



Calhoun: The NPS Institutional Archive
DSpace Repository

Theses and Dissertations

1. Thesis and Dissertation Collection, all items

2022-06

WHAT IS A COAST GUARD?: DEVELOPING A NOMENCLATURE MODEL FOR COAST GUARD

Mohamed, Ahmed Mujuthaba

Monterey, CA; Naval Postgraduate School

<http://hdl.handle.net/10945/70706>

Copyright is reserved by the copyright owner.

Downloaded from NPS Archive: Calhoun



Calhoun is the Naval Postgraduate School's public access digital repository for research materials and institutional publications created by the NPS community. Calhoun is named for Professor of Mathematics Guy K. Calhoun, NPS's first appointed -- and published -- scholarly author.

Dudley Knox Library / Naval Postgraduate School
411 Dyer Road / 1 University Circle
Monterey, California USA 93943

<http://www.nps.edu/library>



NAVAL POSTGRADUATE SCHOOL

MONTEREY, CALIFORNIA

THESIS

**WHAT IS A COAST GUARD?: DEVELOPING A
NOMENCLATURE MODEL FOR COAST GUARD**

by

Ahmed Mujuthaba Mohamed

June 2022

Thesis Advisor:
Second Reader:

Wayne Porter
Thomas Jamison

Approved for public release. Distribution is unlimited.

THIS PAGE INTENTIONALLY LEFT BLANK

REPORT DOCUMENTATION PAGE			<i>Form Approved OMB No. 0704-0188</i>	
Public reporting burden for this collection of information is estimated to average 1 hour per response, including the time for reviewing instruction, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188) Washington, DC 20503.				
1. AGENCY USE ONLY (Leave blank)		2. REPORT DATE June 2022	3. REPORT TYPE AND DATES COVERED Master's thesis	
4. TITLE AND SUBTITLE WHAT IS A COAST GUARD?: DEVELOPING A NOMENCLATURE MODEL FOR COAST GUARD			5. FUNDING NUMBERS	
6. AUTHOR(S) Ahmed Mujuthaba Mohamed				
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) Naval Postgraduate School Monterey, CA 93943-5000			8. PERFORMING ORGANIZATION REPORT NUMBER	
9. SPONSORING / MONITORING AGENCY NAME(S) AND ADDRESS(ES) N/A			10. SPONSORING / MONITORING AGENCY REPORT NUMBER	
11. SUPPLEMENTARY NOTES The views expressed in this thesis are those of the author and do not reflect the official policy or position of the Department of Defense or the U.S. Government.				
12a. DISTRIBUTION / AVAILABILITY STATEMENT Approved for public release. Distribution is unlimited.			12b. DISTRIBUTION CODE A	
13. ABSTRACT (maximum 200 words) <p>“Coast Guards” or “Coastguards” (CG) have played a vital role in the maritime security systems of nations. The diversified utility of CGs by nations and the lack of an internationally accepted nomenclature for agencies bearing the name CG have given rise to complex issues related to these agencies. In this study, the rationales for developing a CG nomenclature model include enhancing maritime security cooperation, distinguishing CGs from naval classifications, fostering CG norms, and identifying the role of a CG in an armed conflict. To achieve this goal, the study performed a qualitative analysis of 15 CG agencies. Findings from the analysis revealed that key elements of the CG roles are civil maritime emergency response (MER) and maritime law enforcement (MLE). Based on the findings, a CG was defined as a maritime organization, assigned with the primary authority to undertake constabulary and emergency response operations within the maritime jurisdiction of a state. From this, the modeling process devised a CG hierarchical taxonomy to obtain a CG nomenclature, which includes military CGs (“Gray” model), civil-constabulary CGs (“Blue” model), and civil emergency response CGs (“White” model). The study achieved its objective of developing a practical CG nomenclature, which also fulfills the rationale behind developing a CG classification.</p>				
14. SUBJECT TERMS classification, coast guard, coastguard, emergency response, maritime, maritime domain, maritime organization, maritime safety, maritime security, nomenclature, gray zone, maritime law enforcement, organizational ontology			15. NUMBER OF PAGES 329	
			16. PRICE CODE	
17. SECURITY CLASSIFICATION OF REPORT Unclassified	18. SECURITY CLASSIFICATION OF THIS PAGE Unclassified	19. SECURITY CLASSIFICATION OF ABSTRACT Unclassified	20. LIMITATION OF ABSTRACT UU	

THIS PAGE INTENTIONALLY LEFT BLANK

Approved for public release. Distribution is unlimited.

