of the following Activities:

- Support for the Forum Fisheries Agency (FFA) and the fisheries-related work of the Secretariat of the Pacific Community (SPC). This included looking at project-specific efforts (the observer programme and the SPC tuna tagging work), and discussions with the FFA and SPC staff in Honiara and Noumea. Our focus was on investigating the overall impact of New Zealand's contribution to the FFA and SPC through interviews with people in a selection of beneficiary countries: Cook Islands, Solomon Islands, Kiribati, Samoa, and Fiji.
- Solomon Islands fisheries assistance: Solomon Islands Marine Resources Organisational Strategy (SIMROS), MekemStrong Solomon Islands Fisheries (MSSIF), the WorldFish rural livelihoods development Activities, and the 2007 rural livelihoods recovery Activity.
- Cook Islands Marine Resources Institutional Strengthening (CIMRIS).

[1] Throughout this report, we use the term 'sector programme' to refer to the overall package of New Zealand's support for Pacific fisheries, being comprised of 'Activities'. The term 'programme' by itself is used in the more generic sense, and also to the work programmes of the regional agencies which New Zealand supports through the untagged components of its country contributions.

The list of in-scope countries was therefore:

- Cook Islands
- Solomon Islands
- Kiribati
- Samoa, and
- Fiji.

We also visited New Caledonia, in order to talk to staff at the SPC.

1.3 Method

We employed an Impact Assessment approach to this evaluation, guided by specific analytical frameworks for analysing the environmental, social, economic, financial and gender dimensions of the evaluation. This involved desk-based review of sector programme documentation provided by MFAT (including previous Activity-level evaluations) and of literature, collection and analysis of data (both desk-based and in-country), and semi-structured interviews.

In total, we interviewed 143 people, primarily in the Cook Islands, Solomon Islands, Kiribati, Samoa, Fiji, New Caledonia and New Zealand. We spoke to people from a range of organisations including:

- Pacific Island Country (PIC) government staff
- FFA
- SPC
- New Zealand industry
- Non-government organisations in New Zealand and in-country, and
- New Zealand government agencies (including MFAT and the Ministry for Primary Industries, as well as New Zealand Posts and High Commission staff).

We also interviewed direct beneficiaries of New Zealand's support, including clam growers in Solomon Islands.

The details of our methodology are set out in Appendix 1 .

1.4 Structure of this report

This report is structured as follows.

- Section 2 provides overall contextual information about Pacific fisheries, to help locate the sector programme and its Activities within the broader regional context and explain the role of the regional agencies.
- Section 3 provides a description of the sector programme's Activities.
- Our findings on the support for the regional agencies are presented in Section 4, and on the IS programmes in section 5.

- Findings in relation to economic development assistance are set out in section 6, and section 7 discusses our overarching findings in relation to the sector programme.
- Section 8 summarises these findings against the DAC criteria and section 9 presents our analysis of these findings, and
- Our recommendations are presented in section 10.

1.5 Challenges and limitations

Our first task in this project was understanding what Activities have been funded over the evaluation period, what they cost, and what previous evaluations have concluded that they achieved. This took a significant (and unexpected) amount of time, and our review of Activity documentation needed to be supplemented with interviews and requests for data and information to help us build this picture, which we suspect may still be incomplete or inadequate in places.

We found it surprisingly difficult to establish complete and consistent costings over time. We discovered that previous evaluations have struggled to assess the impact of Activities, hampered by a lack of ex ante baseline analysis and specific measures that relate the Activity to the desired objectives, and a dearth of quantitative data collection and analysis over time.

This was made all the more difficult by a lack of adequate documentation. While voluminous, the historic Activity documentation often does not seem to capture key decisions that are essential to understanding what has been funded and why – fundamental information one would expect to see from the application of standard project cycle management disciplines.

We considered this a finding in itself; something we discuss in more detail in our analysis and reflect in our recommendations.

2. Establishing the strategic context

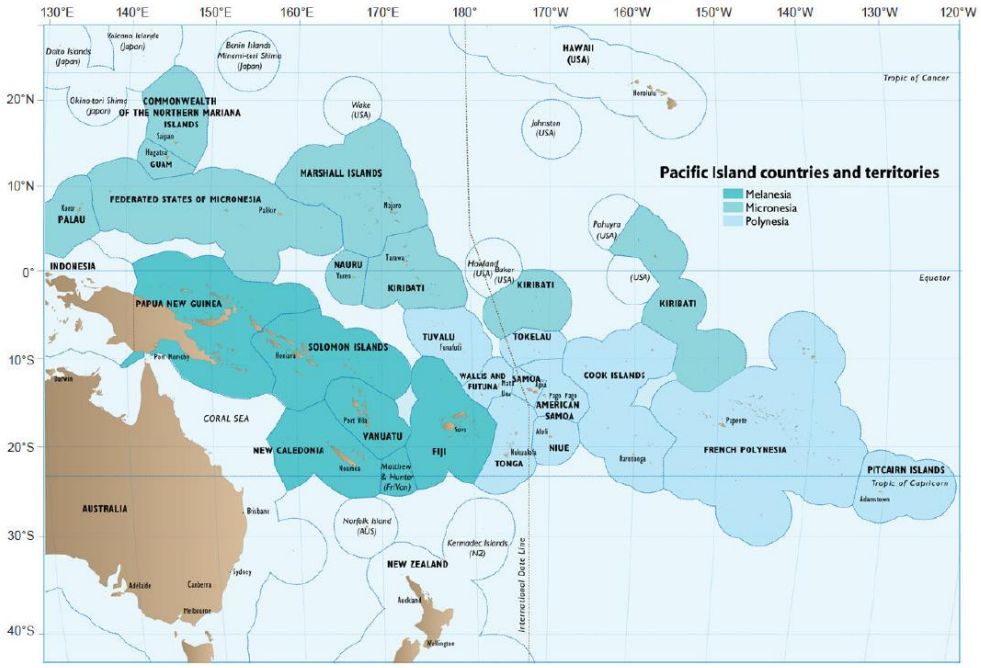
2.1 Introduction

This section provides some overall contextual information about Pacific fisheries, including the nature and status of the resource, and the regional management arrangements. It is intended to help locate the sector programme and its Activities within the broader regional context, and explain the role of the regional agencies (support for whom has dominated New Zealand's funding). This information has been constructed from our review of literature and sector programme documentation, our data collection and the interviews.

2.2 The Pacific Islands region

The Pacific Islands region comprises fourteen independent countries and eight territories located in the western and central Pacific Ocean. The following map shows these countries and territories, and their 200-mile Exclusive Economic Zones (EEZs).

Figure 1 The Pacific Islands region



Source: SPC.

2.3 The fisheries resource

Fisheries are an important source of revenue, food and employment for Pacific Island countries (PICs). Pacific fisheries are also globally significant, with the western and central Pacific purse seine[2] fishery representing the largest tuna fishery in the world. The bulk of the purse seine catch – approximately 1.2 million tonnes per year – is taken from EEZs of Parties to the Nauru Agreement (PNA) member countries (refer box story, below).

Fisheries are a vital resource for Pacific Island countries – providing revenue, food and employment

The tuna sector has been identified as one of the key drivers of growth in the Pacific, with catch from FFA members' waters having an estimated landed value of USD2.8b per annum. Approximately 11% of this value contributes to the GDP of PICSs.[3]

Pacific fisheries comprise oceanic fisheries, coastal fisheries (inshore and reef) and aquaculture. Aquaculture is a small but growing sector, including species such as black pearls, seaweed and prawns. Coastal fisheries are an important source of nutrition; and commercially-traded species include bêche-de-mer (sea cucumber), aquarium fish and live reef fish. The oceanic fisheries comprise four main stocks of tuna,[4] which dominate catch revenues.

Tuna is a highly migratory species, straddling both high seas and EEZs, including that of New Zealand. The migratory nature of the species poses particular issues for the management and governance of Pacific fisheries, as management and development in one country can affect stocks in another. By-catch in the purse seine and longline tuna fisheries includes sharks, turtles and sea birds (some of which are endangered).

On the 2010 figures from the FFA:

- Skipjack made up 50% of the total Western and Central Pacific Fisheries Commission (WCPFC) catch by value, with yellowfin at 28%, bigeye 15% and albacore 7%.
- Purse seine vessels (primarily targeting skipjack) caught 55% of the tuna by value, longliners 33% and other gear types (trolling, pole-and-line) the remaining 12%.
- A bit more than half of all tuna caught in the WCPFC area by value is caught in the EEZs of FFA countries. A quarter is caught in the EEZs of non-member nations (particularly Indonesia, the Philippines and Japan). The remaining 22% is caught on the high seas.
- Within FFA members' waters, Papua New Guinea (PNG) accounts for 42% by value of the tuna caught. The only other significant countries are Kiribati (16%), Solomon Islands (15%), the Federated States of Micronesia (FSM) (10%), and Nauru (6%). The other 12 members of the FFA share the remaining 11% of catch.

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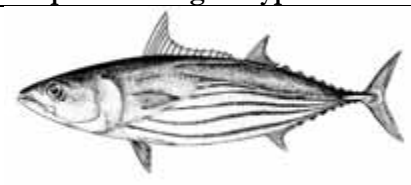
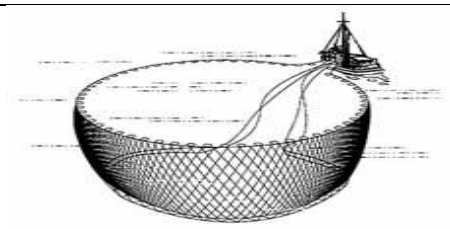
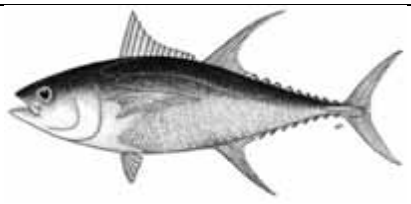
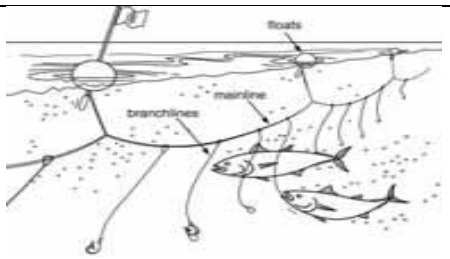
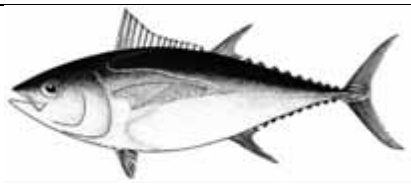
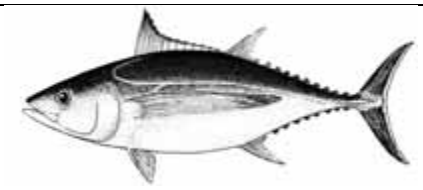
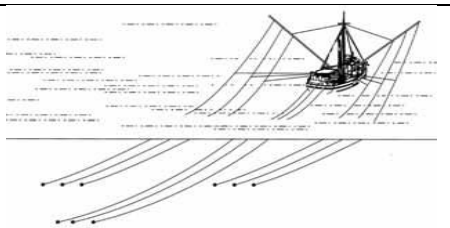
2 Purse seine refers to the type of gear used. Other main gear types for industrial tuna fishing are longline, pole-and-line and trolling.

3 New Zealand Aid Programme (2012) *Sector priorities 2012-2015* (MFAT: Wellington, New Zealand), p.10.

4 Bigeye, yellowfin, skipjack and albacore.

Most tuna fishing is undertaken by distant water fishing nations (DWFNs) using either purse seine or longline vessels. The nature of the DWFN fleet has been changing over time – with newer participants such as China, Taiwan and the European Union (EU) investing in larger vessels and more sophisticated and efficient catch methods (some with the benefit of heavy government subsidies). Access fees can constitute an important source of PIC government revenue.

Figure 2 Tuna species and gear types

Skipjack		**Purse seine** (skipjack and yellowfin)	
Yellowfin		**Longline** (yellowfin, bigeye, albacore)	
Bigeye		**Pole-and-line** (skipjack and yellowfin)	
Albacore		**Trolling** (albacore)	

Source: Robert Gillett (2011) *Fisheries of the Pacific Islands: regional and national information*. RAP Publication 2011/03 (Food and Agriculture Organization of the United Nations: Bangkok, Thailand), pp. 24 and 27.

2.4 Fisheries management context

2.4.1 Regional organisations are key

There are two key regional organisations active in the Pacific fisheries sector – FFA and SPC.

The Forum Fisheries Agency

The FFA was established in 1979, under the Convention of the South Pacific Forum Fisheries Agency, to facilitate regional cooperation for the sustainable management of tuna fisheries within member countries' EEZs. With a Secretariat based in Honiara, its 17 Pacific Island members are Australia, Cook Islands, FSM, Fiji, Kiribati, Marshall Islands, Nauru, New Zealand, Niue, Palau, PNG, Samoa, Solomon Islands, Tokelau, Tonga, Tuvalu and Vanuatu. Its governing body is the Forum Fisheries Committee (FFC).

FFA provides support and advice in relation to oceanic fisheries policy, management, development and compliance

FFA provides expertise, technical assistance and other services to its members who make sovereign decisions about their tuna resources and participate in regional decision making on tuna management through agencies such as the WCPFC.[5] Historically, its focus has been on fisheries management activities, though its involvement in development work has increased since around 2009.

Secretariat of the Pacific Community

The SPC was established in 1947 under the Canberra Agreement by the six 'participating governments' that then administered territories in the Pacific: Australia, France, New Zealand, the Netherlands, the United Kingdom and the United States (US). It now has 26 member countries including the 22 Pacific Island countries and territories and four of the original founding countries – the US, France, Australia and New Zealand. The Conference of the Pacific Community, which is held every two years, is the governing body of SPC. SPC headquarters are located in Noumea, with regional offices in Suva and FSM, and a country office in Honiara.

SPC's fisheries activities relate to oceanic and coastal fisheries science, policy, management development and compliance

SPC works across a number of areas covering public health, geoscience, agriculture, forestry, water resources, disaster management, fisheries, education, statistics, transport, energy, ICT, media, human rights, gender, youth and culture to help Pacific Island people achieve sustainable development.

SPC's Fisheries, Aquaculture and Marine Division (FAME) focuses on providing technical assistance and training, as well as technical services to support regional fisheries management. FAME also hosts the Coral Reef Initiatives for the Pacific (CRISP) programme.

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5 http://www.ffa.int/about Accessed 6/1/13.

The key distinction between the roles of SPC and the FFA is two-fold:

1. SPC provides services and advice relating to oceanic (tuna) fisheries science, while the FFA focuses on oceanic fisheries policy, management, development and compliance.

2. SPC provides coastal and aquaculture science, policy, management development and compliance services and advice; the FFA provides no advice or service in relation to coastal fisheries or aquaculture.

2.4.2 The Pacific Plan

The Pacific Plan was endorsed by Pacific Island Leaders in 2005 and is the high-level strategy for regional integration and coordination in the Pacific. Implementation of the Plan is guided by five themes and related priorities linked to the Pacific Plan pillars. These were endorsed by Leaders at their meeting in Cairns in August 2009 and cover a three-year period from 2009 to 2012. Fisheries features as a regional priority, with initiatives aimed at maximising sustainable returns from fisheries by the development of an ecosystem-based fishery management planning framework and encouragement of effective fisheries development. The Plan is currently under review.[6]

2.4.3 Oceanic fisheries

Management of the oceanic fishery (tuna) occurs on regional, sub-regional and national levels

Management of the oceanic fisheries resources occurs on regional, sub-regional and national levels. There are linkages between the different levels of management. For example, the WCPFC rules require that compatible conservation and management measures should apply in the high seas and in national EEZs, 'in order to ensure conservation and management of highly migratory fish stocks in their entirety'.[7]

Regional level: Western and Central Pacific Fisheries Commission

The WCPFC was established in 2004 by the Convention for the Conservation and Management of Highly Migratory Fish Stocks in the Western and Central Pacific Ocean. The objective of the Convention is to ensure, through sustainable management, the long-term conservation of highly migratory fish stock in the WCPO in accordance with the 1982 United Nations Convention of the Law of the Sea and the 1995 United Nations Fish Stocks

6 Pacific Islands Forum Secretariat website http://www.forumsec.org/pages.cfm/about-us/the-pacific-plan/. accessed 26/5/13.

7 Convention on the Conservation and Management of Highly Migratory Fish Stocks in the Western and Central Pacific Ocean; Article 8: Compatibility of conservation and management measures.

Agreement[8]. There are currently 25 member countries, including New Zealand and other DWFNs that have vessels fishing in the areas such as China, Korea, the US and Japan.[9]

The WCPFC adopts 'resolutions' which are non-binding statements and 'conservation and management measures' which are binding on members (Gillett, 2011, p.35).

Pacific Islands region: FFA and sub-regional arrangements

There are a number of sub-regional tuna management arrangements in place

There are a number of tuna management arrangements and agreements in place for FFA member countries, including minimum terms and conditions for foreign fishing vessel access:

- The Nauru Agreement on terms and conditions for tuna purse seine fishing licences in the region. The parties are FSM, Kiribati, Marshall Islands, Nauru, Palau, Papua New Guinea, Solomon Islands and Tuvalu (administered by the PNA Office).
- The Palau Arrangement, which sets out the Vessel Day Scheme (VDS) used to manage tuna in Nauru Agreement parties waters. The parties are FSM, Kiribati, Marshall Islands, Nauru, Palau, PNG, Solomon Islands and Tuvalu. Tokelau also participates in the VDS (administered by the PNA Office).
- The Federated States of Micronesia Regional Access Arrangement 1995, which is a mechanism for domestic vessels of the PNA to access the fishing resources of other parties. Signatories are FSM, Marshall Islands, Nauru, Palau, PNG and Solomon Islands (administered by the PNA Office).
- The Niue Treaty on Cooperation in Fisheries Surveillance and Law Enforcement in the South Pacific Region. All FFA members are party to this Treaty (administered by FFA).

Parties to the Nauru Agreement (PNA) – A key role in regional tuna management

The eight member countries of FSM, Kiribati, Marshall Islands, Nauru, Palau, PNG, Solomon Islands and Tuvalu) are signatories to the Nauru Agreement Concerning Cooperation in the Management of Fisheries of Common Interest signed in 1982. At that time, the PNA members had already recognised the need for management control of the purse seine fishery in their waters. To implement this, seven of the PNA members adopted the Palau Arrangement for the Management of the Western Pacific Purse Seine Fishery. The Palau Arrangement focussed on limiting the total number of purse seine vessels operating in the fishery. By 1990 a provisional limit had been set of 164 purse seine vessels; increased to 205 in 1993. Throughout the 1990s and through to the early 2000s this limit was never exceeded.

8 The United National Fish Stocks Agreement requires all Regional Fisheries Management Organisations to take an ecosystems approach to fisheries management (i.e. ensuring that fish stocks are managed holistically, as part of the wider ecosystem, and taking into account all the ecological, social and economic consequences of fishing).

9 Sources: WCPFC website http://www.wcpfc.int/about-wcpfc , accessed 26.5.13; Robert Gillett (2011) *Fisheries of the Pacific Islands: regional and national information* (FAO: Bangkok, Thailand).

By 2000 the PNA members were looking to amend the structure of their management arrangements to allow greater flexibility (including the ability to assign preference to domestic and locally-based vessels) and recognise the need for stronger measures to support stock sustainability. A consultancy review completed in 2000 recommended that the Parties introduce a sub-regional limit on the number of purse seine days; the VDS. The details of the VDS were developed by the PNA members with technical assistance from the FFA. Under the VDS, PNA members agree on a minimum price and a limited number of fishing days for each year, based on scientific advice about the status of tuna stocks.

The tuna caught in the EEZs of the eight nations in the PNA make up 95% of the tuna caught in FFA waters. Since its inception in 2006, the VDS has been instrumental in increasing licence revenues to PNA members. The PNA has also been at the forefront of fisheries management to promote both sustainability of the resource and increased returns to its members through a range of initiatives including:

- Regional fishing register and Vessel Monitoring System (VMS)
- Supplementary Minimum Terms and Conditions for fishing in PNA waters
- Preventing fishing in the High Seas 'pockets' as a condition on licences
- Rules requiring 100% observer coverage
- MSC certification for the PNA free school skipjack fishery – with associated branding and marketing through Pacifical (a global marketing company set up by PNA countries).

The FFA provided secretariat support for Nauru Agreement and associated sub-regional instruments until 2010 when a separate PNA Office was established in Majuro in the Marshall Islands. The PNA Office continues to work in close collaboration with FFA and other regional and sub-regional bodies involved in fisheries management across the region.[10]

People we interviewed viewed the PNA as a highly effective organisation, and considered its work, in particular the VDS, as one of the most significant contributors to the growth in PIC government revenues from licence fees. It was also credited with helping strengthen the PIC voice in regional negotiations. One interviewee went so far as to say that '*the PNA is the best development initiative to come along for the last 30 years*'.

National-level: Tuna Management Plans

Tuna Management Plans set out national government objectives for the management of their fishery and the interventions used to give effect to these.

Monitoring, control and surveillance

One of the functions of the WCPFC is to 'establish appropriate cooperative mechanisms for effective monitoring, control, surveillance and enforcement'. The WCPFC's Technical and Compliance Committee provides advice to the WCPFC on a range of MCS measures including: the WCPFC's Vessel Monitoring System; listing of illegal, unreported and unregulated (IUU) vessels, regional observer programmes and compliance monitoring.

[10] References: S. Dunn et al (2006) *The Palau Arrangement for the management of the western Pacific purse seine fishery – management scheme (Vessel Day Scheme)*; PNA Office website, *PNA Factsheet*.

Many of these tools use or build on FFA systems and processes (such as vessel monitoring systems, observer programmes, vessel registers).

PICs are responsible for compliance and monitoring within their EEZs, and are supported by FFA in the management of their tuna resources

Coastal states have responsibility for compliance and monitoring within their EEZs. Flag states (usually DWFNs) are responsible for ensuring that their vessels are authorised by coastal states to fish in coastal state EEZs. Flag states are responsible for controlling their vessels in the high seas, according to measures agreed by WCPFC. The regional observer programme is co-ordinated by the WCPFC (using FFA and SPC sub-regional programmes and FFA national programmes), while the requirement to ensure observers are on board rests with member states – for coastal states this is generally done through licence conditions.

In summary:

- PICs coastal states agree on management arrangements across the fishery, and/or for their individual EEZs
- The WCPFC issues conservation and management measures that are binding on member countries (coastal states and DWFNs) across the Convention Area and are compatible between the high seas and EEZs
- PICs are responsible for MCS within their EEZs (with support from flag states when required)
- DWFNs are responsible for MCS on the high seas, and
- FFA provides advice and services to PICs and sub-regional arrangements on the management, development, control and surveillance of their tuna resource. SPC provides scientific advice and services to PICs, the WCPFC and the PNA.

2.4.4 Coastal fisheries

Gillett (2011) explains that:

> *Coastal fishing is of fundamental importance in the Pacific Islands. Much of the region's nutrition, welfare, culture, employment, and recreation are based on the living resources in the zone between the shoreline and the outer reefs. The continuation of current lifestyles, the opportunities for future development and food security are all highly dependent on coastal fisheries resources. …. Unlike the tuna fishery, virtually all of the coastal catch is taken by Pacific Islanders themselves, with very little access by foreign fishing vessels* (Gillett 2011, p.4).

Coastal fisheries contribute in the following ways to PIC economies and lifestyles:

- Small scale ('artisinal') fishing for subsistence (consumption) and cash income when sold for local consumption (a significant contributor to local food security and cash generation needs)
- Export income when sold to international markets – key exports include live aquarium fish and ornamentals (such as corals), bêche-de-mer, trochus, giant clams and pearls, and

- Revenue from tourism – the quality of the coastal marine environment is the mainstay of tourism in many PICs.

PICs are therefore highly dependent on their coastal fisheries in a number of ways. As shown below in Table 2, estimated per capita fish consumption in some countries is much higher than the World Health Organisation recommended 35kg per year for Pacific people (as high as 75kg for Kiribati).

This dependence is also a source of vulnerability. The economies of countries such as Fiji and the Cook Islands, which rely heavily on tourism, are particularly vulnerable to pollution and over-fishing. As discussed later in section 5.3, the water quality in Rarotonga's Takitumu lagoon is so degraded it poses risks to marine life and human health, and therefore the country's significant tourism industry.

Management of coastal fishery resources makes use of the following systems:

- Traditional management, typically through restrictions on fishing by those outside the local community, and controls on fishing by community members
- Central government management, and
- The use of marine protected areas and similar arrangements which establish an area that is closed to fishing or subject to reduced fishing (Gillett, 2011, p.18).

