

FINANCE AND ADMINISTRATION COMMITTEE

Sixteenth Session

Da Nang, Vietnam 27 November - 3 December 2022

PROPOSED BUDGET FOR THE COMMISSION'S WORK PROGRAMME FOR 2023 AND INDICATIVE BUDGETS FOR 2024 AND 2025

WCPFC19-2022-FAC16-07 Rev1 9 November 2022

- 1. This paper sets out draft budget estimates for the Commission to undertake the proposed programme of work for 2023 together with indicative figures for 2024 and 2025. The budget proposed for the General Account Fund for 2023 is USD8,870,624. The expenditures proposed for 2023 are for work and activities emanating from the previous Commission decisions; recommendations of the 2022 sessions of the Scientific Committee (SC18), the Technical and Compliance Committee (TCC18), the various intersessional working groups; and the Secretariat's estimation of the ongoing operational costs for the Commission and its Secretariat.
- 2. The budget is structured in two parts. Part 1 relates to the administrative expenses to sustain the operations of the Secretariat. Part 2 relates to the expenses for the work of the Science and Technical and Compliance Programmes of the Commission.
- 3. The proposed Part 1 of the budget for the administrative expenses of the Secretariat in 2023 has increased by USD101,776 from the indicative budget for 2023 presented at WCPFC18 when taking into account the Future Work Commission budget line (sub-item 1.8). The increase is primarily due to the added costs for hosting hybrid meetings and staff benefits related to the recruitment of a new ED.
- 4. The proposed Part 2 of the budget for both the Science Programme and the Technical and Compliance Programme in 2023 is USD263,369 more than the comparable indicative figure considered by WCPFC18 for 2023. The increase from the indicative budget is primarily related to projects under the Science Programme as some future projects are based on the current research outputs or other agreed compelling needs.
- 5. The indicative budget for 2023 endorsed by WCPFC18 was USD8,505,479. The current proposed budget represents a 4.3% increase from the indicative 2023 budget and a 4.7% increase from the 2022 budget.
- 6. Due to the impacts of COVID-19 on international travels and the hosting of physical meetings, it is projected that there will be again a significant, although less compared to 2021, savings in the 2022 expenditures. It is proposed that those saving be used to offset the 2023 and 2024 General Fund financing. The net amount of the proposed member contributions is USD7,396,327, once the estimated USD3,400 for bank interest, the USD50,000 from the CNM

Contributions Fund, and the USD1,350,000 drawdown from the Working Capital Fund are accounted for in the contribution formula.

- 7. As per Staff Regulation 19 (f), an annual market survey has been conducted for support staff salaries. Inflation for over the last year has been 6.8%. Per Staff Regulation 19 (f) the maximum amount of an increase due to inflation that can be automatically included in the budget is 5%. The proposed budget for 2023 includes a 5% increase for support staff salaries due to inflation, as set out in Staff Regulations. The cost of the additional 1.8% is included in the table below for consideration.
- 8. The budget estimates do not include provisions for certain activities which are recommended for decision by WCPFC19. Should the Commission approve those activities, they will need to be added to the budget figures. Items that may have a budget impact include:

Item	2023	2024	2025
Triannual salary review (WCPFC19-2022-FAC16-03)	USD78,003	USD78,468	USD78,749
Per Staff Regulation 19 (f) the maximum amount of an increase due to inflation that can be automatically included in the budget is 5%. Per the staff regulation, the additional amount of 1.6% would need to be approved by the Commission.	USD10,819	USD10,905	USD10,993
Preliminary forecast of Secretariat's MCS and Compliance Programme 2023 - 2025 (WCPFC19-2022-IP18) Proposed establishment of Compliance and Monitoring Analyst position to commence in 2023 (see WCPFC19-2022-FAC16-11)	Salary and Benefits- USD133,800 - 190,500 Establishment costs- USD25,565 Annual Travel- USD22,000 (for four trips)	Salary and Benefits- USD133,800 - 190,500 Annual Travel- USD22,000 (for four trips)	Salary and Benefits- USD133,800 - 190,500 Annual Travel- USD22,000 (for four trips)

- 9. As required by the Commission's Financial and Staff Regulations, the following information is provided in support of the budget estimates:
 - Annex 1: Consolidated Overview of Total Income and Expenditures;
 - Annex 2: Summary of Donor Contributions;
 - Annex 3: Summary of estimated General Fund budgetary requirements for 2023 and indicative figures for 2024 and 2025. This Annex includes the funding appropriated for

2022 and the forecasted total expenditure to year end against those appropriations, together with the indicative 2023 budget figures considered at WCPFC18;

- Annex 4: Proposed General Fund financing table for 2023, 2024 and 2025;
- Annex 5: A Summary of estimated costs for Established Posts for 2023-2025;
- Annex 6: Summary of budgetary estimates for 2023, 2024, and 2025 for the Commission's funds other than the General Account Fund;
- Annex 7: Indicative schedule of contributions based on the Commission's contribution formula. This schedule draws on 2019 2021 catch data provided by the Oceanic Fisheries Programme of the Pacific Community (SPC), the gross national income (GNI) and GNI per capita statistics from the World Bank website (www.worldbank.org) and other sources where statistics are not available from the World Bank;
- Annex 8: Indicative schedule of 2023 contributions for Cooperating Non-Members;
- Annex 9: Catch data provided by SPC and used in the assessment of contributions;
- Annex 10: Reproductions of Schedules 1 and 2 of the Commission's Staff Regulations;
- Annex 11: Summary of IT Costs at the Secretariat;
- Annex 12: MOU with SPC for Scientific Services; and
- Annex 13: The SC18 provided the work programme and budget with an average priority rank score to each project that requires funding support from the Commission. The annex includes details of the Science Programme and average priority scores.
- 10. Annex 3 is the core budget document and is divided into Part 1 for Administrative Expenses and Part 2 for the Science and Technical and Compliance Programmes. The budget for the Administrative Expenses are based on the level of Secretariat support consistent with the proposed work programme and management of the Commission's headquarters property. The budget figures for the Science and Technical and Compliance Programmes were obtained from the reports of the SC18 and discussions at TCC18.

Recommendation

11. The Committee is invited to consider the 2023 proposed budget and make recommendations to the Commission on the annual budget for 2023 and the indicative budgets for 2024 and 2025.

Consolidated Overview of Total Income and Expenditures

ANNEX 1

Income	2022	2023	2024	2025
Member Contributions	\$ 6,967,452	\$ 7,467,224	\$ 7,900,811	\$ 8,135,157
CNM Contributions	\$ 174,658	\$ 185,904	\$ 196,699	\$ 202,533
Interest and other income	\$ 3,500	\$ 3,400	\$ 3,500	\$ 3,500
Donors*	\$ 913,361	\$ 368,667	\$ 383,701	\$ 383,701
Total Income	\$ 8,058,971	\$ 8,025,195	\$ 8,484,711	\$ 8,724,890
Estimated Expenditures				
Administrative Expenditures	\$ 3,658,568	\$ 4,524,960	\$ 4,679,250	\$ 4,668,610
Science Programme Expenditures	\$ 2,266,167	\$ 2,323,050	\$ 2,198,311	\$ 2,079,077
Tech. and Compliance Programme Exp.	\$ 1,519,464	\$ 2,022,614	\$ 1,976,750	\$ 1,940,969
Project Expenditures (vol. contributions)	\$ 1,133,979	\$ 1,633,046	\$ 101,464	\$ -
Total Expenditures	\$ 8,578,178	\$ 10,503,670	\$ 8,955,775	\$ 8,688,657
Income over expenditure	\$ (519,207)	\$ (2,478,475)	\$ (471,065)	\$ 36,234
Internal funds to cover deficit				
Working Capital Fund	\$ 1,350,000	\$ 1,350,000	\$ 900,000	\$ 500,000
CNM Fund	\$ 50,000	\$ 50,000	\$ 50,000	\$ 50,000
CNM Fund (offset for Small SIDs)	\$ 100,784	\$ 109,826	\$ 114,285	\$ 117,675
Total	\$ 1,500,784	\$ 1,509,826	\$ 1,064,285	\$ 667,675
Net position	\$ 981,577	\$ (968,650)	\$ 593,220	\$ 703,909

^{*}Income is recognized in the year it is committed but may be expended in future financial years

ANNEX 2

Summary of Donor Contributions

Income	2022	2023	2024		2025
Donors					
Australia	\$ 72,260				
China	\$ 22,500	\$ -	\$ -	\$	-
EU	\$ 309,900	\$ -	\$ -	\$	-
Japan	\$ 232,821	\$ 217,787	\$ 232,821	\$	232,821
Korea	\$ 150,880	\$ 150,880	\$ 150,880	\$	150,880
USA	\$ 125,000	\$ -	\$ -	\$	-
Total Income from Donors	\$ 913,361	\$ 368,667	\$ 383,701	\$	383,701

Summary of estimated General Fund budgetary requirements for 2023 and indicative figures for 2024 and 2025 (USD)