**WHAT IS A COAST GUARD?: DEVELOPING A NOMENCLATURE MODEL
FOR COAST GUARD**

Ahmed Mujuthaba Mohamed
Lieutenant Colonel, Maldivian Coast Guard
BHS, Massey University, Wellington, New Zealand, 2009
MSDSS, Madras University, Wellington, India, 2016

Submitted in partial fulfillment of the
requirements for the degree of

**MASTER OF SCIENCE IN INFORMATION STRATEGY AND POLITICAL
WARFARE**

from the

**NAVAL POSTGRADUATE SCHOOL
June 2022**

Approved by: Wayne Porter
Advisor

Thomas Jamison
Second Reader

Carter Malkasian
Chair, Department of Defense Analysis

THIS PAGE INTENTIONALLY LEFT BLANK

ABSTRACT

“Coast Guards” or “Coastguards” (CG) have played a vital role in the maritime security systems of nations. The diversified utility of CGs by nations and the lack of an internationally accepted nomenclature for agencies bearing the name CG have given rise to complex issues related to these agencies. In this study, the rationales for developing a CG nomenclature model include enhancing maritime security cooperation, distinguishing CGs from naval classifications, fostering CG norms, and identifying the role of a CG in an armed conflict. To achieve this goal, the study performed a qualitative analysis of 15 CG agencies. Findings from the analysis revealed that key elements of the CG roles are civil maritime emergency response (MER) and maritime law enforcement (MLE). Based on the findings, a CG was defined as a maritime organization, assigned with the primary authority to undertake constabulary and emergency response operations within the maritime jurisdiction of a state. From this, the modeling process devised a CG hierarchical taxonomy to obtain a CG nomenclature, which includes military CGs (“Gray” model), civil-constabulary CGs (“Blue” model), and civil emergency response CGs (“White” model). The study achieved its objective of developing a practical CG nomenclature, which also fulfills the rationale behind developing a CG classification.

THIS PAGE INTENTIONALLY LEFT BLANK

TABLE OF CONTENTS

I.	INTRODUCTION.....	1
II.	LITERATURE REVIEW	7
A.	RESEARCH QUESTION	13
III.	METHODOLOGY	15
A.	SAMPLING PROCESS.....	15
B.	SELECTED SAMPLES	17
C.	ANALYTICAL PROCESS	18
	1. Organizational Ontology	18
	2. Roles and Responsibilities	19
	3. Strategic Status.....	19
	4. Physical Characteristics	19
	5. Behavior and Application	20
D.	CLASSIFICATION PROCESS.....	20
IV.	CASE 1: CONTINENTAL MILITARY COAST GUARDS	21
A.	INTRODUCTION.....	21
B.	CHINA COAST GUARD.....	22
	1. Organizational Ontology	25
	2. Roles and Responsibilities	26
	3. Strategic Status.....	27
	4. Physical Characteristics	28
	5. Behavior and Application	31
C.	UNITED STATES COAST GUARD	32
	1. Organizational Ontology	34
	2. Roles and Responsibilities	36
	3. Strategic Status.....	37
	4. Physical Characteristics	39
	5. Behavior and Application	43
D.	CONCLUSION	44
V.	CASE 2: CONTINENTAL PARAMILITARY COAST GUARDS	47
A.	INTRODUCTION.....	47
B.	ITALIAN COAST GUARD (<i>GUARDIA COSTIERA</i>)	47
	1. Organizational Ontology	49
	2. Roles and Responsibilities	50

