

Jobs and Skills Australia Department of Employment and Workplace Relations GPO Box 9828 Canberra ACT 2601

Submitted via consultation portal: Draft Core Skills Occupations List (CSOL) for Consultation | Jobs and Skills Australia

Dear Sir / Madam,

Draft 2024 Core Skills Occupation List for consultation - Submission

The Australian Maritime Safety Authority (AMSA) welcomes the opportunity to make a submission on the draft 2024 Core Skills Occupation List (CSOL). The CSOL plays a pivotal role in ensuring the availability of skilled professionals to support the maritime industry, a vital component of Australia's economy.

AMSA, as Australia's national agency responsible for maritime safety, protection of the marine environment, and maritime aviation search and rescue, recognises the significance of the CSOL in building the skills and capabilities necessary for the Australian maritime sector. As part of our regulatory mandate, AMSA oversees the certification process for seafarers, and collaborates with Registered Training Organisations (RTOs), and industry to ensure the quality and relevance of training programs and the continued competence of seafarers. AMSA's role in migration is as an assessing authority for maritime professionals who fill high complexity roles in the maritime sector.

The occupations assessed by AMSA for maritime professionals seeking employment in Australia include:

- 231212 Ship's Engineer
- 231213 Ship's Master
- 231214 Ship's Officer
- 231215 Marine Surveyor

Seafarers are integral to the shipping and broader maritime industry. It is imperative that the master and crew of a vessel possess the requisite qualification and experience to navigate safely, maintain the engines and machinery and uphold operational standards, thereby contributing to a secure work environment.

It is noteworthy that the maritime industry continues to suffer a significant shortage of skilled seafarers. The Industry Skill Australia Maritime Industry 2024 Workforce Plan (*Draft*)¹ identifies that the continued sustainment of Australia's maritime industry not only relies on the training of Australian seafarers, but also skilled migration of qualified seafarers to Australia. The plan notes that establishing a fleet of 12 vessels will require an additional 432 STCW qualified seafarers, and that skilled migration is an enabler for building this workforce.

Furthermore, the Government's response to the Strategic Fleet Taskforce Final Report² noted the high demand, and low supply, of Australian maritime skills. It indicated that the government would consider targeted skilled migration including through current labour mobility programs, as a short-term solution to recruitment in the future.

¹ Australia Maritime Industry 2024 Workforce Plan (Draft) - <u>People first, for a future-fit supply chain workforce. (industryskillsaustralia.org.au)</u> ² Australian Government Response to the Strategic Fleet Taskforce Final Report <u>Strategic Fleet Taskforce Final Report</u>



AMSA is of the view that it is necessary to include the following occupations in the CSOL:

- 231213 Ship's Master: AMSA foresees a surge in maritime activity driven by initiatives such as the construction of windfarms at sea and the development of Australia's Strategic Fleet. Consequently, there will be a heightened demand for Ship's Masters to oversee these operations. Moreover, the shortage of Marine Pilots (Port and Coastal), who possess extensive experience as Ship's Masters, underscores the urgency of bolstering this occupation. Considering the rapid growth of industry, and development of Australia's Strategic Fleet, this number does not meet the demand for Ship's Masters and Marine Pilots for the future. There are currently 1,295 Ships Masters (Unlimited) who hold an Australian certificate of competency, which is insufficient to meet the demands of Australia's developing maritime and marine pilotage industry.
- 231214 Ship's Officer: Similarly, the anticipated increase in maritime endeavours necessitates a significant presence of Ship's Officers to ensure the smooth operations of vessels involved in projects such as wind farm construction and strategic fleet deployment. Ship's Officers, with more training and sea experience, generally progress to become Ship's Masters. There are currently 1,047 Ship's Officers who hold an Australian issued certificate of competency, which is insufficient to meet the demands of Australia's developing maritime industry.
- **231212 Ship's Engineer:** AMSA advocates for the continued inclusion of Ship's Engineer remaining in the CSOL given their indispensable role in operations, the maintenance of the ship's engines, as well as offshore construction initiatives. There are currently 1,668 Ship's Engineers who hold an Australian issued certificate of competency. This is insufficient to meet the demands of Australia's developing maritime industry.
- 231215 Marine Surveyor: AMSA advocates for the continued inclusion of Marine Surveyors in the CSOL. This profession is essential in the design, construction, certification of ships built in Australia and ships visiting Australian ports. Noting the development in the maritime industry, Marine Surveyors play a critical role in the ongoing development of the maritime industry. AMSA receives very few assessment requests for Marine Surveyors; however industry has expressed a need for the skill set to be targeted.