and mulcative right	Approved budget 2022	Estimated expenditure 2022	Indicative budget 2023	Proposed budget 2023	Indicative budget 2024	Indicative budget 2025
Part 1 - Administrative Expenses of the Secretariat						
Sub-Item 1.1 Staff Costs						
Professional Staff Salary	974,552	959,010	980,393	981,170	987,015	990,553
Professional Staff Benefits and Allowances	861,608	881,809	865,054	986,861	990,309	992,397
Professional Staff Insurance	163,638	152,800	166,005	182,106	185,173	188,824
Recruitment/Repatriation	37,565	36,583	45,130	45,130	25,565	0
Support Staff	467,792	476,347	478,056	519,500	524,994	530,644
Total, sub-item 1.1	2,505,155	2,506,549	2,534,638	2,714,767	2,713,057	2,702,417
Sub-Item 1.2 Other Personnel Costs						
Temporary Assistance/Overtime	16,500	5,256	16,500	16,500	16,500	16,500
Chairs Expenses see note 1	0	0,230	0	20,000	20,000	20,000
Consultants see note 2	138,000	131,020	138,000	153,000	153,000	153,000
Total, sub-item 1.2	154,500	136,276	154,500	189,500	189,500	189,500
Sub-item 1.3 Official Travel	122,500	76,509	210,000	210,000	210,000	210,000
Sub-item 1.4 General Operating Expenses	122,000	, 0,207	210,000	210,000	210,000	210,000
Electricity, Water, Sanitation	42,000	38,889	42,000	42,000	42,000	42,000
Communications/Courier	84,000	81,464	82,000	84,000	82,000	82,000
Office Supplies & Fuel	41,000	36,741	41,000	41,000	41,000	41,000
Audit	7,000	7,000	7,500	10,000	10,000	10,000
Bank Charges	10,000	8,705	10,000	10,000	10,000	10,000
Official Hospitality	10,000	8,207	10,000	10,000	10,000	10,000
Community Outreach	8,000	7,500	8,000	8,000	8,000	8,000
Miscellaneous Services	6,000	7,179	6,000	6,000	6,000	6,000
Security	100,500	98,861	100,500	100,500	100,500	100,500
Training	12,000	10,596	12,000	12,000	12,000	12,000
Total, sub-item 1.4	320,500	305,142	319,000	323,500	321,500	321,500
Sub-item 1.5 Capital Expenditure	320,300	303,112				321,000
Vehicles	0	0	22,000	22,000	0	0
Information Technology	49,373	46,235	49,373	48,400	48,400	48,400
Furniture and Equipment	32,000	28,184	32,000	32,000	32,000	32,000
Total, sub-item 1.5	81,373	74,419	103,373	102,400	80,400	80,400
Sub-item 1.6 Maintenance	01,575	7 1, 117	100,575	102,700	00,700	00,700
Vehicles	6,000	6,515	6,000	6,000	6,000	6,000
Information and Communication Technology	156,653	153,880	156,653	167,863	167,863	167,863
Website Hosting	13,320	16,701	13,320	20,130	20,130	20,130
Buildings & Grounds	60,000	60,257	60,000	60,000	60,000	60,000
Gardeners and Cleaners	82,500	82,837	82,500	82,500	82,500	82,500
Insurance	28,400	28,458	28,400	28,500	28,500	28,500
Total, sub-item 1.6	346,873	348,648	346,873	364,993	364,993	364,993
Sub-item 1.7 Meeting Services	370,073		370,073	304,773	304,773	304,773
Annual Session see note 3	165,000	202,500	165,000	195,000	195,000	195,000
Scientific Committee see note 3	212,000	5,158	192,000	232,000	192,000	192,000
Northern Committee see note 4	18,000	124	18,000	18,000	18,000	18,000
Technical and Compliance Committee see note 3	159,800	2,873	159,800	174,800	174,800	174,800
Support for IWGs and Science Managers Dialog	162,500	370	0	0	0	0
Total, sub-item 1.7	717,300	211,025	534,800	619,800	579,800	579,800
Sub-item 1.8 Future Work - Commission note 4	0	0	220,000	0	220,000	220,000
TOTAL, Section 1/Item 1	4,248,202	3,658,568	4,423,184	4,524,960	4,679,250	4,668,610

ANNEX 3 (continued)	Approved budget 2022	Estimated expenditure 2022	Indicative budget 2023	Proposed budget 2023	Indicative budget 2024	Indicative budget 2025
Part 2 - Science & Technical & Compliance Pro						
Section 2 (Item 2)	5					
Sub-item 2.1 Scientific Services (SPC)	961,875	961,875	981,112	981,112	1,000,734	1,020,749
Sub-item 2.2 Scientific Research	, 01,0,0	, , , , , ,	/ U 1,1 1 2	/ U 1,1 1 2		-,0-0,7 .7
Additional Resourcing SPC	173,206	173,206	176,670	176,670	180,204	183,808
P35b Maintenance of WCPFC Tissue Bank	103,204	103,204	105,268	105,268	107,373	109,520
P42 Pacific Tuna Tagging Project	730,000	730,000	730,000	730,000	730,000	730,000
P65 Peer review of Stock Modelling	50,000	37,882	750,000	750,000	750,000	750,000
P68 Estimation of Seabird Mortality	0,000	37,882	25,000	25,000	40,000	0
P90 Fish weights/lengths for scientific analyses	75,000	75,000	23,000	23,000	40,000	0
P108 WCPO silky shark assessment	73,000	73,000	50,000	50,000	50,000	0
P111 (P17X2) SWP Mako Shark SA	105,000	105,000	30,000	30,000	30,000	0
P100c (P17X3) WCP tuna fisheries for CKMR	40,000	40,000	0	0	0	0
		40,000		0		
P107b (P17X5) Advice for SWP blue shark P18X1 (P17X1) Billfish Research Plan 2023 - 2027	40,000	40,000	55,000	55,000	0	0
	0		55,000		0	0
P18X2 (P17X4) Ensemble model SA uncertainty	0	0	20,000	30,000	0	25,000
P18X3 Improved coverage of cannery receipt data	0	0	0	35,000	60,000	35,000
P18X4 Evidence for increasing trend in SKJ rec.	0	0	0	20,000	0	0
P18X6 Pacific silky shark assessment	0	0	0	0	30,000	0
P18X7 Pacific whale shark assessment	0	0	0	85,000	0	0
P18X8 Shark Research Plan midterm review	0	0	0	30,000	0	0
Total, sub-item 2.2	1,316,410	1,304,292	1,161,938	1,341,938	1,197,577	1,058,328
Sub-item 2.3 Technical & Compliance P	_		4.5.000	4.5.000	4.5.000	4.5.000
ROP - Audit/Remediation	15,000	0	15,000	15,000	15,000	15,000
ROP - Training, Assistance & Development	10,000	0	10,000	10,000	10,000	10,000
ROP Data Management	923,904	923,904	923,904	923,904	923,904	923,904
Vessel Monitoring System - Capital Costs	20,000	0	20,000	20,000	20,000	20,000
Vessel Monitoring System	300,000	0	300,000	300,000	300,000	300,000
Vessel Monitoring System - Airtime	204,846	202,755	208,942	206,810	210,946	215,165
Vessel Monitoring System - Security Audit	8,400	0	8,400	11,900	11,900	11,900
CCM/Staff VMS Training	25,000	0	25,000	25,000	25,000	25,000
Information Management System	100,000	118,979	120,000	120,000	120,000	120,000
Workshops/IATTC Cross Endor. Train.	10,000	0	10,000	10,000	10,000	10,000
AR Part 2/CMS Online Host. and Pub.	18,000	20,800	18,000	20,000	40,000	20,000
Targeted Capacity Building	40,000	0	40,000	40,000	40,000	40,000
Enhance Secretariat Analytical Capacity see note 6	80,000	78,000	80,000	80,000	40,000	40,000
E-Monitoring and E-Reporting Activities	30,000	8,800	30,000	30,000	30,000	30,000
CMS Future Work see note 7	30,000	36,226	0	80,000	50,000	30,000
Regional Capacity Building Workshops see note 8	130,000	130,000	130,000	130,000	130,000	130,000
Total, item 2.3	1,945,150	1,519,464	1,939,246	2,022,614	1,976,750	1,940,969
TOTAL, Section 2/Item 2	4,223,435	3,785,631	4,082,295	4,345,664	4,175,061	4,020,046
Total, Parts 1 & 2	8,471,636	7,444,199	8,505,479	8,870,624	8,854,311	8,688,657

Note 1: Chairs Expenses

If the Chair of the Commission is from a developing state USD20,000 will be included in the budget for the Chairs travel.

Note 2: Consultancies proposed are:

Legal support services	\$65,000
ED Discretion	\$25,000
Meetings' rapporteur	\$63,000
	\$153,000

Note 3: Meeting Services

Increased costs for hosting hybrid meetings for the SC, TCC and the Annual meeting. The costs fo the annual meeting adjust once a final decision is reached on the hosting arrangements for WCPFC20

Note 4: Northern Committee

As per WCPFC9, an additional \$25,000 will be assessed from non-developing state members of the NC to fund attendance at the NC meeting by developing states and territories if needed.

Note 5: Sub-item 1.8 Future Work - Commission

Budget line added in 2020 to account for unidentified furture work that may be required by the Commission. Amount reduced to \$0 for the proposed 2022 budget with the additional projects under Scientific Research.

Note 6: Enhance Secretariat Analytical Capacity

Supplementary dedicated analytical capacity for the Secretariat in 2022 and 2023 (refer TCC17-2021-17). Intended to be in the form of additional short-term resources for the Secretariat in work to

- -Support continued refinements of the CMS
- -Support to develop automated extraction and IT tools to support the parameters of common data requests to support MCS activities and to further enhance public access to WCPFC scientific data and information and Summary information from MCS programmes
- -Support develop and integrate new processes into Secretariat workflows, and to refresh front-facing web screens and user guidance for members and, where relevant, the public

Note 7: CMS Future Work

2022 - CCFS Messaging tool feasibility/design (\$10,000), CCFS improvements (\$20,000)

2023 – TBD (refer TCC18 outcomes)

Note 8: Regional Capacity Building Workshops FFA/SPC to advise on the use of these funds

Proposed General Fund financing table for 2023

	1111111
Proposed budget expenditure total less	8,870,624
Estimated interest	(3,400)
Transfer from Working Capital Fund	(1,350,000)
CNM Contributions Fund	(50,000)
Total assessed contributions	7,467,224
Proposed General Fund financing table for 2024	
Proposed budget expenditure total	8,854,311
Estimated interest and other income	(3,500)
Transfer from Working Capital Fund	(900,000)
CNM Contributions Fund	(50,000)
Total assessed contributions	7,900,811
Proposed General Fund financing table for 2025	.
Proposed budget expenditure total	8,688,657
less Estimated interest and other income	(3,500)
Transfer from Working Capital Fund	(500,000)
CNM Contributions Fund	(50,000)
Total assessed contributions	8,135,157

Summary of estimated Established Posts costs for 2023-2025 USD

2023

	Executive Director (ED)	Science Manager (L)	Compliance Manager (L)	Finance & Administration Manager (L)	ICT Manager (K)	Observer Programme Coordinator (K)	Science Programme Coordinator (J)	VMS Manager (K)	Assistant Manager Compliance and MCS (J)	Total
Professional Position				Manager (L)		Coordinator (K)	Coordinator (3)		Wies (3)	
Entitlement										
Base salary	173,403	124,718	124,718	124,718	96,146	96,146	71,400	96,146	73,778	981,170
Super	13,005	9,354	9,354	9,354		7,211	5,355	7,211	5,533	73,588
COLDA	60,691	43,651	43,651	43,651	33,651	33,651	24,990	33,651	25,822	343,409
Housing	13,200	25,200	25,200	25,200		25,200	25,200	25,200		214,800
Location Allowance	28,612	20,578	20,578	20,578		15,864	11,781	15,864		161,893
Education	20,500	0	41,000	0		41,000	0	0		102,500
Leave fares	11,391	4,688	13,411	4,683	2,500	6,915	1,650	6,119	3,324	54,681
Reunion fares	2,848	0	10,058	0		3,484	0	0		16,390
Domestic	4,000	0	0	0	0	0	0	0	0	4,000
Electricity & water	9,460	0	0	0	0	0	0	0	0	9,460
Phone/Internet	1,140	0	0	0	0	0	0	0	0	1,140
Rep. Allow	5,000	0	0	0	0	0	0	0	0	5,000
Health & Medical	8,819	8,819	8,819	8,819	8,819	8,819	8,819	8,819	8,819	79,371
Life Ins.	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	59,076
Personal accident insurance	490	490	490	490	490	490	490	490	490	4,410
Medevac Access	4,361	4,361	4,361	4,361	4,361	4,361	4,361	4,361	4,361	39,249
Recruitment costs	0	0	0	0	0	10,000	0	0	0	10,000
Recruit/repat. Fares	9,000	0	0	0	0	5,000	0	0	0	14,000
Shipping	8,000	0	0	0	0	8,000	0	0	0	16,000
Establish. Grant	1,565	0	0	0	0	1,565	0	0	0	3,130
Accom. arr/dep.	1,000	0	0	0	0	1,000	0	0	0	2,000
Total	383,048	248,423	308,204	248,418	200,805	275,269	160,610	204,424	166,064	2,195,266
	Administrative	Executive	Secretary	Admin. Assist.				Data Quality	Compliance	4 Data Control
Support Staff Position	Officer	Assistant	/Receptionist	Data Entry	VMS Operator	VMS Operator	Finance Officer	Officer	Officer	Technicians IT Officer