Coastal fisheries are of fundamental importance to PICs, though data are 'largely guesswork'

Despite its fundamental importance, statistics on coastal fisheries are generally not very good. Gillett (2011, p. 3) notes that 'the estimation of production from coastal fisheries … in about half of the Pacific Island countries is largely guesswork'. Estimates of the volume of coastal catch are provided in Figure 4.

2.5 Varying country contexts and capacity

There is wide divergence between PICs in the value of fish in their EEZs, and in terms of their capability to manage their own fisheries. By way of example, we present a selection of descriptive statistics for our in-scope countries, focusing on fisheries management and development. These illustrate that:

- The in-scope countries range from micro-states (Cooks Islands, with 16,000 people) to reasonably-sized countries (Fiji, with a population of 852,000). This affects their domestic capacity to manage their resources and absorb donor funding.
- Some have enormous EEZs, particularly in relation to the size of their population, such as Kiribati with its 3,442 km^2 non-contiguous EEZ. This has implications for their degree of reliance on regional services, particularly for surveillance activities, and their interest in courting DFWNs.
- They range in wealth, and include some extremely poor countries such as Solomon Islands with annual GNI per capita of just USD1,110.
- They vary in terms of the importance of tuna to their local economies – which is crucial in Kiribati and Solomon Islands, moderately important in Samoa and much less so in Cook Islands (see Table 2 and the following two charts).

Table 1 Descriptive statistics

Figures are for most recent year available

Measure	Cook Islands	Fiji	Kiribati	Samoa	Solomon Islands
Population (000)	16	852	103	184	553
People/km² land	66	47	127	63	18
Length of coastline (km)	120	1,129	1,143	403	5,313
EEZ area	1,997	1,283	3,442	128	1,589
People/ km² EEZ	0.01	0.66	0.03	1.44	0.35
GNI/capita (USD)	N/A	3,680	2,110	3,190	1,110
Aid as % GNI	N/A	2%	14%	16%	47%

Source: Population and land area data from SPC (2011), length of coastline and size of EEZ from Wikipedia, GNI per capita from OECD (2011), ODA as % GNI from World Bank (average for years 2006-2010). Some figures cross-checked against CIA World Factbook, Sapere calculations. Figures for the Cook Islands do not appear in the World Bank data we used.

Table 2 A selection of comparative statistics

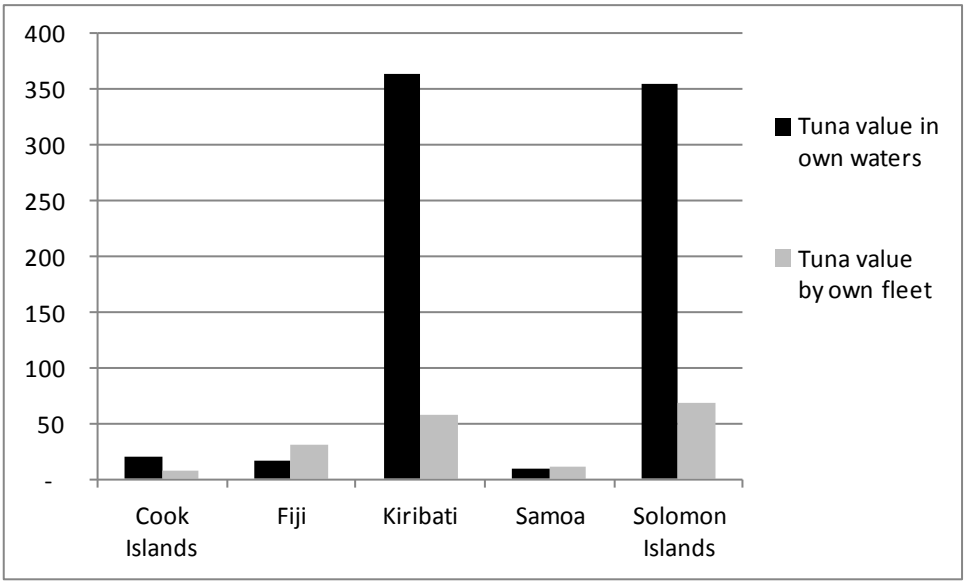
Focused on fisheries management and development, for our in-scope countries. Figures are for most recent year available

Measure	Cook Islands	Fiji	Kiribati	Samoa	Solomon Islands
Access fees as % government revenue	0.40%	0.03%	42.0%	0.15%	4.4%
Estimated tuna employment	58	1,148	656	354	1,067
Contribution of fishing to GDP	6.3%	1.70%	53.4%	6.2%	6.8%
Per capita fish consumption (kg)	57	37	75	51	34

Source: Gillett (2011), World Bank (2012), SPC, FFA *Economic indicators update* 2011.

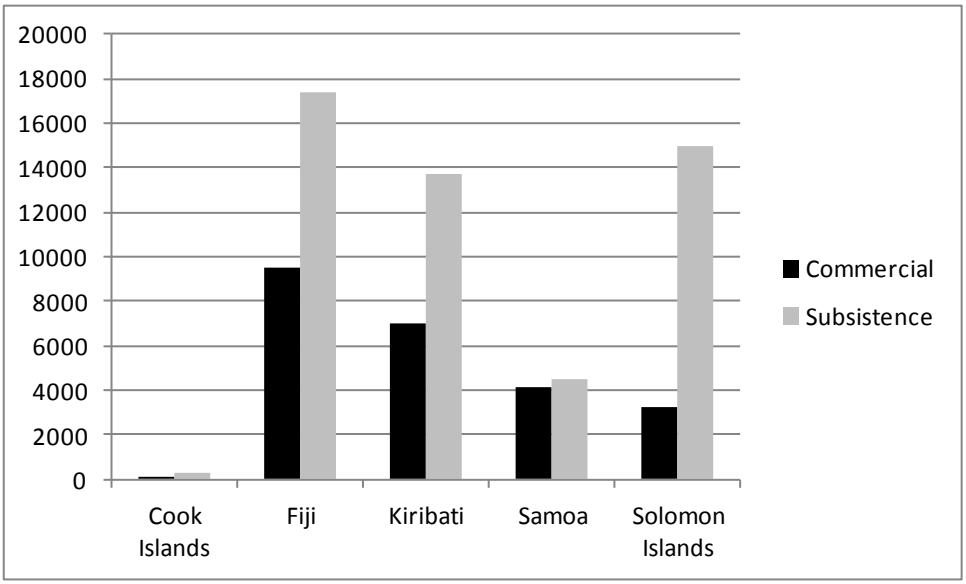
This information has informed our analysis and the formulation of our recommendations, including our advice on how to design an investment portfolio (see in particular 9.3.4).

Figure 3 Value of tuna catch – own waters and by domestic vessels
USD millions



Source: FFA (2011) WCPFC area catch value estimates (as at August 2011)
http://www.ffa.int/node/425#attachments

Figure 4 Catch from coastal fisheries
Volume (tonnes)



Source: Gillett (2011)

3. The sector programme and its costs

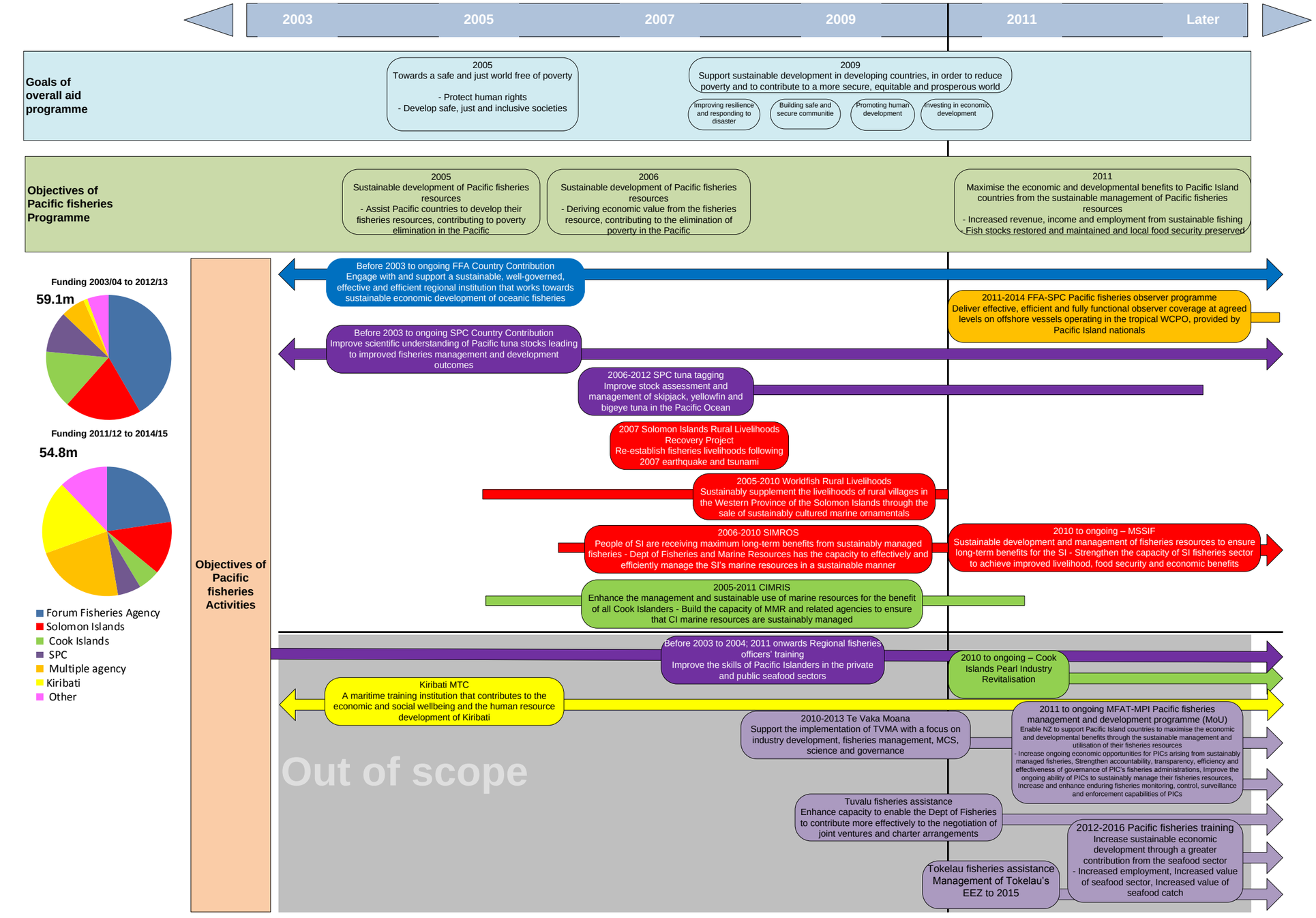
3.1 Building an overview of the sector programme

As part of our initial scoping work, we sought to assemble a description of the sector programme's Activities. We had to construct this from a variety of sources, including ten years' worth of sector programme documentation, financial data and interviews. The total sector programme spending took us some time to construct and we had to reconcile figures from different sources. This process altogether took a substantial amount of time, and illustrated to us that the sector programme has not been managed as a co-ordinated programme in any traditional sense.

Details on the individual Activities are incorporated into our findings in the following sections of the report. Figure 5 (below) sets out the stated objectives of these Activities and the overall sector programme over time, and indicates the time profile of each Activity (i.e. when it began and ended). Each Activity is colour coded to match its funding allocation as shown in the two pie charts. Activities in scope of our evaluation sit above the grey area.[11] It shows that the strategic goals for both the sector programme, and the overall New Zealand aid programme have evolved over time, something which is discussed further in section 7.1.

[11] Please note that this diagram is designed to be printed and read in colour and in A3 format.

Figure 5 Stated objectives of the Pacific fisheries sector programme and its Activities



3.2 Total spend of $60m

Total spend has been just under $60 million in the period from 2003/04 to 2012/13.[12] Fisheries aid makes up only a small proportion of total New Zealand aid, but is forecast to expand sharply: it was $10m or 2% of total ODA spend in 2011/12 but is forecast to average $17m in 2012/13 and the following two.

The focus of New Zealand's Pacific fisheries aid has been support for the FFA (42% of total spend) , with other significant spending in the Solomon Islands (20%) and the Cook Islands (15%) plus the SPC tuna tagging programme (11%), and the FFA/SPC observer programme (6% – listed as 'Multiple agency' in the table below).

Support for the regional agencies has accounted for over half of total expenditure

Table 3: Funded countries/institutions 2003/04-2012/13

Country/Programme	Ten year funding ($)	Per cent	Cumulative
FFA	24,636,473	42%	42%
Solomon Islands	11,723,895	20%	61%
Cook Islands	8,859,261	15%	76%
SPC	6,314,493	11%	87%
Multiple agency	3,690,966	6%	93%
Other	1,714,703	3%	96%
Te Vaka Moana	1,145,486	2%	98%
Kiribati (fisheries only)	619,340	1%	99%
MOU with MPI[13]	418,939	1%	100%
Grand Total	59,123,556		

Source: MFAT financial data, Sapere analysis

The figures for SPC relate to New Zealand's support for its fisheries-related work programme. New Zealand's membership fees to the SPC are not included here, because they are not specifically for fisheries-related activities.

Note also that most historic funding for the Marine Training Centre in Kiribati was not fisheries-related (the MTC was primarily training people for work on cargo ships), and is therefore not included here. Funding amounts to a significant $7.5m in the period from 2003

[12] We report expenditure up to 2012/13 (i.e. beyond the evaluation period) so that there is no gap (no funds excluded) between historic and future expenditure as presented in this report.

[13] In 2010 a Memorandum of Understanding between the then Ministry of Fisheries (now MPI) and MFAT was developed with the aim of enabling MPI to deliver on key areas under the Te Vaka Moana work programme, the PNA Arrangement programme and bilateral initiatives.

to 2010, consisting of the costs of constructing a new building for the MTC ($4.5m), training for mariners ($0.9m) and the extension of the institutional development programme for the MTC that began in 2011 ($2.2m).

3.3 Spending by Activity

The table below shows the allocation of spending by Activity for the eight Activities accounting for more than $2 million in spending each (or 4% of total spending).

The main funded Activities have been support for the regional agencies' work programmes and institutional strengthening in the Cook Islands and Solomon Islands

Funding support for the FFA programme (41%), plus institutional strengthening in the Cook Islands through CIMRIS (11%), and the SPC tuna tagging programme (10%) account for 62% of the spending in the last ten years.[14]

Table 4: Main funded Activities 2003/04 - 2012/13

Activity	Country/institution	Ten year funding ($)	Per cent
Programme 2003-2012	FFA	24,064,952	41%
CIMRIS	Cook Islands	6,374,761	11%
Pacific Tuna Tagging	SPC	5,625,293	10%
FFA/SPC Observer Programme	Multiple agency	3,690,261	6%
SIMROS	Solomon Islands	3,786,582	6%
MSSIF	Solomon Islands	3,176,175	5%
Building for MFMR	Solomon Islands	3,018,204	5%
Pearl Industry Revitalisation	Cook Islands	2,484,500	4%
Other		6,902,828	12%
Grand Total		59,123,556	100%

Source: MFAT financial data, Sapere analysis

[14] The difference between the 42% of total spending for the FFA in the first table, and the 41% figure here is a number of very small specific programmes that were separated financially in the accounts.

3.4 Sector programme management costs at least $7.3m

The figures above are the direct financial costs tagged within the MFAT financial system as relating to fisheries. There is no standard accounting for programme overhead costs in MFAT. We have therefore made a simple effort to get a ballpark estimate of overhead costs by asking people involved in the sector programme from MFAT to tell us what proportion of their time they devoted to the fisheries sector programme in a normal week.

We received 14 responses, which together indicated a total of 17.5 days a week of effort spent on fisheries across MFAT. Only one person amongst those 14 works full-time on the programme, with 11 others spending 20% or less of their time on fisheries-related work.

We have therefore assumed the programme management effort at 25% of the time of those 14 people, or 3.5 FTEs. Based on figures provided by MFAT, we estimate an average FTE cost of $208k for the mix of Wellington and Post staff working on fisheries issues. Based on this, total programme management costs could be $729k a year. Over ten years, this is around $7.3m or around 13% of the total sector programme spend. On these estimates, programme management is an important part of the fisheries sector programme, consuming more than the total spend on institutional strengthening (IS) in the Cook Islands.

The costs of running the sector programme have not been tracked, but are estimated to be at least $7.3m or over 13% of total spend

Note that this is almost certainly an under-estimate because it excludes any agency other than MFAT (e.g. MPI), does not include travel expenses, and we did not get responses from all people that we know to be involved to some extent.

We also asked survey respondents to nominate how their effort on fisheries compared with previous times. Generally speaking, the level of effort required seems to be fairly constant over time, although effort levels for individuals have varied, and fluctuate in intensity over the course of the year.

3.5 Overview of Activities

3.5.1 FFA work programme support ($24.6m)

New Zealand has contributed a combination of membership fees and programme funding to the FFA, as well as project-based funding for the regional observer training programme (discussed below). New Zealand actively contributes to the governance of FFA, is represented on FFC Audit Committee and participates in FFA governing council meetings.

3.5.2 Support for SPC's FAME work programme ($6.3m)

Being one of the founding countries, New Zealand has a long-standing relationship with SPC. As with FFA, support has comprised country contributions as well as project-based funding for the tuna tagging programme.

3.5.3 Pacific fisheries observer programme ($3.7m)

New Zealand's funding commitment for the joint FFA/SPC Pacific fisheries observer programme comprises $4.8m over three years and is scheduled to end in mid-2014. As at 2012/13, $3.7m of this funding has been spent.

3.5.4 Solomon Islands ($11.7m)

New Zealand-funded fisheries projects in Solomon Islands have been running since at least 2005, and comprise the following.

- **Institutional strengthening – SIMROS and MSSIF**. The main focus has been on institutional strengthening of the Ministry of Fisheries and Marine Resources (MFMR), involving two significant multi-year programmes (SIMROS and MSSIF) and including a new building for the Ministry.
- **WorldFish Rural Livelihood Creation**. WorldFish was funded for $1.4m of effort over the five years from 2006 to 2010 to establish an ornamental marine product trade (mostly in clams and coral) for folks living in remote areas. While this project accounts for a modest proportion of total spend, we conducted a specific investigation of it in the field, as it is the only Activity to have specific economic development aims.
- **Rural livelihoods recovery**. There was also a shorter-term programme that funded nearly a thousand replacement canoes for people in Western Province who lost their livelihoods after the 2007 Tsunami, as well as some work to dig channels in reefs. As total spending was a modest $376k, this did not feature in our interviews in-country as we did not consider it further in our evaluation.

3.5.5 Cook Islands ($6.4m)

New Zealand funded an IS programme (CIMRIS) for the Cook Islands Ministry of Marine Resources (MMR) from 2006 until 2010. There were six sets of activities pursued including building management capability in the MMR and strengthening existing institutions (chiefly the Ministry of Health and the National Environment Service) to take actions to improve lagoon water quality.

3.6 Indicative future funding

The following table sets out MFAT's indicative allocation[15] of funding for the next three to five years. Funding for the FFA, a substantial increase in funding for Kiribati, and the continuation of the MSSIF programme together account for over half the total allocation.

Table 5: Indicative and possible future funding to Pacific fisheries Activities

Programme	Timeframe (years)	Funding ($m)	Per cent
Kiribati fisheries assistance	3	10.0	18%
FFA work programme support	3	9.9	18%
FFA investment and export facilitation	3	2.5	5%
MSSIF	3	7.3	14%
Pacific fisheries training programme	5	7.4	13%
FFA/SPC Regional observer training and management	3	4.8	9%
Te Vaka Moana development programme	3	3.4	6%
Cook Islands pearl industry revitalisation	3	3.0	5%
MPI Pacific fisheries management and development programme	3	2.1	4%
Tuvalu fisheries department support	3	1.2	2%
SPC regional services support	1	0.7	1%
SPC Science	3	2.5	5%
Tokelau fisheries development	tbd	tbd	
Grand Total		54.8	100%

Source: IDG Fisheries sector strategy 2012/2015 (draft), MFAT communications, Sapere analysis

[15] This information has been provided by MFAT and it not intended to represent the views of the evaluation team.

4. Support for regional agencies

4.1 Introductory context

This section presents our findings in relation to New Zealand's support for the regional agencies.

New Zealand supports the regional agencies as both a member country and a donor

New Zealand supports FFA and SPC as both a member country and donor. The stated objectives of the support for FFA are to 'engage with and support a sustainable, well-governed, effective and efficient regional institution that works towards sustainable economic development of oceanic fisheries'[16]; and for SPC are to 'improve scientific understanding of Pacific tuna stocks leading to improved fisheries management and development outcomes'.[17]

In terms of New Zealand's contribution to these agencies, our aim was not to evaluate their performance or the governance of these agencies, but to examine the impact of New Zealand's contribution to their work. New Zealand's contributions for these regional agencies comprise membership fees, programme funding and project-based (or extra-budgetary) funding for specific initiatives (such as the tuna tagging and observer programmes). With respect to the programme funding, we explored the extent to which any development impacts could be attributable to their work.

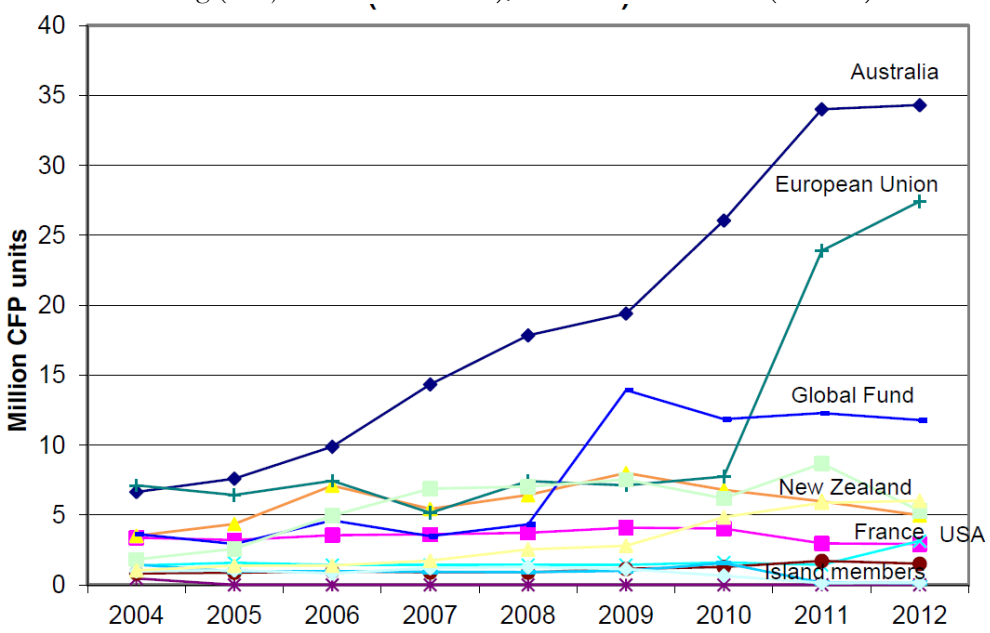
By way of context, we note that New Zealand's contribution to the work of SPC is relatively small, though its contribution to the work of FAME is proportionately higher due to 'soft tagging', to reflect New Zealand's preferences for its fisheries work. New Zealand is a relatively more significant contributor to FFA (though we have been unable to construct a commensurate chart from the publicly available information).

16 *Partnership arrangement between MFAT and the FFA 2012-2015.*

17 *Draft IDG fisheries sector strategy 2012-2015.*

Figure 6 Support for SPC by donor

Total SPC funding (not just fisheries-related), French Pacific francs (millions)



Source: *Independent external review SPC* (June 2012). Figures include New Zealand's total donor contribution to SPC (support for FAME plus membership fee, as well as project-specific funding).

4.2 Agencies' work programmes

FFA's three work programmes comprise:

- Fisheries management – advice and services for the conservation and management of tuna fisheries in coastal waters and high seas (e.g. advice on the WCPFC management measures, US Tuna Treaty negotiations)
- Fisheries development – advice and services to increase returns from tuna fisheries (e.g. advice on fisheries development plans, market intelligence and investment facilitation)
- Fisheries operations – advice and services to address IUU fishing (such as the regional vessel monitoring system and vessel register system, and the regional observer programme).

FFA's work programmes span oceanic fisheries management, development and operations; SPC's fisheries work covers oceanic and coastal fisheries science

This categorisation of programmes came into existence in 2005 (originally, fisheries operations were part of the fisheries management programmes).[18]

FAME delivers two programmes:

- The Oceanic Fisheries Programme – this is the regional centre for tuna fisheries research, fishery monitoring, stock assessment and data management. It was established

[18] FFA *Strategic plan 2005-2020.*

by the 1980 South Pacific Conference (as the Tuna and Billfish Assessment Programme) to continue and expand the work initiated by its predecessor project, the Skipjack Survey and Assessment Programme.