AMSA recommends that the above occupations are **included** in the CSOL for the purposes of meeting the industries current and future demand for seafarers.

AMSA's Point of Contact, should you have any questions,

Thank you for considering our recommendations.

Yours sincerely



17 May 2024

SEAFARER CERTIFICATION DEMOGRAPHICS

29 NOVEMBER 2023

PURPOSE

1. The attachments to this paper provide details of statistical information for Australian international and domestic. The information provided illustrates the current 'state of the maritime industry' with regards to seafarers and high-level demographic information.

BACKGROUND

2. The data provided is valid as of 29 November 2022. Data fluctuates daily as new certificates of competency are issued, expire, are revalidated. The data provided is a 'point in time' indication of seafarer demographic information.

INTERNATIONAL - STANDARDS OF TRAINING, CERTIFICATION AND WATCHKEEPING (STCW) CERTIFICATES OF COMPETENCY

3. Seafarers holding these certificates of competency can work on international trading ships. Certification determines the position they can hold and the size and type of the vessels they can work on.

STCW	November 2022		November 2023	
	Certificates	Seafarers	Certificates	Seafarers
Deck	2,271	2,027	2,460	2,222
Engine	1,662	1,435	1,761	1,557
Total	3,933	3,462	4,221	3,778

4. A summary of high-level statistical information (at *Attachment 1*) is as follows:

DOMESTIC - NEAR COASTAL CERTIFICATES OF COMPETENCY

- 5. Seafarers holding these certificates of competency can operate on seagoing vessels out to the limit of the exclusive economic zone of Australia. Certification determines the position they can hold and size or power rating of the vessels they can work on.
- As compared to international certificates, it is far more common for seafarers to have dual engineering and deck certification when working in the domestic industry, hence the significantly higher number of certificates of competency issued for total number of near coastal seafarers.
- 7. On 1 January 2023, new Marine Order 505 took effect. This Marine Order amended the names of several certificates of competency and introduced new certificates of

competency. The figures provided in this report conform to the certification framework provided in the latest version of Marine Order 505.

Near coastal	November 2022		November 2023	
	Certificates	Seafarers	Certificates	Seafarers
Deck	28,500	25,177	29,691	27,325
Engine	12,598	11,822	12,703	12,278
Total	41,098	26,912*	42,394	29,039*

8. A summary of high-level statistical information (at *Attachment 2*) is as follows:

* Numerous near coastal seafarers hold both deck and engine certification. seafarers that have both a deck and engine certificate of competency are counted in both the deck and engine category, whilst the total represents the total number of seafarers.

DISCLAIMER

- 9. The information provided in this report is subject to ambiguity. Ambiguity exists for a number of reasons including, but not limited to, the following:
 - (a) Many people hold more than one certificate, and some people hold both near coastal and STCW certification,
 - (b) Some people hold more than one of the same certificate at a point in time. This is due to the renewal cycles for certificates where a new certificate is issued prior to the expiration of a current certificate,
 - (c) AMSA inherited a significant amount of information from other maritime agencies during establishment of the national system,
 - (d) Naming conventions, changes to certificate names, complexities in endorsements, mean that the data has needed to be grouped in some places.
- 10. All data provided should be used as a 'point in time estimation' of the number of seafarers and certification held.

