5.3. EXPRESSIONS OF INTEREST PORT DOUGLAS SLIPWAY

REPORT AUTHOR	Neil Beck, Team Leader Planning
MANAGER	Paul Hoye, Manager Environment & Planning
DEPARTMENT	Environment and Planning

RECOMMENDATION

That Council resolve to:

1. **Invite Expressions of Interest for the provision of a slipway or boat handling facility and associated hard stand areas over part of Lot 2 on SP262338 under Section 228 (3) of the *Local Government Regulations 2012*;**

2. **Notes it is in the public interest to invite expressions of interest for the following reasons:**

   i. **Test the findings of the investigation into the marine industry needs of Port Douglas and the appetite of this sector to invest in Port Douglas to provide this service; and**

   ii. **To understand what the market may be able to offer.**

3. **That Council delegates authority under section 257 of the *Local Government Act 2009* to the Chief Executive Officer to determine and finalise any and all matters associated with the finalisation of the Expression of Interest.**

EXECUTIVE SUMMARY

Proposals to redevelop the Port Douglas Marina Precinct over recent years (which includes the land containing the existing slipway operations) will ultimately result in the closure of the slipway at some point in the future.

A Deed of Agreement (Preservation of Slipway) “The Deed” has been entered into between the current owners of the land and Council which requires the slipway to remain in operation until 18 May 2020. Once this date expires, there is no obligations under The Deed for the owners to operate the slipway.

In order to gain an appreciation of the marine industry sector within Port Douglas and whether the region had the capacity to support the construction of a new slipway or related boat handling facility, Council commissioned CDM Smith to undertake an investigation.

The investigation was to identify the characteristics and economic contribution of the marine industry sector and undertake a high level feasibility study of constructing a new facility. A copy of the findings of this investigation was distributed to the Councillors and discussed at a Council Workshop on 22 October 2019.

In line with the discussions at the workshop, this report seeks a Council Resolution to go to market to invite Expressions of Interest with respect to developing a slipway / boat handling facility over part of Lot 2 on SP262338 located at the end of Port Street.

The resolution also seeks to delegate all matters to the Chief Executive Officer with regard to finalising the Expression of Interest document and any supporting documentation.

The area anticipated to accommodate any new facility is identified below.

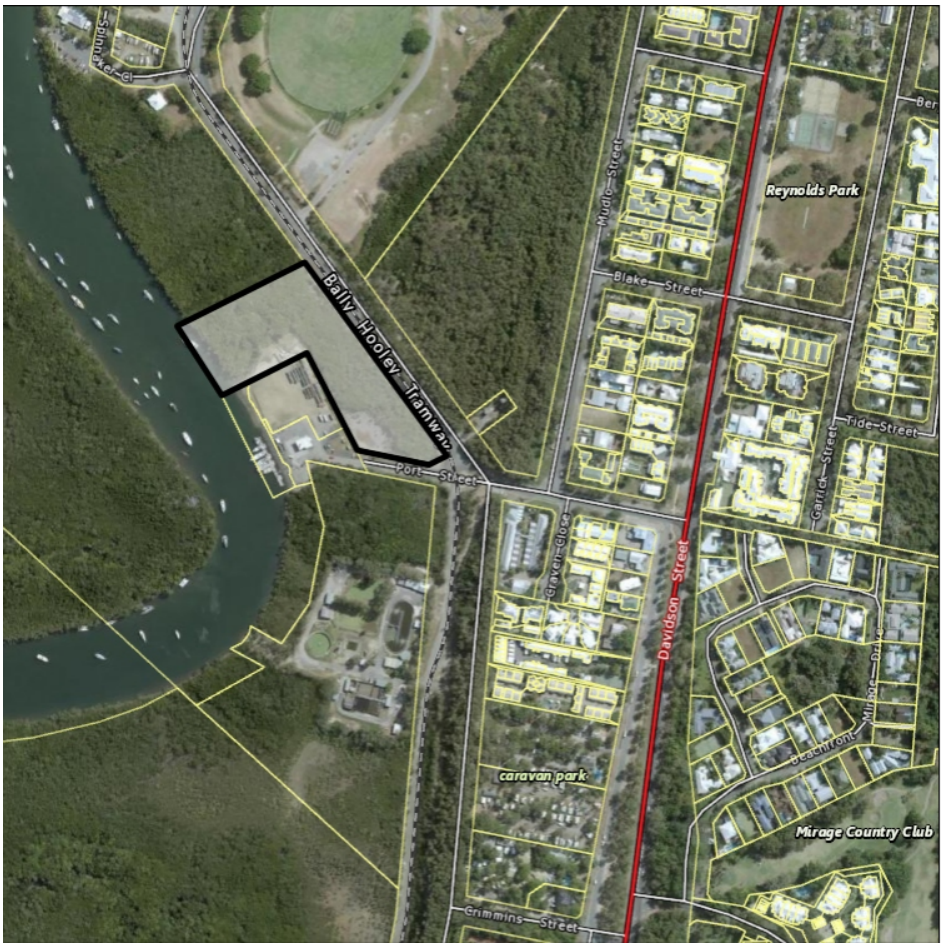

Image 1 - Approximate area to accommodate future facility.

BACKGROUND

Land containing the existing slipway facility is described as Lot 2 on SP288958 and is freehold land purchased in 2017 by Reef Marina Pty Ltd.

As part of the freeholding process, The Reef Marina Pty Ltd & Council entered into a Deed of Agreement which sought to secure the operation of the slipway for a three (3) year period expiring in May 2020.

The Deed of Agreement has been novated to the current owners of the Marina – Crystalbrook Superyacht Marina Port Douglas Pty Ltd.

The slipway has a functioning ship-lifting facility, with associated infrastructure such as space to store boats and a shed.

During the freeholding process, significant concerns were raised by Council Officers, members of the public and elected representatives regarding the loss of the slipway and the economic impacts that the loss of such a facility will have on Port Douglas and the broader region.

Due to intentions to redevelop the land either in accordance with the existing Development Approval or another proposal, an investigation was undertaken to better understand what demands are present with respect to marine based industry and services in the region. Council engaged CDM Smith to undertake this investigation.

The scope of the investigation was as follows:-

- Estimate direct and indirect economic contribution of existing slipway and related services currently being provided. This will require sourcing information directly from the operator of the existing slipway;
- Prepare a high level estimate of the scale of marine and marine related economic activity within the Douglas Shire and identify the various components and areas where Douglas has or could have a competitive or comparative advantage;
- Identify the demands, high level feasibility and likelihood of the construction of a new slip facility and supporting information to substantiate the findings;
- Having regard to competitive advantages identified in preceding stages of the work, identify opportunities to retain marine based industry jobs and other allied trades and services to diversify the economic base of the region and growth opportunities either including or in the absence of a new slipway if need and/or feasibility for a new slipway cannot be demonstrated. Identify what those opportunities are and supporting information to substantiate those opportunities;
- Give an indication of possible floor areas and/or scale of development required (site area) to accommodate the identified marine based industry operations or opportunities that are present. It is requested that additional area also be identified to accommodate for future growth in the foreseeable future i.e 10 – 15 years; and
- Any other matters considered relevant.

A copy of the report is attached as Appendix 1.

COMMENT

The outcomes of the investigation indicates that the feasibility of establishing a new slipway facility or boat handling facility to service the region of Port Douglas is not favorable due to the capital costs involved with such a project and the relatively low number of vessels that such a facility would service.

Despite the content of the report, it is appropriate to further test the appetite of the market with an Expression of Interest to provide a facility over part of Lot 2 on SP262338.

Lot 2 SP262338 is Council Trustee land with a Purpose of Local Government and a Sub Purpose Port and Harbour. This infers that the land can be developed for commercial

enterprises especially marine activities, provided all planning and environmental issues are adequately addressed.

Council can enter into a 30 year trustee lease with a proponent with no options to extend. The rent paid per annum for such a lease will be at the discretion of Council.

The trustee lessee are able to sublease areas within the leased area to a third party and these rental payment are kept by the trustee lessee. All trustee leases and sub leases are to be registered on the title.

Under certain circumstances the Minister for Natural Resources Mines & Energy may approve Council to enter into a 50 year lease.

Under the Land Act 1994, Council cannot offer any extension of the trustee lease.

Legislative Requirements – Expression of Interest

Section 228 Tender Process of the *Local Government Regulation 2012* states that the local government may invite expressions of interest under subsection (5) only if the local government -

(a) decides, by resolution, that it would be in the public interest to invite expressions of interest before inviting written tenders; and

(b) records its reasons for making the resolution in the minutes of the meeting at which the resolution was made.

Council Officers believe it would be in the public interest to invite expressions of interest to test the findings of the report prepared by CDM Smith.

The objectives of this EOI are to:

1. Test the findings of the report prepared by CDM Smith and whether there is any interest by the market to construct a slipway / boat handling facility in the region.