	Administrative	Executive	Secretary	Admin. Assist.				Data Quality	Compliance	4 Data Control		
Support Staff Position	Officer	Assistant	/Receptionist	Data Entry	VMS Operator	VMS Operator	Finance Officer	Officer	Officer	Technicians	IT Officer	
Entitlement												
Base salary	43,758	30,411	14,263	30,411	30,411	23,009	39,921	43,758	34,735	49,344	39,922	379,943
Health & Medical	2,927	2,927	2,927	2,927	2,927	2,927	2,927	2,927	2,927	10,348	2,927	39,618
Life Insurance	2,442	2,442	2,442	2,442	2,442	2,442	2,442	2,442	2,442	9,768	2,442	34,188
Personal accident ins.	490	490	490	490	490	490	490	490	490	1,960	490	6,860
Social security/Retirement plan	6,782	4,714	2,211	4,714	4,714	3,566	6,188	6,782	5,384	7,648	6,188	58,891
Leave fare	0	0	0	0	0	0	0	0	0	0	0	0
Total	56,399	40,984	22,333	40,984	40,984	32,434	51,968	56,399	45,978	79,069	51,969	519,500

Grand total 2,714,767

2024

Professional Position Entitlement	Executive Director (ED)	Science Manager (L)	Compliance Manager (L)	Finance & Administration Manager (L)	ICT Manager (K)	Observer Programme Coordinator (K)	Science Programme Coordinator (J)	VMS Manager (K)	Assistant Manager Compliance and MCS (J)	Total		
Base salary	176,871	124,718	124,718	124,718	96,146	96,146	73,778	96,146	73,778	987,015		
Super	13,265	9,354	9,354	9,354	7,211	7,211	5,533	7,211	5,533	74,026		
COLDA	61,905	43,651	43,651	43,651	33,651	33,651	25,822	33,651	25,822	345,455		
Housing	13,200	25,200	25,200	25,200	25,200	25,200	25,200	25,200	25,200	214,800		
Location Allowance	29,184	20,578	20,578	20,578	15,864	15,864	12,173	15,864	12,173	162,857		
Education	20,500	0	41,000	0	0	41,000	0	0	0	102,500		
Leave fares	11,391	4,688	13,411	4,683	2,500	6,915	1,650	6,119	3,324	54,681		
Reunion fares	2,848	0	10,058	0	0	3,484	0	0	0	16,390		
Domestic	4,000	0	0	0	0	0	0	0	0	4,000		
Electricity & water	9,460	0	0	0	0	0	0	0	0	9,460		
Phone/Internet	1,140	0	0	0	0	0	0	0	0	1,140		
Rep. Allow	5,000	0	0	0	0	0	0	0	0	5,000		
Health & Medical	9,029	9,029	9,029	9,029	9,029	9,029	9,029	9,029	9,029	81,261		
Life Ins.	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	59,076		
Personal accident insurance	490	490	490	490	490	490	490	490	490	4,410		
Medevac Access	4,492	4,492	4,492	4,492	4,492	4,492	4,492	4,492	4,492	40,426		
Recruitment costs	0	0	0	0	0	0	0	10,000	0	10,000		
Recruit/repat. Fares	0	0	0	0	0	0	0	5,000	0	5,000		
Shipping	0	0	0	0	0	0	0	8,000	0	8,000		
Establish. Grant	0	0	0	0	0	0	0	1,565	0	1,565		
Accom. arr/dep.	0	0	0	0	0	0	0	1,000	0	1,000		
Total	369,338	248,764	308,545	248,759	201,146	250,045	164,731	230,330	166,405	2,188,063		
	Administrative	Executive	Secretary	Admin. Assist.				Data Quality	Compliance	4 Data Control		
Support Staff Position	Officer	Assistant	/Receptionist	Data Entry	VMS Operator	VMS Operator	Finance Officer	Officer	Officer	Technicians	IT Officer	
Entitlement												
Base salary	43,758	30,411	14,264	30,411	30,411	24,526		43,758		52,583	39,922	384,700
Health & Medical	2,927	2,927	2,927	2,927	2,927	2,927	2,927	2,927		10,348	2,927	39,618
Life Insurance	2,442	2,442	2,442	2,442	2,442		2,442	2,442		9,768		34,188
Personal accident ins.	490	490	490	490	490	490	490	490		1,960	490	6,860
Social security/Retirement plan	6,782	4,714	2,211	4,714	4,714	3,802	6,188	6,782		8,150	6,188	59,628
Leave fare	0	0	0	0	0	0	0	0	0	0	0	0
Total	56,399	40,984	22,333	40,984	40,984	34,186	51,968	56,399	45,978	82,809	51,969	524,994

Grand total 2,713,057

2025

Professional Position

Grand total

Executive

Director (ED)

Projessional Position												
Entitlement												
Base salary	180,409	124,718	124,718	124,718	96,146	96,146	73,778	96,146	73,778	990,553		
Super	13,531	9,354	9,354	9,354	7,211	7,211	5,533	7,211	5,533			
COLDA	63,143	43,651	43,651	43,651	33,651	33,651	25,822	33,651	25,822	346,693		
Housing	13,200	25,200	25,200	25,200	25,200	25,200	25,200	25,200	25,200	214,800		
Location Allowance	29,767	20,578	20,578	20,578	15,864	15,864	12,173	15,864	12,173	163,441		
Education	20,500	0	41,000	0	0	41,000	0	0	0	102,500		
Leave fares	11,391	4,688	13,411	4,683	2,500	6,915	1,650	6,119	3,324	54,681		
Reunion fares	2,848	0	10,058	0	0	3,484	0	0	0	16,390		
Domestic	4,000	0	0	0	0	0	0	0	0	4,000		
Electricity & water	9,460	0	0	0	0	0	0	0	0	9,460		
Phone/Internet	1,140	0	0	0	0	0	0	0	0	1,140		
Rep. Allow	5,000	0	0	0	0	0	0	0	0	5,000		
Health & Medical	9,300	9,300	9,300	9,300	9,300	9,300	9,300	9,300	9,300	83,699		
Life Ins.	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	6,564	59,076		
Personal accident insurance	490	490	490	490	490	490	490	490	490	4,410		
Medevac Access	4,627	4,627	4,627	4,627	4,627	4,627	4,627	4,627	4,627	41,639		
Recruitment costs	0	0	0	0	0	0	0	0	0	0		
Recruit/repat. Fares	0	0	0	0	0	0	0	0	0	0		
Shipping	0	0	0	0	0	0	0	0	0	0		
Establish. Grant	0	0	0	0	0	0	0	0	0	0		
Accom. arr/dep.	0	0	0	0	0	0	0	0	0	0		
Total	375,369	249,169	308,950	249,164	201,552	250,451	165,137	205,171	166,811	2,171,773		
	Administrative	Executive	Secretary	Admin. Assist.				Data Quality	Compliance	4 Data Control		
Support Staff Position	Officer	Assistant	/Receptionist	Data Entry	VMS Operator	VMS Operator	Finance Officer	Officer	Officer	Technicians	IT Officer	
Entitlement												
Base salary	43,758	30,411	15,203	30,411	30,411	26,146	39,921	43,758	34,735	54,916	39,922	389,592
Health & Medical	2,927	2,927	2,927	2,927	2,927	2,927	2,927	2,927	2,927	10,348	2,927	39,618
Life Insurance	2,442	2,442	2,442	2,442	2,442	2,442	2,442	2,442	2,442	9,768	2,442	34,188
Personal accident ins.	490	490	490	490			490	490	490			6,860
Social security/Retirement plan	6,782	4,714	2,356	4,714	4,714	4,053	6,188	6,782	5,384	8,512	6,188	54,199
Leave fare	0	0	0	0	0	0	0	0	0	0		0
Total	56,399	40,984	23,418	40,984	40,984	36,058	51,968	56,399	45,978	85,503	51,969	530,644

Observer

Programme

Coordinator (K)

Science

Programme

Coordinator (J)

Finance &

Manager (L)

Administration ICT Manager (K)

Compliance

Manager (L)

Science Manager

(L)

Assistant Manager Compliance and

MCS (J)

Total

2,702,417

VMS Manager

(K)

Summary of budgetary estimates for 2023, 2024, and 2025 for the Commission's funds other than the General Account Fund (USD)

other than the			(USD)		
	Other Fu	ınds			
Chines	se Taipei T	rust Fund			
	Indicative budget 2022	Estimated expenditure 2022	Indicative budget 2023	Indicative budget 2024	Indicative budget 2025
For capacity building of small island developing states.	400,000	234,809	253,620	0	0
	Contribut	ions Fund		•	•
	Indicative budget 2022	Estimated expenditure 2022	Indicative budget 2023	Indicative budget 2024	Indicative budget 2025
Fund to collect CNM Contributions; it is proposed that each year from 2011 USD125,000 or lesser remaining balance will be deducted from member contributions until the fund balance is nil. <i>Note 1</i>	158,642	150,784	158,675	163,256	166,786
Ja	pan Trust	Fund			
	Indicative budget 2022	Estimated expenditure 2022	Indicative budget 2023	Indicative budget 2024	Indicative budget 2025
For capacity building in fisheries statistics, regulation and enforcement for small island developing states.	232,821	232,821	217,787	232,821	232,821
Special	Requiren	ents Fund			
	Indicative budget 2022	Estimated expenditure 2022	Indicative budget 2023	Indicative budget 2024	Indicative budget 2025
Article 30 of the Convention purposes.	170,000	131,523	170,000	170,000	170,000
Volunta	ry Contrib	utions Fun	d		
For other earmarked activities.	Indicative budget 2022 389,325	Estimated expenditure 2022	Indicative budget 2023 585,780	Indicative budget 2024 subject to contributions	Indicative budget 2025 subject to contributions
West Pacifi	ic East Asi	a Project F	und		
New Zealand	Indicative budget 2022 923,483	Estimated expenditure 2022 416,159	Indicative budget 2023 405,859	Indicative budget 2024 101,464	Indicative budget 2025 0
Wor	king Capit		,	. /	•
To provide cash flow finance in the absence of sufficient	Indicative budget 2022	Estimated expenditure 2022	Indicative budget 2023	Indicative budget 2024	Indicative budget 2025
contributions	1,350,000	1,350,000	1,350,000	900,000	500,000

Note 1 Under Financial Regulation 5.2 (b) (ii) an offset was established for small island developing states to be taken from the CNM Contributions Fund.