- The Coastal Fisheries Programme – which helps assess, monitor, develop and manage domestic (in-shore) fisheries and aquaculture.

The **Pacific tuna tagging programme** is a joint research project being undertaken by SPC, the PNG National Fisheries Authority, and members and participating non-members of the WCPFC. The project commenced in 2006 and involves the capture, tag and release of large numbers of tuna with numbered plastic dart tags, and the documentation (time, location, fishing method, fish size) of subsequent recaptures of these fish by the various types of fisheries across the region. Information is recorded on the fish's species and size, along with the date and location of the tagging.[19]

Observer programmes involve placing specially trained staff on-board fishing vessels to collect independent data for the purposes of both science (e.g. stock assessments) and regulatory compliance.

4.3 Our approach

For the environmental dimension of our evaluation, we were guided by the Marine Stewardship Council (MSC) certification methodology. This is a well-known and generally respected interpretation of the United Nations' Code of Conduct on Responsible Fisheries.

The MSC methodology covers the elements of the Code across three Principles – stock, ecosystems and management – each with performance indicators. The MSC approach also enables encapsulation of the key elements of good regulatory practice for fisheries management regimes, namely:

Our evaluation of environmental impacts was guided by the Marine Stewardship Council certification methodology

- Well-defined property rights
- Good quality information (including scientific data on stocks and ecosystem impacts, economic data on the value of non-extractive uses, compliance data etc)
- Alignment of incentives to effectively manage the collective action problems associated with a common property resource, and
- Effective compliance monitoring and enforcement.

We sought to assess the status of oceanic and coastal fisheries according to these dimensions, by collecting data and exploring the extent to which impacts could be attributed to the work of the regional agencies through stakeholder interviews.

[19] http://www.spc.int/tagging/en/about-tagging Accessed 5/1/13.

We sought to assess the impacts *attributable to the work of the regional agencies, rather than the detailed* outputs *that are currently monitored*

Because this evaluation is at the sector programme level, we focused on the impacts of New Zealand's funding for the regional agencies, rather than revisiting the detailed outputs that are already set out in the programme documentation. Our questioning of the regional agencies themselves sought to ascertain what they think New Zealand is seeking to achieve from its funding contributions, and what impacts they think have been achieved in member countries as a result of this support. Where impacts were cited, we sought to obtain supporting data, and also to test these with member countries. We also explored whether the structure of New Zealand's support could be made more effective, and their views of New Zealand's engagement with their agency.

We began by reviewing the sector programme documentation provided by MFAT, as well as the recent independent reviews of the two agencies.[20] We spoke to staff in the regional agencies (n=20), recipients of their services in a selection of member countries (n=55) and New Zealand government staff (n=29).

We sought the views of member countries as to the quality, relevance and timeliness of the services and advice they receive from FFA and SPC, and the impacts this support has had in their country. We also asked for their views on New Zealand's objectives in funding these agencies, and the nature of New Zealand's engagement with FFA and SPC.

We also talked with New Zealand government staff, to determine their views on New Zealand's objectives in funding the work of FFA and SPC, the effectiveness of this spending in the context of the sector programme as a whole, and New Zealand's engagement with these agencies.

4.4 Work programmes reflect PIC priorities

The regional agencies have prioritisation processes to determine their annual work plans and allocate programme funding between and within member countries. These combine top-down strategic planning and Statement of Intent processes with bottom up country-level planning which is described in Country Service Level Agreements (FFA) and Joint Country Strategies (SPC).

Interviewees from both the regional agencies and member countries told us that these processes – which involve the regional agencies working with PICs to identify and agree the suite of services they would like to receive – result in national-level work programmes which reflect the priorities of member countries. On the other hand, there were views from both these groups that project-based funding is more likely to reflect donor country priorities and objectives.

Stakeholders consider that FFA's and SPC's country level work programmes reflect PIC priorities

[20] Ian Cartwright, Semisi Fakahau and KVA Consult (2010) *FFA performance review May 2010*; *Independent external review of Secretariat of the Pacific Community June 2012*; *Report of the Expert Reference Group: assessment of SPC's core business and delivery of services to members in the long term* 16-24 January 2012.

We note that PICs appear to vary in their reliance on the expert advice of the FFA and SPC as to what they should do (i.e. their capability to direct priorities), so reflecting PIC objectives in itself does not necessarily lead to better development outcomes. In addition, we note that the regional agencies can provide advice, but responsibility for responding to and implementing this advice rests with PICs.

4.5 Services viewed as efficient and effective

The FFA's services were generally regarded by PIC interviewees as high quality and good value for money, though their responsiveness to individual countries was mixed – due to the multiple levels of priorities they must balance, the sheer number of countries they are serving (which can affect timeliness) and the essentially 'free' nature of the services which poses prioritisation challenges. Scarcity (finite funding) is managed via prioritisation and 'queuing', something most PIC interviewees were relaxed about.

The 2010 FFA performance review encountered almost universal agreement from stakeholders that the FFA Secretariat 'has made a significant contribution towards assisting FFA Members with meeting their commitments under global and regional fisheries conventions and negotiations and in particular the WCPFC' (Cartwright et al, 2010, p.17). This was echoed in our interviews, where FFA was widely acknowledged as assisting members to participate more actively and confidently in regional negotiations. The PNA was also credited by interviewees as a key contributor to the growing strength of the regional voice.

FFA widely acknowledged as assisting members to participate more actively and confidently in regional negotiations

4.6 Case study – the regional observer programme

4.6.1 Background

Over the last 20 years, both SPC and the FFA have helped members develop observer programmes for the region's tuna fisheries. Observer programmes collect data for the purposes of both science (e.g. stock assessments) and regulatory compliance.

Studies underpinning the 2010 Regional Monitoring Control and Surveillance Strategy found that overall implementation of observer programmes was weak. Schemes across the region have failed to meet coverage targets for longline fleets (partly due to the operational characteristics of the vessels, and also resistance from DWFNs – to the placement of observers on their vessels). National observer programmes have also achieved poor coverage, frustrated by a shortage of observers, and data management and institutional weaknesses. In addition, weaknesses in debriefing processes and follow up of observer-reported violations have undermined enforcement of licence conditions.[21]

[21] *Grant funding arrangement between MFAT and FFA* [AID/PAC/5/2/2], March 2011, p.14.

4.6.2 A programme with multiple objectives

Under the WCPFC Conservation and Management Measure 2008–01 (Conservation and Management Measure for Bigeye and Yellowfin Tuna in the Western and Central Pacific Ocean), there must be 100% observer coverage of purse seiners by 1 January 2010, and 5% coverage of longliners by 1 July 2012. Originally the purse seine coverage requirements were to enforce compliance with a ban on the use of fish aggregating devices (FADs) for three months of the year, but the requirement was subsequently extended to full coverage for purse seine vessels.

The observer programme is seeking to meet science, compliance and employment objectives

The new coverage requirements called for a rapid expansion of the existing observer programmes. This in turn presented the need for increased training capacity, as well as the expansion of data management and processing systems. It was estimated that 400 trained observers would be required for purse seiners, and a further 200 for longliners with an on-going annual training requirement of 200 observers to cover natural workforce attrition. A variety of support staff are also required. FFA member countries were keen to realise the employment opportunities presented.

In addition, some observers receive training for participation in scientific research done by the SPC such as collecting scientific samples and tagging tuna.

The joint FFA-SPC funding proposal document reflected these multiple compliance, employment and science objectives:

> *These services will directly support the improved functioning of national and sub-regional observer programmes during this three year period, providing essential scientific data for the fishery and improving compliance. It will also guarantee the ongoing employment of Pacific islanders as observers into the long-term, meeting a strong demand for this kind of job.*

4.6.3 Serious concerns about working conditions

Across the Pacific region, there are currently around 200 active observers, trained by FFA and employed by their national governments. PNG has seven women observers, and Solomon Islands has two,[22] and we understand Kiribati has ten.

Trained debriefers should interview observers when they return to port, check their data and discuss any issues observers may have had on board, such as relations with the crew and payment of relevant salary and allowances. We were told that, to date, there are very few trained debriefers.

Reports of significant safety concerns for observer staff

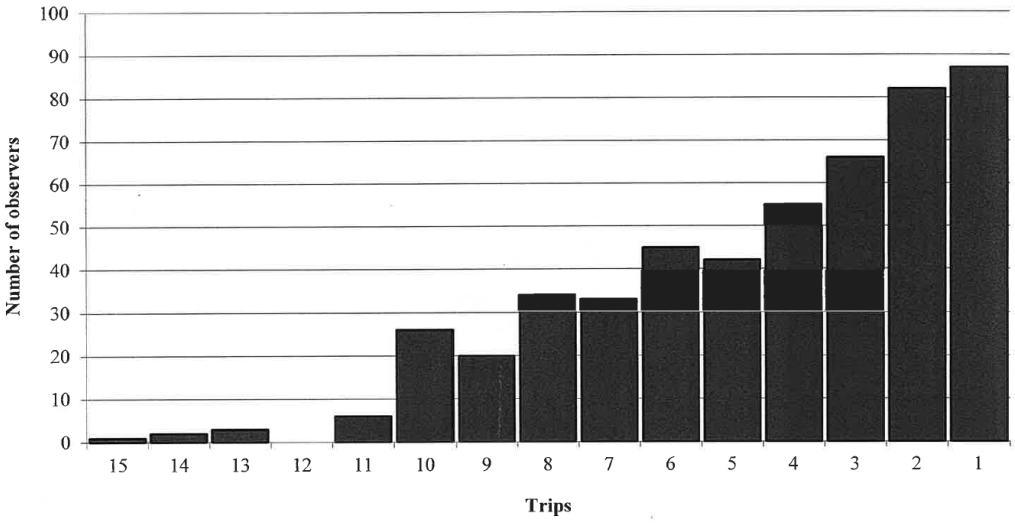
We heard in our interviews that there are some significant human rights and gender issues associated with the working conditions for observers, with reports of violence and unsanitary environments.

[22] FFA 2 minute brief: observer program factsheet. http://www.ffa.int/system/files/2%20MINUTE%20BRIEFS_Observers_regional%20factsheet.pdf.

One male PNG observer was murdered on board and interviewees indicated that conditions for women can be dangerous.

The following chart shows the number of trips that have been made by each observer. While the attrition rate appears steep, it is hard to judge what would constitute an acceptable rate.

Figure 7 Number of trips made per observer



Source: FFA

4.6.4 Compliance enforcement

Observers make notes about the type of fish caught and the methods used, and whether there are any observed breaches to laws and regulations. They have no enforcement powers. Their completed forms are scanned and sent to SPC for manual data entry, then processed and the results provided back to respective PIC governments. Responsibility for the investigation and enforcement of infringements rests with national governments. There are currently significant delays with the current approach to data management, and electronic systems are being investigated.

Improvements to compliance data management being investigated

4.6.5 On-going management requirements

The observer programme requires on-going training efforts (to account for attrition) and regional logistics co-ordination. Several interviewees expressed concern that the imminent cessation of New Zealand funding would jeopardise the future operation of the programme.

Concerns about the sustainability of the observer programme when NZ funding ceases...

Part of the FFA Regional Observer Business Plan was the intention for both regional and national observer services to become self-funding over time (through cost recovery from industry): '[b]y the end of the Project, it is envisaged that national and sub-regional observer programmes will be fully funded and will have adequate capacity to undertake all national aspects of observer programme management'.[23] However, it seems unlikely that arrangements will be developed in time for a smooth transition.

4.6.6 Potential for positive employment spin-offs

One respondent noted that an unexpected spinoff of an earlier generation of observer programme has been the up-skilling of young scientists and fishers, who have gone on to further their careers. This was considered to have made a big impact on a small number of people. It is possible that similar impacts may accrue as a result of the current programme.

4.6.7 History repeating?

... which suggest weaknesses in ex ante appraisal and lack of a feedback loop from previous learnings

The weaknesses in debriefing processes and in data management, difficulties with observer retention, and overall problems with sustainability, all appear predictable in light of past experience. This suggests that the planning for the current programme was overly optimistic and lacked adequate consideration of lessons from previous programmes.

4.7 Impacts on tuna management

4.7.1 Status of national Tuna Management Plans

All PICs have prepared Tuna Management Plans, often with assistance from FFA and support from donors. In most PICs the plans have been formally adopted, although the process of formulation and implementation has not always been smooth (Gillett, 2011, pp.32-33).

[23] *Grant funding arrangement between MFAT and FFA* [AID/PAC/5/2/2], March 2011, p.15.

4.7.2 Tuna stock assessments

SPC's science was highly regarded by people we spoke to, and we saw awareness and use of their tools (such as TUFMAN[24]) in-country. These findings are consistent with those of the June 2012 performance review of SPC, which found the FAME division to be well regarded across all stakeholders, and the division that was most frequently referred to and complimented.

Interviewees considered SPC's tuna stock assessments to be of high standard; and we note they are routinely peer reviewed by WCPFC members through the Scientific Committee established under the Convention.

SPC's tuna stock assessments regarded as high quality, and show that bigeye and yellowfin stocks are reaching sustainable limits

Scientific evidence suggests that bigeye and yellowfin stocks are reaching sustainable limits. While skipjack and albacore stocks are currently healthy, rapid increase in catch levels is expected to impact on catch rates and profitability.[25] According to Greenpeace, because skipjack is mostly caught by purse seine nets set on fish aggregating devices, there is a significant level of bycatch of juvenile yellowfin and bigeye tuna, which puts pressure on these other stocks. [26]

The following diagram shows the relationship between fishing effort and spawning stock status of the four main WCPO tuna species.

New Zealand's funding for tuna tagging was considered instrumental in kick-starting this programme (though actually getting the funding approved was reportedly '*like several root canals without anaesthetic*'). However we encountered a diversity of views on its impact on the quality/robustness of tuna stock assessments – we were variously told that it had no impact on the results, that it reduced the uncertainty around the modelling, and that it was invaluable.

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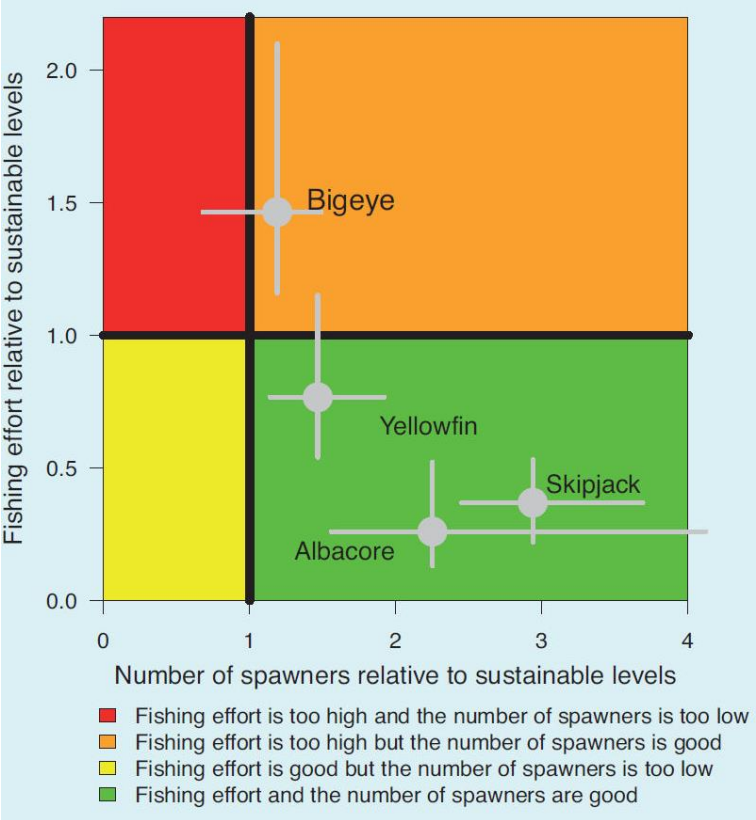
24 TUFMAN (Tuna Fisheries Database Management System) is a database tool developed for Pacific Island Countries to manage their tuna fishery data. It provides for data entry, data management, data quality control, administration, and reporting. The system is the same throughout the region but is highly customisable and set up specifically for the needs of each of the individual countries. Source: SPC website http://www.spc.int/oceanfish/en?start=11, accessed 26.5.13.

25 SPC (2012) *The western and central Pacific tuna fishery: 2010 overview and status of stocks.* Policy Brief 14/2012.

26 Greenpeace (2012) *Defending our Pacific: Summary of findings from the* Esperanza's *expedition, September-December 2011.*

Figure 8 Relationship between fishing effort and tuna stock status

The grey circles and lines represent central estimates and 95% confidence intervals respectively



Source: Data from SPC, chart from World Bank (2012) *Pacific fisheries sector engagement strategy* (World Bank: Washington DC, USA).

4.7.3 Estimates of illegal, unreported and unregulated fishing vary

IUU is understood to occur predominantly in longlining (as purse seining vessels face higher risks of detection due to their size and method) (World Bank, 2012).

Estimates of IUU tuna catch in the WCPO vary, depending on the methodology used. Figures as a proportion of total fishing days (within PIC EEZs) appear low (see Table 6 below). But estimates based on reported catch in the context of the reported tonnage of the fishery (the 'anchor points and influence table' approach) provide a range of 21%-46% of IUU for the Western Central Pacific Ocean, though with most of this occurring in the high seas.[27]

A 2009/10 surveillance operation (Operation Kurukuru) involved sighting of 198 vessels and 35 boardings, resulting in two apprehensions for violation of licence conditions (resulting in the vessels being fined) (FFA *Annual Report 2010*).

[27] MRAG and Fisheries Ecosystems Restoration Research (2008) *The global extent of illegal fishing*; Greenpeace (2012).

Table 6 Estimates of potential unauthorised tuna fishing in PIC EEZs

% of total fishing days

	2009	2010	2011
Purse seine	0.01%	0.02%	0.01%
Longline	0.52%	0.41%	0.33%

Source: DEVFISH presentation, 28 March 2013. The presentation refers to VMS and logsheet data, and notes caveats with these estimates.[28]

4.8 Coastal fisheries is a significant gap

At the coastal level, SPC provide assistance with local surveys, but as we found, both the information and management in this space is generally patchy. At the start of our field work we trialled a survey approach for ascertaining the status of coastal fish stocks and their management for our in-scope countries, using a short-form template adaptation of the MSC methodology (presented in Appendix 1). The aim was to create a baseline of information that could be readily updated in the future. However, we struck a dearth of data and of management measures themselves so were not able to populate this template. It nevertheless provides a framework for what information would be useful to build and monitor over time.

We were unable to complete our proposed survey of coastal fisheries management due to lack of data

However in Fiji and Samoa officials advised us that there is regular information gathered on the price and volume of local fish sales, and a trial is beginning to do something similar in Solomon Islands. In Samoa, for example, the Ministry publicly reports quarterly on the volume and value of inshore fish and marine products sold, and also offshore fish sold at markets in Apia, in Salelologa, and on the roadside between Apia and Faleolo. These quarterly reports are based on weekly surveys performed by Ministry officers.

We have summarised the available information on the status of coastal fisheries management for our in-scope countries, in a much abbreviated form to our original template concept . This is based on information from interviews and the excellent collection of material provided in Gillett (2011). This information shows that:

- There is generally weak management/control over coastal fisheries, with multiple layers and often devolved and fragmented responsibility
- Data/resource assessments are very limited
- There is limited information on local market availability and price, and
- There is little evidence of decision-makers connecting fisheries with other relevant factors such as pollution and habitat (i.e. integrated coastal management).

[28] The DEVFISH presentation also references these estimates of worldwide IUU: http://www.plosone.org/article/info:doi/10.1371/journal.pone.0004570.

Consistent with its role, the FFA focuses exclusively on oceanic fisheries (tuna), and over the evaluation period it also had an emphasis on fisheries management (though new work programmes on export and investment facilitation are increasing the effort on development). The 2010 Cartwright report articulated an on-going challenge for the organisation of integrating fisheries development with fisheries management activities (effectively removing the artificial demarcation between the two functions, to create a focus on sustainable economic development).

The work programmes of the regional agencies have emphasised oceanic over coastal fisheries

The independent reviews of SPC found an emphasis on oceanic fisheries in its work programme, at the expense of coastal fisheries. The emphasis on oceanic rather than coastal fisheries was widely noted amongst our interviewees, with comments that coastal is generally regarded by donors (including New Zealand) as '*the poor cousin'* and '*not so sexy'* as oceanic. This was attributed partly to the potential returns to be had from tuna for relatively low effort (via licence fee revenues), partly the political drive from New Zealand to be able to demonstrate tangible economic achievements ('*show me the results'*). One respondent said that New Zealand shows no recognition of the associated subsistence and food security issues, which '*we ignore at our peril'*.

The January 2012 review of SPC reached similar conclusions, saying that:

> *[c]oastal fisheries tend to be neglected because of the economic potential and regional nature of the tuna resource. In fact, coastal fisheries make a larger contribution to the economics of PICTs than oceanic fisheries at present, providing both food security and livelihoods, but face greater challenges of sustainability* (Report of the Expert Reference Group, 2012, p.viii).

The table below shows SPC's projections of the expected capacity of each country's coastal fishery to support the protein consumption needs of its future population. We note that these projections assume that coastal fisheries have effective sustainable management measures in place to produce the estimated tonnage of fish. Any shortfall is expected to be met from domestic tuna supply (i.e. catch diverted from export markets) – interviewees varied in their perceptions of the feasibility of this.

The gap in coastal fisheries management has implications for future food security and livelihoods development of PICs

Table 7 SPC food security projections

For our in-scope countries

Expected capacity of sustainable production from coastal fisheries		
EXPECTED TO MEET future needs	**NOT EXPECTED TO MEET future needs**	**ADEQUATE but distribution difficult**
Cook Islands	**Fiji** **Samoa** **Solomon Islands**	**Kiribati**

Source: Adapted from *Fish and food security*. SPC Policy Brief 1/2008.

1. To provide 34-37kg per capita of fish annually, to meet 50% of the recommended protein intake for PICs, based on sustainable production of 3 tonnes/km^2 of reef.

We note that these projections are quantity-based, and do not incorporate any assumptions around fish prices. They therefore do not model the market responses to scarcity or the availability of substitutes. As noted above, there is generally little data available on the health of coastal fishery stocks, but there are efforts to gather and report local fish market price and quantity data in three of the five in-scope countries. This information is useful at many levels, including as a way to track consumption and affordability of locally consumed fish over time, and for fishers themselves to have a better idea where and when to sell their fish for the best returns.

4.9 New Zealand regarded as 'the governance people'

According to briefings from MFAT officials, FFA has struggled in the past with dysfunctional governance arrangements, and a lack of appropriate business planning and financial accountability. This led MFAT officials, in 2005, to recommend that the subsequent three years of (increased) funding be subject to the FFA's achieving set standards in regards to governance and management (a recommendation that was supported by the Minister).

The 2010 review highlighted a breakdown in communication at the Executive management level, the source of significant criticism from member countries, as well as problems with staff performance and financial administration. Administrative and governance reforms (including major reforms to budgeting and planning) were expected to address many of the concerns raised, including demands for increased national and sub-regional (as opposed to regional) efforts, to better reflect national priorities and the vast diversity of characteristics across member countries.

NZ's contribution to improved governance of the regional agencies has been valuable, but lacks clarity on the end state

While formal MFAT briefings indicate much greater satisfaction with the Executive and the business planning and budgeting arrangements in recent times, New Zealand officials we

spoke to were repeatedly critical of the governance of the regional agencies. From the perspective of the agencies themselves and member countries, New Zealand is focussing too much on achieving governance perfection. There were no suggestions that the work to date has not been valuable, but we did get a sense that New Zealand is seeking ever more marginal tweaks to governance, without clarity on when the job will be done.

In relation to governance, there was also a view expressed that New Zealand sometimes seeks to circumvent the agreed prioritisation and governance processes in order to advance initiatives that '*light[s] our fire*' (notably projects that attract better donor visibility than general contributions). It was also recognised this can be driven by strong (New Zealand) Ministerial preferences.

5. Institutional strengthening programmes

5.1 Piecing together the story

We began our investigation by reviewing the sector programme documentation supplied by MFAT. This material ran to many thousands of pages and we found it difficult to piece together a clear story on the history of the two IS programmes, in particular on CIMRIS, where what we heard in-country seemed to differ from what was documented.