2. Understand what the market may be able to offer; and

3. Enable the market to better understand:

    a. The limitations of Council involvement with the delivery of such a project. That is, all costs associated with the delivery of the facility is to be met by the proponent.

    b. The tenure and leasing arrangements associated with Lot 2.

Section 228 Tender Process of the *Local Government Regulation 2012* states that the invitation for expressions of interest must -

a. be made by an advertisement in a newspaper that circulates generally in the local government area; and

b. allow written expressions of interest to be given to the local government for at least 21 days after the advertisement is published.

If the local government invites expressions of interest under subsection (5), the local government may -

a. prepare a short list from the persons who respond to the invitation for expressions of interest; and

b. invite written tenders from those persons.

Council Officers recommend that the expression of interest be used to collect information about the level of market interest and to test the findings of the investigation.

There is no intention to develop a shortlist from EOI submitters or to invite written tenders from those persons.

PROPOSAL

That Council resolve to:

1. Invite Expressions of Interest for the provision of a slipway or boat handling facility and associated hard stand areas over part of Lot 2 on SP262338 under Section 228 (3) of the *Local Government Regulations 2012*;

2. Notes it is in the public interest to invite expressions of interest for the following reasons:

   i. Test the findings of the investigation into the marine industry needs of Port Douglas and the appetite of this sector to invest in Port Douglas to provide this service; and

   ii. To understand what the market maybe able to offer.

Content of Expression of Interest

The Expression of Interest document will be drafted once a Council Resolution has been obtained and is anticipated to be released to the market early in 2020.

The Expression of Interest document will be a 'high level' document which will convey the following key obligations and expectations for a proponent interested in establishing such a facility on the site:-

1. Council will not be providing any financial contributions to the development of this land for this purpose. All costs associated with the development of the site is the responsibility of the proponent;

2. All land use planning and environmental approvals must be obtained in accordance with the relevant legislation and requirements applicable at the time.

3. Council will apply the maximum term lease available and would also pursue the option of seeking Ministerial approval to extend the lease for a 50 year period.

FINANCIAL/RESOURCE IMPLICATIONS

In the event the sector responds to the EOI submission, a Request for Tender process would be required and a contract awarded after an evaluation process. An obligation for Council as trustee land will also be to support and assist with the preparation of the lease documentation that is registered on title.

The costs associated with this process is typically the responsibility of the proponent.

The Team Leader of Planning in consultation with the Executive Manager Infrastructure and Council's Property Department will manage the Expression of Interest process internally.

RISK MANAGEMENT IMPLICATIONS

The purpose of the Expression of Interest process is to further explore the interest and appetite of the market to construct a new slipway and/or boat handling facility in Port Douglas.

The Expression of Interest exercise is being undertaken to exhaust all avenues to maintain this industry within Port Douglas when the existing facility ceases to operate at some point in the future.

The EOI process is non-binding and obligation free for both Council and whomever submits an EOI.

SUSTAINABILITY IMPLICATIONS

Economic:	The findings of the report identifies the economic contribution of the marine industry sector within Port Douglas and more specifically, the economic contribution of the slipway. Any loss of service industry uses and employment in the region is unfortunate and should be avoided where ever possible. Ultimately, market forces will decide if this service will remain in Port Douglas.
Environmental:	Any development of the land for this purpose will be undertaken in accordance with all planning and environmental approvals and best practice standards.
Social:	The purpose of the Expression of Interest process seeks to mitigate the social impacts associated with the closure of the existing facility. While the Deed ensures the operation of the slipway until May 2020, the actual closure of the facility is unknown.

CORPORATE/OPERATIONAL PLAN, POLICY REFERENCE

This report has been prepared in accordance with the following:

Corporate Plan 2019-2024 Initiatives:

5.1.1 - Establish and develop long term financial, resource and infrastructure planning to ensure ongoing capacity to fund operations and capital works programs.

5.1.3 - Monitor and regularly review procurement practices to ensure legislative compliance and "value for money".

COUNCIL'S ROLE

Council can play a number of different roles in certain circumstances and it is important to be clear about which role is appropriate for a specific purpose or circumstance. The implementation of actions will be a collective effort and Council's involvement will vary from information only through to full responsibility for delivery.

The following areas outline where Council has a clear responsibility to act:

Custodian	Council owns and manages infrastructure, facilities, reserves, resources and natural areas. In fulfilling its role as custodian, Council will be mindful of the community, the economy, the environment, and good governance.
Facilitator	Council often brings stakeholders together on important issues, projects or for service delivery. In this role, Council can act as a mediator, connector, collaborator or initiator.

CONSULTATION

Internal:	The process of exploring options regarding the relocation of the slipway and obligations of the Deed of Agreement has been discussed with internal stakeholders and key personnel.
External:	The notion of commencing an Expression of Interest process was raised and discussed with Council at the workshop of 22 October 2019. In light of the findings of the investigation into the marine industry needs of Port Douglas, the Expressions of Interest was seen as a mechanism to test the findings of the investigations and determine if there is any interest by the sector to establish a facility in Port Douglas.

COMMUNITY ENGAGEMENT

There has been extensive community engagement and media coverage of the concerns surrounding the closure of the slipway and future of the fishing industry since the former owners of the Port Douglas Marina sought approval from the Queensland Government to freehold a number of waterfront leasehold lots. Such actions resulted in the Deed of Agreement regarding the preservation of the slipway to which this Expression of Interest now relates.

ATTACHMENTS

1. CDM Smith-1000497- RP T- Port Douglas Marine Industry Needs Assessment RE V 1 181119 [**5.3.1** - 34 pages]

Douglas Shire Council

Port Douglas Marine Industry Needs Investigation

18 November 2019

CDM Smith

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Document history & status

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Rev A	29 August 2019	S McCormack	M Brown	29 August 2019	Draft
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Project Manager:	M Brown
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Section 1 Introduction

1.1 Background

It is understood that Reef Marina Pty Ltd has recently purchased waterfront land, including land currently used by the Port Douglas Slipway. As part of the purchase agreement, Reef Marina Pty Ltd is obligated to operate the slipway until May 2020. Douglas Shire Council is concerned with the long term sustainability of the slipway and the potential economic consequences should the slipway cease operation.

1.2 Purpose of Study

Douglas Shire Council is keen to understand the economic contribution of marine industry to Douglas Shire and specifically the economic contribution of the Port Douglas Slipway. The project brief outlined the following requirements.

- Estimate direct and indirect economic contribution of existing slipway and related services currently being provided. This will require sourcing information directly from the operator of the existing slipway.;
- Prepare a high level estimate of the scale of marine and marine related economic activity within Douglas Shire and identify the various components and areas where Douglas has or could have a competitive or comparative advantage;
- Identify the demand, high level feasibility and likelihood of the construction of a new slipway facility and supporting information to substantiate the findings;
- Having regard to competitive advantages identified in preceding stages of the work, identify opportunities to retain marine based industry jobs and other allied trades and services to diversify the economic base of the region and growth opportunities either including or in the absence of a new slipway if need and/or feasibility for a new slipway cannot be demonstrated. Identify what those opportunities are and supporting information to substantiate those opportunities;
- Give an indication of possible floor areas and/or scale of development required (site area) to accommodate the identified marine based industry operations or opportunities that are present. It is requested that additional area also be identified to accommodate for future growth in the foreseeable future i.e. 10 – 15 years; and
- Any other matters considered relevant.

1.3 Report Structure

To respond to the project brief, our report is structured as follows:

- Section 1: Introduction;
- Section 2: Size, Shape and Contribution of Marine Industry and Slipway;
- Section 3: Marano Proposal;
- Section 4: SWOT Assessment of Marine Industry at Port Douglas;

- Section 5: Demand for Marine Industry and Slipway;
- Section 6: Strategic Assessment of Slipway Feasibility; and
- Section 7: Summary and Conclusions.

1.4 A Note on Information Collection

As part of this study representatives from CDM Smith contacted operators of several slipways throughout Queensland. Assurances were provided that no statements from individual operators would be specifically attributed. This undertaking facilitates a freer exchange of information between interviewee and interviewer. As such, we have only provided the names of the organisations contacted. The names of individuals have been withheld. The organisations contacted include:

- Deagon Slipways;
- Pelican Slipways (Redland Bay);
- BSE Slipways (multiple sites);
- Bundaberg Slipways;
- Royal Queensland Yacht Squadron;
- Scarborough Marina;
- Shute Harbour Slipways;
- Rudi Maas Marina;
- Gold Coast City Marina and Shipyard; and
- Horizon Shores Marina and Shipyard.

Section 2 Size, Shape and Contribution of Marine Industry and Slipway

2.1 Definition of Marine Industry

Australian Institute of Marine Science[1] identifies that the main barrier to collecting consistent and comparable data relating to the economic value of Australia's marine industry is that there is no single definition of which activities constitute this sector.