Annex 7
Schedule of contributions based on the Commission's contribution formula

		2023 C	Contribution T	able				
	Base fee	National wealth	Catch	Addition for	Total	Percent of	Offset for	Total of
	component:	component:	component:	Northern	Contributions	Budget by	Small Island	components:
Member	uniform share	20% of budget	70% of	Committee	by Members	member	Developing	100% of
	10% of budget	v G	budget		·		States*	budget
Australia	28,447	93,299	12,055	0	133,801	1.84%	0	133,801
Canada	28,447	84,116	0	0	112,564	1.54%	0	112,564
China	28,447	183,639	113,138	0	325,224	4.46%	0	325,224
Cook Islands	28,447	895	11,670	0	41,012	0.56%	27,416	68,428
European Union	28,447	228,058	40,047	0	296,553	4.07%	0	296,553
Federated States of Micronesia	28,447	5,322	435,124	0	468,893	6.43%	0	468,893
Fiji	28,447	7,322	22,935	0	58,704	0.81%	0	58,704
France	28,447	92,013	9,982	0	130,442	1.79%	0	130,442
Indonesia	28,447	17,683	105,989	0	152,119	2.09%	0	152,119
Japan	28,447	99,484	805,552	0	933,483	12.81%	0	933,483
Kiribati	28,447	4,370	389,978	0	422,796	5.80%	0	422,796
Korea	28,447	66,946	897,550	0	992,943	13.63%	0	992,943
Marshall Islands	28,447	2,981	261,254	0	292,682	4.02%	4,049	296,731
Nauru	28,447	544	212,594	0	241,585	3.31%	23,162	264,748
New Zealand	28,447	63,897	31,764	0	124,108	1.70%	0	124,108
Niue	28,447	83	1	0	28,531	0.39%	22,799	51,330
Palau	28,447	909	1,179	0	30,535	0.42%	21,781	52,316
Papua New Guinea	28,447	4,144	235,943	0	268,534	3.68%	0	268,534
Philippines	28,447	9,493	137,506	0	175,447	2.41%	0	175,447
Samoa	28,447	5,712	4,670	0	38,830	0.53%	0	38,830
Solomon Islands	28,447	3,149	67,940	0	99,536	1.37%	0	99,536
Chinese Taipei	28,447	48,871	781,115	0	858,433	11.78%	0	858,433
Tonga	28,447	5,338	348	0	34,133		1,492	35,625
Tuvalu	28,447	597	41,554	0	70,598	0.97%	7,976	78,574
United States of America	28,447	337,436	400,354	0	766,238	10.51%	0	766,238
Vanuatu	28,447	4,291	157,186	0	189,924			10,,,=:
Totals	739,633	1,370,590	5,177,429	0	7,287,652	100%	108,675	7,396,327

^{*} To be offset by the CNM Contributions Fund.

Annex 7 Cont.

Offset for Small Island Developing States as per Financial Regulation 5.2(b) (ii)

	-5 states as per		meron et=(8)	
Member		Maximum Payable for	National	Offset for Small Island
		wealth	wealth	Developing
	Population	component	component	States
Cook Islands	17,900	895	28,311	27,416
Federated States of Micronesia	116,250	5,813	5,322	0
Fiji	902,900	45,145	7,322	0
Kiribati	121,390	6,070	4,370	0
Marshall Islands	59,620	2,981	7,030	4,049
Nauru	10,870	544	23,706	23,162
Niue	1,651	83	22,881	22,799
Palau	18,170	909	22,690	21,781
Papua New Guinea	9,119,000	455,950	4,144	0
Samoa	200,140	10,007	5,712	0
Solomon Islands	704,000	35,200	3,149	0
Tonga	106,760	5,338	6,830	1,492
Tuvalu	11,930	597	8,572	7,976
Vanuatu	31,446	1,572	4,291	0
Total				108,675

Additional Funding for Northern Committee as agreed in WCPFC9-2012-22 FAC 6 Summary Report 5.4 (25)

Non-developing States Members of	Percent of total	Percent of NC	Additional
NC	budget	fund	cost
Canada	1.52%	3.5%	0
China	4.40%	10.1%	0
Japan	2.06%	4.7%	0
Korea	13.42%	31.0%	0
Chinese Taipei	11.61%	26.8%	0
United States of America	10.36%	23.9%	0
Total	43.37%	100.00%	0

Annex 7 Cont.

Schedule of contributions based on proposed 2024 budgets without the Offset for Small Island Developing States and Additional funds Assessed on

Non-Developing States Members of NC

			2023			2024 In	ıdicative	2025 Ina	licative
	Base fee		Catch	Total of	% of budget by	Total of	% of budget	Total of	% of budget
Member	component:	National wealth	component:	components:	member	components:	by member	components:	by member
Wiember	uniform share	component:	70% of	100% of		100% of		100% of	
	10% of budget	20% of budget	budget	budget		budget		budget	
Australia	28,447	93,299	12,055	133,801	1.81%	141,640	1.81%	146,056	1.81%
Canada	28,447	84,116	0	112,564	1.52%	119,158	1.52%	122,873	1.52%
China	28,447	183,639	113,138	325,224	4.40%		4.40%	355,010	4.40%
Cook Islands	28,447	28,311	11,670	68,428	0.93%		0.93%	74,696	0.93%
European Union	28,447	228,058	40,047	296,553	4.01%	313,927	4.01%	323,713	4.01%
Federated States of Micronesia	28,447	5,322	435,124	468,893	6.34%	496,364	6.34%	511,838	6.34%
Fiji	28,447	7,322	22,935	58,704	0.79%	62,143	0.79%	64,081	0.79%
France	28,447	92,013	9,982	130,442	1.76%	138,084	1.76%	142,389	1.76%
Indonesia	28,447	17,683	105,989	152,119	2.06%	161,031	2.06%	166,051	2.06%
Japan	28,447	99,484	805,552	933,483	12.62%	988,173	12.62%	1,018,977	12.62%
Kiribati	28,447	4,370	389,978	422,796	5.72%	447,566	5.72%	461,518	5.72%
Korea	28,447	66,946	897,550	992,943	13.42%	1,051,117	13.42%	1,083,883	13.42%
Marshall Islands	28,447	7,030	261,254	296,731	4.01%	314,116	4.01%	323,908	4.01%
Nauru	28,447	23,706	212,594	264,748	3.58%	280,258	3.58%	288,995	3.58%
New Zealand	28,447	63,897	31,764	124,108	1.68%	131,380	1.68%	135,475	1.68%
Niue	28,447	22,881	1	51,330	0.69%	54,337	0.69%	56,031	0.69%
Palau	28,447	22,690	1,179	52,316	0.71%	55,381	0.71%	57,107	0.71%
Papua New Guinea	28,447	4,144	235,943	268,534	3.63%	284,266	3.63%	293,128	3.63%
Philippines	28,447	9,493	137,506	175,447	2.37%	185,726	2.37%	191,516	2.37%
Samoa	28,447	5,712	4,670	38,830	0.52%	41,105	0.52%	42,386	0.52%
Solomon Islands	28,447	3,149	67,940	99,536	1.35%	105,368	1.35%	108,653	1.35%
Chinese Taipei	28,447	48,871	781,115	858,433	11.61%	908,726	11.61%	937,054	11.61%
Tonga	28,447	6,830	348	35,625	0.48%	37,712	0.48%	38,888	0.48%
Tuvalu	28,447	8,572	41,554	78,574	1.06%	83,177	1.06%	85,770	1.06%
United States of America	28,447	337,436	400,354	766,238	10.36%	811,129	10.36%	836,415	10.36%
Vanuatu	28,447	4,291	157,186	189,924	2.57%	201,051	2.57%	207,319	2.57%
Totals	739,633	1,479,265	5,177,429	7,396,327	100.00%	7,829,653	100.00%	8,073,729	100.00%

ANNEX 8

Proposed 2023 Contributions for CNMs (formula agreed at WCPFC7)

	Base fee		Catch	Total of	
Cooperating Non-Member	component:	National wealth	component:	components:	
Cooperating Non-Member	uniform share	component: 20%	70% of	100% of	50% of
	10% of budget	of budget	budget	budget	Contributions
Curacao	27,656	25,982	0	53,639	26,819
Ecuador	27,656	9,384	56,558	93,598	46,799
El Salvador	27,656	5,845	11,935	45,437	22,718
Liberia	27,656	854	0	28,510	14,255
Nicaragua	27,656	2,874	0	30,530	15,265
Panama	27,656	19,573	0	47,230	23,615
Thailand	27,656	13,838	0	41,495	20,747
Vietnam	27,656	7,277	0	34,933	17,467
Totals	221,251	85,626	68,494	375,371	187,685