3.	Strategic Status.....	51
4.	Physical Characteristics	53
5.	Behavior and Application	57
C.	KENYA COAST GUARD SERVICE.....	58
1.	Organizational Ontology	60
2.	Roles and Responsibilities	61
3.	Strategic Status.....	63
4.	Physical Characteristics	65
5.	Behavior and Application	68
D.	CONCLUSION	69
VI.	CASE 3: CONTINENTAL CIVIL GOVERNMENT AND NON- GOVERNMENT COAST GUARDS	71
A.	INTRODUCTION.....	71
B.	AUSTRALIAN VOLUNTEER COAST GUARD	71
1.	Organizational Ontology	74
2.	Roles and Responsibilities	75
3.	Strategic Status.....	76
4.	Physical Characteristics	78
5.	Behavior and Application	81
C.	CANADIAN COAST GUARD (<i>GARDE COTIERE</i>)	82
1.	Organizational Ontology	85
2.	Roles and Responsibilities	87
3.	Strategic Status.....	87
4.	Physical Characteristics	90
5.	Behavior and Application	94
D.	GEORGIAN BORDER POLICE COAST GUARD	94
1.	Organizational Ontology	97
2.	Roles and Responsibilities	99
3.	Strategic Status.....	100
4.	Physical Characteristics	103
5.	Behavior and Application	106
E.	CONCLUSION	106
VII.	CASE 4: ISLAND MILITARY COAST GUARDS.....	109
A.	INTRODUCTION.....	109
B.	JAMAICA DEFENSE FORCE COAST GUARD.....	109
1.	Organizational Ontology	113
2.	Roles and Responsibilities	114
3.	Strategic Status.....	115

4.	Physical Characteristics	118
5.	Behavior and Application	120
C.	MALDIVES NATIONAL DEFENSE FORCE COAST GUARD	121
1.	Organizational Ontology	123
2.	Roles and Responsibilities	124
3.	Strategic Status.....	125
4.	Physical Characteristics	129
5.	Behavior and Application	132
D.	CONCLUSION	133
VIII.	CASE 5: ISLAND PARAMILITARY COAST GUARDS.....	135
A.	INTRODUCTION.....	135
B.	ICELANDIC COAST GUARD (<i>LANDHELGISGÆSLA ÍSLANDS</i>)	135
1.	Organizational Ontology	138
2.	Roles and Responsibilities	139
3.	Strategic Status.....	140
4.	Physical Characteristics	143
5.	Behavior and Application	146
C.	JAPANESE COAST GUARD	147
1.	Organizational Ontology	150
2.	Roles and Responsibilities	151
3.	Strategic Status.....	152
4.	Physical Characteristics	155
5.	Behavior and Application	159
D.	CONCLUSION	160
IX.	CASE 6: ISLAND GOVERNMENT AND NON-GOVERNMENT COAST GUARDS.....	161
A.	INTRODUCTION.....	161
B.	NATIONAL COAST GUARD – MAURITIUS	161
1.	Organizational Ontology	163
2.	Roles and Responsibilities	165
3.	Strategic Status.....	166
4.	Physical Characteristics	170
5.	Behavior and Application	173
C.	COASTGUARD NEW ZEALAND.....	174
1.	Overview	174
2.	Organizational Ontology	177
3.	Roles and Responsibilities	178