In considering the appropriate definition for marine industry in the Port Douglas context, consideration has been given to the Australian and New Zealand Standard Industrial Classification (ANZSIC) at the four digit level. Our assessment has identified the following sectors as relevant to the Port Douglas context:

- Sectors supporting marine industry (i.e. repair and maintenance):
  - Shipbuilding and Repair Services (ANZSIC code 2391);
  - Boatbuilding and Repair Services (ANZSIC code 2392);
  - Other Polymer Product Manufacturing (ANZSIC code 1919);
- Sectors influencing marine industry:
  - Seafood Processing (ANZSIC code 1120);
  - Fishing (ANZSIC code 041)[2];
  - Water Passenger Transport (ANZSIC code 4820); and
  - Scenic and Sightseeing Transport (ANZSIC code 5010)[3].

It is anticipated that only a portion of scenic and sightseeing transport would be considered relevant to the marine industry sector as this category includes multiple modes of non-marine transport, including hot air balloon ride operation and scenic railway operation.

2.1.1 Census Estimates of Marine Industry Employment

Employment in the marine industry and influencing sectors has been assessed based on employment by place of work data sourced from the ABS 2016 Census. Estimates have been presented for both the Port Douglas SA2 and Douglas LGA.

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[1] AIMS (2016) The AIMS Index of Marine Index, December 2016

[2] The three digit ANZSIC code 041 covers the sub-categories of 0411 Rock Lobster and Crab Potting, 0412 Prawn Fishing, 0413 Line Fishing, 0414 Fish Trawling, Seining and Netting and 0419 Other Fishing.

[3] Scenic and sightseeing transport differs from water passenger transport as the emphasis is not on the efficiency or speed of the transport service but rather on providing recreation and entertainment. The service provided is usually local in nature and generally includes tour commentary, highlighting features of the scenery and/or the vehicle.

According to the 2016 Census, there was no employment within the marine industry sector in Port Douglas SA2 and only seven persons employed in the boatbuilding and repair services sector in Douglas LGA.

Within the identified sectors supporting marine industry, there was no employment identified within the seafood processing sector in either Port Douglas SA2 or Douglas LGA. The scenic and sightseeing transport sector provides significant employment within both Port Douglas SA2 and Douglas LGA, but only a portion of this demand will be considered relevant to the marine industry sector.

The data reported below in Table 2-1 indicates that marine industry within Port Douglas has a small footprint. In some instances, the datasets indicate that there is no employment in some sectors. However, as later mentioned an inventory of marine industry activity at Port Douglas indicates that while the sector is small, there are enterprises present in those sectors that the ABS data reports as having no employment. As the inventory later indicates, however, several businesses that operate in the marine industry space do provide services to other sectors hence there is potential for under reporting.

Table 2-1 summarises the estimated employment within the relevant sectors in the marine industry and sectors influencing marine industry as of the 2016 Census.

Table 2-1 Estimated Employment (Place of Work Data) by Sector, 2016 Census

Industry Sector	Port Douglas SA2		Douglas LGA	
	No.	%	No.	%
Sectors Supporting Marine Industry				
Shipbuilding and Repair Services	0	0.0%	0	0.0%
Boatbuilding and Repair Services	0	0.0%	7	0.1%
Other Polymer Product Manufacturing	0	0.0%	0	0.0%
Total	0	0.0%	7	0.1%
Sectors Influencing Marine Industry				
Seafood Processing	0	0.0%	0	0.0%
Fishing	4	0.1%	12	0.2%
Water Passenger Transport	5	0.2%	15	0.3%
Scenic and Sightseeing Transport (partially)	182	5.5%	223	4.0%
Total	191	5.8%	250	4.5%
All Employment	3,296	100.0%	5,584	100.0%

Source: 2016 Census – Place of Work data

While total employment within the region has increased between the 2011 and 2016 Censuses, employment in the marine industry sectors appears to have declined, except for the fishing and water passenger transport sectors in both Port Douglas SA2 and Douglas LGA. While there appears to be some reduction in employment, as mentioned above this could be as a result of enterprises diversifying their services and hence no longer being recorded in a particular sector (e.g. boatbuilding repair and services).

Data from the ABS Census is reported for completeness, but should be taken as a minimum employment. That being said the marine industry sector is obviously quite small in Douglas Shire. Also, reductions in employment

within the Port Douglas context appear not to have been replicated by reductions at the LGA level, which indicates that there could be a locational coding issue with the small area dataset, which is a common issue.

Table 2-2 summarises the trend in marine industry employment in Port Douglas SA2 and Douglas LGA between the 2011 and 2016 Censuses.

Table 2-2 Historic Employment in the Marine Industry Sector, 2011-2016 (POW Data)

Industry Sector	Port Douglas SA2			Douglas LGA		
	2011	2016	Change, 2011-16	2011	2016	Change, 2011-16
Sectors Supporting Marine Industry						
Shipbuilding and Repair Services	3	0	-100.0%	3	0	-100.0%
Boatbuilding and Repair Services	8	0	-100.0%	8	7	-2.6%
Other Polymer Product Manufacturing	0	0	-	0	0	-
Total	11	0	-100.0%	11	7	-8.6%
Sectors Influencing Marine Industry						
Seafood Processing	0	0	-	0	0	-
Fishing	0	4	-	4	12	24.6%
Water Passenger Transport	0	5	-	11	15	6.4%
Scenic and Sightseeing Transport (partially)	200	182	-1.9%	237	223	-1.2%
Total	200	191	-0.9%	252	250	-0.2%
All Employment	2,710	3,296	4.0%	4,838	5,584	2.9%

Source: 2011 and 2016 Census Place of Work data.

2.1.2 Identification of Marine Industry Activity

Site visits conducted in August 2019 identified minimal marine industry activity within Douglas Shire, with nine businesses identified in addition to the slipway, these being:

- Port Douglas:
  - Nautical Marine Sales;
  - Port Douglas Marine Décor;
  - Van Rhine Welding and Fabrication;
  - Quicksilver (servicing shed);
- Craiglie Industrial Area:
  - Port Douglas Paint & Panel;
  - Port Douglas Suzuki Marine;
  - Port Douglas Mechanical;

- Port Douglas Marine; and
- Port Douglas Sail Makers.

Of these ten businesses identified, it was clear that Van Rhine Welding and Fabrication, Nautical Marine Sales, Port Douglas Paint & Panel and Port Douglas Mechanical serviced multiple industry sectors and were not solely dedicated to the repair and maintenance of marine vessels. Nautical Marine Sales serviced both the private and commercial market, offering a range of products from sale, ranging from fishing tackle to bilge pumps.

Anecdotal evidence was reported that there were several sole operator contractors that offered general trade services to boat owners within the region. However, these trade contractors also provide those same services to a range of other sectors in addition to marine activities.

Table 2-3 summarises marine industry activity in Port Douglas, including details relating to business name, address and nature of business activity.

Table 2-3 Marine Industry Activity Identified in Douglas Shire

Business Name	Address	Nature of Activity
Port Douglas		
Nautical Marine Sales	2/30 Wharf Street, Port Douglas	• Provides fishing tackle and chandlery supplies to the recreational and commercial boating fleet in Port Douglas.
Port Douglas Marine Décor	25 Warner Street, Port Douglas	• Manufacture and repair of boat sails, equipment covers, shade sails and upholstery for both the marine industry sector and non-marine industry sector uses (e.g. shade sails, furniture upholstery and ute covers).
Van Rhine Welding and Fabrication	2 Mowbray Street, Port Douglas	• Provides welding, fabrication services and transport to both the marine industry and non-marine sector in Port Douglas.
Quicksilver (servicing shed)	15 Warner Street, Port Douglas	• Site inspections indicated the site was being used for the repair and maintenance of small scale boats.
Craiglie Industrial Area		
Port Douglas Paint & Panel	Shed 2, 7 Pioneer Close, Craiglie	• Provides body repair services to vehicles, boats, trailers and motorbikes.
Port Douglas Suzuki Marine	18-20 Teamster Close, Craiglie	• Repair of outboard motors for boats. Business advertises that they service Port Douglas and the Cape York region.
Port Douglas Mechanical	6-8 Pioneer Close, Craiglie	• Provides mechanical maintenance and repair services to vehicles, boats, trailers and motorbikes.
Port Douglas Marine	7-9 Dickson Street, Craiglie	• Provides diesel engine, outboard repairs and marine parts in Port Douglas.
Port Douglas Sail Makers	Shop 1, Port Traders, Captain Cook Highway, Craiglie	• Manufacture of yacht sails.

Source: CDM Smith inventory

2.2 Estimated Economic Contribution of Marine Industry Sector

The economic contribution of an industry or sector is principally driven by the sales or purchases of industrial or sectoral outputs. This section estimates the indicative sales or purchases from marine industry within Douglas Shire. This analysis is based on ABS employment data, hence the overall size of the industry is likely to be marginally understated.

2.2.1 Regional economic contribution approach

The total economic contribution of the marine industry to the Douglas Shire regional economy has been estimated using a regional economic contribution model (input-output approach).

Economic contribution analysis is used to estimate the direct and indirect (or supply chain) contribution of a particular economic stimulus or activity, in this case the economic contribution of the marine industry sector to the Douglas Shire regional economy.