Average Annual Catches

Commission Member	Own EEZ,	%	Own EEZ,	%	Ex-Own EEZ	%	Total	% in Conv	Own EEZ,	%	Ex-Own EEZ	%	Discounted	% of Catch
	Archipelagic		Non-Archipelagic					Area	Discounted				Total	Component
Australia	0		3,920	99.5	20	0.5	3,940	0.15	3,920	99.5	20	0.5	3,940	0.23
Canada	0		0	0.0	0		0	0.00	0	0.0	0	0.0	0	0.00
China	0		0	0.0	36,977	100.0	36,977	1.42	0	0.0	36,977	100.0	36,977	2.19
Cook Islands	0		863	19.9	3,469	80.1	4,332	0.17	345	9.1	3,469	90.9	3,814	0.23
European Union	0		0	0.0	13,089	100.0	13,089	0.50	0	0.0	13,089	100.0	13,089	0.77
Federated States of Micronesia	0		45,548	26.9	123,992	73.1	169,540	6.50	18,219	12.8	123,992	87.2	142,212	8.40
Fiji Islands	660		7,456	59.0	4,513	35.7	12,629	0.48	2,982	39.8	4,513	60.2	7,496	0.44
France	0		8,155	100.0	0	0.0	8,155	0.31	3,262	100.0	0	0.0	3,262	0.19
Indonesia	419,420		86,601	17.1	0	0.0	506,021	19.40	34,640	100.0		0.0	34,640	2.05
Japan	0		23,325	8.9	239,953	91.1	263,278	10.09	23,325	8.9		91.1	263,278	15.56
Kiribati	0		132,606	64.1	74,414	35.9	207,021	7.94	53,043	41.6	74,414	58.4	127,457	7.53
Korea, Republic of	0		0	0.0	293,346	100.0	293,346	11.24	0	0.0	293,346	100.0	293,346	17.34
Marshall Islands	0		11,453	12.4	80,804	87.6	92,257	3.54	4,581	5.4	80,804	94.6	85,385	5.05
Nauru	0		20,633	25.2	61,229	74.8	81,862	3.14	8,253	11.9	61,229	88.1	69,482	4.11
New Zealand	0		8,526	82.1	1,855	17.9	10,381	0.40	8,526	82.1	1,855	17.9	10,381	0.61
Niue	0		1	100.0	0	0.0	1	0.00	0	100.0	0	0.0	0	0.00
Palau	0		803	92.6	64	n/a	867	0.03	321	n/a	64	n/a	385	0.02
Papua New Guinea	86,083		81,040	38.3	44,697	21.1	211,820	8.12	32,416	42.0	44,697	58.0	77,113	4.56
Philippines	129,414		19,615	10.5	37,095	19.9	186,125	7.13	7,846	17.5	37,095	82.5	44,941	2.66
Samoa	0		1,327	57.1	996	42.9	2,322	0.09	531	34.8	996	65.2	1,526	0.09
Solomon Islands	23,014		10,406	20.2	18,042	35.1	51,463	1.97	4,163	18.7	18,042	81.3	22,205	1.31
Tonga	0		284	100.0	0	0.0	284	0.01	114	100.0	0	0.0	114	0.01
Tuvalu	0		3,315	21.3	12,255	78.7	15,570	0.60	1,326	9.8	12,255	90.2	13,581	0.80
Chinese Taipei	0		9,640	3.8	245,651	96.2	255,292	9.79	9,640	3.8	245,651	96.2	255,292	15.09
United States of America	0		10,496	8.0	120,351	92.0	130,848	5.02	10,496	8.0	120,351	92.0	130,848	7.73
Vanuatu	0		129	0.3	51,321	99.7	51,450	1.97	51	0.1	51,321	99.9	51,373	3.04
Total	658,592	25.2	486,144	18.6	1,464,136	56.1	2,608,871	100.00	228,003	13.5	1,464,136	86.5	1,692,138	100.00

Western and Central Pacific Fisheries Commission Staff Regulations

SCHEDULE 1 (as of January 2020)

ALLOWANCES

Establishment Grant: Regulation 16(d)

All Staff USD1,565

Cost of Living Differential Allowance (COLDA): Regulation 23(q)

The index as of March 2010 is 191.9

Maximum Rate for Executive Director's Rent -free Accommodation: Regulation 24

Provisionally USD2,000 per month

Domestic Assistance Allowance for Executive Director: Regulation 24

USD4,000

Housing Assistance for staff in non-Commission accommodation: Regulation 28(d)

All professional staff: USD1,200 per month.

Location: (approved at WCPFC4)

2010: 16.5% of base salary

ANNEX 10 (cont.)

Western and Central Pacific Fisheries Commission

Staff Regulations

SCHEDULE 2 (a)

WCPFC Professional Staff Salary Scale (based on decisions of WCPFC17)

	Annual Salary		Annual Salary	spendabl	ntage to deter le income for wance purpo	COLDA
Salary Level	SDR	Salary Level	SDR			
Grade/Point		Grade/Point		Single	55.900%	
				Married + 0	62.075%	
I,1	26,037		55,431	Married + 1	63.700%	
I,2	27,342		58,897	Married + 2	65.000%	
1,3	28,648		62,363	Married + 3	66.950%	
1,4	29,952		65,831	Married + 4	68.250%	
I,5	31,259		69,298	Trialities T	00.25070	
I,6	32,563		72,766			
I,7	33,867	L,7	76,233			
I,8	35,175		79,702			
I,9	36,464	L,9	83,145	REFERENCE	E EXCHANG	ERATE
				SDR/USD	1.5	
J,1	36,357	M,1	66,670			
J,2	37,964	M,2	70,839			
J,3	39,569	M,3	75,007	ECA Index		
J,4	41,175	M,4	79,177			191.9
J,5	42,781	M,5	83,343			
J,6	44,388	M,6	87,511			
J,7	45,994	M,7	91,682			
J,8	47,600	M,8	95,850			
J,9	49,185	M,9	100,005			
K,1	47,371		The Executive			
K,2	49,463		Director's salary			
K,3	51,551		is based on the			
K,4	53,640		UN's			
K,5	55,728		D1 salary			
K,6	57,817		scales^			
K,7	59,905	ED,7	plus a 2%			
K,8	61,996		increase			
K,9	64,097	ED,9	increase			

[^] refer http://icsc.un.org

SCHEDULE 2(b) (as of January 2021)

Salary scale for support staff

Grade/Point	Point 1	Point 2	Point 3	Point 4	Point 5	Point 6	Point 7	Point 8	Point 9
Grade 1	\$28,441	\$30,318	\$32,319	\$34,451	\$36,726	\$39,150	\$41,733	\$44,487	\$47,422
Grade 2	\$25,040	\$26,692	\$28,455	\$30,332	\$32,334	\$34,469	\$36,743	\$39,168	\$41,674
Grade 3	\$22,708	\$24,208	\$25,805	\$27,507	\$29,324	\$31,261	\$33,322	\$35,522	\$38,021
Grade 4	\$19,838	\$21,149	\$22,544	\$24,031	\$25,618	\$27,309	\$29,111	\$31,032	\$33,081
Grade 5	\$16,970	\$18,090	\$19,284	\$20,557	\$21,913	\$23,358	\$24,901	\$26,544	\$28,963
Grade 6	\$13,418	\$14,303	\$15,248	\$16,254	\$17,327	\$18,471	\$19,690	\$20,990	\$22,375
Grade 7	\$9,869	\$10,519	\$11,213	\$11,953	\$12,742	\$13,584	\$14,479	\$15,437	\$16,440

Position	Grade
Administrative Officer	2
Data Quality Officer	2
Finance Officer	3
IT Officer	3
Compliance Officer	4
Executive Assistant	5
VMS Operator	5
RFV Officer	5
Data Control Technician	7
Receptionist	7

IT Budget	Cost	Quantity	Total
Part 1 Budget			
Capital Budget			
Laptop and Desktop Refresh	1,150	14	16,100
Software for Laptop and Desktop Refresh			
Windows Upgrades for new computers	200	14	,
Network Hardware	8,500	1	- ,
Server Hardware Refresh	11,000	1	11,000
Other			
Misc	10,000	1	,
			48,400 Total
Maintenance Budget			
Reoccurring Licenses- Desktops and Laptops			
Nito PDF	35	52	1,820
Antivirus - SEPM	25	70	·
Microsoft Office365	209	35	·
Zoom	1,500	1	
Reoccurring Licenses- Servers	.,550	•	.,
PRTG	1,750	1	1,750
Syslogwatcher	300	1	,
VMware vSphere 5 Enterprise	6,400	1	
QuickBooks	4,300	<u>.</u> 1	
Malwarebytes	2,400	<u>'</u> 1	
,		-	
FortiWeb	2,050	1	,
Spam Filter	2,500	1	,
Veaam Support	1,500	1	,
Firewall Support	2,000	1	,
Campaign Monitor	9	12	108
SendGrid	180	1	180
Survey Monkey	35	12	420
Solarwinds	505	1	505
TeamViewer	436	2	872
Contractors			
Penetration Testing	15,000	1	15,000
Disaster Recovery	13,000	1	- ,
Maintenance Contract BMC	50,000	1	50,000
Maintenance Contract Eighty Options	35,200	1	,
Maintenance Contract Taz-e	12,000	1	12,000
Maintenance Contract Kapiti Apps	5,000	1	5,000
			167,863 Total
MA/alasika Haskina			
Website Hosting Website Server Hosting (AWS)	11,241	1	11,241
			·
Staging Server Hosting (AWS)	2,765	1	,
Discourse Forum Hosting	6,124	1	- ,
			20,130 Total
Part 2 Budget			
Vessel Monitoring System - Capital Costs	20,000	1	20,000
IMS Development	120,000	1	
•			
E-Monitoring and E-Reporting Activities*	30,000	1	,
CMS Future work, including CCFS enhancements*	30,000		,
AR Part 2/CMS Online Host. and Pub	20,000	1	20,000
Vessel Monitoring System - Security Audit	11,900	1	11,900
			231,900 Total

Agreement for the Annual Provision of Scientific Services to the Commission and Assistance to Members by the Pacific Community

(Pursuant to Article 2 of MOA)

I. Period covered by this Agreement

This Agreement is for the period from 1 January to 31 December 2022 and will be reviewed annually and be extended by one calendar year.

II. Specific Services and Terms of Reference for the Provision of Scientific Services for 2022

The scientific services to be provided to the Commission by SPC's OFP during the period of this Agreement are as follows:

Activity	Description of Service	Specific Outputs	Timing	Performance ¹						
	Core SPC services									
1. L	1. Data management, statistical analyses and related services									
i.	Data Management									
	1) Incorporate data provided by Members, Cooperating Non-Members and Participating Territories (CCMs) under the Commission's data provision policy into existing databases and facilitate access of Commission Secretariat staff to those data as appropriate.	 Databases updated and installed at WCPFC headquarters Updated database query tools for regional databases available at WCPFC headquarters WCPFC staff training as required 	January- December							
	2) Produce a summary on the status of the provision of scientific data to the Commission.	• SC / TCC / WCPFC papers as required	Mid-July, mid- September							

¹ To be completed by SPC and WCPFC in November each year and provided as a paper to the Regular Session of the WCPF Commission and its appropriate subsidiary bodies (e.g., FAC)