The stated objectives of the IS programme in the Cook Islands were to 'enhance the management and sustainable use of marine resources for the benefit of all Cook Islanders [and to] build the capacity of MMR and related agencies to ensure that Cook Island marine resources are sustainably managed'.[29] The objectives of SIMROS in Solomon Islands were that the 'people of Solomon Islands are receiving maximum long-term benefits from sustainably managed fisheries [and that] MFMR has the capacity to effectively and efficiently manage the Solomon Islands' marine resources in a sustainable manner'.[30] For its successor programme, MSSIF, the objectives were 'sustainable development and management of fisheries resources to ensure long-term benefits for the Solomon Islands [and to] strengthen the capacity of Solomon Islands fisheries sector to achieve improved livelihoods, food security and economic benefits'.[31]

Previous, Activity-level evaluations have struggled to measure the contribution of Activities to the desired outcomes. Difficulties cited include the lack of baseline data and in attributing outcomes to Activities (i.e. isolating their impact from the myriad of endogenous and exogenous influences). These issues are by no means unique to New Zealand. A 2008 review of international programme evaluation reports of fisheries/aquaculture development assistance found that 'many claims are made about the positive impacts of fisheries/aquaculture development assistance, but... the quality and rigour of the evaluations often precludes any certainty about whether such impacts actually occurred, and if they did, whether they were caused by the intervention or just correlated with it'.[32]

Activity-level evaluations have lacked baseline data and meaningful measurement of impacts

In addition, and in our view, the stated outcomes and supporting performance indicators for Activities have tended to lack specification (e.g. quantitative targets and data sources) and are

29 *Project Design Document August/September 2004.*

30 *Project Annual Report January-June 2007.*

31 *Programme Design Document February 2010.*

32 Graeme Macfadyen (2008) *Assessing the impact of development assistance in fisheries and aquaculture.* Report for the Food and Agriculture Organization of the United Nations, May 2008, p.iv.

frequently disconnected (with a lack of alignment between outcomes, indicators and reported results).

It was therefore not clear to us from the MFAT documentation what the impacts of the IS programmes had been and whether they had achieved their objectives. In the case of SIMROS, we were provided with annual work plans and reports for each year that give useful details on what the funded activities ended up being, and how the best-laid plans (in the workplans) turned out in practice (in the annual reports). Unfortunately the value of this information to our evaluation was limited, since it did not relate back to any ex ante measures of progress. This made it hard to know how much difference SIMROS itself actually made relative to expectations. There were also lessons about the relative powerlessness of MFAT if a long-term contract goes off-track, particularly if the scoping is deficient.

Similarly, in the *Programme Design Document* for MSSIF, there is no meaningful quantification of anything other than estimated programme costs, so it is difficult to see what scale of change was intended to be made, or how progress would be measured other than by ticking off milestones that are essentially qualitative in nature.

We interviewed MFAT staff and past consultants, and then spoke to a range of stakeholders in Solomon Islands and Cook Islands including staff from the recipient Ministries as well as related government agencies, past and present Technical Advisors (TAs), local NGOs and industry representatives and New Zealand government staff. As with our approach for the regional agencies, we sought to obtain quantitative information to verify the views we heard (such as the results from the water quality monitoring in Rarotonga, see 5.3).

5.2 We found mixed results

Both IS programmes instituted improved corporate systems and processes, though these are vulnerable to changing circumstances

A key achievement of both IS programmes has been the development of corporate systems and processes, such as financial management, human resources (including job descriptions and recruitment processes) and IT. Though, as discussed below these and other achievements are highly vulnerable to changing circumstances. For example, we were told that systems developed under SIMROS had to be re-done later (under MSSIF) due to a lack of ownership, changes in personnel and multiple changes of government in Solomon Islands (resulting in multiple Ministers) which led to new requirements.

IS in Solomon Islands assisted with oceanic fisheries management, which substantially lifted licence fee revenues...

In terms of fisheries management, people we spoke to credited the Solomon Islands programme with improved policy development and decision-making, and specifically the development of a Tuna Management Plan and processes for issuing licences and setting access fees. This work, as well as the support provided for access negotiations with DWFNs, is attributed with a substantial increase in licence fee revenues.

A strategy to improve the competency of MFMR staff to prepare inshore fishery management plans and community-based management plans was prepared but not

implemented. According to the 2009 Activity evaluation this was due to the need for new legislation and Provincial ordinances to support community-based management, the 2007 tsunami, a lack of leadership and a lack of facilities and resources at the provincial level.

Nevertheless, an inshore community-based management programme was agreed on and applied in 2009, and a management plan for beche-de-mer developed and applied in 2008.

... but community-based management is hampered by lack of capacity and resources at the provincial level

According to the 2010 *Activity Completion Report*, the community-based fisheries management programme supported by SIMROS proved to be 'remarkably successful' but that 'these arrangements are still transitional and there is concern at the capacity of Provincial Governments to participate meaningfully in these programmes' (p.8). This concern regarding provincial capacity (particularly within MFMR) was echoed in our interviews.

Over the evaluation period, New Zealand provided specific funding for one rural livelihoods development activity in Solomon Islands, which is discussed in 6.3. SIMROS also supported the development of aquaculture development plans for tilapia and seaweed (applied in 2008 and 2009 respectively). Planning for these initiatives continued through the MSSIF programme.

A major component of the New Zealand's IS funding contribution to Solomon Islands was the construction of a new Ministry building. Staff expressed appreciation for the new offices, and the improved working environment is credited with helping to improve morale – '*they want to come to work now*' and also performance and accountability through the open-plan layout which facilitates closer supervision. Lessons documented in the MFAT papers do suggest some basic troubles with a combination of the site and the design: the building is too close to the noisy road to allow the windows to be opened as designed, meaning that air conditioning needs to be installed, raising running costs above expectations. However we were also told that that this site was the only land available within the Honiara City boundary.

IS in the Cook Islands supported the development of oceanic fisheries plans and regulations, but otherwise focused on issues beyond its original target

In the Cook Islands, the programme supported the development of an Offshore Fisheries Management Plan, and provided funding to develop high seas and longline regulations (the latter came into force in 2008), but was otherwise focused on projects not directly related to its original target of managing fishing licensing for the oceanic fishery. This 'policy drift' is discussed in detail in the following case study (see 5.3).

Both programmes were associated by some interviewees with a lift in organisational capability and standing – though converse views were also expressed, and in Solomon Islands this turnaround was frequently attributed to the calibre and efforts of the current Permanent Secretary (PS).

Strengthened staff get headhunted by other organisations

Many interviewees lamented that their staff members of their staff who benefit from the 'strengthening' then get 'headhunted' by the regional agencies and other governments. However some have returned, bringing with them additional skills and outside perspective.

5.3 Case study: policy drift – the case of CIMRIS

We heard a variety of opinions about the genesis of CIMRIS, but were told that the original driver was a need for assistance in managing the rapid growth in licensing demands for the Cook Islands' longline tuna fishery in the early 2000s. Institutional strengthening assistance was sought by the then PS of MMR from New Zealand to help build MMR's capability to manage the licensing regime.

CIMRIS originated as a programme to help MMR manage their tuna licensing regime...

Following a Scoping Mission in 2003, the programme expanded to address other issues in the marine resources sector. The final design encompassed aquaculture and pearl farming development, inshore fisheries and community-based fisheries management and integrated coastal management.

It also included as a component of the IS programme, limited strengthening of the skill base for senior staff at the National Environment Service (NES) and the Ministry of Health, in order to address water pollution problems in the lagoons. In the case of NES, the focus was on developing and implementing Environmental Impact Assessment (EIA) regulations and procedures in recognition of the adverse effect land-based activities were having on water quality. A further visit in 2004 resulted in the inclusion of support for the Ministry of Health to develop guidelines and regulations for the treatment of sewage and wastewater, and funding for MMR to undertake water testing in the lagoons. The *Activity Completion Report* characterises this as a focus on the marine resource itself rather than on a single agency, meaning that 'quite disparate elements had to be managed within the project' (*Activity Completion Report*, p.5).

... but evolved into a multi-agency programme encompassing coastal water quality management

Two years elapsed between the project design and the signing of the CIMRIS contract, during which time the operating environment had changed. As a result, the *Activity Implementation Report* differed still further from the original intent and final design. The *Activity Completion Report* cites a disconnect between reforms in the central agencies and line departments, lack of co-operation within the public service and a lack of engagement between government agencies and their stakeholders, as factors which had a major influence on the project.

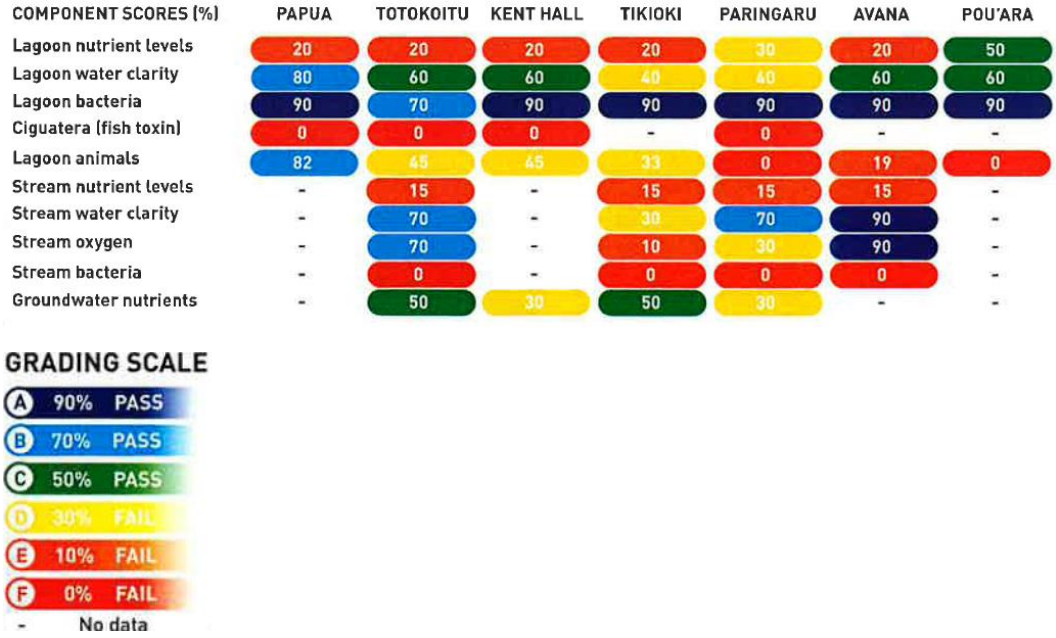
The mid-term evaluation of CIMRIS took the overall view was that the programme was being run effectively and that there was clear evidence that the performance of the MMR had improved, although it was too early to look for improvements in fundamental outcomes like earnings for seafarers, or government revenue from fishing. That said, the reviewers found that the progress made on some efforts was insufficient (including lagoon water quality) and that the sustainability of the achievements were in doubt because it depended on speedy change in MMR and on other parts of the broader Cook Islands public service that had marine resources responsibilities.

People we spoke to cited the key achievements of the programme as being the initiation of an annual Lagoon Day (a community event to raise awareness about Takitumu lagoon water quality and its management) and the inter-agency collaboration to remediate the lagoon (which now includes a major upgrade of septic systems).

We found that, while CIMRIS provided funding for the development of oceanic management plans and regulations, it otherwise lost its focus on offshore fisheries. So as an oceanic fisheries management initiative, CIMRIS delivered little. And in terms of coastal fisheries, gains are yet to be made in improvements to either lagoon water quality or marine life (refer Figure 9, below) and anecdotal evidence suggests declining coastal fish stocks. The 2011 report from MMR on trends in water quality of Rarotonga's streams showed that seven of the eight tributary streams monitored had levels of bacteria which exceed the maximum considered safe for human and coral reef health. While we appreciate that water quality projects can take many years to deliver tangible results, among the range of government agencies involved there did not seem to be a sense of commitment, let alone urgency, about this work commensurate with the potential impacts on public health and the tourism industry of declining water quality.

CIMRIS supported foundational work to improve lagoon water quality, though this is yet to deliver tangible results

Figure 9 Takitumu lagoon water quality 2009



Source: Cooks Islands Ministry of Marine Resources *Takitumu Lagoon health 2009 report card.*

The change in focus from oceanic fisheries management to coastal (and stream) water quality reflected other pressing concerns at the time – ciguatera in reef fish (can result in neuro-toxin poisoning if eaten), algal blooms in the lagoon and water pollution (from inadequate sanitation systems, and runoff from various land uses) were all raising human health concerns, and disease in the pearl fisheries were affecting production. In this regard, CIMRIS was hailed by some interviewees for its flexibility in being able to respond.

We agree there is value in programmes being able to adapt and respond to changing local circumstances. But in our view, this also risks an ultimate mis-match between expectations and delivery. We heard views in-country that there was a poor connection between what the Cook Islands wanted and what they got, and that the programme did not have a clear fisheries goal. On the ground, flexibility also implies a trade-off for donors, as it increases the challenge of demonstrating accountability and results, and in this case justification as a

fisheries-sector investment. We present a framework for considering these and other trade-offs below (refer Table 10 in section 9.7).

5.4 Value for money?

A number of interviewees queried the value for money of IS programmes. Some commented that CIMRIS in particular seemed expensive relative to the benefits delivered. The main enduring benefits have been some corporate systems in the Ministry, a water quality monitoring effort that has not as yet led to improved water quality, improved regulations for wastewater management and an EIA process that is proving to be less than effective in avoiding adverse environmental effects. The high proportion of spend on consultants came under criticism, both in terms of its efficiency (flights, accommodation and so on), and as 'boomerang aid' (i.e. aid money that is effectively consumed by the donor country without any decision-making control for the partner).

IS in Solomon Islands appears to have delivered better value for money than the programme in the Cook Islands, partly due to its 'residential' approach

By comparison, the SIMROS/MSSIF effort in the Solomon Islands seems to have delivered better value for money, partly due to the 'residential' approach that was taken (see 5.5, below). Stakeholders told us that the main gain from SIMROS was the saving of the Soltuna plant and the continuing employment of its substantial staff, a fortunate effect of the SIMROS-funded staff being capable of assistance, and available in-country at the moment when Soltuna came into serious financial difficulty (this is discussed in below in section 6).

5.5 Models and matching

There are a number of design choices to be made in IS projects, and we saw two different approaches and contexts in the New Zealand-funded efforts.

Full-time 'residential' – fly in-fly out

In Solomon Islands, the approach is very much a long-term commitment, with full-time on the ground support envisaged to continue for at least another 7-10 years. In the Cook Islands, the approach was more 'fly in-fly out', and over a shorter period of time. We heard views for and against both approaches – in a 'hardship' post like Honiara it can be difficult to recruit people for long-term stays, but fly in-fly out may not provide counterparts with the depth of assistance they need (one respondent said they only received an hour of training).

There are a number of key design choices to be made in IS programmes...

We heard support for assistance to be provided at a lower intensity but for a longer period of time, in order to minimise the gaps that can open up when the support ends, and to provide plenty of time for the benefits to be realised. Some interviewees (both consultants and recipients) were of the view that a series of visits of a few months' duration, work better to reduce the dependency on external assistance that can accrue from full-time in-country support. These visits need to take place over an extended period to ensure the strengthening measures become embedded and adjustments made to address issues that arise before they undermine the improvements made to policies and practice.

Technical support – coaching

In either case, the choice of consultant appears critical – with the wrong personality having the potential to cause chaos and unravel the relationship between donor and partner. We heard repeatedly that the right personal attributes are not taken into account in the selection process, that '*it's all about the CV*'. This raises a further question regarding the model of IS – whether the Technical Advisors (TAs) are being selected as technical specialists or coaches/mentors. The temptation for the former can be to do the work themselves, and leave little behind in terms of enhanced capability, whereas experts in the latter may lack the necessary fisheries management expertise. A number of interviewees described the '*balancing act*' of TAs needing to meet deliverables to fulfil contractual reporting requirements, with the time required to build sufficient capability and confidence in their counterparts. One said that it should work so that '*when you leave, I am able to stand*' – '*empower me to do what I am expected to do*'.

> *... and selecting the right people for the job is critical*

Systems – people

A third choice is around the balance of effort between establishing systems and processes, and building staff capability. In terms of sustainability, we heard that having systems and documentation is important for managing the potential loss of institutional knowledge with staff turnover. But we were also told that even having these systems does not immunise the organisation from disruption and change, as systems are vulnerable to influence at the political level and by individual PSs. We were told that the systems developed under SIMROS had to be re-done under MSSIF, due to changes in political and management requirements.

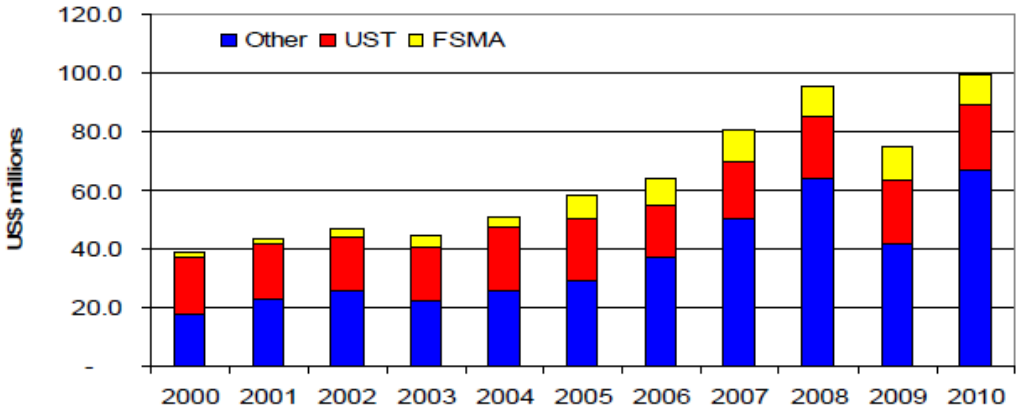
6. Economic development assistance

6.1 Growth in access fees

With respect to government revenue from access fees, it is clear that returns have increased significantly over the evaluation period. Growth in government revenue from access fees contributes to GDP and provides the opportunity for economic development.

The following chart shows estimates from the FFA of access fees, based on an assumed rate of return on catch value (6% for purse seine and 5% for longline). These figures may differ significantly from actual fees as they are based on historical catch and price data.

Figure 10 Estimated access fees received by FFA member countries under multilaterals and 6% of catch value of bilateral partners (purse seine)



Source: FFA (2011) *Economic indicators update.*

Notes: UST = US Treaty; FSMA = FSM Arrangement.

PIC government revenues from access fees have increased, assisted by the work of FFA, and the implementation of supporting arrangements at the national level

People we spoke to were divided on the extent to which the increase in returns can be attributed to the sector programme. At a regional level, this result was widely attributed to much broader initiatives such as the US Tuna Treaty and the establishment of the WCPFC, and the work of FFA under these, as well as the VDS.

At a national level, New Zealand's IS work was credited with assisting the successful implementation of access arrangements in Solomon Islands. We were told that the contribution of SIMROS and MSSIF strengthened the capacity of MFMR staff to develop and promote policy changes, work with regional bodies, and manage fishing licensing processes to increase revenue and minimise corruption. According to interviewees, revenues from offshore fishing have doubled between 2006 and 2012 (from $SI[33] 50m – $SI 60m to

[33] Solomon Island dollars.

about $SI 120m) largely as a result of policies introduced by SIMROS and the support provided by SIMROS to the PS in addressing corrupt practices among some Ministry staff.

We note that, while from an economic point of view revenue from selling access to fisheries might have the same impact on GDP as direct investment in economic development, local production capability and local employment may be more highly valued by PICs themselves.

More generally, we note that there is a general lack of transparency around access and vessel licensing arrangements which makes it difficult to put an accurate figure on access revenue received by PICs. A recent audit report by the Pacific Association of Supreme Audit Institutions found that many of these arrangements were 'shrouded in secrecy' and that 'for public accountability purposes it is crucial that these arrangements are open and transparent'. The report emphasised the need for sound accounting practice to ensure that revenues received are accurately, properly and publicly recorded.[34]

6.2 Job creation

Both the programme documentation and interviewees cited job creation attributable to the IS programmes in Solomon Islands. The majority of employment benefits resulted from the resurrection and expansion of the Soltai (now called Soltuna) tuna canning factory in Noro.

Job creation in Solomon Islands an unintended spin-off from IS support

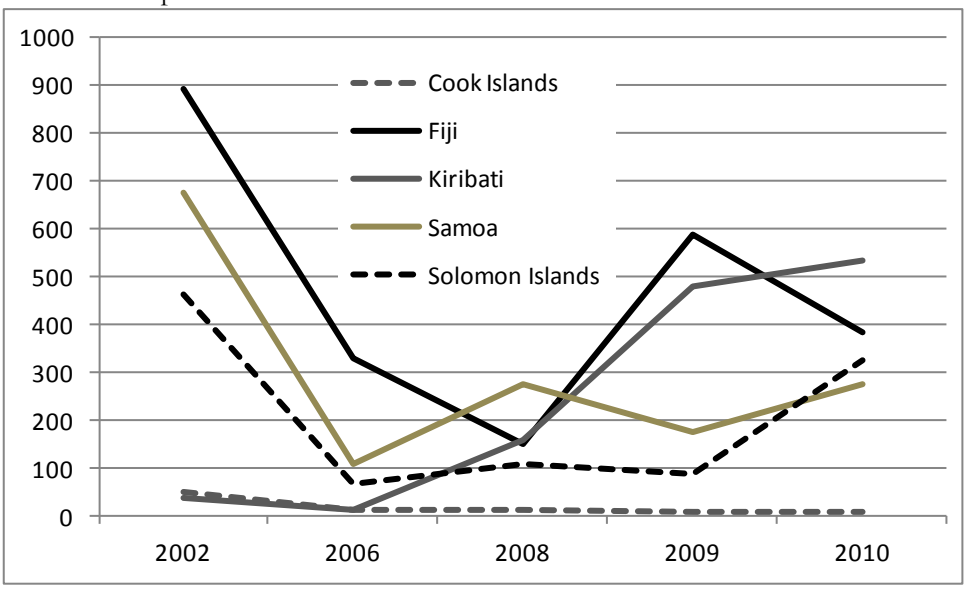
First, the resurrection: we were told that the SIMROS team leader was an important part of efforts to stave off insolvency for Soltuna, although this was not expected to be part of the project. Then the expansion: the MFMR, under guidance from MSSIF-funded advisors, developed a policy change requiring fishing companies to land a portion of their catch for processing, and worked with the cannery to ensure capacity would be available to process the additional supply. This resulted in the creation of 500-800 new jobs at the cannery, with an additional shift, and 20 in a local tuna loining plant. Around 90% of Soltuna's employees are women. This is good news for Solomon Islands, but it is possible that some supply was diverted from other Pacific Island processing plants.

The following two charts present the available data on fisheries-related employment for our in-scope countries. Jobs on tuna vessels fluctuated over the evaluation period, declining overall in Samoa, Fiji and Solomon Islands, but increasing in Kiribati. Jobs in onshore facilities (primarily canning and loining plants) increased in Solomon Islands but declined in Fiji, with total jobs across our in-scope countries dropping from 2,088 to 1,751 over the period. Presenting cross-country time series data in this way enables consideration of sub-regional (or regional) trends – in this case assessment of the net change in jobs across a selected sub-region.

Regional time series analysis important for assessing net employment growth over time

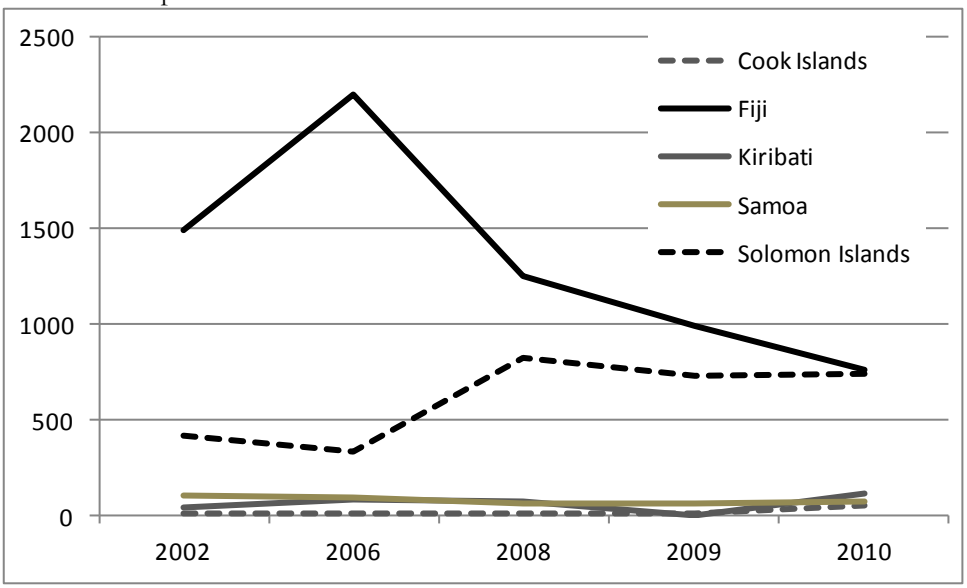
[34] *Audit finds opportunity for more sustainable Pacific fishing industry*. Press release by the Pacific Association of Supreme Audit Institutions 28/3/13.