The analysis of economic contribution is based on input-output tables which describe inter-industry transactions for a given region. National input-output tables for 2012-13[4] are prepared by the Australian Bureau of Statistics based on the Australian National Accounts. Queensland and regional tables are then imputed using Queensland State Accounts, Census data and taxation data based on the GRIT approach[5].

The total economic contribution of a particular stimulus or activity comprises the following effects.

- Direct or initial effects: being the stimulus for the economic contribution, typically described as the change in sales or contribution to final demand by the stimulus or activity.
- Flow on effects, comprising production-induced effects and consumption-induced effects, these being:
  - First-round production effects: being those purchases of inputs required from other industry sectors in the economy to produce the additional output generated by the stimulus or activity;
  - Industrial support production effects: being those second, third and subsequent-round industrial flow on effects stimulated by the purchases made in the first round; and
  - Consumption induced effects: being those purchases made by households upon receiving additional income from labour payments stemming from the production of additional output generated by the stimulus or activity under assessment.

The extent of contribution can be represented by multipliers calculated in aggregate for various regional, state or national economies. There are commonly four multipliers used to measure economic contribution, these being:

- Output;
- Household income;

[4] ABS (2015) Australian National Accounts: Input-Output Tables Catalogue No. 5209.0.55.001. This is the most recently available comprehensive input-output dataset. The complexity of generating this dataset means that this data is typically released three to five years behind the mainstream national accounts data.

[5] Jensen, R. & West, G. (2001) Community Economic Analysis, Department of Primary Industries: Brisbane, Qld

- Employment; and
- Value added.

Multiplier effects are typically largest in secondary industries (e.g. manufacturing, construction) which require significant intermediate inputs to facilitate production. Service sectors typically have significantly smaller multiplier effects.

Two sets of the above multipliers can be generated, namely:

- Type 1 Multipliers, which estimate the direct and production induced impacts of a stimulus or activity; and
- Type 2 Multipliers, which estimate the direct, production induced and consumption induced impacts of a stimulus or activity.

Type 1 Multipliers are used in this analysis because the preference of state and commonwealth treasury is for use of only Type 1 Multipliers, given that Type 2 Multipliers typically overstate the extent of consumption-induced impacts of any given stimulus or activity.

Table 2-4 summarises the four main measures of economic contribution used in the analysis.

Table 2-4 Measures of Economic Contribution

Impact Measure	Description
Output	The output impact measures the increase in gross sales throughout the entire economy by aggregating all individual transactions (direct and indirect) resulting from the economic stimulus. The output impact provides an indication of the degree of structural dependence between sectors of the economy. However, output impacts are regarded as overstating the impact on the economy as they count all goods and services used in one stage of production as an input to later stages of production, hence counting their contribution more than once.
Household income	The household income impact measures the additional wages, salaries and supplements paid to households associated with the industry under consideration and with other industries benefiting from the stimulus to the economy. It is important to note that the input-output tables on which this analysis is based relate to 2012-13. The input-output tables represent the structural dependence of industry sectors within the regional economy. Since 2012-13 there may have been changes in the composition of real wages. While the input-output tables have been augmented to reflect changes in relative incomes between industries, they have not been augmented such that they reflect relative differences between regions on an inter-industry basis.

Impact Measure	Description
Employment	The employment impact measures the number of full time equivalent (FTE) positions for one year created directly and indirectly by the stimulus. However, the short-term response to increased demand may be that existing employees work overtime. Consequently, actual levels of employment generated (in terms of persons employed) will tend to be lower than those estimated by the input-output analysis. This short-term employment response (of working additional overtime) will be more prevalent where the demand stimulus is likely to be temporary and short lived, or where there is limited spare capacity in the economy (that is, when the economy is at or near full employment).
Value added	The value added or Gross Regional Product (GRP) impact measures only the net activity at each stage of production resulting from a stimulus. GRP is defined as the addition of consumption, investment and government expenditure, plus net exports (exports minus imports) from a region. The value added (or GRP) impact is the preferred measure for the assessment of contribution to the economy from a stimulus or impact, and as such should be used to describe the net impact of the event.

Source: Jensen, R. & West, G. (2001) Community Economic Analysis, Department of Primary Industries: Brisbane, Qld

Additionally, our assessment provides consideration of the gross operating surplus (GOS). Gross Operating Surplus (GOS) represents the returns to capital from production (in the same way that wages and salaries represent the return to labour). Whilst not perfectly analogous, Gross Operating Surplus can be considered as the profits generated by businesses, i.e. the profits generated by business operations within the marine industry sector in Douglas Shire Council.

2.2.1.1 Limitations of Approach

Like all analytical techniques the assessment of economic contribution has several limitations, which may result in overestimation of impacts, as outlined below:

- The absence of capacity constraints such that the supply of each good is perfectly elastic, implying that each industry can supply whatever quantity is demanded of it and there are no budget constraints;
- The assumed linearity and homogeneity of the input function, which implies constant returns to scale and no substitution between inputs. This occurs because the approach assumes inputs purchased by each industry are a function only of the level of output of that industry;
- Each commodity, or type of commodity, is supplied by a single industry sector, implying there is only one method used to produce each commodity and each sector has only a single primary output;
- Multipliers are derived from the 2012-13 Input-Output tables and reflect the structural dependence of the economy at that time. These tables have been augmented to reflect broad level structural change across the national economy by industry sector. The Queensland and regional tables prepared for this analysis reflect regional variation from the national tables as at 2012-13. As such, the tables do not reflect any intensification or deterioration in regional competitive advantage in specific industry sector that may have occurred since this time;

- The assumption that the economy is in equilibrium at given prices and that the economy is not subject to other external influences; and
- The additivity assumption suggests the total effect of carrying on several types of production is the sum of the separate effects, which is not a true reflection of economic systems.

These limitations are generally only relevant in situations whereby:

- The stimulus being assessed is immature (or new);
- When the stimulus is likely to result in a major structural change in the host economy; and/or
- The regional economy is approaching a capacity constraint.

Marine industry activity within the Douglas Shire is considered mature and there is no evidence of the Douglas regional economy being capacity constrained, hence the limitations outlined above are unlikely to materially affect the robustness of the analysis.

2.2.2 Assumptions

To estimate the economic contribution of the marine industry sector within Port Douglas to the Douglas regional economy, the following steps have been undertaken:

- *Classification of marine industry activity*: Classify each four digit ANZSIC industry sector to the relevant marine industry category in CDM Smith's regional input output model;
- *Convert employed persons to full time equivalent (FTE) employment:* Convert employed person estimates to full time equivalent employment based on national averages. Note that all employment contribution results reported as outputs from the regional economic contribution analysis are full time equivalents (FTEs). FTEs generally equate to in the order of 2,000 work hours per annum;
- *Estimate annual output of the marine industry sector:* Utilise output (or sales) per FTE estimates ($/FTE) by industry sector from CDM Smith's regional input output model to derive annual output (or sales) of the marine industry sector; and
- *Estimate contribution of marine industry sector to the Douglas regional economy:* Run the derived annual output estimates through CDM Smith's regional input output model to generate estimates of output, employment, income and value added.

As outlined in Section 2.1 above, employment within the marine industry sector in Douglas Shire is currently estimated at 59 persons as summarised in Table 2-5.

Table 2-5 Marine Industry Sector Employment, Douglas Shire

ANZSIC Industry Sector	I-O Model Industry Classification	Estimated Employment (persons)
Sectors Supporting Marine Industry		
Shipbuilding and Repair Services	Ships and Boat Manufacturing	0
Boatbuilding and Repair Services	Ships and Boat Manufacturing	7
Other Polymer Product Manufacturing	Polymer Product Manufacturing	0
Total		7
Sectors Influencing Marine Industry		
Seafood Processing	Processed Seafood Manufacturing	0
Fishing	Fishing, Hunting and Trapping	12
Water Passenger Transport	Water, Pipeline and Other Transport	15
Scenic and Sightseeing Transport	Water, Pipeline and Other Transport	25
Total		52

Note: The I-O model industry classifications are not entirely consistent with the four digit ANZSIC classification.
Source: CDM Smith estimates

The estimated output of the marine industry sector in Douglas Shire is calculated by converting the number of workers to full time equivalents and then applying the output per full time equivalent from national accounts data. The number of workers is converted to full time equivalent to reflect that not all workers are part time. The conversion rate from workers to full time equivalents is also drawn from national accounts data sets.

The marine industry related activity in Douglas Shire Council employs an estimated 53.4 full time equivalents and generates estimated annual output of $25.93 million, comprising $2.21 million in sectors supporting marine industry and $23.73 million in sectors influencing marine industry, as summarised in Table 2-6.

The estimate of the size of marine industry related activity is heavily driven by water passenger transport and scenic and sightseeing transport, which could be summarised commonly as tour and charter boat operations. These activities ostensibly sit within the tourism industry but undoubtedly contribute to marine industry activity. While major repair activity for tour and charter boats is likely to be undertaken at larger facilities at Cairns, there is potential for small scale repairs to be undertaken locally in Port Douglas. Hence, charter and tour boats influence the marine industry sector.