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		Continued update of the WCPFC Scientific Data Catalogue	and mid- November
ii.	Compilation of catch and effort estimates		
	 Compile estimates of annual catches by species, gear type and flag, as specified in the procedures for <i>Scientific Data to be Provided to the Commission</i> AND in support of the functions of the Commission and its subsidiary bodies, and conduct the following SC17 recommendations: expand the tables in ANNEX 2 of the SC17-ST-WP-01 to include the longline, purse seine and pole-and-line operational catch and effort data fields, for review by SC18 and TCC18, noting SC17 recommendation "<i>SC17 recommended the SSP enhance the scientific data submission guidelines by preparing operational data field tables for longline, purse seine and pole and line operational data for SC18 review</i>"; and add a new annex to the data gaps paper (SC17-ST-WP-01) to include a breakdown of the coverage levels for each operational data field by year and fleet (Para 36, SC17 Report) <i>Note: Consider Paragraph 71 of the SC15 Summary Report and Paragraph 663 of the WCPFC16 Summary Report to support the improvement of the CMM for Charter Notification Scheme</i>. 	SC papers	Mid-July
	2) Estimates of annual catches by vessel flag, EEZ, archipelagic waters, and IATTC/WCPFC overlap area for use in determining the catch component of the Commission's assessed contributions	Catch table provided to the Commission Secretariat	Late-Sept
	3) For catches for which estimates are not otherwise available, conduct statistical analyses to estimate catches, particularly regarding: a) purse-seine catches of bigeye, skipjack, and yellowfin tuna, and b) discards of target tuna species. Note 1: SC14 recommended that the Scientific Services Provider continue the work on purse seine and longline bycatch estimates, and provide updates every 2-3 years. (Paragraph 83, SC14 summary report). Previous papers provided include: • PS bycatch estimates: SC14-ST-IP-04 and SC17-ST-IP-06 • LL bycatch estimates: SC14-ST-WP-03 and SC16-ST-IP-11	SC papers	Mid-July

	The next longline bycatch update is due in 2023 and purse seine in 2024 under a 3-year cycle,		
	Note 2: Future papers consider the following SC17 recommendation in Para 58 in the SC17 Summary Report: 58. SC17 recommended that future analyses providing estimates of purse seine bycatch include estimates of marine mammal bycatch to the species level, where possible, to allow for additional monitoring of bycatch and bycatch rates of marine		
	mammal species.		
	Estimates of marine mammal/cetacean interactions can be produced if requested as per SC17-ST-IP-10.		
iii	Additional data-related issues		
tti	Authorita auta-renteu issues		
iv.	Data dissemination		
	1) Produce and publish on the Commission's website the <i>Tuna Fishery Yearbook</i> ,	Yearbook published	Dec
	containing annual catch estimates by gear type, flag and species.	on WCPFC website	
	2) Disseminate public domain catch, effort and size data on the Commission's website at agreed level of resolution, enhancing where possible, while ensuring that the WCPFC rules for public domain data are applied.	Update WCPFC public domain webpage	Jan-Dec
	• Regarding size data, refer to the following SC17 recommendation: "35. SC17 recommended publishing aggregated size data (data fields as listed in SC17-ST-WP-01, section 4.1) via the WCPFC Public Domain		
	webpage, after CCMs have advised the SSP on which of their size data submissions should be excluded. In this regard, CCMs are requested to advise the SSP of the size data to be excluded before 31 December 2021, after which		
	time the SSP will proceed to publish the WCPFC Public Domain size data based on this advice."		
	 Contingent on the authorizations of relevant CCMs, facilitate release of non-ROP longline data for Project 101, as noted in Paragraph 378 of the SC17 Summary Report. 		
	3) Continue to produce the <i>Overview of Tuna Fisheries in the WCPO, including Economic Conditions</i> paper and include summaries of northern stocks in the WCPFC Convention Area; and more information on the "other" fisheries (Para 38, SC15 Summary Report).	SC paper	Mid-July
	4) Generate the Annual catch and effort (ACE) tables based on the latest data, publish the	Update WCPFC	Mid-July,
	ACE Tables on the relevant WCPFC webpages according to the agreed schedule.	ACE Tables	mid-
		webpage	September

			and November
	5) Generate and disseminate the latest version of the WCPFC public domain bycatch data, including data defined in the Bycatch Data Exchange Protocol on the WCPFC public domain webpage.	Update WCPFC BDEP and public domain bycatch webpages	November
	6) Update and disseminate the WCPFC Data Catalogue via the WCPFC Data Catalogue webpage.	Update WCPFC Data Catalogue webpage	November
v.	Technical / policy advice		
	1) Provide <i>ad-hoc</i> advice on science and data-related implications of relevant MCS activities, including, but not limited to: transshipment, the regional observer programme, port sampling, VMS, port state measures, catch documentation schemes, the implementation of e-reporting and e-monitoring (ER and EM), etc.	Advice provided on request	Jan - Dec
	2) Provide advice on data-related procedures of the Commission, e.g., Rules and Procedures for the Protection, Access to and Dissemination of Non-Public Domain Data and Information Compiled by the Commission, and Scientific Data to be Provided to the Commission".	Advice provided on request	Jan - Dec
	3) Provide support to coordination and collaboration on data-related matters between the ISC and WCPFC, including specific tables that show provisions of operational level catch and effort data for the North Pacific region from all CCMs.	Advice provided on request	Jan-Dec
2. 3	Stock assessment and related analytical services		
vi.	Target species stock assessments and auxiliary analyses		
	 Undertake the following work in 2022 (Para. 410, SC17 Summary Report): the skipjack stock assessment, taking into consideration the research recommendations as noted in Para 223 of the SC15 Summary Report; the yellowfin tuna peer review and additional analyses:	SC papers	Mid-July

	 ii) Consider CCMs' views expressed in paragraphs 242 - 247 of the SC17 Summary Report as appropriate in preparing the updated peer review process above; and c. continuing work to develop improved approaches for characterising stock assessment uncertainty: i) ongoing work to refine/enhance the characterisation of uncertainty using ensemble modelling, noting in 2022 this will be considered to some extent as part of the yellowfin tuna assessment peer review, 		
	ii) develop a draft TOR to present to SC18 for an independent peer review of how stock assessment uncertainty is characterized for presenting management advice from WCPFC stock assessments.		
	2) Undertake analyses of catch and effort data, including operational-level data where possible, to construct indices of abundance for target and non-target species; and any additional research on biological parameters, to support stock assessments.	SC paper(s)	Mid-July
	3) Make available stock assessment data and results files.	Data and results files posted on SPC-OFP website, and link on WCPFC website	Dec
	4) Indicator papers for bigeye, yellowfin, skipjack tuna and south Pacific albacore for those years when a stock assessment is not conducted, with explanatory details for the figures and a brief interpretation of the trends.	SC paper	Mid-July
	5) Trends paper for South Pacific albacore longline and troll fisheries.	SC paper	Mid-July
vii.	Model development and refinement		
V114	1) Refinement or development of stock assessment models, as appropriate, and refinement of models for CPUE standardization, model ensemble approaches, and harvest strategy framework.	SC paper(s)	Mid-July
3. A	Management analyses and CMM performance monitoring		
viii.	Conservation and Management Measure performance monitoring		
	1) Provide an update on other commercial fisheries for bigeye, skipjack and yellowfin to SC18/TCC18 so that SC/TCC can provide further advice to WCPFC19 on the application of paragraph 51 of CMM 2018-01, as noted in Paragraph 33 of the WCPFC18 Outcomes Document: 33. Noting potential issues with data availability, the Commission agreed that, at its regular session in 2022, it would agree a baseline period or limit for the	SC / TCC/ WCPFC papers, and tables or figures as required	Mid-July, mid- September and mid- November

	Indonesia Large Fish Handline Fishery, based on the Indonesia proposal and		
	advice from SC18 and TCC18.		
ix.	Development of Harvest Strategy Framework		
14.	 The Commission adopted the <i>Updated Harvest Strategy Workplan for the Adoption of Harvest Strategies under CMM 2014-06</i> at WCPFC18 (Attachment I, WCPFC18 Outcomes Document). i) Provide support and produce supporting documents to undertake the activities specified in the updated Workplan for consideration at SC18, TCC18 and WCPFC19. 	SC / TCC / WCPFC papers as required	Mid-July, mid- September and mid- November
	2) Produce supporting documents to facilitate efficient and effective discussions on proposed areas of focus (refer to Paragraph 59, WCPFC18 Provisional Outcomes Document) at the 1 st session of the Science-Management Dialogue currently planned to take place immediately after SC18 in August 2022.	SMD papers as required	Mid-July
	3) Provide capacity building activities including education materials and capacity building workshops to build understanding by CCMs of harvest strategy development, functioning and implications to enable their participation in the process of harvest strategy development, decision making and implementation.	A list of capacity building activities	
	4) Conduct analyses required to support decision making on TRPs for skipjack, yellowfin and bigeye tuna.	SC papers as required	
х.	Analyses to support development of Conservation and Management Measures		
	1) Evaluate the potential impacts of existing, new or revised management measures, and the results of which may be suggested to the Commission and/or meetings of its subsidiary bodies as requested.	SC / TCC / WCPFC papers and <i>ad hoc</i> advice, as required	Jan - Dec
	2) Provide data and advice regarding the revision of CMMs as requested.	SC / TCC / WCPFC papers as required	Jan - Dec
4. (Other advisory and technical services		
xi.	Other advisory and technical services		
	1) Provide support to continue Intersessional Working Groups for 2022, including the SP Albacore Roadmap IWG, noting priorities in paragraph 39 of the WCPFC18 Outcomes Document, and the FAD Management Options IWG.		
	2) Assist the WCPFC Secretariat on the review process of the Shark Research Plan.	SC paper	Mid July
5	Our weight of WCDEC funded on supported projects		
3. (Oversight of WCPFC-funded or supported projects		

xii.	1) Oversight of the Commission supported projects (as of January 2022) and appropriate		
	reporting on each as per individual contracts:		
	 Project 35b: Maintenance of the WCPFC tuna tissue bank 		
	Project 42: Pacific tuna tagging program		
	Project 60: Purse Seine Species Composition		
	Project 65 - Peer review of yellowfin tuna stock assessment and additional analyses		
	Project 90: Fish weights/lengths for scientific analysis		
	 Project 100c – Application of CKMR to resolve stock assessment uncertainties 		
	 Project 107b - Scientific advice for SWP blue shark 		
	Project 109 - Training observers for elasmobranch biological sampling		
	Project 110 - Non-entangling and biodegradable FADs		
	Project 111 - South Pacific make shark assessment		
	2) Provide a "provisional" list of the SPC-OFP documents for SC18 to the WCPFC		
	Secretariat (Science Manager) as early as possible but no later than by 30 August 2022 for		
	the finalization of the SC18 provisional agenda.		