	4.	Strategic Status.....	179
	5.	Physical Characteristics	182
	6.	Behavior and Application	185
D.		HER MAJESTY’S COASTGUARD – UNITED KINGDOM.....	186
	1.	Organizational Ontology.....	189
	2.	Roles and Responsibilities	191
	3.	Strategic Status.....	192
	4.	Physical Characteristics	196
	5.	Behavior and Application	200
E.		CONCLUSION	201
X.		CASE 7: LANDLOCKED COAST GUARD	203
A.		INTRODUCTION.....	203
B.		AZERBAIJANI COAST GUARD.....	203
	1.	Organizational Ontology	207
	2.	Roles and Responsibilities	208
	3.	Strategic Status.....	208
	4.	Physical Characteristics	210
	5.	Behavior and Application	213
C.		CONCLUSION	213
XI.		FINDINGS AND COLLATION.....	215
A.		FINDINGS	215
	1.	Maritime Environment.....	216
	2.	Organizational Ontology	218
	3.	Roles and Responsibilities	220
	4.	Strategic Status.....	223
	5.	Physical Characteristics	224
	6.	Behavior and Application	226
B.		FURTHER DISCUSSION	228
XII.		THE CG NOMENCLATURE MODEL	233
A.		INTRODUCTION.....	233
B.		DEFINING THE “COAST GUARD”	233
C.		HIERARCHICAL MATRIX OF A CG	235
D.		NOMENCLATURE MODEL.....	237
	1.	Identifying the Taxa.....	238
	2.	The Hierarchical Taxonomy	240
	3.	Obtaining the CG Nomenclature.....	241
E.		THREE CG NOMENCLATURE MODELS	242

1.	The Military CG (Gray Model)	242
2.	The Civil Constabulary CG (Blue Model)	244
3.	The Emergency Response CG (White Model).....	246
F.	KEY TAKEAWAYS	249
G.	CONCLUSION.....	252
LIST OF REFERENCES		253
INITIAL DISTRIBUTION LIST		299

THIS PAGE INTENTIONALLY LEFT BLANK

LIST OF FIGURES

Figure 1.	Stratified sampling applied in this research with geographical and organizational strata.	16
Figure 2.	China’s maritime domain, with its EEZ highlighted in red.	23
Figure 3.	CCG Ship 3901 <i>Haijing</i>	29
Figure 4.	CCG <i>Harbin</i> helicopter in flight.	30
Figure 5.	Commonly worn CCG uniform.	31
Figure 6.	The U.S. mainland maritime domain, with its EEZ highlighted in red.	33
Figure 7.	USCG National Security Cutter.	41
Figure 8.	A group of USCG aircraft.	42
Figure 9.	Two of the most common uniforms worn by USCG.	43
Figure 10.	Italian maritime domain, with its EEZ highlighted in red.	48
Figure 11.	ICG Ship Ubaldo Diciotti at berth.	54
Figure 12.	ICG ATR 42 MPA.	55
Figure 13.	ICG sailors in the field working uniform.	56
Figure 14.	Kenya’s maritime domain, with its EEZ highlighted in red.	59
Figure 15.	KCGS Offshore Patrol Vessel <i>Doria</i>	67
Figure 16.	KCGS personnel in their working blue uniform.	68
Figure 17.	Australian maritime domain, with its EEZ highlighted in red.	73
Figure 18.	AVCG rescue boat on a mission.	79
Figure 19.	AVCG volunteers in the white working uniform.	80
Figure 20.	Canadian maritime domain, with its EEZ highlighted in red.	83
Figure 21.	CACG Ship <i>Henry Larsen</i>	91
Figure 22.	CACG Bell Textron 429 helicopter.	92

Figure 23.	CACG cadets in the working blue uniform at the CG College.....	93
Figure 24.	Georgian maritime domain, with its EEZ highlighted in red.....	95
Figure 25.	GCG ship underway in the Back Sea.....	104
Figure 26.	GCG personnel in their white ceremonial uniforms at an official function.	105
Figure 27.	Jamaican maritime domain, with its EEZ highlighted in red.....	110
Figure 28.	JDFCG ship <i>Nanny of the Maroons</i>	119
Figure 29.	JDFCG sailors in traditional naval white uniforms.	120
Figure 30.	Maldivian maritime domain, with its EEZ highlighted in red.	122
Figure 31.	MCG ship <i>Huravee</i> taking part in a fleet review in India.....	130
Figure 32.	MCG's <i>Dhruv</i> class ALH.	131
Figure 33.	MCG sailors and officers in summer white uniforms at a ceremony.	132
Figure 34.	Icelandic maritime domain, with its EEZ highlighted in red.....	136
Figure 35.	ISCG ship <i>Thor</i> (Þór).....	144
Figure 36.	ICG Dash 8 Q300 aircraft.	145
Figure 37.	ISCG officers in the traditional navy winter uniform.	146
Figure 38.	Japanese maritime domain, with its EEZ highlighted in red.	148
Figure 39.	PLH class JCG ship <i>Zao</i>	156
Figure 40.	JCG Sikorsky 76D helicopter.	157
Figure 41.	The summer white, winter black, and working blue uniforms of the JCG.	158
Figure 42.	Mauritian maritime domain, with its EEZ highlighted in red, and with the Chagos EEZ in dashed red outline in the North East.....	162
Figure 43.	MNCG ship, the CGS <i>Valiant</i>	171
Figure 44.	MNCG Dornier 228 MPA on patrol.	172