Boatbuilding and repair services contribute ~$2.21 million in economic activity (output) to the regional economy. Of this only a proportion is related to the slipway. The economic contribution of the slipway is assessed in section 2.2.3.

Table 2-6 Estimated Output of the Marine Industry Sector, Douglas Shire

ANZSIC Industry Sector	Est. Employment (persons	Workers / FTE	Est. FTEs	Output / FTE	Est. Output ($m)
Sectors Supporting Marine Industry					
Shipbuilding and Repair Services	0	1.06	0.0	$335,653	$0.00
Boatbuilding and Repair Services	7	1.06	6.6	$335,653	$2.21
Other Polymer Product Manufacturing	0	1.07	0.0	$306,219	$0.00
Total	7	1.06	6.6	$335,653	$2.21
Sectors Influencing Marine Industry					
Seafood Processing	0	1.33	0.0	$573,351	$0.00
Fishing	12	1.16	10.3	$340,870	$3.52
Water Passenger Transport	15	1.10	13.7	$553,176	$7.58
Scenic and Sightseeing Transport	25	1.10	22.8	$553,176	$12.63
Total	52	1.11	46.9	$506,379	$23.73

Source: CDM Smith estimates

2.2.3 Estimated Economic Contribution of Marine Industry Sector

The marine industry sector in Douglas Shire is anticipated to make the following annual economic contributions:

- Direct output contribution of $25.93 million;
- Direct household income contribution of $7.61 million;
- Direct employment of 53.5 FTEs;
- Direct value added of $8.91 million; and
- Gross Operating Surplus[6] (GOS) of $1.30 million.

The sectors most likely impacted by any changes to the Port Douglas Slipway are the sectors supporting marine industry. These sectors are estimated to have an annual contributions to the Douglas Shire economy of:

- Direct output contribution of $2.21 million;
- Direct household income contribution of $0.65 million;
- Direct employment of 6.6 FTEs;
- Direct value added of $0.76 million; and
- GOS of $0.11 million.

Table 2-7 summarises the estimated annual economic contribution of the marine industry sector in Douglas Shire.

[6] Recall from section 2.2.1 that Gross Operating Surplus (GOS) represents the returns to capital from production (in the same way that wages and salaries represent the return to labour). GOS is largely analogous to profits earned by businesses.

Table 2-7 Estimated Economic Contribution of the Marine Industry Sector, Douglas Shire

Measure	Direct Contribution ($m)	Indirect Contribution ($m)	Total Contribution ($m)
Sectors Supporting Marine Industry			
Output ($m)	$2.21	$0.57	$2.78
Income ($m)	$0.65	$0.15	$0.80
Employment (FTEs)	6.6	1.4	8
Value Added ($m)	$0.76	$0.24	$1.00
GOS ($m)	$0.11	$0.09	$0.20
Sectors Influencing Marine Industry			
Output ($m)	$23.73	$6.13	$29.86
Income ($m)	$6.96	$1.63	$8.59
Employment (FTEs)	46.9	14.8	61.7
Value Added ($m)	$8.15	$2.59	$10.74
GOS ($m)	$1.19	$0.96	$2.15
Total			
Output ($m)	$25.93	$6.70	$32.63
Income ($m)	$7.61	$1.78	$9.39
Employment (FTEs)	53.5	16.2	69.7
Value Added ($m)	$8.91	$2.83	$11.74
GOS ($m)	$1.30	$1.05	$2.35

Source: CDM Smith estimates

2.3 Estimated Economic Contribution of Slipway

Advice from several slipway operators within Queensland indicate slipping fees range from $3,000 to $6,000 per lift. The upper end estimates were typically in SEQ and for facilities that can lift vessels in the 60 tonne to 100 tonne range. Slipping fees tend to be proportional to vessel size. Smaller slipway facilities in locations were the vessel fleet is smaller tended to report slipping fees towards the lower end of the aforementioned range. Crystalbrook Marina indicates that the existing slipway lifts 60-70 vessels per annum, which assuming an average slipping fee of $4,500, translates to an annual revenue in the order of $270,000-$315,000 per annum. This could be an overestimate, because the average size of vessel being slipped at the existing facility is likely to be smaller than what is seen at other facilities across Queensland.

Based on an annual slipway revenue in the order of $270,000 - $315,000 per annum, this translates to the following estimated economic contribution to the Douglas Shire economy:

- Direct output contribution of $0.27 - $0.32 million;
- Direct income contribution of $0.08 - $0.90 million;
- Direct employment contribution of 1.0 to 1.1 FTEs;
- Direct value added contribution of $0.09 - $0.11 million; and

- Direct GOS contribution of $0.01 - $0.02 million.

Total economic contribution of the slipway based on current levels of operation are as follows:

- Total output: $0.34 million - $0.40 million;
- Total income: $0.1 million - $0.11 million;
- Total employment: 1.2 FTEs – 1.4 FTEs;
- Total value added: $0.12 million - $0.14 million; and
- Total GOS: $0.02 million - $0.03 million.

The economic contribution results modelled in Table 2-8 and reported above are modelled results. Actual contribution is likely to differ, possibly in the order of +/- 25%. These differences arise from different approaches to operating a business between enterprises and the outstanding capital burden of the facility. The capital costs of the Port Douglas slipway are likely to have been long amortised hence there could be a slight bias towards higher levels of employment than suggested by the modelled results.

Consultation with the marina manager at Crystalbrook Marina indicated that one full time equivalent is currently employed at the slipway, with two additional persons at the marina trained to assist at the slipway on an as needed basis[7]. This information tends to corroborate the economic contribution analysis detailed in Table 2-8, although suggests a marginally higher level of employment than the modelled results.

Table 2-8 summarises the estimated annual economic contribution of the Port Douglas Slipway.

Table 2-8 Estimated Annual Economic Contribution of the Port Douglas Slipway

	Min			Max		
	Direct	Indirect	Total	Direct	Indirect	Total
Output ($m)	$0.27	$0.07	$0.34	$0.32	$0.08	$0.40
Income ($m)	$0.08	$0.02	$0.10	$0.09	$0.02	$0.11
Employment (FTEs)	1.0	0.2	1.2	1.1	0.3	1.4
Value Added ($m)	$0.09	$0.03	$0.12	$0.11	$0.03	$0.14
GOS ($m)	$0.01	$0.01	$0.02	$0.02	$0.01	$0.03

Source: CDM Smith estimates

[7] It is understood that the cradle lift facilities at the Port Douglas slipway require two people to bring the boats out of the water. However, the additional two persons trained predominately are utilised at the marina, rather than the slipway.

Section 3 Marano Proposal

In late 2007, Douglas Shire Council issued a negotiated decision notice to the Port Douglas Fisherman's Association for the development of a small scale marine industry precinct at the end of Port Road, Port Douglas (Lot A on SR808245 being part of Lot 122 on CP890172: SL09/1821:PT Rerserve 177, Parish of Salisbury, County of Solander). This proposed development is commonly referred to as the Marano development (refer to Figure 3-1 for context map).

Figure 3-1 Context map for Marano site

The Marano proposal (plans shown at Figure 3-2) covers approximately half a hectare and includes provision for a hydraulic travel lift and a number of hardstand areas and small sheds for vessels to be worked on. The key challenge for the Marano proposal will be cost of development and likely return. At less than a hectare it would be challenging for sufficient hardstand or shed leasing income to be generated to provide a return on investment.

Interviews with slipway operators across Queensland indicate that slipway viability is either achieved through:

a. Sunk capital costs: that is the slipway was established many years ago and the capital burden of the facility was amortised long ago. Hence, viability is achieved by limited costs to operating and maintenance costs;