III. Financial Support to be provided by the Commission

The financial support to be provided by the Commission to SPC's OFP for the services outlined above is as follows:

Item	Cost basis	USD
Data management, stock assessment, and other advisory and technical services	Costs based on SPC costs of scientific staff positions, administration costs, travel to SC, TCC and WCPFC annual sessions, and computer support.	961,875
Providing essential computer support and software development for stock assessment ²		173,206
Total Commission funding		

² Terms of reference for this resourcing includes:

[•] Further enhancement of MULTIFAN-CL and its use in stock assessment to implement SC recommendations

[•] Maintain and further develop the MULTIFAN-CL website to facilitate access to software and support

Continue to implement a formal framework for management of MULTIFAN-CL code updates, testing new developments, training, and updating the
users' guide

Scientific Committee's Future Work Program and Budget

- 1. Regarding the scoring approach to prioritise SC projects, it was raised at FAC15 that (Para 30, FAC15 Report):
 - 30. The Cook Islands expressed concern with the FAC determining a funding threshold for scientific projects based on the average sum of individual rankings through the SC. The Cook Islands acknowledged the value of that process within the SC, but suggested it would be outside the remit of the FAC to do so at this stage. The Cook Islands suggested it would be useful to have clarity from the SC in future years on how they recommend the FAC use those rankings.
- 2. SC18 noted intervention by PNA and Tokelau as follows (Paragraph 390, SC18 DRAFT Summary Report).
 - 390. PNA + Tokelau addressed the intent of the SC ranking process and how it should be applied when the projects are considered at the WCPFC Finance and Administration Committee (FAC). They stated that at WCPFC18 the FAC changed the SC project ranking somewhat arbitrarily, through decisions that were not based on science but rather on the financial priorities of some CCMs. They stated that in their view, the SC project rankings and FAC decision process should follow these steps:
 - (i) first, the SC ranks the projects according to their priorities;
 - (ii) FAC sets the SC budget;
 - (iii) if the projects fit within that budget no further grooming of projects is required;
 - (iv) if the project budget exceeds the FAC SC budget, then the lowest-priority projects should be dropped sequentially until the project budget fits within the FAC budget.

They noted that the FAC should not re-prioritise the SC projects, but rather simply consider the budget, as is their role. PNA + Tokelau further noted the suggestion to split shark assessments over two years, as recommended in three separate papers to the SA and EB Themes, and voiced their support for this approach, as the recent assessments have demonstrated that the underlying data for these assessments are complex and require much additional work. This process would allow the data characterisation, CPUE analysis and catch reconstruction work to be carried out and completed for review at the SPC pre-assessment workshop, prior to the assessment commencing. They stated that they see this as a good step toward improving these assessments.

- 3. The Scientific Committee used to have working groups in the margin of its regular session to discuss proposed SC projects. However, during the continued COVID-19 pandemic, side meetings were not easy to convene for lengthy discussions on each project under the limited meeting time. In addition, SC17 resolved some ambiguity of prioritising each project raised during SC17 by introducing a scoring system using two criteria: *Importance to WCPFC management outcomes or to the functioning of the SC* and *Feasibility: likelihood of success* (refer to Table 2 below). Since SC17, the Science Programme provided its work and budget focusing on the next year programme with the average score of project priority ranks provided by CCMs.
- 4. FAC16 will review the proposed approach in Paragraph 2 as an option and provide its views, particularly on subitem (ii) for SC's further consideration.
- 5. Table 1 provides work program and budget for 2023 and indicative budget for 2024 and 2025 as recommended by SC18; Table 2 introduces the scoring of project priorities as adopted by SC17; and Table 3 provides further information (objectives and scope of work) on highlighted projects in Table 1 that request funding support from the Commission in 2023.

Table 1. Recommended Future Work Program and Budget for 2023 - 2025. Average score for each highlighted project is based on the Scoring Criteria in Table 2 below with priority rankings: 6&9 = High; 3&4 = Medium; 1&2 = Low. 'No. CCMs' represent the number of CCMs which provided scores on that

project. (Source: SC18 Outcomes Document, Table WP-01)

Project Title	2023	2024	2025	Notes	Avg.	No.
Sub-item 1. Scientific se	rvices				Score	CCMs
SPC-OFP scientific services	981,112	1,000,734	1,020,749	Budget: 2% annual increase	essential	
Sub-item 2. Scientific re	<u>search</u>		Γ	T=		ı
SPC Additional resourcing	176,670	180,204	183,808	Budget: 2% annual increase TOR: MFCL work	essential	
P35b. WCPFC Pacific Marine Specimen Bank	105,268	107,373	109,520	Budget: 2% annual increase	essential	
P42. Pacific Tuna Tagging Program	730,000	730,000	730,000	Responsibility: SPC	essential	
P60. Purse seine species composition				Responsibility: SPC Carry over 2021 budget of \$40K to 2023		
P65. Peer review of yellowfin modeling				Responsibility: SPC (On-going)		
P68. Seabird mortality	25,000	40,000		Responsibility: SPC Indicative budget approved at WCPFC18	4.5	22
P90. Length weight conversion (WCPFC17 endorsed the extension of P90 to 57 months until Sep. 2023)				Responsibility: SPC (On-going)		
P100c (=P17X3). Preparing WCP tuna fisheries for application of CKMR methods to resolve key SA uncertainties. (Duration: 2023 - 2025)				Responsibility: SPC Funding: WCPFC, SPC, EU, IATTC and CSIRO Budget (matching fund) approved at WCPFC18		
P108. WCPO silky shark assessment	50,000	50,000		Indicative budget approved at WCPFC18	6.2	23
P109 - Training observers for elasmobranch sampling				Responsibility: SPC (On-going)		

P18X1 (=P17X1). Billfish Research Plan 2023 - 2027	55,000			Responsibility: SPC Indicative budget approved at WCPFC18	7.0	22
P18X2 (=P17X4). Further development of ensemble model approaches for presenting SA uncertainty	30,000			Responsibility: SPC Indicative budget of \$20K approved at WCPFC18	7.9	21
P18X3. Improved coverage of cannery receipt data for WCPFC scientific work	35,000	60,000	35,000	Responsibility: SPC	7.4	22
P18X4. Exploring evidence and mechanisms for a long-term increasing trend in recruitment of skipjack tuna in the equatorial Pacific and the development and modelling of defensible effort creep scenarios	20,000			Responsibility: SPC	7.6	21
P18X5. Ecosystem and Climate Indicators	0			Budget to be requested for 2024 and beyond	7.2	19
P18X6. Pacific silky shark assessment (inclusion in the Project 108)	0	30,000		Project 108: WCPO Project 18X6: Pacific-wide	4.5	22
P18X7. Pacific whale shark assessment	85,000				3.0	22
P18X8. Shark Research Plan midterm review	30,000				6.2	22

Table 2. SC17 agreed that *Scoring of the Proposed Scientific Committee Projects* below be used to score and then rank SC projects. SC agreed to implement this approach at SC17 and thereafter. Ranking is derived from the average of the scores allocated by CCMs (reference document: SC17-GN-WP-01). Colours represent priority rankings (6,9 = High; 3,4 = Medium; 1,2 = Low). (Source: SC17 Outcomes Document, Table WP-01)

		Importance to WCPFC Management Outcomes or to the functioning of the SC				
_	Rank	Low Moderate High				
Feasibility:	Low	1	2	3		
Likelihood of	Moderate	2	4	6		
Success	High	3	6	9		

Notes:

Importance criteria evaluate the significance of the outcomes of the proposal in contributing to the successful management of the WCPFC stocks or the functioning of the SC (e.g. is the proposal aligned with the WCPFC research and/or management priorities; does the proposal contribute to the effective planning and functioning of the SC; are the intended outputs/benefits well-defined and relevant; what is the level of impact and likelihood that the proposal outputs will be adopted; is the proposal cost effective). High= Essential; Moderate=Important but not essential; Low=Not Important.

Feasibility criteria evaluate the proposal's potential for success i.e., how likely is the proposal to achieve its stated objectives (e.g. are the objectives clearly stated, is the methodology sound, are the project objectives realistic and likely to be achieved, does the research team [if identified] have the ability, capacity and track record to deliver the outputs).

Table 3. Objectives and/or scope of work for SC projects with budgets requested for 2023. (Source: SC18-GN-IP-07)

SPC-OFP scientific services (USD 981,112) and SPC Additional resourcing (USD 176,670)

SPC's assessment-related activities for 2023 include:

- WCPO YFT assessment (incorporating key recommendations from the YFT review in 2022)
- WCPO BET assessment (incorporating key relevant recommendations from the YFT review in 2022)
- Initial work following up on skipjack assessment recommendations (and review of implications arising from 2022 YFT review)
- Analytical support to TT CMM discussions in 2023
- Ongoing work on assessment diagnostics based upon SC18 and SC19 discussions
- Development of the requested SC19 paper on timelines for WCPO stock assessment outputs
- Input into the early 2023 CAPAM tuna conference

P35b. WCPFC Pacific Marine Specimen Bank (USD 105,268)

Objectives: to maintain the Pacific Marine Specimen Bank with particular emphasis on WCPO bigeye, yellowfin, albacore and skipjack tunas, and swordfish, and, to facilitate transmission of samples to specified researchers with due cognizance of the WCPFC Tuna Tissue Bank Access Protocol.

The scope of ongoing work will include, but not limited to, the following:

- 1. Maintain and develop:
 - the public SPC webpage (www.spc.int/ofp/PacificSpecimenBank) informing interested parties of the tissue bank, including the rules of procedure to access samples from the tissue bank;
 - a secure web-accessed database holding non-public data;
 - a relational database that catalogues the samples to include sampling metadata;
 - The Noumea (SPC) storage site is maintained and expended as required; and
 - the Brisbane (CSIRO) storage site
- 2. Tissue sample utilisation and a record of outcomes/outputs will also be detailed in the relational database.
- 3. Subject to approval by the WCPFC Executive Director:
 - metadata will be made available to institutions or organizations responsible for providing scientific advice in fisheries through the web-accessible component of the database, and subsequently, and

- SPC-OFP will facilitate the transmission of requested samples to specified researchers/organisations, and the return of unused and/or processed samples to the relevant storage facility.
- 4. Australia has provided access to their quarantine and sample storage infrastructure through CSIRO. Under current funding, samples are curated at the Brisbane site on an ongoing basis. CSIRO have committed to the in-kind contribution of maintaining space and transfer of specimens. The specific work is to:
 - Sort specimens on arrival and reconcile with quarantine data;
 - Enter data describing specimens received into BioDaSys;
 - Store specimens systematically so that they can be retrieved when requested; and
 - Laboratory and storage materials to complete curation.
- 5. As agreed at the annual project steering committee meeting (SC18-RP-P35b-02), in addition to maintaining and operating the WCPFC Tuna Tissue Bank in 2021, the Scientific Services Provider will:
 - continue to support initiatives to increase rates of observer biological sampling, noting that this contribution is essential to the ongoing success of WCPFC's work; and
 - pursue the proposed enhancement work listed in Section *Work Plan 2023* in the *Report of the Tuna Tissue Bank Steering Committee* (WCPFC-SC18-2020/RP-P35b-02).

P42. Pacific Tuna Tagging Program (USD 730,000)

Objective: To assist operations and activities related with the PTTP including new tag releases, tag recovery, and preparation of the 2023 PTTP Steering Committee meeting.