 Attachments:
 Attachment 1
 Seafarer certification demographic – International STCW

 Attachment 2
 Seafarer certification demographic – Domestic NSCV

Attachment 1

STCW CERTIFICATE OF COMPETENCY DEMOGRAPHIC INFORMATION

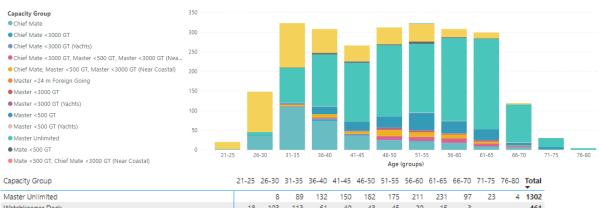
STCW CERTIFICATE OF COMPETENCY (COC) CAPACITY BY AGE

- 1. The graphs and tables below provide the total number of active CoC's as at 29 November 2023.
- 2. A specific seafarer will be counted multiple times if they hold multiple certificates. The total figures presented in the table indicate the total number of CoC's active. This number changes daily as CoC's expire, are renewed and new certificates are issued.
- 3. The tables below do not include endorsements or recognition of foreign issued CoC's.

Number of Certificates **Capacity Group** Chief Mate • Chief Mate <3000 GT Chief Mate < 3000 GT (Yachts) Chief Mate <3000 GT. Master <500 GT. Master <3000 GT (Nea...</p> Chief Mate, Master <500 GT, Master <3000 GT (Near Coastal) Engineer Class 1 Chief Engineer Engineer Class 2, Second Engineer, Chief Engineer <3000 kW</p> Engineer Watchkeeper Master <24 m Foreign Going</p> Master < 3000 GT Master < 3000 GT (Yachts) • Master < 500 GT 81-85 76-80 36-40 41-45 46-50 56-60 61-65 66-70 Master < 500 GT (Yachts) Age (groups) 21-25 26-30 31-35 36-40 41-45 46-50 51-55 56-60 61-65 66-70 71-75 76-80 81-85 Total Capacity Group Master Unlimited Engineer Class 1, Chief Engineer Engineer Watchkeeper Engineer Class 2, Second Engineer, Chief Engineer <3000 kW Watchkeeper Deck Chief Mate Master <500 GT Chief Mate, Master <500 GT, Master <3000 GT (Near Coastal) Chief Mate <3000 GT, Master <500 GT, Master <3000 GT (Near Coastal) З Mate <500 GT Master < 3000 GT (Yachts) Chief Mate <3000 GT Master <3000 GT Master <500 GT (Yachts) Mate <500 GT, Chief Mate <3000 GT (Near Coastal) Chief Mate <3000 GT (Yachts) Master <24 m Foreign Going Watchkeeper Deck <500 GT Watchkeeper Deck <500 GT, Watchkeeper Deck <3000 GT (Near Coastal) Total 2 4221