Figure 11 Local jobs on vessels
For our in-scope countries



Source: Gillett (2011), based on data from Gillett (2002, 2008) and FFA (2008, 2009, 2011).

Figure 12 Local jobs in onshore facilities
For our in-scope countries



Source: Gillett (2011), based on data from Gillett (2002, 2008) and FFA (2008, 2009, 2011).

6.3 Livelihoods development in Solomon Islands

New Zealand spent $1.4m over five years on a project delivered by WorldFish to train villagers in Western Province, Solomon Islands to grow giant clams and coral for export to the US aquarium trade.

The project proposal expresses the objective as being to:

> *help a large number of small-scale operators to develop new livelihoods by using low cost, sustainable methods to produce high-value products with a strong export demand* (Project proposal, p.2*)*.

The Proposal indicates that the project expected to initially assist 50-100 families, with other areas likely to want to join later once the project was successful and noted that '[t]his project has a very high probability of success' (*Project proposal*, p. 19).

The project failed to achieve its objectives. The project was never economically viable, by which we mean total revenues did not cover total costs including the costs of the hatchery, the depot and the farmers' costs of equipment. Although substantial efforts were made to improve the returns to all involved, these rested on projected growth in volumes of supply that never eventuated in practice. This meant that the project could never have continued without external financial support of one kind or another. After five years New Zealand stopped its funding, having extended it at the three year point in order to support efforts to move the project on to a more sustainable basis, and WorldFish subsequently closed the uneconomic hatchery.

This failure was partly a result of unforeseen changes, including increases in the cost of fuel, changes in market demand, other suppliers with cheaper transport links in the market, and difficulties in breeding juvenile clams; partly it was due to learning along the way, including some poor selection of candidates for training early on. There was also tension between the objective of poverty alleviation and that of establishing a financially viable operation: we were told that New Zealand changed its approach part way through to encourage the recruitment of farmers more distant from Gizo, the regional centre. This may have helped more economically deprived individuals to join the project, and they were more likely to remain farmers, having fewer economic opportunities; but it also increased transport costs and so further reduced the financial viability of the project overall.

WorldFish rural livelihoods development project was never commercially viable, poorly planned and failed to meet its objectives...

The project also failed because it was not well planned. There was no market analysis at the beginning of the project that could have provided information on the economics of the project as a whole, and its sensitivity to particular risks. And it was expensive for what it achieved: spending $1.4m to help no more than 52 individuals earn no more than an additional $1,000 a year for a short period adds up to a very poor return on investment. From the language in the initial documents, the project was substantially over-sold: a small project to assist a modest number of individuals to explore a potential new income stream that was already working in other communities was said to contribute 'directly to four of the eight primary responsibilities entrusted to the Department' under the National Development

Plan, and to be 'designed to assist [the Department] to meet several of [its] specific development strategies'.

All that said, the fact that New Zealand was engaged at all in the Solomon Islands straight after the ethnic tensions is a credit to its commitment. There was widespread recognition from the people we spoke to of the important contribution New Zealand made to rebuilding morale and a sense of community irrespective of the success of this initiative. This suggests at least that there were foreign policy objectives in play that were not an explicit part of the design. We were told that the project was established very quickly in response to the need to do something, which may also explain the lack of planning. And the project was well-evaluated during its life: it was in our view the best documented and evaluated Activity of all of the initiatives that were in the scope of our work.

There have also been some benefits aside from the modest direct gains to farmers while the project lasted. One gentleman is now establishing an EU-funded hatchery near Gizo with plans to grow and export clams at a greater scale and with a more integrated business model. He told us he would not have pursued this had he not been a clam farmer under the WorldFish project. He has recruited three other farmers to grow clams – all were participants in the WorldFish project. They are building their new enterprise based on the lessons learned under the Worldfish project. We were told that WorldFish as an organisation also has learned lessons from the clams project. They are now more aware of the need to develop projects in consultation with local communities and therefore the need for staff with skills in community development to complement the marine science specialist. They are actively recruiting staff with these skills. WorldFish has recently produced a book on how to set up and run small-scale coral and clam farms based largely on the lessons learned from the Gizo clam project. It is currently involved in a new project (funded through MISSIF) on strengthening community-based resource management with a particular focus on gender issues.

... though it led to some positive spin-offs in the form of new projects

7. Over-arching findings

7.1 Lack of strategic coherence...

In the early part of our evaluation period (2003-2004), the sector programme lacked explicit strategic direction. This reflects its origins as a collection of bilateral institutional strengthening programmes and support for regional agencies, rather than as a strategic sector-based programme.

In 2005, New Zealand developed an MFAT/NZAid/Ministry of Fisheries strategy for its engagement in Pacific fisheries. The overall goal in this strategy was the 'sustainable development of Pacific fisheries resources', and one of its intermediate outcomes was to 'assist Pacific countries to develop their fisheries resources, contributing to poverty elimination in the Pacific'. We note that maximising sustainable returns from fisheries was also identified as a regional priority for the first three years of the regional Pacific Plan (2006-2008).

Since 2009, support for Pacific fisheries has been explicitly located within the overall New Zealand Aid Programme. The Pacific region is the core geographic focus of the overall Programme, and fisheries is identified as one of three sector foci. There are also four themes, and New Zealand's sector programme of support for Pacific fisheries fits within the 'investing in economic development' theme. There was widespread (though not comprehensive) awareness amongst interviewees of the shift in focus towards economic development, and this was widely attributed to the change in government, and in particular with the interests of the current Minister of Foreign Affairs.

The sector programme has lacked strategic coherence...

Despite this increased clarity in overall sector programme-level direction, it is still hard to see how the composite Activities support these high-level objectives. Our review of the sector programme documentation found that each Activity typically has an extensive raft of sub-objectives, and frequently multiple or mixed objectives (we discussed this point in relation to CIMRIS and the observer programme, above). But the results logframes that are designed to monitor and evaluate the Activity are focused on inputs and outputs. In our view, there is a gap between the (often lofty) outcomes sought and the outputs the Activity is designed to produce – meaning there is no explicit intervention logic to link these initiatives to the sector programme objectives.

... and measurement has focused on outputs, lacking linkage to sector programme objectives

Support for the various Activities has evolved from various drivers, but appears to have been largely reactive. New Zealand has long-standing relationships with the regional agencies, being a founding member of SPC and an active participant in FFA. The project-based funding was approved in response to specific proposals from these agencies. Support for IS in the Cook Islands and Solomon Islands was provided in response to requests from the partner countries.

Interviewees were generally of the view that, beyond the support for the regional agencies, it is unclear why particular countries and Activities have been selected for support, why they

are priorities for fisheries support in the region, and how they contribute to the high-level objectives. The sector programme was variously described as a '*hodge podge of things*', '*piecemeal*' and '*schizophrenic in nature*' with confused objectives. These comments applied across the evaluation period (and to date).

A number of interviewees noted the nature of the relationship with New Zealand (of free association) as a general driver of support in the Cook Islands, which reflects New Zealand's foreign policy objectives as much as fisheries-related goals.

7.2 ... and co-ordinated sector programme management

In our view, New Zealand's support for Pacific fisheries has not been run as a formal, co-ordinated programme. There is no overarching programme-level governance and decisions appear to be made in an ad hoc fashion across different MFAT divisions. It can be unclear who the decision-maker on a particular project is, and who is responsible for delivering on Activity outcomes. Even within each country, some projects are run from Wellington with limited local engagement, which seems to invite poor co-ordination in-country.

The sector programme has not been run as a co-ordinated programme...

It seemed to us unnecessarily difficult to establish the full costs of the sector programme. And as noted above, the costs of managing the sector programme have not been attributed or tracked over time. This perhaps reflects the lack of explicit sector programme management.

More generally, the approach to overall budget management appears to have been rather ad hoc. Some interviewees noted that the supply of funds can determine the size of the project. An example was given where MFAT had asked a partner country – '*we have all this money to spend, what shall we spend it on*?' This can circumvent prioritisation processes and also analytical due diligence, in turn impacting on the quality of spend. It can work the other way too, with large projects being shoe-horned into insufficient budgets.

... and overall funding decisions seem to have been ad hoc

A number of interviewees lamented the high turnover of Wellington staff, resulting in a lack of institutional knowledge and changing expectations over time. They also remarked on the lack of depth and expertise in MFAT. The lack of handover may also have contributed to the morphing of Activity objectives over time; an issue which would have been compounded by the lack of adequate documentation we observed.

Stakeholders expressed concerns with high turnover of desk staff and lack of MFAT expertise

7.3 Basic project cycle management also weak

Deficiencies in project cycle management practices were also apparent

Some of the problems identified in previous chapters appear symptomatic of a lack of basic project cycle management (PCM) practices within MFAT over the evaluation period. PCM comes in various forms, but may be described as comprising six phases:

- **Programming**: during this phase the main objectives and sector priorities for intervention are identified, and indicative programming and strategy documents drafted. The problem analysis with verification of ideas also takes place at this stage of the project cycle.
- **Identification**: during this phase a pre-feasibility study is carried out and a preliminary project proposal is drafted and the consistency and relevance of the action proposed is assessed against the policy and strategy frameworks programmed.
- **Formulation**: in light of the results of the feasibility study to be carried out at this stage, the project proposal is finalised and equipped with a sound activity and financial plan.
- **Financing**: during this phase the applicant signs the contract and receives the financial resources to start up the project activities.
- **Implementation**: during this phase the project activities are implemented, the results obtained and the project purpose achieved. Process monitoring and evaluation are planned and executed throughout the project life and/or during specific phases. Monitoring may be conceived of as a discrete stage.
- **Evaluation/audit**: in this final phase the end-of-project evaluation takes place in order to assess the efficiency, effectiveness, impact, sustainability and relevance of a project in the context of stated objectives. It is usually undertaken as an independent examination with a view to drawing lessons that may guide future decision-making.

Particular PCM weaknesses identified include:

- **Apparent lack of deliberate, mutual decisions regarding changes to Activities**. The change in focus and scope of CIMRIS, while reflected in Activity documentation, appears to have lacked explicit decision-making in the form of formal scope changes. And given the disenchantment from some of stakeholders who requested the assistance in the first place, these scope changes seem to have lacked explicit partner country buy-in. Flexibility and adaptability should not be used as reasons for circumventing robust project management systems.
- **Shortcomings in Activity formulation**. We found that Activity design often focuses on project set-up and upfront costs, and lacks consideration of the on-going operational requirements. An example is the need for on-going training, data management and regional logistics in the observer programme (whether this be donor funded or cost recovered from industry). More generally, we heard stories of cases (out of scope of our evaluation) where (for example) boats have been purchased but lying idle due to lack of thought as to on-going fuel and maintenance requirements, and information-based projects initiated without building in future needs for enhancements to data management systems. This calls for whole-of-life costing at the project appraisal stage

(and consideration of *who* will pay for these costs). It also requires realistic monitoring and decision-making on projects throughout their life. The reality seems to have been that, in a complex governance environment, these are difficult standards to meet so decision-making focuses more on what can be agreed, leaving difficult future issues for later.

- Relatedly, the WorldFish example discussed above illustrates the perils of not undertaking robust economic, supply chain analysis and social research and of failing to account for total costs. This requires economic expertise, participatory planning and community development expertise, and commercial nous – skills that a number of interviewees observed as lacking in MFAT.
- **Little in the way of meaningful measurement**. At the Activity level, we found the information in the monitoring and evaluation documentation generally precluded assessment of whether the stated objectives had been achieved. With the exception of the evaluation of the WorldFish livelihoods development project, reporting is typically at a low level (documenting outputs such as reports generated) and qualitative in nature. The narrative produced does not relate these outputs to impacts, so their contribution to the achievement of objectives is unclear. There appears to have been little effort to establish measureable baselines, or track quantitative measures in any meaningful way.
- **Heralding unplanned outcomes as evidence of success**. We encountered examples of unplanned outcomes held up as evidence of the success of Activities. In Solomon Islands for example, the employment generated at the Soltuna cannery was not a planned objectives of the SIMROS/MSSIF, but was a fortuitous effect of the programme-funded staff being capable of assistance and available in-country at the moment the company came into serious financial difficulty.
- **Lack of a feedback loop from monitoring and evaluation**. We did not find evidence of findings from evaluations being actively used to inform the selection and design of future Activities. This has risks that run two ways: the potential to repeat mistakes from the past, and the possibility of missed opportunities to build on and replicate successes.

Since July 2011, the International Development Group (IDG) in MFAT has introduced Programme and Activity (project) management processes, which incorporate PCM practices. IDG is also building a results-based management culture. This includes developing Results Frameworks at Programme and Activity level that comprise:

- A Results Diagram (essentially an intervention logic diagram)
- A results table (which includes indicators and targets against key outputs, and short-, medium- and long-term outcomes), and
- A monitoring and evaluation plan.

7.4 The balance of support

Support has emphasised fisheries management over development, and oceanic over coastal fisheries

Support for the regional agencies dominated spending over the evaluation period, followed by IS programmes in two countries. Support for sub-regional initiatives did not feature in the sector programme over this time. Over the period, New

Zealand funded one small Activity with explicit fisheries development aims (the WorldFish project).

The sector programme has had an emphasis on fisheries management over development, and also on oceanic over coastal fisheries – largely as a result of the high proportion of spending on regional agencies. As noted above, coastal fisheries was a significant gap over the evaluation period, both in New Zealand's programme of funding, and in the work programmes of regional agencies.

7.5 Policy coherence

Policy coherence for development (PCD) is a key component for promoting development and responding to global development challenges. It seeks to ensure that government policies on issues which go beyond aid and development assistance are supportive of, or at least do not undermine, their development-focussed policies. It is both about 'doing no harm' to developing countries by ensuring that progress towards a donor's development assistance goals is not undermined by policies to advance domestic objectives, and is also about identifying synergies and win-win scenarios where domestic policies support development goals as well as securing other objectives.[35]

In recent decades, the OECD has formally pursued PCD as part of its overall development strategies. In June 2008 OECD Ministers adopted the OECD Ministerial Declaration on Policy Coherence for Development.

PCD is part of the New Zealand Aid Programme's *International Development Policy Statement*: '[t]he NZ Government seeks to ensure the coherence of policies in areas such as trade, migration, investment and the environment so they are consistent with international development commitments and goals.'

7.5.1 New Zealand's engagement in the region

Policy coherence has not been an explicit objective of the Pacific fisheries Programme over the period of the retrospective evaluation (2003-2010). We were nevertheless asked to explore the coherence and perceived consistency of New Zealand's contributions and engagement in Pacific fisheries Activities. Our findings with respect to strategic coherence across the sector programme are traversed in 7.1, above.

NZ acknowledged as having multiple roles in Pacific fisheries, which are generally perceived as being well managed...

With respect to coherence between the respective policy engagement from MFAT and MPI, interviewees reflected broad recognition of New Zealand's multiple roles – as donor, fishing nation, and member coastal state. There were some views that these multiple roles are generally well-managed, and that the messages from the two agencies are reasonably consistent. But there were alternate views expressed that the dual role of donor and fishing nation produces inherent tensions in New Zealand's regional engagement. There was some sympathy for this situation,

[35] OECD (2009) *Building blocks for policy coherence for development* (OECD: Paris, France).

with one respondent describing it as '*the sharp end of fisheries management*'. Some noted that supporting PICs to increase access fee revenues and engagement with other DWFNs has adverse implications for New Zealand's own fishing interests.

A number of interviewees commented on the tenor of New Zealand's engagement in the region. New Zealand interviewees were generally of the view that New Zealand maintains a special relationship with PICs, and is considered by PICs to be a well regarded good neighbour. However, views obtained in partner countries were more mixed. While we encountered widespread appreciation of New Zealand's funding, some thought that New Zealand's attitude to regional engagement was inclined to be a bit '*arrogant and insensitive*' and becoming a bit more '*big brother*' as it aligns itself more with Australia.

... though partner countries had mixed views on the tenor of NZ's engagement

7.5.2 Potential for greater cross-sectoral coherence

Issues were raised by interviewees in relation to broader policy coherence, mostly noting the potential for synergies in areas such as renewable energy and education/scholarships. A lack of coherence with New Zealand's seasonal employment programme was singled out by one respondent as a particular area where there is scope for better alignment.

7.5.3 Room to improve donor co-ordination

A number of interviewees spoke of poor donor co-ordination (particularly in Kiribati where they are seen to be '*tripping over each other*'[36]) though a number thought that it has improved in recent times. We note the recent (2010) review of national development planning under the Cairns Compact in Kiribati uncovered significant room for improvement with respect to donor co-ordination. Recommendations from the review team included development partners (donors) taking full account of the need to reduce the burden of aid management on the government of Kiribati, devoting sufficient resources to effective policy dialogue and accepting more flexible and predictable forms of aid.[37] While we heard some views that co-ordination in the region is now better than it was, we note that the entry of new donors such as the World Bank to the Pacific fisheries scene is likely to increase the challenges.

We heard about the risk of duplication between IS projects and the work of the regional agencies. In one instance, a partner country requested FFA funding for a consultant to develop a Tuna Management Plan, to be told that this is a service FFA provides directly. In another case, SPC was told by New Zealand to '*butt out of bilateral projects*' unless they would work with the programme – despite the donor programme potentially cutting across SPC work. This appears to be a co-ordination issue that could easily be resolved – one respondent remarked that AusAID takes a

Room for improved co-ordination between donors (e.g. roundtables), and between bilateral IS work and that of regional agencies

[36] Though we also heard views that PICs' approaches to multiple donors contributes to the lack of co-ordination.

[37] Pacific Islands Forum Secretariat (2010) *Cairns Compact for Strengthening Development Coordination in the Pacific: Peer reviw of the Republic of Kiribati*.

more roundtable approach to working with the regional agencies. A more co-ordinated division of labour would enable cost efficiencies. We understand that FFA is working to develop a more coherent view of donor and regional agency efforts across PICs.

We also heard widespread concerns about decisions at the political level (both within donor and partner countries, and in regional Leaders' fora) disrupting existing work programmes.

7.6 Gender considerations not a feature of the sector programme

None of the Activities within the sector programme has had an explicit objective to address gender issues and improve the quality of life for women in the Pacific.

Gender considerations have not featured in the sector programme, and some stakeholders were of the view that NZ is not interested in 'hand waving and gender rights'

Some interviewees told us that New Zealand has explicitly said it's not interested in funding '*hand waving and gender rights'*. Conversely, others were of the view that donors in general are (at least in more recent times) actively encouraging the training of women by regional agencies.

Consistent with the Moser Framework, a focus on gender could be expected to include one or more of the following: a reduction in the income differences between men and women; equal opportunities for training between men and women; improved employment conditions for women; opportunities for women to participate in decisions that affect their lives; and avoidance of inflated prices for staple household food items (in this case, fish). None of the Activities were designed to achieve such outcomes.

We did not encounter any examples of deliberate attempts to proactively engage women in the development and governance of any of the Activities. We did find a tendency to superficially brand projects that happened to involve women as 'gender projects'.

With respect to oceanic fisheries, the employment opportunities for women in the tuna industry are largely on-shore, in processing facilities (canneries and loining plants), clerical roles and domestic marketing. Work on fishing vessels and also commercial marketing is generally undertaken by men.[38] For those women with data-processing and science-based skills there are opportunities but the numbers involved are minimal in relation to the large proportion of low-skilled unemployed women (as well as men) in the PICs.

Employment opportunities for women in the tuna fishing industry are limited...

In relation to New Zealand's sector programme of support, the majority of employment benefits for women resulted from the investment in Soltuna, which helped to create hundreds of jobs for the plant's predominantly female workforce. Some local women have been trained as observers in the region, but the working conditions are reported to be unacceptably dangerous. The observer debriefing role is potentially an option as this is

[38] DEVFISH project (2006) *Gender issues in the Pacific Islands tuna industry* (FFA and SPC).

shore-based, but requires employees to have previously worked on-board as observers. In Kiribati, neither the Marine Training Centre nor the Fisheries Training Centre accept female recruits (because the industry will not employ women – we were told that the pole and line crews trained by the FTC require physical strength and endurance).

... and there are concerns that the presence of fishing crews encourages prostitution, including the sale of daughters' services in exchange for fish

General concerns exist regarding the downsides of female employment in the industry, including poor working conditions in processing factories, the workload with domestic responsibilities and childcare issues (DEVFISH, 2006). Prostitution to the crews of fishing vessels (including the sale of daughters' services in exchange for fish) was noted as a concern by interviewees in both Cook Islands and Solomon Islands, and in New Zealand.

With respect to the WorldFish project, over the first three years, 52 growers earned income from the project and 73 were trained – of those 73, 13 were women. Of these 13, seven did not start farming, three dropped out and three were reported as working – a retention rate approximately half that of the males.

Fish is a staple food item for households in most Pacific countries. Coastal fishing is a way for women to supplement their household income to provide cash for the payment of school fees, clothing and other items that cannot be grown, harvested or made from their own resources. In at least three of the countries studied (Cook Islands, Solomon Islands and Kiribati) we heard that people are concerned about reduced catch of coastal fish: '*some of the fish shops in town close from time to time because they have no fish to sell. How ridiculous is that in a Pacific Island country?*' Interviewees told us that the ability of women to generate a cash income from the coastal fishery is being impeded by the lack of basic facilities such as dugout canoes and freezer storage.

Reduced coastal catches threaten women's food gathering and cash-generating activities

8. Findings against DAC criteria

8.1 Research questions and focus areas

This section summarises our findings against the Organisation for Economic Cooperation and Development's (OECD) Development Assistance Committee (DAC) criteria for evaluating development assistance. [39]

The following table summarises our main research questions and shows how these align with the DAC criteria.

Table 8 Alignment of key research questions with DAC criteria

Key research question	DAC criterion
Has the sector programme been effective?	Impact Effectiveness Sustainability
Has the sector programme been relevant?	Relevance
Has the sector programme been efficient?	Efficiency
How has the sector programme contributed to equity?	Impact
Were the stated objectives and foci the right ones?	Relevance
Has the overall balance and modality of investment been appropriate?	Relevance

8.2 Impact

New Zealand's support for the regional agencies ($34m out of a total $59m) has contributed to the management and assessment of tuna stocks. FFA's support for tuna management measures (such as the development of Tuna Management Plans) has assisted Pacific Island Countries (PICs) to increase their government revenues from licensing arrangements.

SPC's tuna stock assessments are regarded by stakeholders as being of a high standard, and are routinely subject to peer review. They show that stocks of two key tuna species are reaching sustainable limits. New Zealand's support for tuna tagging was considered instrumental in kick-starting this programme, which contributed to tuna stock assessments.

Project-specific funding for the regional observer programme has assisted in training observers to collect data that may be used in both scientific research and compliance enforcement, with improvements to compliance data management currently being investigated.

[39] OECD Development Co-operation Directorate *Criteria for evaluating development assistance.* http://www.oecd.org/dac

The regional agencies have also assisted members to participate more actively and confidently in regional negotiations.

Funding for the two IS programmes comprised over a third of total support over the period ($20.6m). Both programmes assisted with the introduction of corporate systems such as financial management and HR processes. SIMROS/MSSIF supported the development of tuna management policies and processes that led to a substantial increase in licence fees. CIMRIS funded the development of oceanic plans and regulations, but otherwise focused largely on coastal water quality. It supported the development of foundational initiatives to manage the Takitumu lagoon, but water quality is yet to improve.

8.3 Effectiveness

Total funding for the regional agencies accounted for around 60% of total support. Evidence shows this has been money well spent, with the advice and services provided by these agencies being widely perceived as high quality. This finding is consistent with the conclusions of the recent independent reviews of these agencies.

New Zealand's support for IS programmes has been appreciated by partner countries, with both being credited by some interviewees to a lift in organisational capability and reputation.

- In Solomon Islands, the programme assisted with oceanic fisheries management, but implementation of policy work in community-based fisheries management appears to have been hampered by lack of capacity and resources at the provincial level.
- In the Cook Islands, the IS support ultimately delivered little in the way of oceanic fisheries management outcomes, leading to some disappointment from local stakeholders.

Over the evaluation period, New Zealand directly supported one economic development programme, providing $1.4m over five years for a project delivered by WorldFish to train villagers in Western Province in Solomon Islands to grow giant clams and coral for export to the US aquarium trade. This project was never commercially viable, and did not meet its stated development objectives. However it led to some positive spin-offs in the form of subsequent projects and New Zealand's commitment to Solomon Islands immediately after the ethnic tensions was widely recognised and appreciated.

8.4 Sustainability

We found a lack of up-front analysis and planning for on-going sustainability, including the donor exit strategy. This was particularly evident in the WorldFish project, and we also heard concerns about the sustainability of the observer programme when New Zealand funding ceases in 2014. More rigorous ex ante project appraisal and application of project management disciplines would help avert these problems in future.