Figure 45.	MNCG personnel in their working uniform at a closing ceremony with USN personnel.....	173
Figure 46.	New Zealand's maritime domain, with its EEZ highlighted in red.	175
Figure 47.	CGNZ Rayglass Protector support boat.....	183
Figure 48.	CGNZ Auckland Air Patrol Cessna 182 in flight.	184
Figure 49.	CGNZ crew of volunteers in CG red jackets.	185
Figure 50.	Maritime domain of Great Britain and Northern Ireland, with the EEZ highlighted in red.....	187
Figure 51.	HMCG vessel conducting an operation with an HMCG helicopter.	197
Figure 52.	HMCG S-29A helicopter, a King Surveillance aircraft, and the newly inducted drone.	199
Figure 53.	HMCG personnel in official dress uniform and blue working uniform.....	200
Figure 54.	Azerbaijan's maritime domain, highlighted in red, within the Caspian Sea.	204
Figure 55.	AZCG ship underway in the Caspian Sea.....	211
Figure 56.	Senior AZCG personnel in combat fatigues during an exercise.....	212
Figure 57.	The geographical composition of the analyzed CGs, the date of their inception, and their organizational structure.....	215
Figure 58.	The positioning of 15 CGs studied, according to their structural parameters.	216
Figure 59.	Status of naval forces in the countries analyzed.	218
Figure 60.	Combined results of analyses of organizational ontology from CG case studies.....	220
Figure 61.	Summary of roles and responsibilities results from the CG analyses.....	222
Figure 62.	Combined results of analyses of strategic status from CG case studies.	224
Figure 63.	Combined results of analyses of physical characteristics from CG case studies.....	225

Figure 64.	Combined results from analyses of behavior and application of CGs studied.	227
Figure 65.	CG as a transitional organization between the navy and the police.	234
Figure 66.	Matrix of organizational hierarchies identified in 15 CGs analyzed.	236
Figure 67.	Higher-order typologies and taxa for a CG taxonomy featured in light green.	239
Figure 68.	Hierarchical taxonomy of a CG.	241
Figure 69.	The three nomenclature models for CGs with their primary traits.	249

LIST OF TABLES

Table 1.	Selected CG samples for analysis.	17
Table 2.	The maritime domain in terms of EEZs and coastlines of the analyzed CGs.	217
Table 3.	Matrix showing the grouped roles and responsibilities of CGs.	221
Table 4.	Maximum caliber of main guns installed onboard CG platforms studied.	226
Table 5.	Summary of the analyses of 15 CGs studied.	231

THIS PAGE INTENTIONALLY LEFT BLANK

LIST OF ACRONYMS AND ABBREVIATIONS

ACGF	Arctic Coast Guard Forum
AIS	Automatic Identification System
AMSA	Australian Maritime Safety Authority
ATON	Aids to Navigation
AVCG	Australian Volunteer Coast Guard
AZCG	Azerbaijani Coast Guard
CACG	Canadian Coast Guard
CARICOM	Caribbean Community
CBR	Chemical, Biological, and Radiological
CCG	China Coast Guard
CG	Coast Guard or Coastguard
CGNZ	Coastguard New Zealand
CIWS	Close-in Weapons System
CMC	Central Military Commission
COP	Common Operating Picture
CS	Continental Shelf
DCoC	Djibouti Code of Conduct
DHS	Department of Homeland Security
DOD	Department of Defense
ECGFF	European Coast Guard Functions Forum
ECS	East China Sea
EEZ	Exclusive Economic Zone
EOD	Explosive Ordnance Disposal
EU	European Union
FONOPS	Freedom of Navigation Operations
FPS	Fisheries Protection Service - Canada
GCG	Georgian Border Police Coast Guard
HACGAM	Heads of Asian Coast Guard Agencies Meeting