Scope of work: Conduct elements in the work plan as identified in the Report of the PTTP Steering Committee (SC18-RP-PTTP-01), including, but not limited to:

- Subject to the decision by the PTTP Advisory Committee, support for the agreed tag-release cruise(s) for conventional and archival tagging and biological sampling in the western and central equatorial Pacific during 2023, targeting the agreed tropical tuna species:
 - o including the chartering of FV Soltai 105 and FV Gutsy Lady 4 as preferred vessels for tagging to maintain consistency with previous tagging operations in the western and central equatorial Pacific. SPC should consult with the WCPFC Science Manager on alternatives if these vessels are not available or alternate vessels are proposed.
- While the exact composition of tags to be deployed will be confirmed prior to the cruise (via the PTTP Cruise Planning Advisory Committee), the design of the PTTP requires the use of the following tag types and suppliers:
 - HallprintTM conventional tags for all tagged fish;
 - o Wildlife Computers™, Vemco ™ and Lotek ™ tags for archival and satellite tagged marine organisms.
 - Vemco TM and Lotek TM acoustic transmitters (and receivers).
 SPC should consult with the WCPFC Science Manager on alternatives if these tags are not available;
- Support identification of solutions for ensuring regional capability to implement tuna-tagging experiments in the longer term;
- Maintain and enhance as appropriate the tag recovery network and pay tag rewards including via
 cash or t-shirt. Where appropriate, engage third-parties, such as WCPFC member fisheries
 authorities, industry associations and other fisheries service providers to act as agents for tag
 recovery. Third-party agents should be reimbursed for tag rewards dispensed plus any costs and
 expenses incurred in assisting with tag recovery;

- Conduct PTTP data verification with VMS and Logbook, and cannery data;
- Continue consolidation of the web-tagging database, recapture information and tagging database frameworks:
- Conduct data analyses on tag reporting and seeding, fishing and natural mortality, tagging mortality, movement and tag simulation;
- Facilitate conduct of PTTP Cruise Planning Advisory Committee meetings in 2023;
- Support for the development and implementation of a work plan for 2023 tagging activities as outlined in the 2022 PTTP report to SC18; and
- Preparation of PTTP Steering Committee meeting in conjunction with SC19 and production of the PTTP Progress Report and the 2023 Steering Committee Report.

P68. Seabird mortality (USD 25,000)

Objectives:

- Fulfil the requirement under the WCPFC seabird CMMs to estimate the total number of seabirds being killed per year in WCPFC fisheries.
- Assess mortality per year over the ten years since the first WCPFC seabird CMM, as requested under CMM2006-02, CMM 2007-04 and CMM 2012-07, and assess whether there is any detectable trend.
- Provide advice to the Scientific Committee on what data improvements are needed to enable better analyses to be made

Scope of Work:

- Identify the limitations in the data available.
 - O Document what information is available on species that overlap with the WCPFC fisheries, their population status, any tracking data (or already established spatial distributions that are more complex than binary presence absence) and any estimates on their biological parameters such as Rmax (the theoretical maximum breeding rate).
 - Ocument current observer data to assess the level of coverage in each fishery, both spatially and temporally.
- Estimate seabird mortalities (where feasible) and risks associated with interactions with WCPFC fisheries (where feasible).
- Describe the methods used to estimate total mortalities including treatment of data gaps.
- Provide advice to the Scientific Committee on the suitability of risk assessment approaches given the data available.
- Generate advice on what further level of seabird assessment at species or species-group level can be conducted, given the amount and quality of data currently available.

P108. WCPO silky shark assessment (USD 50,000)

Objective: Undertake a stock assessment of silky sharks in the western Pacific Ocean

Scope of Work:

- Review the previous assessment in the WCPO as well as other subsequent shark assessments to assess and improve on methods to increase the understanding of data strengths and weaknesses, and update stock status.
- Review of ways to deal with the input data for shark assessments (presented to a dedicated agenda item at the 2024 PAW).
- Provide a data characterization, data compilation and catch reconstruction analyses.
- Update WCPO longline catch estimates and abundance indices using recent observer data.
- Present the stock status in terms of the metrics outlined in the 2021-2025 Shark Research Plan.
- Prepare reports containing the above results for SC20.

• If the data are too poor to undertake a full quantitative assessment, then a medium data assessment may be appropriate.

P18X1. Billfish Research Plan 2023 – 2027 (USD 55,000)

Objective: Develop a WCPFC research plan for billfish for 2023-2027.

Scope of Work:

- 1. This document will focus on the WCPFC billfish species including the marlins, swordfish, sailfish and shortbilled spearfish.
- 2. Collate the available data in a series of summary plots and tables.
- 3. Develop a research plan.
- 4. Develop a draft list of prioritised projects for the 2021-2026 period.

P18X2. Further development of ensemble model approaches for presenting SA uncertainty (USD 30,000)

Objectives:

- 1. Review the ensemble approach to model uncertainty taken within the 2021 southwest Pacific Ocean swordfish assessment (<u>Ducharme-Barth et al. 2021</u>) to capture both 'structural' and 'estimation' uncertainty, and provide advice on the utility of the approach for other WCPFC stock assessments.
- 2. Evaluate the approaches used within that assessment to select models to include in structural uncertainty grids, cognisant of the initial ensemble grid and findings of SC18 in relation to SC18-SA-WP-03, and review the implications for advice. If possible, within the funding constraints conduct a similar review of project 107b refining scientific advice for Southwest Pacific blue shark assessment (see SC18-SA-WP-03).
- 3. Provide recommendations for model ensemble construction, model retention, and weighting of models included in ensembles in the context of the tuna, billfish and shark assessments reviewed by WCPFC SC.
- 4. Recommend approaches for characterising both 'estimation' and 'structural' uncertainty in stock assessment outputs and how the uncertainty characterisation should be used in provision of scientific advice, with a focus on the context of the management systems and decision- making processes used by the WCPFC.

Scope of Work:

The scope of this review is the 2021 southwest Pacific Ocean swordfish assessment (and if possible project 107b - refining scientific advice for Southwest Pacific blue shark assessment (see <u>SC18-SA-WP-03</u>), specifically the approach taken to characterise estimation and structural model uncertainty within that assessment and to provide management advice.

The outcomes of this review work are expected to:

- 1. Provide a basis for stock assessment teams to better consider the approaches to model selection and weighting when characterising stock assessment uncertainty across the WCPFC tuna, billfish and shark assessments; and
- 2. Ultimately provide managers and stakeholders with a better understanding of the implications of alternative approaches to characterising uncertainty for their perceptions of risk.

P18X3. Improved coverage of cannery receipt data for WCPFC scientific work (USD 35,000)

Objectives:

This project's overarching objective is to continue the work first started by Lewis (2017) to improve the coverage of cannery receipt data through collaboration with relevant port state CCM authorities.

Scope of Work:

• Seeking interest from relevant port-state CCMs to participate in Year 1 of the project;

- Selection of a suitable contractor;
- Initial collaboration (through email/virtual meetings) to plan a visit to the port state CCM country, include potentially identifying a cooperative processing company before the visit;
- Informing relevant flag and coastal state CCMs of any planned visits, and engaging with these CCMs during the project as required;
- Conduct the visit (1-2 weeks) under Year 1 objectives;
- Contractor liaison with the WCPFC Secretariat and SSP;
- Preparation of consultant report for year 1 activities (objectives 1, 2 and 3), including a plan for Year 2 and 3 activities;
- Consultant conducting Year 2 and 3 activities (Objective 4), in liaison with SSP and WCPFC Secretariat;
- Preparation and presentation of reports to SC;
- Ongoing work required under Objectives 6 and 7.
- It is intended that annual reports will be prepared for SC19, SC20 and SC21.

P18X4. Exploring evidence and mechanisms for a long-term increasing trend in recruitment of skipjack tuna in the equatorial Pacific and the development and modelling of defensible effort creep scenarios (USD 20,000)

Objectives:

- Conduct a review and analysis of all relevant data and other information to explore the possibility, or otherwise, of an increasing trend in skipjack tuna recruitment in the equatorial Pacific since the late 1980s. To consider bottom-up, production driven processes, and top-down, predation driven processes.
- 2. Develop plausible and defensible effort creep scenarios to apply to skipjack abundance indices, with a focus on pole-and-line indices and apply these in model runs of the 2022 skipjack diagnostic model.

Scope of Work:

The recruitment investigation will focus on the equatorial Pacific region, including the east Asian waters where large numbers of small skipjack are taken, and the CPUE/effort creep work will primarily focus on the Japanese pole-and-line data. Work will continue on purse seine CPUE analysis and effort creep supported under the Pacific European Union Marine Partnership (PEUMP).

P18X5. Ecosystem and Climate Indicators (Detailed TOR will be provided in 2023)

Objectives:

- Develop and test candidate ecosystem and climate indicators to track the impact of climate and ecosystem changes on WCPFC fisheries and ecosystems.
- Provide technical advice to the Scientific Committee on the suitability of criteria used for testing and evaluating the performance of candidate indicators.
- Support the Scientific Committee in developing tools to communicate ecosystem and climate change impacts to WCPFC and external stakeholders and interest group.

Scope of Work:

- Technical analyses to develop and test candidate indicators.
- WCPFC member and expert workshops to refine indicators.
- Scientific Committee Reporting.
- Routine preparation of adopted indicators
- Development of tools for communication to WCPFC and wider stakeholders

P18X6. Pacific silky shark assessment: inclusion in the Project 108 in 2023 and additional budget of USD 30,000 in 2024 for Pacific-wide assessment

Objectives: Undertake a stock assessment of silky sharks in the Pacific Ocean

Scope of Work:

- Reviewing the previous assessment in the WCPO to assess and improve on methods to increase the understanding of data strengths and weaknesses, and update stock status.
- Update WCPO longline catch estimates and abundance indices using recent observer data.
- Present the stock status in terms of the metrics outlined in the 2021-2025 Shark Research Plan.
- Prepare a report containing the above results for SC20.

If the data are too poor to undertake a full quantitative assessment, then a medium data assessment may be appropriate.

P18X7. Pacific whale shark assessment (USD 85,000)

Objective: Undertake a stock assessment of whale sharks in the Pacific Ocean

Scope of Work:

- Reviewing the previous assessment in the WCPO to assess and improve on methods to increase the understanding of data strengths and weaknesses, and update stock status.
- Update WCPO longline catch estimates and abundance indices using recent observer data.
- Present the stock status in terms of the metrics outlined in the 2021-2025 Shark Research Plan.
- Prepare a report containing the above results for SC19.

P18X8. Shark Research Plan midterm review (USD 30,000)

Objective: Review the WCPFC Scientific Committee's <u>2021-2025 Shark Research Plan (SRP) - Project 97 Final Report</u>, to evaluate progress against the plan and assess future needs for shark research relevant to management of the WCPO shark stocks.

Scope of Work:

While this document will focus on the WCPFC key shark species, other elasmobranchs can be considered as required.