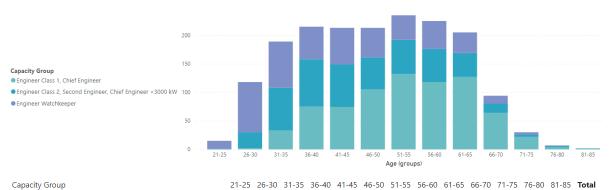
STCW All CoC - Capacity by age

STCW Deck CoC - Capacity by age



Master Offinitited		0	05	152	150	102	175	411	231	51	20	4 1302
Watchkeeper Deck	18	103	113	61	40	43	45	20	15	3		461
Chief Mate	2	36	109	74	37	24	22	17	8	7	1	337
Master <500 GT		1	2	19	23	28	44	31	27	7	6	188
Chief Mate, Master <500 GT, Master <3000 GT (Near Coastal)			4	9	6	15	12	10	5	1		62
Chief Mate <3000 GT, Master <500 GT, Master <3000 GT (Near Coastal)			1	3	2	10	10	11	7	3		47
Mate <500 GT			1	4	3	2	6	2	1			19
Master <3000 GT (Yachts)			2		2	4	2	1	2			13
Chief Mate <3000 GT			1	4	2	1	1	1	1			11
Master <3000 GT						2	3	2	2			9
Master <500 GT (Yachts)			1	1			1	1		1		5
Mate <500 GT, Chief Mate <3000 GT (Near Coastal)					1			1				2
Chief Mate <3000 GT (Yachts)				1								1
Master <24 m Foreign Going						1						1
Watchkeeper Deck <500 GT							1					1
Watchkeeper Deck <500 GT, Watchkeeper Deck <3000 GT (Near Coastal)							1					1
Total	20	148	323	308	266	312	323	308	299	119	30	4 2460

STCW Engine CoC - Capacity by age

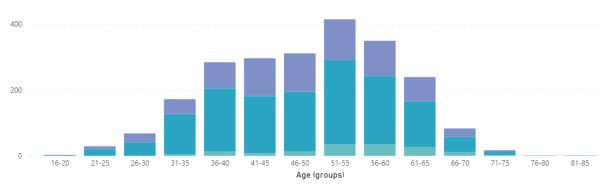


														•
Engineer Class 1, Chief Engineer		2	33	75	74	105	132	118	127	64	22	4	2	758
Engineer Watchkeeper	14	88	81	57	64	52	43	49	36	14	4	1		503
Engineer Class 2, Second Engineer, Chief Engineer <3000 kW	1	28	75	83	75	56	60	58	42	16	4	2		500
Total	15	118	189	215	213	213	235	225	205	94	30	7	2	1761

STCW Certificate of Proficiency by age

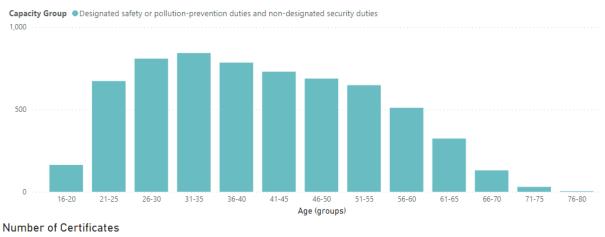
Number of Certificates

Capacity Group
Chief Integrated Rating
Integrated Rating
Marine Cook



Capacity Group	16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	Total ▼
Integrated Rating	2	20	41	122	192	173	180	255	207	138	46	10	1	1	1388
Marine Cook	1	9	27	46	79	115	117	124	107	74	26	5			730
Chief Integrated Rating				4	13	8	14	35	35	27	11	2			149
Total	3	29	68	172	284	296	311	414	349	239	83	17	1	1	2267

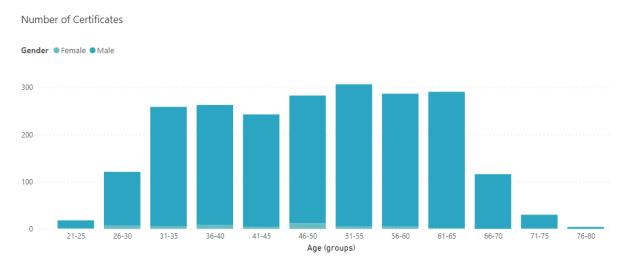
STCW Certificate of Safety Training (CoST) - Proficiency by age



Capacity Group	16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	Total ▼
Designated safety or pollution- prevention duties and non- designated security duties	163	672	808	842	784	729	687	647	510	323	130	30	3	6328
Total	163	672	808	842	784	729	687	647	510	323	130	30	3	6328

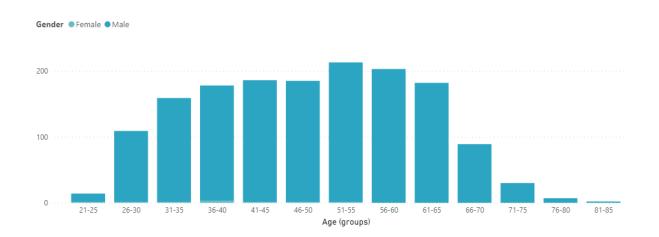
STCW CERTIFICATE OF COMPETENCY (COC) GENDER BY AGE

- 4. The graphs and tables below provide a breakdown of the number of STCW CoC holders by gender and age.
- 5. A specific seafarer will be **counted only once** within their category (Deck, Engine, Certificate of Proficiency) regardless of the number of CoC's they hold. AMSA's STCW records currently only provide for the recording of gender by male or female.