Individual staff members who benefit from strengthening become attractive to the regional agencies and other governments, and are often headhunted – though sometimes return home, bringing with them new skills and perspectives. And the corporate systems implemented through IS programmes have proven vulnerable to disruption at political and management levels. We found a number of factors that are critical to the on-going success of

IS programmes, some of which are outside a donor's control, but others which can be managed more effectively (such as the selection process for in-country Technical Advisors, and the application of best practice IS principles).

8.5 Relevance

Historically, there does not appear to have been programme-level selection and prioritisation of Activities within the sector programme. This reflects its origins as a collection of bilateral IS programmes and support for regional agencies, rather than a strategic, sector-based programme. Stakeholders were generally unclear as to why particular Activities have been selected, why they are priorities for fisheries, and how they contribute to the sector programme-level objectives. Some funding (such as support for Cook Islands) appears to reflect New Zealand's foreign policy goals as much as fisheries objectives.

In terms of whose objectives are being met, PIC members consider that the services delivered through the work programmes of the regional agencies reflect their (PICs') priorities. Project-specific funding provided by donors through regional agencies and bilateral IS programmes is considered by stakeholders to reflect donor objectives, whereas programme-based funding enables PICs to fund their own priorities.

We encountered some views that the flexibility provided under MSSIF allows more alignment to Solomon Islands priorities (than under SIMROS).We found that CIMRIS drifted away from its original objectives, leading to some views in the Cook Islands that there was ultimately a mis-match between expectations and what was delivered.

8.6 Efficiency

The services and advice provided by the regional agencies are viewed by members as representing good value for money. In our view, there are clear arguments for on-going regional provision of some services, particularly where there are obvious economies of scale and scope and a lack of national capacity (e.g. monitoring, control and surveillance). In light of this, and member countries' positive perceptions of the value of services from the regional agencies, we think the continued support by New Zealand for these agencies is entirely appropriate.

The IS efforts in Solomon Islands appear to have delivered better value for money than CIMRIS. The long-term 'residential' approach appears to have assisted in this regard, as well as a clearer focus on oceanic fisheries management. Value for money could be enhanced in future IS efforts by:

- Focusing on countries where there is sufficient national capacity to justify stand-alone national fisheries administrations, and
- Providing support at a lower intensity but over a longer time period, to ensure support is within the absorptive 'bandwidth' of the country, to minimise the gaps that open up when the support ends and to provide plenty of time for the benefits to be realised.

The WorldFish project delivered poor value for money as it was not commercially viable and did not achieve its objectives. Value for money in economic development projects could be improved in the future by:

- Undertaking more robust ex ante project appraisal that includes supply chain analysis and considers the on-going operational requirements and costs, and
- Using this analysis to select development projects on the basis of social and economic viability (i.e. that are likely to succeed).

8.7 Human rights and gender issues

Gender considerations have not featured in the sector programme. None of the Activities had an explicit objective to address gender issues and improve the quality of life for women in the Pacific, and we did not find evidence of local women being actively encouraged to participate in the development and governance of Activities. We did uncover a temptation to superficially brand projects that happened to involve women as 'gender projects'.

Employment opportunities for women in oceanic fisheries are primarily on-shore (canneries and loining factories), around which there are general concerns about employment conditions. Employment as observers on vessels reportedly poses safety and human rights issues for both men and women. There are also concerns that the presence of fishing crews encourages prostitution.

In coastal fisheries, we heard concerns that the ability of women to gather fish for food and to generate cash income is being impeded by a lack of basic facilities and reduced catch of coastal fish.

9. Analysis

9.1 What's worked well and what hasn't

9.1.1 Institutional strengthening: critical success factors

The IS programmes in the Cook Islands and Solomon Islands delivered mixed results. Both saw the introduction of corporate systems such as financial management and HR processes. However, these systems have been vulnerable to disruption and change at the political and management levels. SIMROS/MSSIF supported the development of tuna management policies and processes that led to a substantial increase in licence fees. CIMRIS funded the development of oceanic plans and regulations, but otherwise focused largely on coastal water quality, which is yet to improve.

The success and sustainability of IS efforts relies on the alignment of a number of critical success factors, not all of which are within a donor's control

The success and sustainability of IS efforts appear to hinge on the alignment of a number of key factors:

- **Needs and purpose** – there is clear mutual agreement between partner and donor on the needs and objectives, and the design of the programme is matched to these needs.
- **Context** – the local environment is well understood, including the capacity of local staff, the existing systems, and the broader institutional context. Interviewees mentioned the need for the 'pillars' of governance, accountability and transparency in the wider public sector to be sound in order to make traction with an individual agency. In Solomon Islands, this was clearly not the case when SIMROS was initiated. This is particularly important in fisheries, where a prime focus is on increasing general government revenue from access fees (requiring robust fiduciary systems for receiving and managing this revenue).
- **Political will and consistency** – the initiative has political support that is not disrupted by changes in government or individual Ministers.
- **Management buy-in** – the organisation itself is ready and willing to be 'strengthened', and operating under a capable and committed PS. There are clear and well-managed communications about the purpose and nature of the programme to all staff, so everyone knows what is happening and when, and where they can go for help.
- **The right TA** – the right fit of TA is selected for the model of IS and the working environment, and the partner country has a strong voice in consultant selection. The TA must not only have the right mix of technical skills and practical experience but also have the personal skills to work with local people within the local context.

Clearly donors have limited or no control over some of these factors (in particular, political changes), but need to design their efforts around realistic assessments of these factors and be nimble enough to respond to changing realities on the ground. The new approach for MSSIF was applauded as enabling local flexibility within broad controls. However, we would caution

that significant changes in focus or approach should be implemented as explicit and mutual project management decisions, in order to guard against the policy drift discussed earlier.

Stand-alone national fisheries administrations may not be sustainable in some smaller PICs

More generally, is it questionable whether it is worthwhile for some of the smaller PICs to attempt to build national fisheries administrations (the option being to contract in services). This would have implications for where New Zealand may choose to focus any future IS efforts.

There is a wealth of institutional knowledge and best practice to draw on in this space

Building strong institutions has been recognised as one of the central challenges of development especially since the World Bank highlighted the issue in its World Development Report 1997.[40] The World Bank website provides a gateway to the extensive on-going research and evaluation effort in this crucial field. We encourage MFAT to draw on this wealth of expertise, and ensure its in-country TAs are well versed in best practice IS principles.

9.1.2 Advice and services from regional agencies

As discussed above, we encountered widespread views from stakeholders in member countries that the services and advice provided by the regional agencies are of high quality and reflect the priorities of PICs. Support from FFA was widely attributed as assisting members to participate more actively and confidently in regional negotiations.

However, the historic focus of these agencies' work programmes on oceanic fisheries has meant that funding over the evaluation period has provided less support for coastal fisheries management and development, a gap which is discussed further below in 9.3.2.

Project-specific funding for the tuna tagging programme has contributed to tuna stock assessments. And funding for the observer programme has assisted both with scientific research and compliance enforcement, though appears to entail significant safety risks to observer staff, particularly women. More rigorous application of PCM practices, in particular ex ante project appraisal and design, should help identify and mitigate such risks prior to implementation. This is discussed further in 9.4.2.

9.1.3 Livelihoods development: a need to select for viability

Livelihoods development project should be selected for their social and economic viability, informed by more robust ex ante appraisal

The failure of the WorldFish project also points to a need for more robust ex ante project appraisal. Had economic and market chain analysis been undertaken, it seems unlikely that this project proposal would have been assessed as having a 'very

[40] World Bank (1997) *The state in a changing world.* World Bank Development Report (Oxford University Press: New York, US).

high probability of success', though we speculate that some type of related project may have been pursued anyway, for foreign policy reasons. In relation to this latter point, we stress that the critical thing is for decision-making to be explicit and deliberate about what projects are funded and why.

The decision to expand support to more remote farmers demonstrates a lack of adherence to PCM processes. Should a formal change request have been submitted, supported by economic analysis of the impacts of the scope change, the decision may have been different.

9.2 Specifying objectives – picking a niche

One of our research questions relates to whether the stated objectives and foci of the sector programme were the right ones, or whether we think there were more appropriate objectives. We were also asked to provide advice on the relative priorities afforded to the objectives.

As noted above (and summarised in Figure 5), the goals and focus of New Zealand's support for Pacific fisheries has evolved over time. Over the evaluation period it focused on organisational/institutional strengthening and funding for the core work programmes of the FFA and SPC. Current support includes making markets function better, facilitating trade, helping producers move up the value chain, and supporting related technical and vocational skills and research activities (*International development policy statement*, p.6).

A fisheries sector strategy is currently under development, and has a draft goal to 'increase the returns from sustainable fisheries' (*NZ Aid Programme Sector Priorities 2012-2015, p10*). Outcomes articulated in the *Sector priorities* document are:

- Increased revenue, income and employment from sustainable fishing, and
- Fish stocks restored and maintained and local food security preserved (*NZ Aid Programme Sector Priorities 2012-2015*, p10).

We have two main reflections on this topic.

1. There is nothing wrong with the current high-level objectives for the sector, but they are not supported by a coherent programme of Activities. In addition, the programme of sector support reflects geopolitical drivers as well as fisheries aims. An example is the support for the fisheries administration in the Cook Islands – a country which has a special relationship with New Zealand but for whom commercial (tuna) fishing is of modest importance compared with other PICs such as Kiribati where it is of vital economic importance.

2. At present New Zealand is noted for its flexibility and responsiveness, but not for any particular specialisation.

Selecting a specialist niche based on NZ's comparative advantage could increase the coherence and improve the value for money of the sector programme

In order to address both these issues, and thereby maximise value for money, we recommend using centralised sector programme governance to move over time to a single motivating philosophy for the fisheries sector programme. That is, having a coherent theme based on a specialist niche where New Zealand can add particular value.

We stop short in this report of recommending what specialisation New Zealand should select for its future support for Pacific fisheries – we think this is for MFAT to decide. But in terms of how to make this decision, we suggest considering how New Zealand's comparative advantage in fisheries intersects with the development needs of PICs.

The draft *IDG fisheries sector strategy* describes New Zealand's comparative advantage as follows:

> *[a]s a Pacific coastal state with a significant fishing industry, New Zealand brings experience in innovative fisheries governance and implementation approaches. We have experience in meshing indigenous, commercial and customary interests into coherent management frameworks. These attributes have contributed to an internationally competitive seafood sector (capture and aquaculture), with large and growing Maori commercial interests, that makes a significant contribution to our cultural, economic and social wellbeing* (draft *IDG fisheries sector strategy 2012-2015*, p.1).

What appears to be missing from the strategy is how New Zealand's aid will translate this comparative advantage into development support that is effective and targets the needs of PICs. In other words, there is a need to select the mode/s of delivery for bilateral support that best capitalises on New Zealand's strength in developing and implementing fisheries governance and management frameworks.

The selection process for TAs should be reviewed, to identify how to make better use of NZ's talent pool and achieve better matching of consultants to the local environment

On the face of it, the comparative advantage as stated seems to lend itself to providing IS. However, the provision of TAs to national fisheries administrations has had mixed results in the past, due in large part to the selection of individuals. We suggest investigating whether recruitment processes can be improved to make better use of New Zealand's talent pool and achieve better matching of consultants to the local environment.

9.3 Balancing support – a portfolio approach

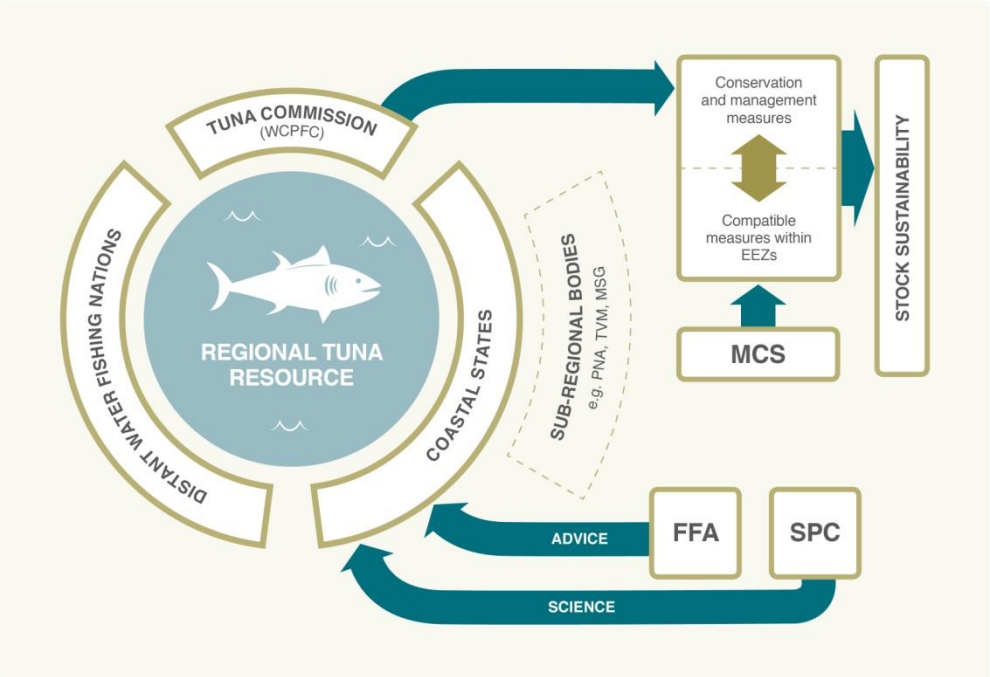
A coherent and balanced portfolio of projects should be deliberately selected, focused on the selected niche

Within the selected theme, we suggest that New Zealand develops an investment portfolio that reflects a deliberate mixture of likely successes and 'quick wins' (supporting things that are already working well) and more difficult projects (perhaps where there is the greatest need but also greater chance of failure). Some projects require a commitment to be in it 'for the long haul', and may involve long-term investment in operational matters such as data management, that lack donor visibility.

9.3.1 Point of intervention

In oceanic fisheries there are points of intervention at the regional, sub-regional and national levels; in coastal fisheries support can be directed at national or local/provincial government levels, or provided directly to community-based management and development initiatives. These points of intervention are illustrated in the following diagrams.

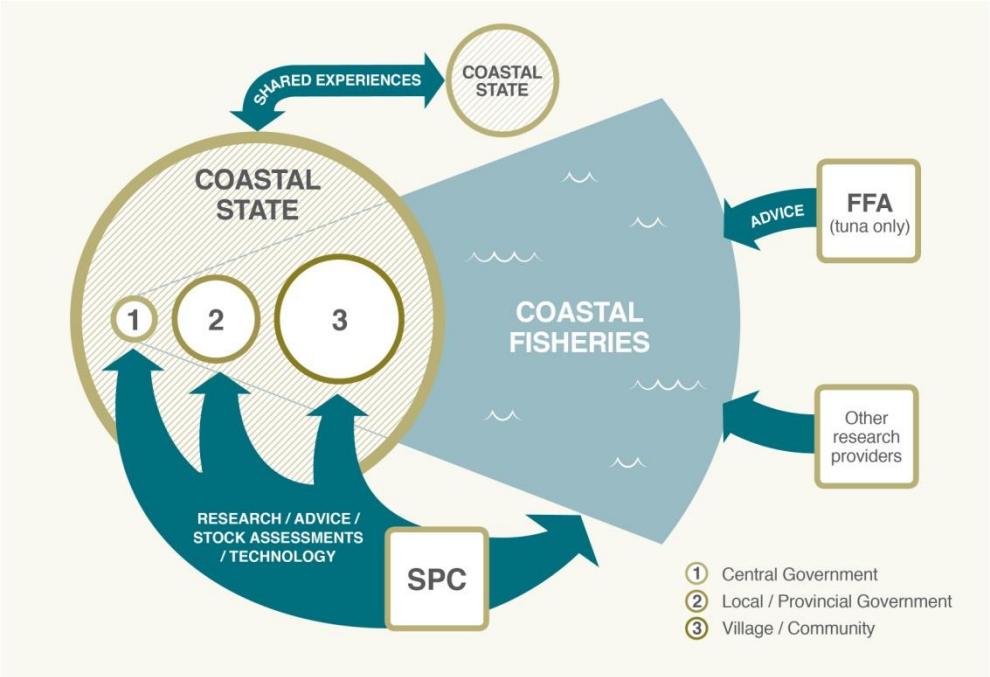
Figure 13 Points of intervention: oceanic fisheries



Source: Evaluation team

Note: This diagram seeks to illustrate the potential points at which a donor may provide support; it does not show the full array of institutional and functional relationships.

Figure 14 Points of intervention: coastal fisheries



Source: Evaluation team

The sustainability of fish stocks is crucial, and the key management elements (property rights, quality information/data, alignment of incentives and effective monitoring, control and surveillance) need to be established regionally and nationally.

There are convincing arguments for on-going provision of some services by regional agencies, particularly where there are obvious economies of scale and lack of national capacity... and continued NZ support for these agencies is appropriate

In our view, there are convincing arguments for the on-going provision of some services by the regional agencies, where there are obvious economies of scale and scope (such as science capability), and a lack of national capacity. For example, some countries can manage the operation of their national MCS work given assistance from the FFA, and regular surveillance support from New Zealand, Australia and the US. They are, however, unlikely to ever have the national capacity to actually conduct effective MCS operations entirely on their own. In light of this, and member countries' positive perceptions of the value of services from the regional agencies, we think that continued support by New Zealand for these agencies, as part of an investment portfolio, is entirely appropriate.

However we note that there are inherent tensions with regional approaches to management, such as the desires of some PICs to have local observers used on vessels in their EEZ (which poses additional logistical challenges).

Active, regional co-ordination of staff development could support national IS efforts and address concerns about losing good staff to the regional agencies

Picking up on the concerns raised in-country about good staff being recruited by the regional agencies, we also see potential in looking to a more active and regional approach to HR development. This could involve more co-ordinated efforts with the FFA and SPC to more deliberately grow the capability of PIC people and moving them through opportunities in national and regional fisheries roles. This could dovetail with national-level IS programmes to build regional capability in fisheries management and development.

Sub-regional initiatives such as the PNA have demonstrated their value and effectiveness in increasing returns for member countries. New Zealand could consider building on these successes by providing greater support at this level, to help consolidate property rights and ensure sustainability of the resource, raise the price of access, and add value to fisheries products (such as the PNA and analogous initiatives). However, we are mindful of the inherent tensions and challenges in this space, and the need for wider regional discussions in the management of the shared fisheries resource. We also understand that governance and institutional arrangements need to continue to mature to deal with these challenges. In light of this, and the wide divergence in the capacity of individual PICs to manage their fisheries, support for sub-regional management efforts may best be done by focussing on individual member countries with the highest dependence on their fisheries resource and with the most to gain (in particular Solomon Islands, Tuvalu and Kiribati).

Bilateral support should focus on building complementary national capacity – with IS programmes being less intensive but over longer time frames

Support at the national level should focus on building complementary national capacity, where there is sufficient scale to justify stand-alone national fisheries administrations. Mindful of the absorptive capacity of PICs (the 'bandwidth' issue mentioned earlier) and the preferences expressed by people we spoke to in-

country, we suggest that support for IS programmes should be less intensive but over longer time frames – potentially implying a lower proportion of total annual spend.

9.3.2 Fisheries management versus development

We discussed earlier the weighting of New Zealand's historic spend in Pacific fisheries towards oceanic over coastal fisheries, driven largely by the high proportion of total spending being on support for the regional agencies. Funding for these agencies has contributed to the management and assessment of tuna stocks. However, the available evidence suggests many coastal fish stocks are becoming depleted, and in the case of Rarotonga, water quality problems threaten health and livelihoods. This has implications for the future ability of locals dependent on these fish stocks to meet their food and cash-generation needs.

We also noted that a focus on oceanic fisheries translates into general revenues at the central government level, whereas successful livelihoods development efforts are likely to have more direct benefits for locals. Many PIC communities are highly dependent on their coastal fisheries – both for subsistence livelihoods as well as economic sectors such as tourism. The critical importance of coastal fisheries, combined with their fragility suggests to us that greater priority on coastal fisheries management and sustainable development activities would be appropriate and timely.

We recommend increased priority on coastal fisheries management and sustainable development

9.3.3 Nature of support

Over the evaluation period, support for the regional agencies comprised over half of total spending, and bilateral support for IS programmes a further third. Direct funding for livelihoods development comprised just $1.4m out of the total $60m. New Zealand's provision of bilateral support has been moving towards a more flexible approach allowing greater partner discretion– and less donor control – about how to spend the money.

The choices around method of funding are discussed in more detail below. But here we suggest that, should MFAT wish to continue to move towards greater partner control of project selection, it could consider providing tools and advice to help partner countries to make sound investment decisions. In light of the gap in coastal fisheries management, and leveraging off New Zealand's stated comparative advantage in 'meshing indigenous, commercial into coherent management frameworks', this could focus on providing expert advice on the design and implementation of community management practices for livelihoods development and food security. The provision of any such advice should be co-ordinated with the efforts of the regional agencies in this space.

Partner control of funding can be supported by providing tools and advice to guide sound investment decisions

9.3.4 Where to support

As noted above, the mix of beneficiary countries over the evaluation period has reflected New Zealand's foreign policy goals as well as fisheries sector objectives. There is wide divergence between PICs in the value of fish in the EEZs, the significance of fisheries to their economy, and their capacity to manage their own fisheries. Support at the sub-regional and national levels could focus on individual PICs with the highest dependence on their

fisheries resources and with the most to gain – and correspondingly the most to lose if management is ineffective.

Quantitative analysis is required to inform the geographic spread of funding

In order to make these decisions, we suggest that MFAT undertakes geographic and sector analysis across the region, using descriptive metrics such as those presented in section 2.5, and including the location and nature of other donors' activity.

This analysis would then need to be overlaid with analysis of PICs' own stated priorities and objectives, and matched with New Zealand's investment niche, to construct a portfolio of partner countries. We believe this process would assist MFAT in making informed and deliberate choices about the geographic spread of its Pacific fisheries sector support.

9.4 Improving decision-making

Part of our brief is to provide advice on how the decision-making processes around the sector programme could be changed to make more coherent and evidence-based decisions about what to fund and where. Based on our findings, we see two levels of decision-making where significant improvements could be made: at the sector programme level, and at the project cycle management level. We discuss each in turn.

9.4.1 Instituting sector programme-level governance

The sector programme to date has not been explicitly managed as a co-ordinated programme; we suggest that it should be. This would involve putting in place a governance structure that makes deliberate and explicit decisions across the Pacific fisheries investment portfolio, i.e. co-ordinating fisheries-related decision-making across the bilateral programmes and the support for regional agencies and employing a consistent set of decision-making criteria. This would involve:

The sector programme should be run as a formal, co-ordinated programme

1. Creating a central oversight and decision-making group for all fisheries-related aid
2. Assigning a responsible owner to each Activity who attends governance meetings to report on progress
3. Standardising reporting on Activity-level process and outputs so that progress can be compared, e.g. on a one-page template
4. Attributing and tracking the full costs of the sector programme consistently over time, and
5. Clearly documenting all decisions across the lifecycle of Activities.

The governance group should operate regular (e.g. six-monthly) decision-making meetings, and quarterly monitoring updates. Its roles would be to:

- Make key gating decisions and manage Activities across their lifecycle, i.e. take decisions to start a new Activity design, begin project funding, approve substantial Activity changes and to end Activities

- Provide ongoing monitoring of project progress and the overall Pacific fisheries context on the basis of simplified project reporting, and
- Ensure clear accountability for success and achievements, and that mistakes are learned from and not repeated.

We suggest that clearer documentation of decisions and results would also help the transfer of institutional knowledge as staff turn over, thereby assisting consistency of approach between MFAT desk officers.

Clearer documentation will smooth transitions when staff turn over

9.4.2 A need for robust project cycle management

In order to redress the deficiencies in PCM outlined in the previous chapter, we have identified the following areas for improvement. Underpinning these specific areas is a need to take a far more disciplined approach to formal PCM procedures to avoid issues such as the policy drift and disillusioned beneficiaries we saw in the case of CIMRIS.

More robust project cycle management should focus on improving the quality of processes and ensuring that the procedures applied are proportionate to the size of the project

The emphasis should be on improving the *quality* of these processes, rather than generating more elaborate bureaucracy. Also, the processes applied should be *proportionate* to the size of the project, with larger projects attracting commensurately deeper ex ante analysis, and higher levels of scrutiny and on-going monitoring.

Selecting for sustainability

Economic development projects – artisanal through to industrial scale – should be selected on the basis of reasonable expectations of financial viability and sustainability. The likelihood of success can be improved by more rigorous ex ante project appraisal. This requires economic supply chain analysis, and whole of life costing (i.e. consideration of the on-going operational costs and requirements, as well as up front set-up costs). This will require MFAT to build its capacity in economics and commercial analysis.