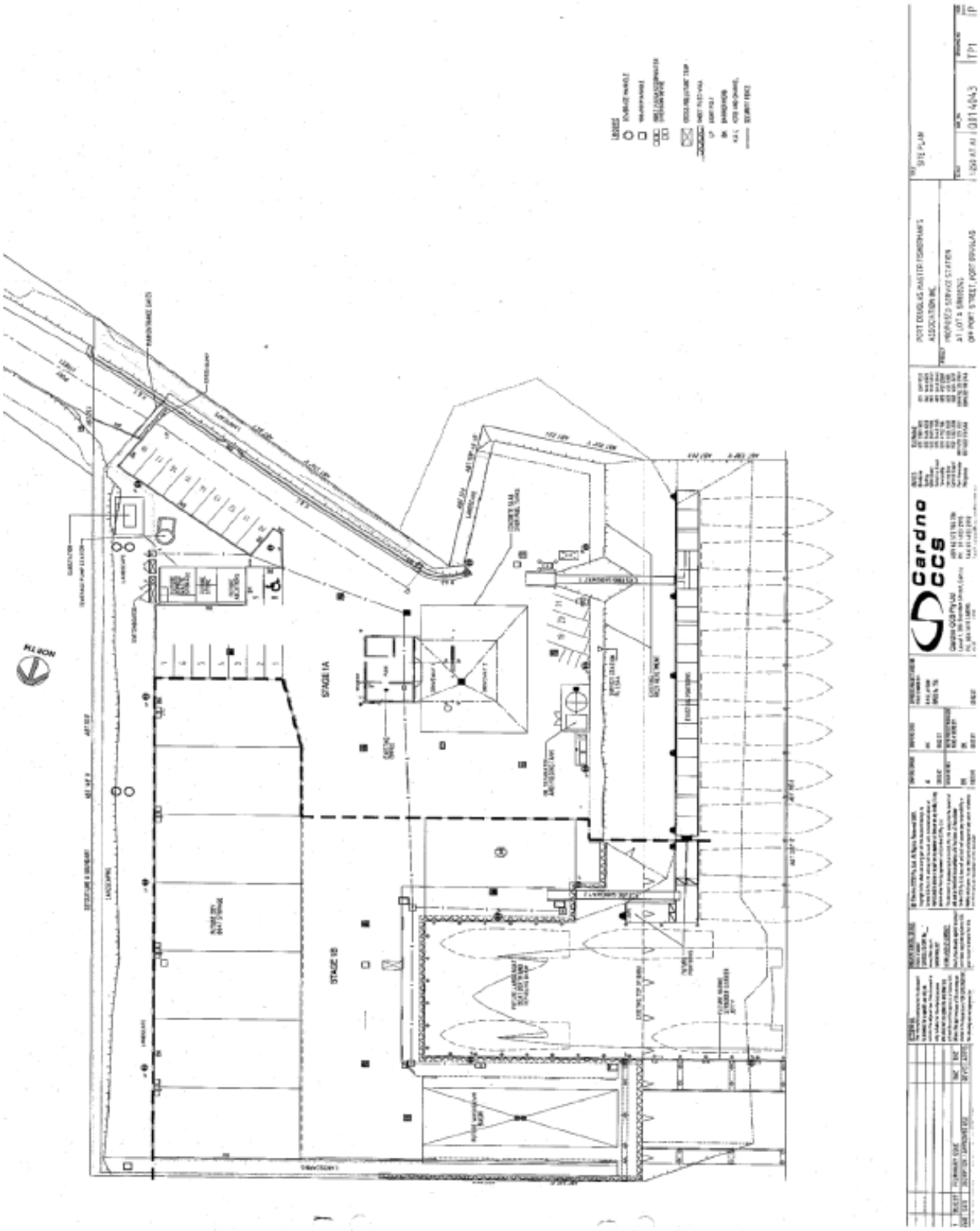
b. Sale of leasing income from industrial enterprises: the slipway is delivered as part of a marine industry development where hardstand or shed areas are either sold or leased at commercial leasing rates;

c. Slipway as part of a larger enterprise: dedicated boat and ship builders operate their slipway as part of an integrated business. These are usual found in major population centres. Cairns Slipway operated by BSE Maritime Services is the largest slipway outside of SEQ; or

d. Slipway is operated as a member benefit: several smaller slipways are operated by yacht and boating clubs and their operation is subsidised as a club member benefit.

Given that the Marano proposal would not have the benefit of any of the above, it would be very difficult to viably deliver the development without significant financial support from an external entity.

Figure 3-2 Proposed Marano development



Section 4 SWOT Assessment of Marine Industry at Port Douglas

This section provides a summary SWOT analysis of marine industry at Port Douglas having regard to local assets, structure and markets.

4.1 Strengths

Key strengths of marine industry at Port Douglas include:

- Significant employment growth in commercial fishing, which could translate to an uplift in demand for marine industry (although commercial fishing vessels have a wide home range which would likely include Cairns);
- Most local marine industry enterprises also service other sectors. Enterprises have actively pursued diversified revenue streams and business drivers. This insulates these enterprises to some extent from volatility in the marine industry sector;
- Crystalbrook Marina is almost fully occupied and achieves berthing fees consistent with other premium locations;
- Depreciation of the Australian dollar has seen the local and FNQ tourism industries recovery strongly. This could stimulate provision or repositioning of private charter vessels in Port Douglas; and
- Port Douglas is a high profile tourism destination with both national and international name recognition.

4.2 Weaknesses

Key weaknesses of marine industry at Port Douglas include:

- There has been a decline in the prominence of marine industry activity in Port Douglas and Douglas Shire more generally;
- Existing Port Douglas slipway infrastructure and facilities represent an outdated technology, hence any continuation of slipway operations would require a major capital investment;
- Rail and cradle lift facility limits number of boats through slipway per annum, with vessels staying on cradles while they are out of water and being worked on;
- Low tides restrict usage of Port Douglas slipway operations approximately three to four times a month during winter; and
- Slipway predominantly utilised by locally berthed boats with little inflow of touring vessels or vessels from Cairns.

4.3 Opportunities

Key opportunity for marine industry at Port Douglas include:

- There are alternatives to a fully specified slipway at Port Douglas that would suit the majority of vessels that are currently utilising the slipway, which would not attract the same capital cost;
- Presence of a pre-existing or historic approval in the form of the Marano site, which could minimise approval risks for a future development if located at the Marano site; and
- Potential to establish value adding opportunities associated with the commercial fishing sector

4.4 Threats

Key threats for marine industry at Port Douglas include:

- Potential loss of slipway with no alternative slipping facilities provided in lieu of a slipway could reduce attractiveness of Port Douglas as a berthing location and future outlook for existing marine industry enterprises;
- Continued consolidation of marine industry activity into major centres and growth in marine industry activity in Cairns could crowd out marine industry activities in Port Douglas; and
- Potential loss of berthed boats at Crystalbrook Marina to other localities due to loss of Port Douglas Slipway, although consultation indicates this impact is anticipated to be minimal

Section 5 Demand for Marine Industry and Slipway

The demand for marine industry and slipway services will be primarily determined by the size of the local vessel fleet. The slipway provides the service of removing vessels from the water so that they can be maintained and worked on, hence the demand for the slipway will be driven by the number of vessels that need to be berthed at marina facilities within close proximity to the slipway. On the other hand, the demand for marine industry, which also provides services to smaller vessels that do not require marina berthing, is driven by the size of the broader vessel fleet (including jet skis, small outboard boats, larger trailable boats, wet berthed vessels, etc).

5.1 Local Fleet Projections

Economic analysis conducted for the Port Douglas Waterfront Master Plan[8] indicated that the demand for marina berths from local vessels at Port Douglas would increase from approximately 150 vessels in 2008 to 203 vessels in 2026. These estimates exceed the provision of marina berths at Port Douglas, however as shown in aerial imagery in Figure 5-1 below , there are a material number of vessels berthed within the Port Douglas inlet on either buoys or pile moorings.

Figure 5-1 Aerial image of Port Douglas inlet

[8] Economic Associates (2008) Port Douglas Waterfront Master Plan: Economic Analysis

Subsequent analysis conducted as part of the Queensland Recreational Boating Infrastructure Forecasting Project[9], estimated that the demand for marina berths within Douglas Shire as at 2016 was ~175 berths, with a total recreational boat fleet of ~1,750 vessels.

As part of the Queensland Recreational Boating Infrastructure Forecasting Project[10] the size of the fleet requiring marina berths was projected to increase from ~175 vessels in 2016 to ~214 vessels by 2036. The size of the total recreational boat fleet for Port Douglas was projected to increase from ~1,750 vessels in 2016 to ~2,125 vessels in 2036. These projections are generally consistent with the marina berth demand analysis conducted for the Port Douglas Waterfront Master Plan.

The above projections suggest that demand for slipway services (based on the fleet utilising marina berths) would grow at a rate of 1% per annum. This means for the number of slips conducted by the Port Douglas slipway to increase significantly over time there would need to be a major change in the regional positioning of the slipway such that it was able to draw trade from the Cairns based fleet.

5.2 Potential Relevance or Otherwise of Cairns Fleet

The Queensland Recreational Boating Infrastructure Forecasting Project anticipates much stronger growth and overall demand for marina berths (and by implications need for slipway services) in Cairns projecting an increase in the size of the fleet requiring marina berths from ~996 vessels in 2016 to ~1,355 vessels in 2036 (representing a growth rate of 1.6% per annum from a much larger base than that in Douglas Shire). The average sailing distance from Cairns based marinas to Port Douglas is in the order of 30 to 35 nautical miles, implying that the Cairns market might be contestable from Port Douglas assuming a half day cruise time between Cairns and Port Douglas is considered acceptable by boat owners. The average fuel burn of a motor boat is in the order of 30 litres to 40 litres per hour. Assuming a three to four hour cruise this would incur a fuel cost in the order of $150-$200 each way. Additionally, the boat owner would need to make two round trips to Port Douglas representing a total vehicle kilometres travelled of 280 kilometres. Based on an average vehicle operating costs of $0.3/kilometre to $0.4/kilometre[11], these trips would cost between ~$85 to ~$110.