STCW Deck CoC Holders – Gender by age

Gender	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	Total ▼
Male	16	114	253	255	239	271	302	282	289	116	29	4	2170
Female	2	7	6	8	4	12	5	5	2		1		52
Total	18	121	259	263	243	283	307	287	291	116	30	4	2222



STCW Engine CoC Holders – Gender by age

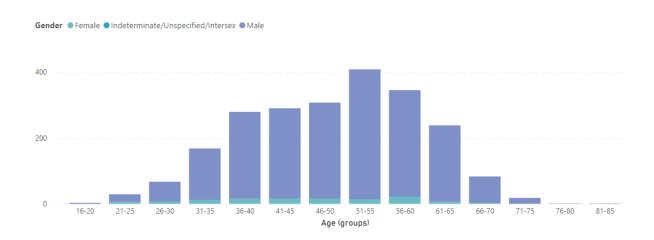
Number of Certificates

Gender	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	Total ▼
Male	13	108	158	175	185	184	212	203	182	89	30	7	2	1548
Female	1	1	1	3	1	1	1							9
Total	14	109	159	178	186	185	213	203	182	89	30	7	2	1557

Certificates of Proficiency

Number of Certificates

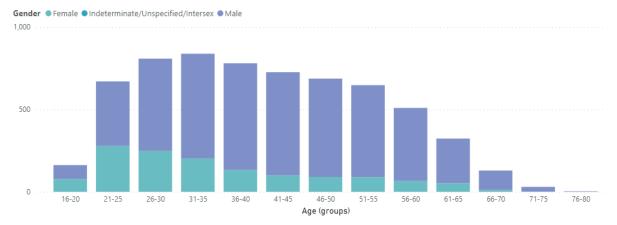
6. The graph and table below include Chief Integrated Ratings, Integrated Ratings and Marine Cooks.



Gender	16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	Total ▼
Male	3	23	60	156	264	274	291	394	324	232	80	18	1	1	2121
Female		6	7	12	15	16	16	14	20	6	3				115
Indeterminate/Unspecified/Intersex									1						1
Total	3	29	67	168	279	290	307	408	345	238	83	18	1	1	2237

STCW Certificate of Safety Training (CoST) - Gender by age

Number of Certificates



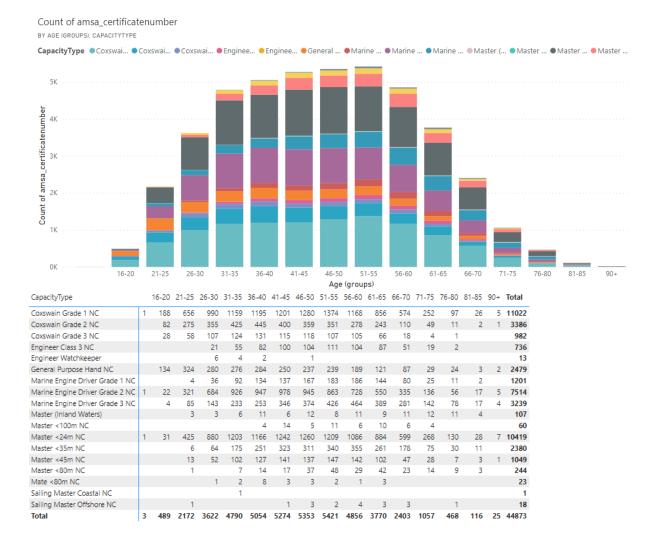
Gender	16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	Total ▼
Male	84	392	560	635	647	626	597	558	443	271	118	29	3	4963
Female	78	277	247	203	133	100	90	89	65	52	11	1		1346
Indeterminate/Unspecified/Intersex		1	1						1					3
Total	162	670	808	838	780	726	687	647	509	323	129	30	3	6312