MFAT will need to build its economics capacity in order to undertake more robust ex ante project appraisal

The WorldFish case study highlighted the perils of not undertaking robust economic and commercial analysis. While some of the factors contributing to the failure of the venture were external, supply chain analysis at the outset, and at the point where expanding to more remote farmers was being considered, would have revealed flaws in its financial viability.

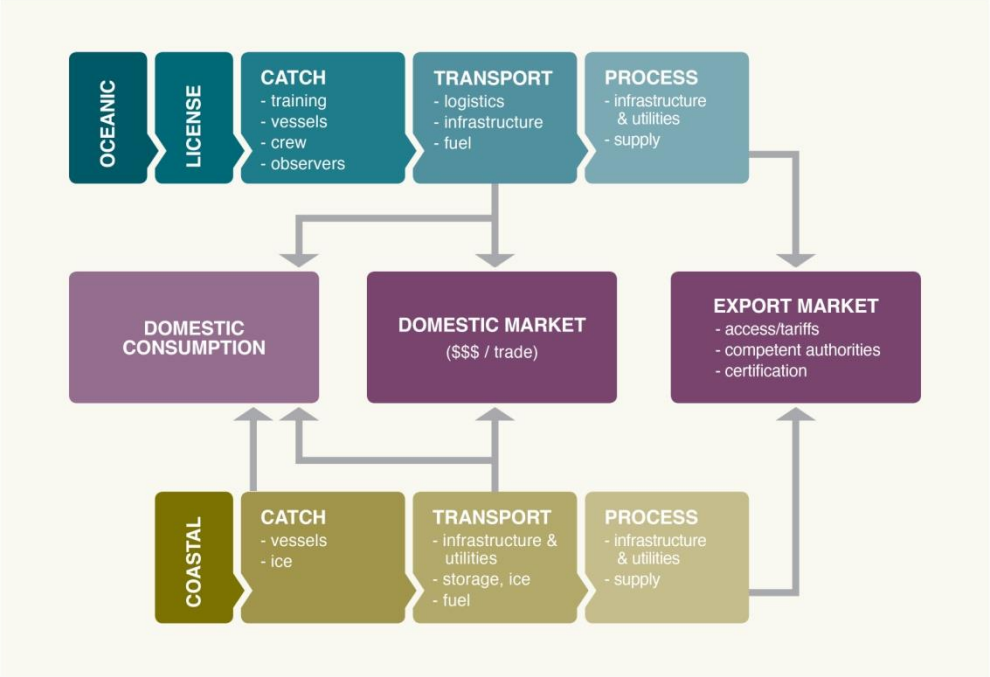
The following diagram illustrates the various points in the supply chain for oceanic and coastal fisheries operations, and indicates some of the components in each. It is not intended to be comprehensive, but rather to prompt consideration of the full range of factors that can influence viability. Both current and expected future trends in these factors should be considered. For instance in the case of fuel, forecasts/scenarios for oil prices should be factored in to the investment appraisal.

This highlights a number of opportunities for future support including:

- Regional pooling for (for example) training, transportation, fuel purchase

- Local infrastructure and market development, and
- Access to international markets (including trade/negotiation advice, competent authorities, certification/branding).

Figure 15 Fisheries supply chain



Source: Evaluation team

9.4.3 Designing individual Activities

Objectives should be more specific and realistic – focused on metrics that matter

In designing individual Activities, we recommend that objectives be clear and specific, with explicit intervention logic that explains the causality from the Activity. With this point in mind, Activity-level objectives should be realistic and far fewer than in the past. There should also be partner buy-in and community engagement to setting objectives, and formal change processes for any alteration to these objectives.

We recommend that consideration of cross-cutting issues (environmental, gender and human rights impacts) be 'mainstreamed' by being built into the project selection and design, rather than regarded as add-ons or not considered at all. This includes considerations such as the working conditions for both women and men in efforts to stimulate job creation.

We were told that such mainstreaming of gender analysis has always been a requirement of the New Zealand Aid Programme, with gender equality and women's empowerment being a central commitment since the 1998 Gender and Development Policy of MFAT's Development Co-operation Division. Requirements to mainstream gender analysis were mandated by Cabinet in 2002 when NZAID was established, and again when NZAID was

integrated back into MFAT. However, we saw no evidence of these requirements being adhered to in the Activities we reviewed.

More comprehensive ex ante appraisal will help identify and mitigate adverse impacts, and identify potential for linkages with work in other sectors

Policy coherence could be strengthened by ensuring that ex ante analysis is sufficiently cross-sectoral, and investigates linkages with work in other sectors, such as renewable energy and infrastructure (e.g. the potential for solar energy sources, and the need for consistent water supply).

9.4.4 Planning the exit at the outset

For time-bound Activities, the donor exit strategy should be planned at the outset, and this plan adhered to

For time-bound Activities, the donor exit strategy should be built into project design, and clearly understood by all parties. This was not the case for the WorldFish project. And as discussed above, the cost recovery arrangements for the observer programme appear unlikely to be developed in time for the cessation of New Zealand funding. In our view, this highlights both the need for the on-going operational requirements of projects to be better considered at the design stage, and for the donor exit strategy to be clear and well-managed from the outset.

9.5 Monitoring results

As discussed above, monitoring and evaluation has typically been qualitative in nature, focussed on outputs, and silent on how these outputs contribute to the desired outcomes. This approach has led to the generation of reams of narrative reporting and detailed logframes of outputs, but little meaningful information on the impacts of the funded Activities. In our view, reporting needs to be both simplified – to focus on metrics that matter, and its quality improved – by gathering quantitative data to support the qualitative information.

9.5.1 Improving reporting

In terms of monitoring and evaluation at the Activity level, we recommend a change in approach that simultaneously draws up from the detailed output reporting, and is more realistic in terms of impacts and contribution to outcomes. Essentially, this would involve focusing more in the intermediate area that is largely absent from current reporting conventions, helping to fill the blanks in terms of intervention logic. It would result in fewer indicators that more directly relate to the investments and are more realistic in terms of attribution to high-level outcomes. Optically, this would mean that individual Activities would appear to claim more modest results, probably across fewer outcomes, but the countervailing benefits from Activities will be more realistic and achievable.

We strongly encourage MFAT to commit to quantitative measurement of key statistics and project progress and build that in to standard project governance. Collecting and analysing quantitative metrics will help test and validate the assertions made by stakeholders about the impact of Activities. This requires the collection of baseline data before an

MFAT should commit to quantitative analysis – to support strengthened baseline analysis and on-going monitoring

Activity commences, and monitoring it over time – ideally continuing for a period after the conclusion of an Activity to determine whether results have been sustained.

We suggest the development of a dashboard to enable easy visualisation of progress and development on progress and in the country more broadly. We provide a selection of possible indicators below (Table 9) but note more refinement would be needed to tailor these to the specific requirements. Importantly, indicators need to be chosen to be meaningful but also such that they can be consistently applied and interpreted. A more refined product could be developed in the dissemination stage of this work.

Feedback loops from monitoring should be hard-wired to sector programme governance, ensuring lessons are built on and mistakes are not repeated

Feedback loops from results monitoring to decision-making should be hard-wired through the governance structures. Feedback on results should also extend back to the partner countries and agencies.

We have also considered the reporting requirements at the regional agency level. Each agency has its own reporting framework that is developed within its governance structures (of which New Zealand is a member). In addition, MFAT imposes additional reporting requirements for some projects such as the tuna tagging and observer programmes, to help monitor New Zealand's contributions in specific areas. As discussed above, we found considerable shortcomings with MFAT's internal sector programme reporting.

We reviewed FFA's annual reports and the indicator set that FAME (in SPC) has developed for monitoring the results of its work programme, as well as the Activity-specific reporting in the MFAT sector programme documentation. And we have drawn heavily on data from both regional agencies in the course of our analysis.

We found considerable overlap between the metrics developed by FAME and those we had developed as part of our *Evaluation plan*. FAME has also considered the strengths and weaknesses of each indicator.

In terms of the FFA reporting, we note that the data presented in the annual reports is largely snapshot data (covering the period in question), and posit that the inclusion of cumulative and time series data would help build a picture of the total impacts of programmes over time. For example, the number of observers trained over the period is reported, but not how many trained observers are available to work at a point in time, and therefore the capacity to meet the coverage requirements.

Reporting on work by the regional agencies should leverage off their existing reporting systems, rather than adding on layers of compliance, of dubious value

As a general principle, we suggest that reporting should leverage off the existing reporting systems of these agencies, in order to minimise the compliance costs imposed. Given that New Zealand is a member of both these agencies, and has a strong focus on good governance, we suggest that if MFAT desired enhancements to the existing reporting systems of these agencies, enhancements to reporting should be investigated via participation in these agencies' existing governance arrangements, rather than sought as add-ons which increase compliance costs (and from what we have seen, generate little additional information value).

9.5.2 What to measure?

Taking this approach, we would need to know the confirmed sector programme of future investment in order to construct a well-tailored results framework. But based on the indicative spend, we offer the following indicative suggestions for monitoring. We note that there could be some overlap of indicators, e.g. if the programme is aimed at boosting offshore returns and an in-country TA is seeking to build PIC negotiating capacity with DWFNs. This approach would need to be trialled in order to test its effectiveness, and further work undertaken to specify and confirm the indicators (in particular the governance measures). It could be incorporated into the proposed one-page form that Activity-leads complete each quarter/half year.

Table 9 Monitoring future Activities

Indicative objective	Indicator	Data source
Institutional strengthening		
Improved governance, accountability and transparency	Generic elements: • Discharge of statutory functions • Quality of service delivery • Staff skills and capacity in relation to the roles required of them, and succession planning • Quality and relevance of planning • Opportunities for public scrutiny of proposed policies and practices that affect wellbeing Additional elements specific to the role of fisheries agencies: • Transparency and documentation on issue of fisheries licences and access agreements • Transparency with respect to financial transactions (access and licence fees) • Quality, relevance, ownership, and implementation of fisheries management plans and policies	Qualitative assessment (refer box below) Publicly available information, and evidence of processes to submit feedback
Improved staff skills and capacity	Number of staff 'strengthened' by: • Gender • Formal qualifications (over time) • Role over time, and in which organisation (i.e. their career path – within the agency, the region or internationally) • Quality of outputs (qualitative assessment)	Prospective, longitudinal tracking exercise (retrospective component needed for existing programmes), from pre-intervention baseline and continuing after TAs have left
Improved fisheries management and/or development	To be tailored to the individual programme, but based around the MSC framework and linked with the governance indicators, to cover: • Limits set (for target stocks, taking ecosystem-based approach) • Limits implemented (measures in place, for stocks and habitats) • Measures enforced • Stock and habitat status • Price of fish in local markets relative to e.g. the minimum wage or average weekly household incomes	Ideally, would leverage agency's own reporting framework Data on local consumption and fish prices at local markets

Indicative objective	Indicator	Data source
Fisheries economic/livelihoods development		
Creation of sustainable, economically viable fisheries development ventures	To be tailored to individual ventures, but would capture variables such as: • Net number of jobs created (by gender) (i.e. factoring in any employment displacement from other PICs) • Wages or incomes generated by the venture (annual, by gender), plus profits if relevant • Export revenue generated (if relevant) • Longevity of the venture after donor funding has ceased (number of years) • Contribution of the income generated from fishing projects to enable subsistence households to meet their cash-based requirements	Periodic reporting (project-specific) Number of households meeting their cash requirements through project earnings on a long-term basis
Support for regional agencies		
Country contribution to agency work programme	Use agency's own indicator set	Agency's own reporting framework
Project-specific funding	To be tailored to specific projects, but would use agency's own indicator set. For projects with training and/or employment objectives, we suggest investigating (with the regional agencies) longitudinal tracking of participants to assess their employment and income outcomes over time	Agency's own reporting framework, potentially with supplementation

Monitoring institutional governance: a qualitative approach

A key objective of IS initiatives is improved governance (expressed as 'strengthened accountability, transparency, efficiency and effectiveness') delivered through fisheries administrations.

The issue of good governance is an important one across a range of sectors. For this reason we gave particular attention to the development of measures and indicators in this field. The development of ways of measuring the performance of agencies is problematic. Fukuyama (2013)[41] reviewed a number of approaches including procedural measures, capacity measures, and output measures, and proposed a composite approach based around capacity measures. At the same time, the practical issue of assessing governance in-country is a matter that requires some subtlety, as an external assessment of state agencies needs the co-operation of the agency itself if it is to proceed constructively. For this reason, we have concluded that a qualitative approach is most suitable for assessing institutional governance. This can be complemented by a more systematic assessment of the existence and functioning of systems.

The approach proposed below involves some generic considerations on process and assessment when considering an IS project, supplemented by some measures of specific relevance to fisheries.

Conduct baseline assessment

Before the project design is concluded, the donor should commission an in-country assessment of the prevailing level of confidence (or trust) in the agency as determined by interviews with staff, peers in other agencies, and people in the private sector and civil society. The process should focus in particular on individuals who have an ongoing professional relationship with the agency over the medium-long term (including longstanding clients, collaborators and critics). The key output is a qualitative assessment of the standing of the agency as represented by the consensus of stakeholders.[42]

To give a sense of the overall effectiveness of the agency, the following elements may be included:

- Discharge of statutory functions
- Quality of service delivery
- Staff skills and capacity in relation to the roles required of them, and succession planning
- Quality and relevance of planning.

Additional elements specific to the role of fisheries agencies:

- Transparency and documentation on issue of fisheries licences and access agreements
- Transparency with respect to financial transactions (access and licence fees)
- Quality, relevance, ownership, and implementation of fisheries management plans and

41 Francis Fukuyama (2012) *What is governance?* Centre for Global Development Working Paper 314.

42 We have arrived at this view from consideration of the 'governance' component of national assessments carried out by a team assembled by FFA.

policies.

In addition to establishing a baseline description of the Institution, the assessment may be used to inform a decision on whether to proceed with the project, and/or aspects of the project design.

Ongoing monitoring

At a time commensurate with the delivery of the project (e.g. at the end of the project, and five years after the conclusion of the project), the assessment should be repeated using a comparable methodology in order to provide a qualitative measure of institutional change, the contribution of the project to that change, and the sustainability of change.

9.6 Increasing value for money

Assessing value for money essentially involves comparing the benefits of the sector programme against the costs, and determining whether these benefits could have been achieved at lower cost, or greater benefits achieved for the same cost. In this regard, the first thing we would note is that it seemed unnecessarily difficult to establish the full costs of the sector programme. This was perhaps partly due to the fact that it has not been deliberately run as a programme, meaning we had to reconcile figures from different sources. In addition, the cost of managing the sector programme has not been tracked, and (as noted above) we had to construct an estimate of this.

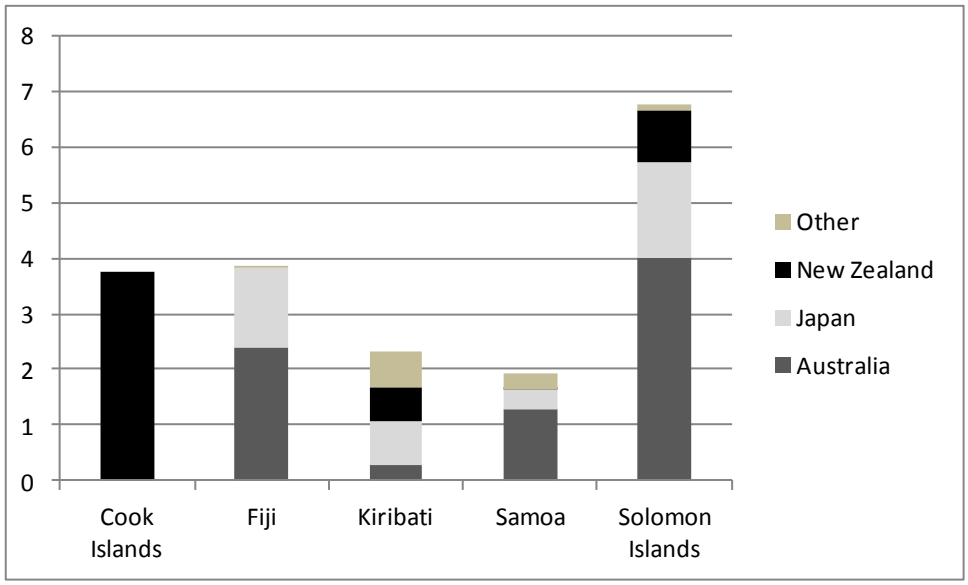
Value for money can be improved by picking a specialist niche, selecting projects that are likely to succeed, and not exceeding the partner country's capacity to absorb funding

In terms of economic development projects, there is clearly scope to improve value for money by selecting enterprises that are likely to succeed in generating sustainable income for local people.

Transcending this, we note that the 'bandwidth' of partner countries – i.e. the size and capability of the local institutions – affects their capacity to absorb donor funding. An over-supply of funding relative to the country's ability to manage that funding can result in wastage and reduced value for money. Allocations within the capacity of the country concerned to administer, provided over longer periods of time, are therefore likely to have more effective outcomes. For IS programmes, this means less intensive funding but for longer – which (in terms of the balance of support) implies that these programmes could comprise a lower proportion of total annual sector programme spending in the future.

The following chart shows bilateral aid funding by donor, for our in-scope countries. Note that the most disaggregated figures available include funding for agricultural-related initiatives. These officials statistics do not appear to capture the wide range of donors we heard about in-country, and that are referred to in resources such as Gillett (2011), so we advise some caution in their interpretation.

Figure 16 Bilateral commitments by donor (agriculture, forestry and fisheries sector)
USD millions, 5 years to 2011, for our in-scope countries



Source: OECD ODA by sector (Geo Book). Data extracted 13/4/13.

There is no shortage of donor funding in the region, and PICs can to some extent choose their donor ('donor shopping'), and so New Zealand should be realistic about its degree of influence in this regard. Given this busy context, there may also be benefits from specialisation. By this we mean picking a niche – deciding what New Zealand's comparative advantage is and focusing on this. This could both improve the chances of successful outcomes, and improve the value for money of support by getting greater leverage from New Zealand's relatively limited resources.

We also note that fisheries in the Pacific is a multi-billion industry (USD $4.5bn total WCPFC catch value in 2010), which in principle suggests potential for cost recovery of some Activities such as MCS and the costs of the FFA and SPC. However we note that a move to greater cost recovery would likely lead to industry seeking greater decision-making rights.

9.7 How to structure support

There are many options for structuring funding and accountability in relation to any given Activity or institution. We suggest thinking about the options in terms of the way they allocate decision-rights between donors and partners, whether the partner is a national government, an NGO or other body, or a regional agency.

At one end in terms of partner flexibility, a donor can provide untagged budget support to a given amount, leave the decisions on what to do with the funding to the partner's existing governance, and rely on the partner's existing reporting systems to track progress.

This is generally what happens with the FFA and SPC programme money, with the wrinkle that New Zealand is engaged in the governance body itself. It also seems to be how CIMRIS was set up, with the exception that there was specific reporting back to MFAT on progress.

This more open arrangement might be appropriate if the donor had a high degree of confidence in the partner, or if there was a particularly fluid set of national circumstances that meant that shaping the nature of activities was something best done locally. It might also be appropriate if the important thing was the public signal that assistance was being provided, rather than the detail of precisely what projects were pursued.

At the other end of the partner flexibility spectrum, a donor can provide project funding for a particular purpose and a specified time, run the project from Wellington, and impose a new reporting structure to track progress. This might be appropriate where the donor had very specific views on what it was willing to fund, or very acute concerns about the quality or reliability of partner reporting systems, and was willing to sacrifice local flexibility and responsiveness to the desire to avoid waste.

In the middle of the flexibility spectrum might be MSSIF, for example, where the money is allocated for fisheries technical assistance but the Activity is not tightly time-bound, and there is a lot of local flexibility about exactly what to do, but special reporting to Wellington is required.

Some factors around which options could be constructed would include:

- **Nature of support** – on a continuum from most to least partner flexibility, the options might be budget support, soft-tagged funding (i.e. some of the programme funds provided are notionally tagged to a particular sector), and tagged funding (i.e. funds support only a given project).
- **Governance approaches** – a project can be governed through existing systems with management control locally, a separate local group might be convened with an oversight function, the High Commission could be involved, or governance could be done entirely in Wellington with reporting from local staff. Financial decisions could be taken or approved locally, or approved in Wellington subject to thresholds.
- **Reporting systems** – the options include using just existing reporting against existing objectives, changing the existing system to deliver particular progress information, or constructing a parallel or separate reporting system for the new funding. There can also be choices made about how frequently reporting is required, what format it takes and what level of detail is demanded.
- **Timing** – funding can be open-ended, renewable, i.e. able to be extended subject to conditions being met, or for a specific time period or milestone.

As is obvious from the preceding list, there are as many options for funding and governance as there are ideas for projects. Each of these choices has implications. For example, new reporting requirements impose additional transactions/compliance costs, but existing reporting systems may not have the degree of results accountability a donor desires. The transaction costs of new reporting arrangements might be worth incurring if the extra reporting generates improved activity outcomes.

Regardless of the funding and governance approach, it will help promote effectiveness if there is buy-in and understanding on both the donor and partner side as to the purpose and objectives of the project, if the local reality is truly reflected in the project design, and if there is regular open communication about governance decisions on the project with those who are affected.

There are choices around the degree of partner flexibility and donor control in funding arrangements – we have developed a tool to help consider the trade-offs

We have developed a tool (Table 10) to help MFAT think through the options for funding and accountability, and in particular the question of what decisions are best made in Wellington, versus what decisions should be taken more locally. The tool does not strictly guide choices, so much as help MFAT to work through why it might be choosing particular funding and accountability arrangements in the case of any particular activity. At its heart, it is about allocating the power to make decisions to those who have the best available information, capability and incentives in each case. It could be applied more generally as it is not specific to fisheries funding.

Where funding decisions are aligned with the results of analysis using the tool, we expect better Activity outcomes, e.g. stronger impacts, less resource waste, and better alignment with broader government goals. Consistent use of this kind of structured decision-making can also help MFAT run its efforts as a programme, and to improve the transparency and repeatability of its own decision-making.

We intend that MFAT could use this tool and the options:

- When designing new Activities
- When thinking about whether the funding and accountability arrangements for current spending are appropriate, and
- To help decide when it might need to reconsider funding or accountability arrangements for an Activity in response to changes in the environment.

Table 10 Funding and accountability analysis tool

Criterion	Allocate decision rights to	
	Partner	Donor
Relevance		
How confident is MFAT in the capability of the partner to effectively determine its priorities	Highly capable	Less capable
How strong are donor views on what activities to pursue	Not strong	Strong
Efficiency		
How strong are the partner's incentives to control and report on its spending	Strong	Not strong
How strong is the partner's capability to improve the efficiency of its spending over time	Strong	Not strong
Effectiveness		
The best information on what activities will be most effective rests with	Partner	Donor
How much will activities need to change in the course of the project in response to local changes	Unstable environment	Stable environment
Risk of loss/wastage		
How strong are donor concerns about loss or wastage of resources	Not strong	Strong
Donor visibility		
How important is visibility of donor spend and activity	Not important	Important
Co-ordination and coherence		
At what level does co-ordination with other donors and activities take place	At local level	At donor level
Does coherence between this activity and other activities require tighter donor oversight	Not really	Yes really

9.7.1 Support for regional agencies

One important choice facing donors providing fisheries-related aid is whether to fund regional agencies through untagged or tagged funding, i.e. the degree of specificity about what particular funds are spent on.

We were consistently told that regional agencies preferred untagged programme funding, with priorities set through the normal governance process, instead of funding for particular projects or tagged programme funds. This is for several reasons:

- Project funding can put pressure on core funding (i.e. core staff, utilities and maintenance). We were told of capital maintenance being deferred in order to meet the pressures of project-funded work. Regular reconsiderations of project spending impacts the ability of agencies to, for example, retain permanent staff instead of consulting firms

or contractors, and integrate activities appropriately into the organisation. We were given the example of the FFA's work on export facilitation, which is funded through extra-budgetary allocation but is in practice an ongoing activity more appropriately funded through core funds.

- Untagged funding reduces compliance costs for all sides, i.e. the cost of measuring, managing and reporting on the allocation and use of separate funds. We were told that SPC now has about 20 donors tying their funding to projects.
- Untagged funding increases agency flexibility to make decisions on priorities, with donor preferences expressed through the standard governance arrangements rather than having to be accommodated through a parallel process. Substantial reliance on project funding creates a risk of gaps in the agency work in areas that no donor sees fit to fund directly.

Untagged funding increases agency incentives to reduce costs. With project funds, any under-spends are carried forward and cannot typically be reallocated to other priorities. There are also some particular challenges in relation to the FFA due to the agreements that underpin its operations. We were told that under the FFA financial regulations there are two separate funds:

- General fund – this pays for core administration and is funded by member contributions, cost recovery and management fees. The level of this fund has been static since 2005, and
- Trust Fund – this supports technical activities.