Total resource costs associated with the choice to send a vessel from Cairns to Port Douglas for servicing would likely be in the order of an additional $500 depending on fuel burn. Boat owners might also consider the value of theirs and any travel companion's travel time. The personal travel time for a boat owner and companion could be in the order of six to eight hours each way, which based on a value of travel time of ~$16.50/hour[12], would translate to a cost of over $500. As such, there are several factors that would militate on Port Douglas marine industry and slipway operators penetrating strongly into the Cairns market, with the cost saving associated with boat work likely to need to be in the order of $1,000. It is unclear whether or not such a discount could be achieved.

[9] Department of Transport and Main Roads (2017) Queensland Recreational Boating Infrastructure Forecasting Project

[10] Department of Transport & Main Roads (2017) Queensland Recreational Boating Infrastructure Demand Forecasting Project

[11] ATAP (2017) Parameter Values, Vehicle Operating Costs (inflated to rounded 2019 dollars)

[12] ibid

5.3 Future Demand Growth

Based on the above, we would anticipate that demand growth for marine industry activities and indeed the slipway would likely be in the order of 1%-2%. Ultimately, the size and anticipated growth of the vessel fleet limits the scope for demand growth for marine industry and slipway services.

Discussions with the Port Douglas Slipway operator identified that the number of vessels slipped at the facility had remained stable for some time, with the facility primarily servicing the local fleet berthed at Crystalbrook Marina.

5.4 Opportunities Moving Forward

Development of a viable marine industry within Port Douglas will be dependent on a combination of fleet growth and local supply chain capability. There remains potential for new marine enterprises to establish in Port Douglas, but this would ultimately require the establishment of a dedicated marine industry precinct within which new enterprises could establish and grow over the medium to long term. Development of local supply chain capability might be sufficient to improve the competitive balance between Port Douglas and Cairns for marine industry activities.

Recognising the challenges of developing a new slipway, were one to be established consideration should be given to providing land for marine industry to establish. Based on existing market size and long term growth potential a precinct that could yield in the order of one hectare of marine industry land, of which 1,000sqm to 2,000sqm is occupied by a slipway, would be appropriate.

Consultation with the Port Douglas Slipway operator indicated that modern slipway facilities tended to be supported by a large marina and significant sheds in which supporting businesses could operate, undertaking boat repairs undercover.

Section 6 Strategic Assessment of Slipway Feasibility

The purpose of this section is to provide a high level assessment of the feasibility of a new slipway facility at Port Douglas having regard to the order of magnitude capital and operating costs relative to potential revenue streams. Analysis is conducted to report the changes in slipway activity that would be necessary to support the capital and operating costs associated with developing a new facility.

The existing slipway facility at Port Douglas is a cradle and rail lift facility. This represents a superseded technology. The problem with traditional cradle and rail facility is that the vessel extracted remains in the cradle used for slipping the vessels while it is being worked on. Based on interviews with industry representatives, a replacement facility would most likely take the form of a travel lift, which is a hydraulic lift used in most modern slipways. The hydraulic travel lift allows the vessel to be extracted from the water and placed on a temporary work cradle, leaving the travel lift free and available to lift other vessels. The size of the travel lift facility is normally determined by the likely size of the fleet. Where the fleet is predominantly private recreational vessels, travel lifts with a capacity of between 40 tonnes to 80 tonnes are predominant. At present, the weight capacity of the existing large cradle and rail lift is understood to be approximately 50 tonnes.

In addition to a travel lift a new slipway will require significant site and pier works to facilitate the operation of the lift. This would normally be complemented by a significant laydown or hardstand area for vessels to be set down and worked on. In addition to slip fees, slipways can have the potential to generate hardstand income or site leasing income for contractors based within the grounds of the slipway. Figure 6-1 provides an example of a small travel lift slipway

Figure 6-1 Example of small slipway travel lift

6.1 Capital Costs

The principal expenses associated with establishing a new slipway will be the purchase of the travel lift and site and pier works to facilitate the operation of the travel lift. There will be additional works associated with hardstand and laydown areas, parking, administration facilities and potentially contractor sheds.

The cost of a travel lift varies depending on whether the lift is purchased new or used. While there is significantly variability in the cost of new and used travel lifts in the North American market, the small size and relative remoteness of the Australian market significantly constrains price variations.

The cost of a new travel lift is subject to a price on application with there being some scope for negotiation depending on market conditions. However, discussions with existing slipway operators within South East Queensland indicate a capital cost of between $800,000 to $1.2 million for various travel lifts within the 40 tonne to 80 tonne capacity. Advice from slipway operators was that a reconditioned travel lift with limited warrantee could be purchased at a 20% discount to a new travel lift. However, the market is very small and there are limited numbers of reconditioned lifts sold in any given year. There is evidence that travel lifts are sold between slipways, however this can be risky.

'Ring fencing' the site area necessary for a slipway is challenging, because most of Queensland's smaller slipways are operated as part of yacht club or marina facilities and are positioned as a member or marina benefit. The establishment of pier arms and small laydown area (~500sqm) was disclosed as being in the order of $1.5 million to $2 million for a 40 tonne slipway. A review of unit cost information for laydown areas capable of supporting loading associated with the movement of a loaded travel lift and laydown of a vessel, are in the order of $250/sqm. Assuming a 2,000 sqm adjacent laydown area, this would add an additional $500,000 to the cost of the slipway facility.

The land cost associated with a new facility is unknown. In the case of yacht clubs the land is frequently held under trust arrangements, while in the case of a marina the land and basin costs are aggregated at across all marina operations.

Excluding land costs, parking and administration building, the capital cost of a new slipway facility would be in the order of $3 million to $3.5 million for a 40 tonne facility. An 80 tonne facility would likely be in the order of $3.5 million to $4 million.

This is an indicative cost and likely excludes significant cost items associated with design, approval and development of a new slipway. As such, a contingency of 50% would be reasonable. This would imply a capital cost of over $4.5 million for the new slipway facility. This analysis adopts an indicative estimate of $4.88 million, comprising:

- Travel lift acquisition: $1 million;
- Pier and site works: $1.75 million;
- Hardstand works: $0.5 million; and
- Contingency: $1.63 million.

6.2 Operating Costs

Operating costs for the slipway facility will be influenced to some extent by the number of vessels slipped each year. However, there would likely be a significant fixed cost component associated with operating the slipway.

6.2.1 Labour costs

The slipway would as a minimum require a lift operator and facility administrator. Wages information for these functions is not available. The minimum wage in Australia is currently in the order of $41,000 per annum including employer's compulsory superannuation contribution. According to ABS data, the average full time wage in Queensland is in the order of $89,000 per annum including employer's compulsory superannuation contribution.

Assuming that the lift operator is remunerated at the Queensland rate of average full time earnings and the administrator is paid a minimum wage the combined wage costs of a minimal workforce would be in the order of $130,000 per annum including employer's compulsory superannuation contribution.

At present, the Port Douglas slipway employs one full time equivalent person, with two persons at Crystalbrook Marina also trained to assist at the slipway (i.e. as the cradle lift facility requires two persons to be operated).

6.2.2 Utilities

The slipway can reasonably be expected to be connected to main electricity, water and waste water. There is no information available of the likely utility costs of a slipway facility. However, Energy Consumers Australia (2018)[13] report that the average retail electricity cost for small and medium enterprises in Queensland is in the order of $6,250 per annum. An interview with Queensland Urban Utilities (pers comm) indicated that the average cost of water and waste water for a small logistics business[14] in SEQ was in the order of $10,000 to $15,000 per annum. This suggests a total utility cost of between $15,000 to $20,000, hence an assumption of a total utilities charge of $17,500 has been adopted.

6.2.3 Maintenance Costs

Advice from a yacht club that operates a slipway indicates that the main source of maintenance costs is related to the travel lift, and that an appropriate maintenance allowance was in the order of 1% of the cost of the travel lift. For convenience a cost of $10,000 per annum has been adopted.

6.2.4 Other and Miscellaneous Costs

In addition to labour and utility costs the slipway would likely incur other costs, including local government taxes and charges, input materials, waste management costs and other incidental costs. Without access to detailed financial information it is not possible to settle a precise cost estimate for these other costs.

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[13] Energy Consumers Australia (2018) Analysis of small business retail energy bills in Australia, Small and Medium Enterprise Retail Tariff Tracker Project, prepared by Alviss Consulting.

[14] This example is used because it is not anticipated that the slipway would be a large water or waste water user like a manufacturing business.

6.3 Revenue Considerations

Advice from several slipway operators within Queensland indicate slipping fees range from $3,000 to $6,000 per lift. The upper end estimates were typically in SEQ and for facilities that can lift vessels in the 60 tonne to 100 tonne range. Slipping fees tend to be proportional to vessel size. Smaller slipway facilities in locations were the vessel fleet is smaller tended to report slipping fees towards the lower end of the aforementioned range.