Attachment 2

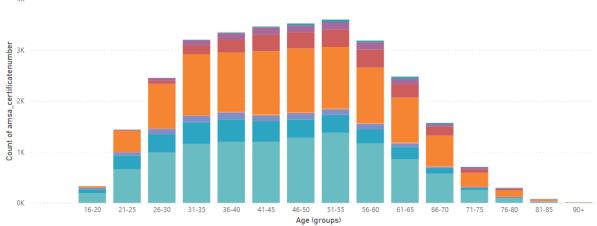
NEAR COASTAL CERTIFICATE OF COMPETENCY DEMOGRAPHIC INFORMATION

NEAR COASTAL COC - CAPACITY BY AGE

- 1. The graphs and tables below provide the total number of active CoC's as at 29 November 2023.
- 2. A specific seafarer will be counted multiple times if they hold multiple certificates. The total figures presented in the tables indicate the total number of CoC's active. This number changes daily as CoC's expire, are renewed and new certificates are issued.
- 3. <u>Note</u> The statistics provided align with the new Near Coastal Certification framework established under the new Marine Order 505, which took effect 1 January 2023.



All Near coastal CoC - Capacity by Age



Near Coastal Deck CoC - Capacity by Age

Count of amsa_certificatenumber

BY AGE (GROUPS), CAPACITYTYPE

CapacityType OCxsswain ... OCxsswain ... OCxsswain OMaster (I... OMaster ... O

CapacityType		16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	90+	Total
Coxswain Grade 1 NC	1	188	656	990	1159	1195	1201	1280	1374	1168	856	574	252	97	26	5	11022
Coxswain Grade 2 NC		82	275	355	425	445	400	359	351	278	243	110	49	11	2	1	3386
Coxswain Grade 3 NC		28	58	107	124	131	115	118	107	105	66	18	4	1			982
Master (Inland Waters)			3	3	6	11	6	12	8	11	9	11	12	11	4		107
Master <100m NC						4	14	5	11	6	10	6	4				60
Master <24m NC	1	31	425	880	1203	1166	1242	1260	1209	1086	884	599	268	130	28	7	10419
Master <35m NC			6	64	175	251	323	311	340	355	261	178	75	30	11		2380
Master <45m NC			13	52	102	127	141	137	147	142	102	47	28	7	3	1	1049
Master <80m NC			1		7	14	17	37	48	29	42	23	14	9	3		244
Mate <80m NC				1	2	8	3	3	2	1	3						23
Sailing Master Coastal NC					1												1
Sailing Master Offshore NC			1				1	3	2	4	3	3		1			18
Total	2	329	1438	2452	3204	3352	3463	3525	3599	3185	2479	1569	706	297	77	14	29691