HADR	Humanitarian Assistance and Disaster Relief
HMCG	Her Majesty's Coastguard
ICG	Italian Coast Guard
IHL	International Humanitarian Law
IMO	International Maritime Organization
INTERPOL	International Criminal Police Organization
ISCG	Icelandic Coast Guard
IUUF	Illegal, Unregulated, and Unreported Fishing
JCG	Japan Coast Guard
JDF	Jamaica Defense Force
JDFCG	Jamaica Defense Force Coast Guard
JMSDF	Japan Maritime Self-Defense Force
JSDF	Japan Self Defense Force
KCGS	Kenya Coast Guard Service
LEDETs	Law Enforcement Detachments
LOAC	Law of Armed Conflict
LRIT	Long-Range Identification and Tracking
MACC	Maritime, Air and Cyber Command
MASE	Maritime Security Program - European Union
MBC	Maritime Border Command - Australia
MCA	Maritime and Coastguard Agency
MCG	Maldives National Defense Force Coast Guard
MDA	Maritime Domain Awareness
MER	Maritime Emergency Response
MERA	Maritime Emergency Response Agency
MLE	Maritime Law Enforcement
MLEA	Maritime Law Enforcement Agency
MNCG	Mauritius National Coast Guard
MNDF	Maldives National Defense Force
MOD	Ministry of Defense

MOOTW	Military Operations Other Than War
MPA	Maritime Patrol Aircraft
MRCC	Maritime Rescue Coordination Center
MSA	Maritime Safety Agency - Japan
MTA	Maritime Transport Agency - Republic of Georgia
NATO	North Atlantic Treaty Organization
NEO	Non-Combatant Evacuation Operations
NGO	Non-Government Organization
NM	Nautical Miles (1,852 meters)
NMCC	National Maritime Coordination Center - NZ
NZDF	New Zealand Defense Force
NZSAR	New Zealand Search and Rescue
OPV	Offshore Patrol Vessel
PAFMM	People's Armed Forces Maritime Militia - China
PAP	People's Armed Police - China
PLAN	People's Liberation Army Navy - China
RAN	Royal Australian Navy
RCMP	Royal Canadian Mounted Police
RCN	Royal Canadian Navy
SAR	Search and Rescue
SBS	State Border Service - Azerbaijan
SCS	South China Sea
SLOC	Sea Lines of Communication
SOA	Special Operating Agency - Canada
SOF	Special Operations Force
SOP	Standard Operating Procedure
SRR	Search and Rescue Region
UAS	Unmanned Aircraft System
UAV	Unmanned Aerial Vehicle
UN	United Nations

UNCLOS	UN Convention on the Law of the Sea
UNGA	UN General Assembly
USCG	U.S. Coast Guard
USCGAUX	USCG Auxiliary
USN	United States Navy
USRCS	United States Revenue Cutter Service
VBSS	Visit, Board, Search, and Seizure
WMD	Weapons of Mass Destruction

EXECUTIVE SUMMARY

In the contemporary maritime security environment, the “Coast Guard” or the “Coastguard” (CG) is one of the most active, yet misunderstood agencies utilized by nations to propel their maritime security interests. The diversified utility CGs provide nations and the lack of an internationally accepted nomenclature for agencies bearing the name CG has given rise to complex issues related to the exploitation of these agencies. This study seeks to answer the question: Can the CGs of each nation be classified into a model to derive a nomenclature for the agency by thoroughly analyzing representative CGs in its unique maritime environment and respective maritime security system?