Information provided by Crystalbrook Marina indicates that the existing slipway lifts 60-70 vessels per annum. Assuming an average slipping fee of $4,500, this translates to an annual revenue in the order of $270,000-$315,000 per annum. This could be an overestimate, because the average size of vessel being slipped at the existing facility is likely to be smaller than what is seen at other facilities across Queensland.

Crystalbrook Marina also advised that their throughput might be supressed by the cradle lift facilities, where a vessel is not removed from the cradle until it is relaunched back into the water. This limits the number of vessels that can be slipped.

One slipway operator in regional Queensland contended that the number of vessels being slipped is heavily influenced by the number of vessels that can be berthed at an adjacent marina. This slipway operator offered a simple relationship that it had observed over three decades of operation:

$$\text{Number of vessels slipped} = \left(\frac{Number\ of\ marina\ berths}{2}\right) * 1.25$$

The rationale was that every vessel in the marina would need to be defouled every 18 months to two years and approximately 20% of the number of vessels slipped would be non-local.

While other smaller slipway operators did not offer such a metric all referenced the number of nearby marina berths and that vessels berthed in water typically need to be defouled annually or biennially[15].

Applying the above formula suggests that the likely market size for slipping at Port Douglas would be in the order of 80 vessels per annum[16]. The attractiveness of Port Douglas it is likely that there could be more upside potential associated with non-local vessels, however the size of the Port Douglas marina is likely a major constraint on the market for slipway services. Consultation advised that the number of boats slipped at the Port Douglas Slipway had remained at approximately 60-70 vessels per annum for some time, with limited demand generated from the non-local fleet, other than some commercial fishing boats from Cooktown.

6.4 Viable Operation of a New Slipway

The viability of developing a new slipway will be determined by the interaction of capital and operating costs with revenue streams, the target rate of return and project life.

The target rate of return or discount rate will be determined by Crystalbrook Marina's weighted cost of capital (WACC), which is determined by the risk free rate of return and the industry or enterprise risk premium. This information will be held confidentially by Crystalbrook Marina, with private enterprises typically being unwilling to disclose their WACC (or standard hurdle rate). In the absence of a WACC from Crystalbrook Marina, to provide

[15] That is once every two years, as opposed to bi-annually which means twice a year.

[16] Based on a marina size of ~130 berths.

context we note that the social time preference rate is generally contended to be in the order of 3% (real), while the social opportunity cost of capital is generally considered to be in the order of 4%-4.5% (real). Government agencies generally adopt test discount rates for infrastructure projects of between 4% and 7% (real), depending on jurisdiction and project. The WACC of regulated rail monopolies in Queensland has historically been in the order of 6%-8%. A private sector WACC would normally be above that of a regulated monopoly.

For the purposes of this assessment a test real rate of return of 10% has been adopted. This is likely below the WACC of Crystalbrook Marina, hence a sensitivity test discount rate of 15% is also included in the analysis.

This analysis also adopts a project life of 20 years, which is potentially a longer payback period than ultimately preferred by a private enterprise like Crystalbrook.

For the new slipway based on the costs described above to be viable at the test discount rates it would need to achieve slipping fees of:

- ~$740,000 per annum at the 10% discount rate; and
- ~$752,000 per annum at the 15% discount rate.

Assuming that the new slipway charged $4,500 per slip, it would need to slip ~170 vessels per annum, compared to an existing throughput of 60-70 vessels per annum.

To provide additional context were the new slipway to generate revenue in the order of $270,000 per annum, the lower end of our estimate of the performance of the existing slipway, the investment decision to develop a new slipway would have a negative internal rate of return. To achieve a 0% (as opposed to negative) internal rate of return the new slipway would need to achieve slipping fees in the order of $410,000 per annum. This means that a new slipway would not be viable based on existing slipping volumes.

6.5 Potential Measures to Improve Viability

The viability of a new slipway will depend ultimately on reductions or offsetting of capital costs and/or significant increases in slipway business.

6.5.1 Reducing Capital Costs

It is unlikely that there are major savings to be had in capital costs without dramatically changing the nature of the facility. An alternative to establishing a new slipway with a travel lift would be purchase of a trailable or mobile cradle lift, which is essentially a large vessel trailer. This would significantly reduce both acquisition, pier and site costs and could be used at existing boat ramp facilities if accessible to a work or storage yard. However, this would most likely reduce the size of vessels that can be serviced locally. Figure 6-2 and Figure 6-3 are examples of smaller scale lifts that could reduce costs, but would also reduce flexibility of operation.

At present, the two cradle lifts at the Port Douglas slipway can accommodate boats from approximately 30-35 foot in length to 60-70 foot in length.

Figure 6-2 Small self-propelled mobile cradle lift

Figure 6-3 Small self- mobile cradle lift trailer

6.5.2 Offsetting Capital Costs

Capital costs could potentially be offset through grant funding, however the scale of grant funding required would likely be in excess of $1 million to meaningfully offset the capital costs of a new travel lift slipway. The parameters for grant funding from Queensland and Australian government grant programs change regularly. While grant funding can be accessed by private enterprises, prospects for success would be improved if a private proponent were to partner with Douglas Shire Council.

6.5.3 Increasing Revenue Potential

As mentioned above, a new slipway would need to see a very significant increase in slipping volumes from 60-70 vessels slipped per annum to ~170 vessels slipped per annum. The single most significant factor influencing demand for a local slipway is the number of vessels berthed locally. The existing Port Douglas marina has ~130 berths, not all of which are permanently occupied. To establish a local market of sufficient scale to generate demand for 170 slips per annum at a Port Douglas facility the local berthed vessel fleet would need to increase to 300-350 vessels (assuming an average slip fee of $4,500[17]). Hence, the viability of a new slipway at Port Douglas would be contingent on a more than doubling of the number of marina berths at Port Douglas. The feasibility of this is outside the scope of this study, but there would be significant regulatory hurdles to be cleared for such an expansion. It is also recognised that provision of 300-350 marina berths at Port Douglas would represent provision over and above projected demand in Douglas Shire over the medium to long term[18].

6.6 Floorspace and Land Requirements for Marine Industry at Port Douglas

At present, there is little floor space dedicated to marine industry activity in Port Douglas and Douglas Shire more broadly, with a number of businesses servicing the marine industry sector also providing services more broadly. Should the slipway facility in Port Douglas ultimately close, it is considered unlikely that the provision of marine industry floor space in Port Douglas would change significantly, rather that the incidence of business undertaken specifically for the marine industry sector is likely to shrink.

The lack of a purpose built marine industry precinct is likely a key constraint to ongoing marine industry activities and development within Douglas Shire. Given the small size of existing marine industry activity the appropriate development response would be the establishment of a small scale marine industry precinct in the order of one hectare. The provision of long term leasing opportunities could potentially defray a significant portion of capital investment in a new slipway facility, however there would still remain a need for a significant uplift in vessels requiring slipway services.

[17] If average slip fees are at the bottom end of the reported range (i.e. $3,000 per slip) then the local vessel fleet would need to be closer to 450 vessels).

[18] As outlined in Section 4 of the report, the Port Douglas Waterfront Masterplan estimated marina berth demand for 203 vessels in 2026, with the Queensland Recreational Boating Infrastructure Forecasting Project (2017) estimating marina berth demand to reach 214 vessels in 2036.

Section 7 Summary and Conclusions

The marine industry in Port Douglas is comparatively small and is represented by a small number of generally small enterprises. Most of these marine industry enterprises have diversified to offer services to non-marine clients. The slipway does represent a strength for marine industry within Port Douglas, however consolidation and ongoing investment in competitor locations (most notably Cairns) has seen activity at the Port Douglas Slipway decline over the past decade.

The establishment of a new purpose built and full operational slipway (i.e. a 40-60 tonne hydraulic travel lift) would incur a significant capital cost. A high level analysis of feasibility indicates that the a new purpose built and fully operational facility would need more than twice as many vessels using the facility as what currently occurs. The demand for slipway services is largely driven by the size of the local fleet that is wet berthed. Analysis shows that the number of vessels berthed in Port Douglas marina facilities, pile moorings and inlet buoys would need to more than double to drive sufficient demand to support a new purpose built and fully operational facility. The potential for significant uplift in slipway demand driven by Cairns based vessels is limited because of the costs of shuttling a vessel and driver from Cairns to Port Douglas and return and the unlikelihood of a major cost saving at the slipway.

The Marano proposal represents a potential opportunity although it too would have to contend with higher capital costs, and at present being only half a hectare is not of a sufficient scale to generate hardstand or shed leasing income to defray the capital costs of development.

Viability could be improved through grant contributions possibly obtained through programs such as Building Better Regions Fund, but typically these programs do not award grants to private enterprises. Alternatively, the type of slipway services provided in Port Douglas could change using alternative slipping technologies, but this would significantly limit the size of vessel that could be serviced in Port Douglas. In summary, the development of a purpose built and fully operational slipway at Port Douglas would not be viable without a significant third party capital contribution and/or alternative income streams most typically generated through property income from adjacent industrial uses.