Near Coastal Engine CoC - Capacity by Age

Count of amsa_certificatenumber

BY AGE (GROUPS), CAPACITYTYPE

CapacityType

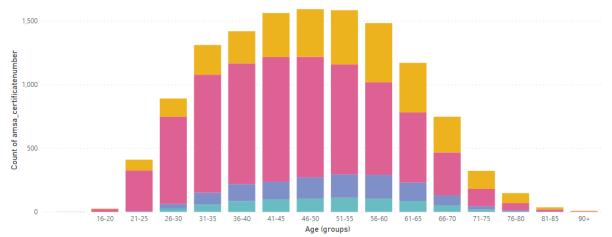
Engineer Class 3 NC

Engineer Watchkeeper

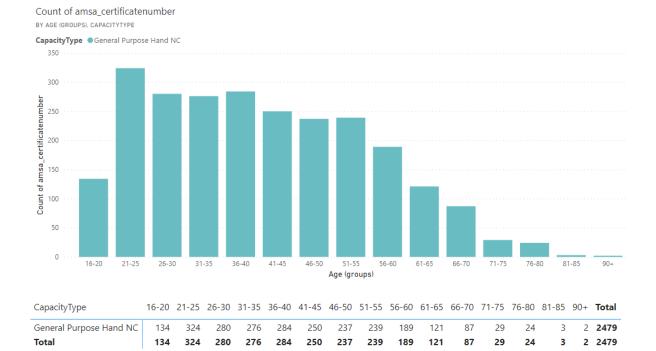
Marine Engine Driver Grade 1 NC

Marine Engine Driver Grade 2 NC

Marine Engine Driver Grade 3 NC



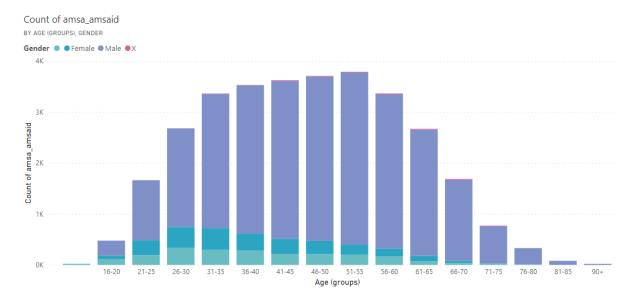
CapacityType	1	16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	90+	Total
Engineer Class 3 NC				21	55	82	100	104	111	104	87	51	19	2			736
Engineer Watchkeeper				6	4	2		1									13
Marine Engine Driver Grade 1 NC			4	36	92	134	137	167	183	186	144	80	25	11	2		1201
Marine Engine Driver Grade 2 NC	1	22	321	684	926	947	978	945	863	728	550	335	136	56	17	5	7514
Marine Engine Driver Grade 3 NC		4	85	143	233	253	346	374	426	464	389	281	142	78	17	4	3239
Total	1	26	410	890	1310	1418	1561	1591	1583	1482	1170	747	322	147	36	9	12703



Near Coastal General-Purpose Hand CoC - Capacity by Age

NEAR COASTAL COC - GENDER BY AGE

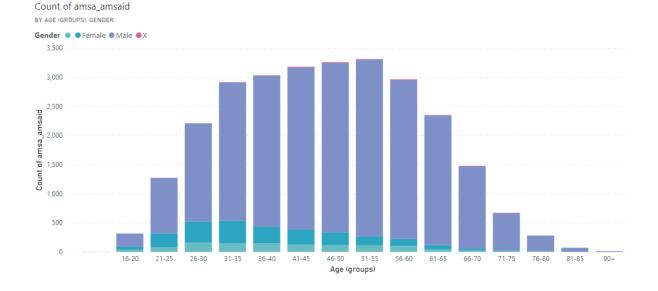
- 4. The graphs and tables below provide a breakdown of the number of Near Coastal CoC holders by gender and age. This reflects the actual number of seafarers, and their respective CoC held.
- 5. A specific seafarer will be **counted only once** within their category (Deck, Engine, Other) regardless of the number of CoC's they hold. A number of seafarers CoC records have no gender information associated with them. This is because AMSA inherited CoC demographic data from state maritime agencies when the national system was established.



All near coastal CoC holders – gender by age

Gender		16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	90+	Total
	20	112	191	333	297	279	217	212	199	166	71	39	12	4	1		2153
Female	1	69	291	411	419	335	296	261	195	157	105	42	12	10			2604
Male	1	295	1179	1935	2641	2911	3098	3226	3386	3025	2479	1589	735	315	79	19	26913
Х			1	2	6	4	13	9	9	16	15	16	10	1	1	2	105
Total	22	476	1662	2681	3363	3529	3624	3708	3789	3364	2670	1686	769	330	81	21	31775