Under the Regulations, carry over from project funds in the Trust Fund cannot be used for activities funded from the General Fund. (We note that the specific details of financial regulations may vary between regional agencies).

Regional agencies expressed a preference for untagged funding – this has implications for accountability and donor visibility which are reflected in our tool

Despite the difficulties for regional agencies and the additional transaction costs for all sides, donors might prefer project-based funding for regional agencies if they prefer to have more direct control over management and use of the funds, if they have particularly strong views on what to fund, or if a visible project is an important consideration. We have endeavoured to reflect these possibilities in the funding and accountability tool above.

9.7.2 Bilateral support

Implicit in the funding and accountability tool is that the appropriate approach for any individual partner will depend on that partner's circumstances and the relative balance of information, incentives and capability between the partner and the New Zealand government. As noted above, variations in factors such as donor trust in local institutions, capability in local reporting systems, levels of information held in Wellington, or capability of selected consultants could mean that a very similar Activity could be funded and governed quite differently in two different partner countries.

10. Recommendations

This section brings together the recommendations formulated in the previous chapter. Rather than list them in relative priority, we present them as a sequence of steps that MFAT would undertake in order to effect the internal changes necessary to improve the effectiveness of its Pacific fisheries support. While some changes, such as greater emphasis on coastal fisheries, are clearly of critical importance to the PICs themselves, we advise against making such changes in MFAT without the necessary management infrastructure to make coherent and deliberate evidence-based decisions.

Table 11 Recommendations

1	**Run the sector programme as a programme**
1.1	Create a central oversight and decision-making group responsible for all fisheries-related aid
1.2	Assign a responsible owner to each Activity, who is required to attend governance meetings to report on progress
1.3	Standardise Activity-level reporting to the governance group e.g. on a one-page template
1.4	Attribute and track the full costs of the sector programme (i.e. including sector programme management costs)
1.5	Clearly document all decisions across the lifecycle of Activities
2	**Pick a niche and design an investment portfolio**
2.1	Select a specialisation that translates New Zealand's comparative advantage in fisheries management and governance into targeted development support
2.2	Undertake geographic and sectoral analysis across the region, using the descriptive statistics presented in this report, as well as data on the location and nature of other donors' support
2.3	Match this analysis with the stated priorities and objectives of PICs and New Zealand's investment niche, to make informed and deliberate choices about the geographic spread of support
2.4	Design an investment portfolio based on New Zealand's niche, that reflects a deliberate mixture of likely successes and more difficult projects
2.5	Consider redressing the balance between support for oceanic and coastal fisheries, by boosting the proportion of funding directed at coastal fisheries management and sustainable development activities
2.6	Continue to support the regional agencies, through their existing governance arrangements
2.7	Focus support at the national level on building complementary national capacity, where there is sufficient scale to justify stand-alone fisheries administrations
2.7.1	Design institutional strengthening programmes to run as less intensive but over longer time frames
2.7.2	Investigate whether TA recruitment processes can be improved to make better use of New Zealand's talent pool and achieve better matching of consultants to the local environment
2.7.3	Draw on the international best practice to design effective IS programmes that will meet local needs
3	**Ensure the disciplined application of robust project management cycle processes**
3.1	Insist on more rigorous ex ante project appraisal
3.1.1	Select economic development projects for their viability and sustainability
3.1.2	Undertake robust economic supply chain analysis
3.1.3	Ensure whole-of-life project costing, that captures the on-going operational requirements of projects

3.1.4	Ensure that analysis of cross-cutting issues is built into the project appraisal and design stages
3.2	For time-bound Activities, plan the donor exit, and ensure this is built into project design and clearly understood by all parties and the plan adhered to
3.3	Ensure that material changes to project scope or design are appraised and explicitly agreed through formal change request procedures
4	**Simplify and improve monitoring and reporting**
4.1	Focus on metrics that matter: develop indicators that relate more directly to the investment and are more realistic in terms of attribution to outcomes
4.2	Commit to the quantitative measurement of key statistics and build this into standard project governance, including the establishment of baseline data before an Activity commences
4.3	Develop a dashboard to enable easy visualisation of progress
4.4	Ensure that a feedback loop from monitoring and evaluation is hard-wired into the sector programme governance processes
4.5	Provide feedback on results to partner countries and agencies
4.6	For reporting on support to regional agencies, leverage off the existing reporting frameworks of these agencies, and seek enhancements to these arrangements via participation within these agencies' existing governance arrangements
5	**Build MFAT capacity to support and implement these system changes**
5.1	Build MFAT capacity in economics and commercial analysis, as well as in participatory planning and community development
5.2	Help mitigate the impacts of staff turnover on partner countries through more effective handover processes, including better documentation

Appendix 1 Methodology

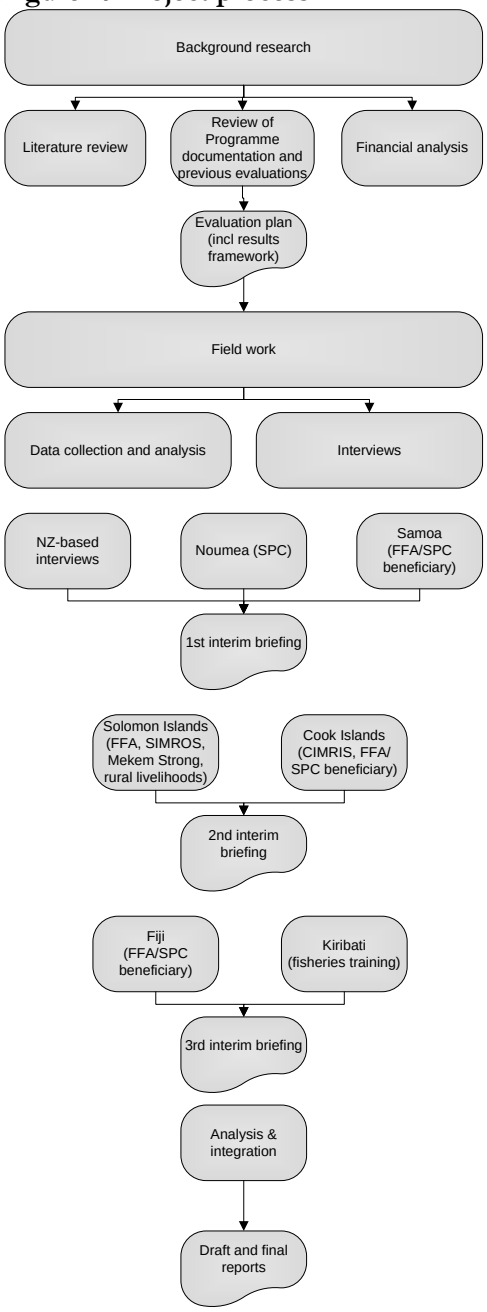
Overall approach of Impact Assessment

We employed an Impact Assessment (IA) approach to this evaluation. The IA framework covers environmental, economic and social dimensions, and seeks to identify and measure both the positive and negative impacts, as well as direct and indirect impacts of a programme or policy. In this case, we have undertaken a retrospective assessment of the sector programme and its composite suite of Activities, and used these findings to make recommendations for its future strategic development.

Our overarching IA framework was supported by a suite of analytical lenses for exploring particular dimensions of the evaluation. These are explained below. But it is important to note that our focus has been firmly on evaluating the in-scope Activities themselves – not the overall social or economic wellbeing of these countries' populations or the quality of the fisheries management regimes per se. What we have sought to determine is the effect of the funded Activities, in light of their stated objectives.

We have done this through review of the sector programme documentation (including previous evaluations) and desk-top review of literature, collection and analysis of data (desk-based and in-country), and semi-structured interviews. We provided three interim briefings to the project Steering Group, on themes and findings emerging from the field work. The project stages are illustrated in Figure 17, below.

Figure 17 Project process



Data collection and analysis an iterative exercise

The data collection and analysis was an iterative process. We began by documenting the stated objectives of the sector programme and its Activities, and constructing a preliminary indicator set to measure the achievement of these objectives. This comprised both quantitative and qualitative indicators (with data on the latter to be gathered through the interviews). The intention was to test and refine this indicator set during the course of the evaluation.

We undertook an initial desk-based data gathering exercise. We sought to use publicly available data, and collect time series wherever possible and relevant. We encountered a number of issues with data quality (including missing values and series that are not frequently updated, such as household censuses and surveys). However, our report presents what is available.

Some indicators we needed to construct from a combination of interviews, literature and follow-up with specialists in-country. The information on the status of coastal fisheries and fisheries management is an example of this (see Table 12). In many cases, we followed up on comments made by interviewees, either to test the qualitative information, or to gather more information (as was the case with the lagoon water quality monitoring in the Cook Islands, and the food security projections produced by SPC). The results of our data analysis are used to illustrate and support our findings, so are presented thematically throughout the report rather than in one single 'results measurement' table. Our suggestions for future results monitoring are discussed in Section 9.5.

Semi-structured interviews

The interviews were structured around the research question themes, and comprised open-ended questions to prompt interviewees to consider the listed issues. The semi-structured format was selected in order to balance the desire to elicit rich information with maintaining some consistency across interviews and enable future replicability. Given the wide variety of topics and stakeholders to be interviewed, we used a modular format, with questions tailored to the Activity, the research questions and the evaluation dimensions (environmental, social etc) were then mixed and matched depending on the interviewee. The full set of interview questions is available on request.

We synthesised our findings from reading, data analysis and interviews into a template structured around the research questions. Findings from the interviews were grouped thematically in this structure, with the number of responses attributed to each view/statement. We then used the relative number of responses to weight the overall body of opinion and inform our own views.

Selection and recruitment of interviewees

We took a three-fold approach to identifying participants for the semi-structured interviews:

- Members of the project Steering Group were invited to identify relevant stakeholders – this generated a substantial list of New Zealand government staff (MFAT and the Ministry for Primary Industries, MPI), current and past consultants, and representatives from non-government organisations (NGOs) and New Zealand industry.
- Arrangements for in-country interviews were organised with the assistance of MFAT Posts, Fisheries administrations and staff from the regional agencies (FFA and SPC). Staff from the New Zealand High Commissions also helped identify additional interviewees, including stakeholders from the wider public sector as well as private sector and community interests.
- Additional informants were identified in the course of the interviews and the field work.

In total, we interviewed 143 people, mostly face-to-face but some over the phone where this was not possible. Interviewees in other countries were interviewed by phone and Skype.

The following charts show the number of interviewees by country in which the interview took place (or location of respondent for international phone/Skype calls), and their organisation. The 'partner/beneficiary PICs' category includes people we spoke to in their capacity as recipients of FFA/SPC services, PIC government staff (including recipients of IS programmes) and direct beneficiaries (such as clam growers in Solomon Islands). 'NZ Government' includes MFAT and MPI staff, as well as New Zealand Posts and High Commission staff. 'Other' includes other donors (AusAID) and organisations such as the PNA.

Figure 18 Interviewees by country

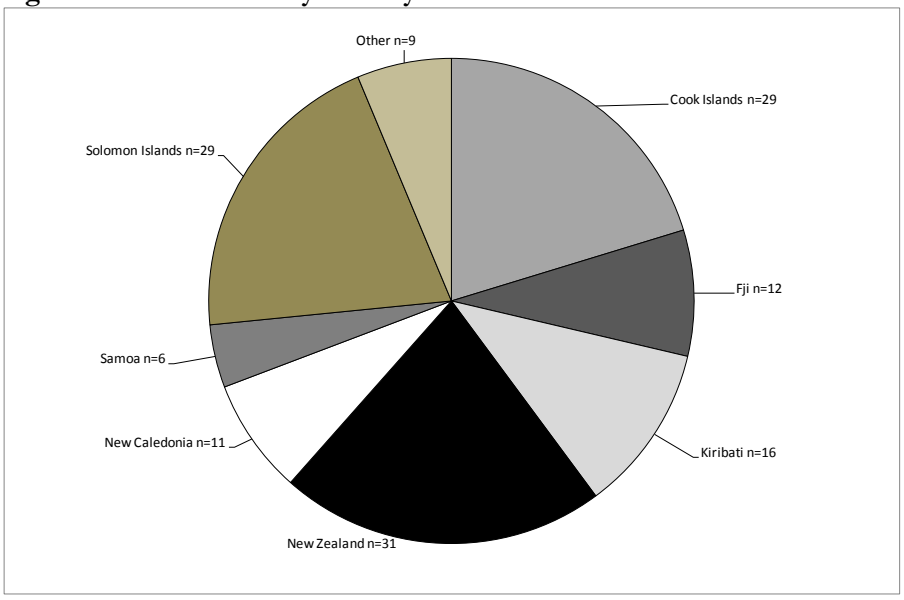
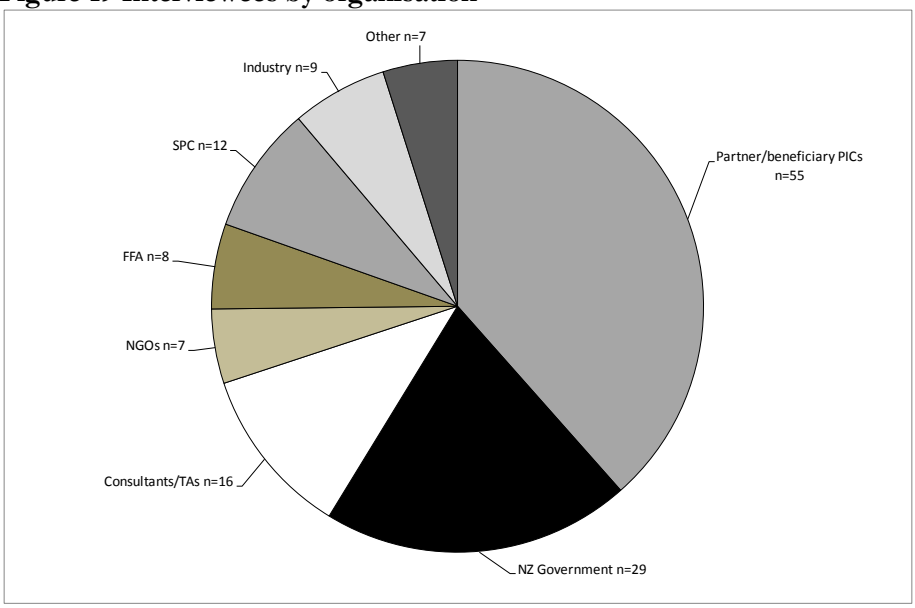


Figure 19 Interviewees by organisation



Interview protocols

Where possible and appropriate, we provided questions to interviewees in advance, with background material explaining what the evaluation was about and who we were. These served as a general guide, with discussion being semi-structured and focussing on topics of relevance to each respondent's role and background knowledge. Notes from the interviews remain confidential to the evaluation team, and comments recorded in the report have not been attributed to individuals.

Consideration of cross-cutting issues

Environmental analysis

For the environmental dimension of the evaluation, we were guided by the Marine Stewardship Council (MSC) certification methodology. This is a well-known and generally respected interpretation of the United Nations' Code of Conduct on Responsible Fisheries.

The MSC methodology covers the elements of the Code across three Principles – stock, ecosystems and management – each with performance indicators. The MSC approach also enables encapsulation of the key elements of good regulatory practice for fisheries management regimes (also covered in our results framework), namely:

- Well-defined property rights
- Good quality information (including scientific data on stocks and ecosystem impacts, economic data on the value of non-extractive uses, compliance data etc)
- Alignment of incentives to effectively manage the collective action problems associated with a common property resource, and
- Effective compliance monitoring and enforcement.

Gender and human rights

For the social impact dimensions of our analysis, we have used the generic social wellbeing framework which includes assessment of the effects on the following factors (not all of which are relevant to our evaluation):

- Health – quality of air, noise levels, water quality,
- Housing – quality, security of tenure,
- Accessibility to goods, facilities and services
- Quality of physical environment, amenity
- Employment – skills, who for, pay-rates, quality of working life, net loss or gain?
- Safety and security – perceived and real, autonomy
- Leisure and recreation – spare time, access to facilities and open space, and
- Social capital – groups and activities, sense of community ownership, interaction with friends and neighbours.

Gender analysis has historically been a sub-set of social impact analysis. In more recent times gender has been treated as a separate field. For this evaluation, aspects of gender

analysis based on the Moser Framework have been incorporated into our social assessment method. The Moser Framework includes:

- Gender roles identification
- Gender needs assessment
- Disaggregating control of resources and decision-making within the household
- Planning for balancing women's triple role (reproductive, productive and community-managing activities)
- Distinguishing between different aims in interventions, and
- Involving women and gender-aware organisations in planning.

Analytical considerations

Attribution explored through the interviews

Common to all aspects of the evaluation is the issue of attribution of impacts to New Zealand's funding contributions. We have not undertaken econometric analysis – we considered this unlikely to be fruitful as we would need sophisticated information on the myriad of other influencing factors in order to define and specify such analyses. Instead, we sought to use the interviews to explore perceptions on the extent to which trends in the data can be attributed to the sector programme and its Activities. Of key relevance are the activities of other donors, the efforts of other regional agencies, national PIC government policies, and exogenous in-country factors such as political events, factors that were frequently raised by interviewees.

Scale important for assessing causality

Related to attribution is the issue of scale. The relative size of the Activity in relation to the partner country and other donor contributions affects the extent to which we can discern causality. For this we need contextual statistics on total population, GDP and so on, which we have sought to do in the descriptive statistics (see 2.5).

Adaptation recognised

In some cases the specific objectives and programme design changed during the course of the Activity. As a pragmatic way of reflecting this issue, we retained the focus for our analysis on the original, documented objectives, but explored the reasons for and outcomes of any adaptation in the interviews.

Appendix 2 Short-form survey for assessing fisheries management and sustainability

Introduction

The following set of questions is aimed at creating a baseline evaluation for identified fisheries in each of our in-scope countries (Cooks Islands, Solomon Islands, Kiribati, Samoa and Fiji). Future responses to the same questions could be used to monitor progress generally or against specific Activity or sector programme objectives. Responses may also be useful in identifying key areas for improvement and objective setting.

The questions need to be answered for each identified fishery. We are interested in both coastal/inshore and offshore fisheries. Please first list fisheries and then try to respond to the questions for each fishery. A fishery might be a combination of gear type and area, nominated target species and area, or as defined in a fishery plan, etc. Please be clear in your definition(s).

List of fisheries

1

2

3

…

Questions for EACH fishery

A) Retained Species *(need first to define and list main and other target specie which are landed and used for food, trade, or other purposes)*

1. Are there clear targets and limits set for main target stocks? [what are they?]
2. Are there clear targets and limits set for other retained stocks? [what are they?]
3. Are main stocks above or below targets and limits? [which stocks? How certain?]
4. Are other retained stocks above or below targets and limits? [which stocks?]
5. If there are stocks below set limits are measures in place to ensure rebuilding? [how effective are these?]
6. Is there a clear set of measures in place to ensure main target stocks are at or can rebuild to target levels?
7. Are those measures effective? [is there evidence or just an expectation of that?]
8. Is there a clear set of measures in place to ensure other target stocks are at or can rebuild to target levels?
9. Are those measures effective? [is there evidence or just an expectation of that?]
10. Is there information available to allow main [and other] target stocks to be evaluated? [are stock assessments done?, can status with respect to targets and limits be evaluated?, are data rigorously collected or more qualitative?]

B) Bycatch species *(need first to define and list bycatch species [but not ETP] which are caught but not landed)*

11. Are there clear targets and limits set for bycatch (i.e., not retained) stocks? [what are they?]

12. Are bycatch stocks above or below targets and limits? [which stocks? How certain?]
13. If there are stocks below set limits are measures in place to ensure rebuilding? [how effective are these?]
14. Is there a clear set of measures in place to ensure bycatch stocks are at or can rebuild to target levels?
15. Are those measures effective? [is there evidence or just an expectation of that?]
16. Is there information available to allow bycatch stocks to be evaluated? [are stock assessments done?, can status with respect to targets and limits be evaluated?, are data rigorously collected or more qualitative?]

C) Endangered, Threatened and Protected (ETP) species *(need first to define and list ETP species; e.g. specific marine mammals, birds, turtles, sharks that are listed in national law/policies or international agreements)*

17. Are there clear targets and limits set for ETP species? [what are they?]
18. Are ETP stocks above or below targets and limits? [which stocks? How certain?]
19. If there are stocks below set limits are measures in place to ensure rebuilding? [how effective are these?]
20. Is there a clear set of measures in place to ensure ETP stocks are at or can rebuild to target levels?
21. Are those measures effective? [is there evidence or just an expectation of that?]
22. Is there information available to allow ETP stocks to be evaluated? [are assessments done?, can status with respect to targets and limits be evaluated?, are data rigorously collected or more qualitative?]

D) Habitats *(need first to define and list habitats. These may be quite broadly defined or where information exists might be quite specific.)*

23. If there are habitats which may be affected, how likely do you think it is they might not be able to recover?
24. Are measures in place to ensure habitats are protected from fishing impacts? [how effective are these?]
25. Is there a clear set of measures in place to ensure that any already impacted habitats can recover? [how effective are these?]
26. Is there information available to allow habitat impacts to be evaluated? [are data rigorously collected or more qualitative?]

E) Governance and Policy

27. Is the management system generally in line with local, national and international laws?
28. Is the management system generally aimed at achieving sustainable fisheries?
29. Are there clear mechanisms for dealing with disputes? [are these effective?]
30. Does the fishery management system comply quickly with and judicial decisions arising from local, national or international challenges?
31. Are there specific legal or recognised customary rights established? [are these effectively implemented?]
32. Are the roles and responsibilities of organisations and individuals all clearly defined? [are they well understood?]
33. Does the management system give opportunity for all interested and affected people do be involved?
34. Does the management process actively seek input and views and participation? [does it take on board all views?]
35. Are there clear long-term objectives set (in legislation, policy)? [implicit, explicit, where, what?]
36. Does the management system consider incentives for sustainable fishing? [are these explicit?, regularly reviewed?]
37. Does the management system consider and discourage perverse incentives?

F) Fishery-specific Objectives

38. Does the fishery have clear fishery specific objectives relating to a) stocks and b) other components (bycatch, ETP, habitats)? [are these articulated in fishery plans or similar documents? Where?]
39. Are there clear decision-making processes and approaches to meeting objectives? [who advises? Who makes decisions? Are decisions clearly explained – not just what by why?]

40. Does the decision-making process respond quickly to research findings, new data, and other inputs?
41. Does decision-making use a precautionary approach? [examples?]
42. Are monitoring and control systems are in place? [are they effective?]
43. Do fishers comply with the system? [examples of problems?]
44. Are there sanctions available to deal with non-compliance? [examples?]
45. Are those sanctions applied? [examples?]

Appendix 3 Summary information on coastal fisheries management

Table 12 Coastal fisheries management

Summary information for our in-scope countries. Information obtained from our qualitative interviews is indicted in *italics*

Country	Coastal management		Coastal stocks		Coastal ecosystems
	Agency responsible	**Management plans**	**Resource assessments**	**Local market prices**	
Cook Islands	Ministry of Marine Resources Local authorities (fisheries of local interest)	Plans prepared for designated fisheries (parrotfish, trochus) *Takitumu lagoon management plan*	Assessments for trochus 'Many of the inshore fishery resources, especially those close to urban markets, are fully or over-exploited'	*Information on local prices not collected*	'Increasing attention by the government and NGOs to the quality of the inshore marine environment of Rarotonga' Use of ra'ui. Marine reserves. Ciguatera/water quality monitoring.
Fiji	*Ministry of Fisheries and Forests* *Co-management with resource custodians for 411 customary fishing areas*	No formal management plans *Plans in development for customary fishing areas* *Fisheries legislation under review*	Fiji Fisheries Resource Profiles include research in 44 of the main fishery resources *Intent to assess resources in customary fishing areas*	*Market surveys across Divisions; data published in Annual Report*	Marine protected areas
Kiribati	Ministry of Fisheries and Marine Resource Development	*Kiribati National Fisheries Policy 2013-2015* A major issue is the weak nature of the current coastal fishery management measures Fishery management plan is in	Increasing exploitation of the inshore resources, especially close to the urban markets in south Tarawa Coastal resources are nearing or may have exceeded their sustainable production limits		

		preparation for bêche-de-mer	Tarawa lagoon has been well researched (including assessments of shellfish, coral reef and benthic organisms and finfish)		
Samoa	*Ministry of Agriculture and Fisheries* *Village councils*	*Village Management Plans*	*Fisheries Division has a village advisory section with a role in monitoring and assessment of stocks*	*Regular market surveys – data published in Annual Report*	
Solomon Islands	Ministry of Fisheries and Marine Resources *Provincial governments* Customary management by local villages	*Management plans for some coastal species*	Many of the inshore fisheries resources, especially those close to the urban markets, are fully or over-exploited	*Collecting data on local fish markets (trial)*	