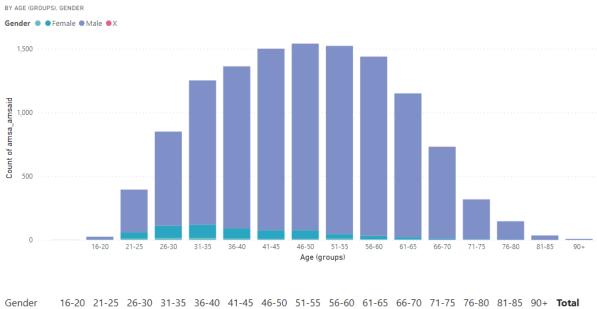
- 6. There are 31,775 individual seafarers who hold Near Coastal CoC's. AMSA's information on gender has been inherited through historical records. Information held by AMSA indicates the following:
 - 2,604 identify as female,
 - 26,913 identify as male,
 - 2,258 seafarers have no gender information associated with their record.



Near Coastal Deck CoC – Gender by age

Gender		16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	71-75	76-80	81-85	90+	Total
	1	37	83	158	152	146	125	116	114	101	43	25	9	2			1112
Female		55	236	366	379	287	260	218	152	122	73	29	9	8			2194
Male	1	223	953	1683	2380	2596	2785	2916	3039	2726	2228	1413	649	271	71	13	23947
Х				2	3	4	10	9	7	14	8	9	6				72
Total	2	315	1272	2209	2914	3033	3180	3259	3312	2963	2352	1476	673	281	71	13	27325

- 7. There are 27,325 individual seafarers who hold Near Coastal Deck CoC's. AMSA's information on gender has been inherited through historical records. Information held by AMSA indicates the following:
 - 2,194 identify as female,
 - 23,947 identify as male,
 - 1,184 seafarers have no gender information associated with their record.

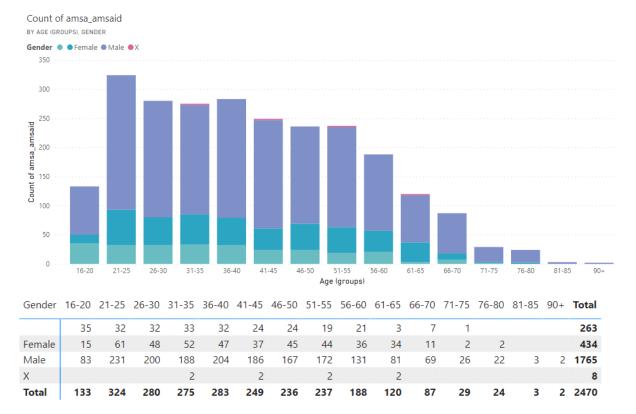


Near Coastal Engine CoC – Gender by age

Count of amsa_amsaid

Gender		16-20	21-25	26-30	31-35	36-40	41-45	46-50	51-55	56-60	61-65	66-70	/1-/5	76-80	81-85	90+	Total
	1	1	12	14	15	11	8	8	11	5	4	1	1	1			93
Female		1	48	98	104	80	69	69	35	26	16	7	4	2			559
Male		23	334	738	1133	1271	1423	1463	1477	1407	1130	722	312	143	35	8	11619
Х			1				1	1		1		2	1				7
Total	1	25	395	850	1252	1362	1501	1541	1523	1439	1150	732	318	146	35	8	12278

- 8. There are 12,278 individual seafarers who hold Near Coastal Engine CoC's. AMSA's information on gender has been inherited through historical records. Information held by AMSA indicates the following:
 - 559 identify as female,
 - 11,619 identify as male,
 - 100 seafarers have no gender information associated with their record.



General Purpose Hand and other – Gender by age

- There are 2,470 individual seafarers who hold either General Purpose Hand CoC. AMSA's information on gender has been inherited through historical records. Information held by AMSA indicates the following:
 - 434 identify as female,
 - 1,765 identify as male,
 - 271 seafarers have no gender information associated with their record.