The study advances four main rationales for developing such a nomenclature model. They include its contribution to maritime security cooperation mechanisms; distinguishing CGs from traditional navies; fostering distinctive, functional, and legal norms for a CG; and finally, clarifying ambiguities surrounding the role of a CG in an armed conflict. To achieve this goal, the study applied two conjoined processes: the analytical and the modeling process.

The analytical process included the qualitative analysis of 15 agencies bearing the name “coast guard” that are representative of several geographical configurations and organizational structures. The CGs, which are identified in Figure 1, were analyzed using the attributes: organizational ontology, roles and responsibilities, strategic status, physical characteristics, and behavior and application. Findings from the analysis of the CGs revealed that key elements of the CG roles are Maritime Emergency Response (MER) and Maritime Law Enforcement (MLE). Further, eight out of the 15 CGs were also mandated to undertake maritime warfare.

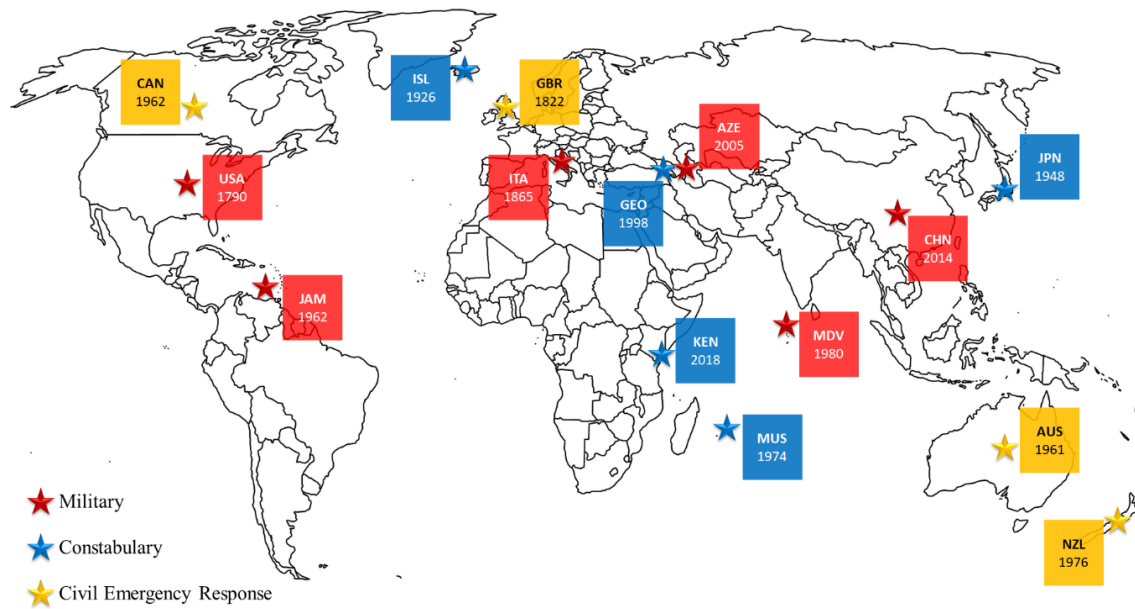


Figure 1. The 15 CGs analyzed, the date of their inception, and their categorization by organizational structure.

Based on this analysis, CG was defined as a maritime organization tasked with the primary authority to undertake constabulary and emergency response operations within the maritime jurisdiction of a state.

The modeling process went through three main phases: identifying the CG taxa, devising the CG hierarchical taxonomy, and obtaining the CG nomenclature. The CG taxa contributed to a CG hierarchical taxonomy, which included a hierarchy of six taxa: nation-state, domain, system, structure, agency, and type. The hierarchical taxonomy was adapted from the model developed in “The Organizational Taxonomy: Definition and Design,” by Philip Rich.¹ Based on this outcome, three main CG nomenclature models were developed. They are the military CGs (“Gray” model), the civil-constabulary CGs (“Blue” model), and the civil emergency response CGs (“White” model).

This study concluded that the Gray CG may be considered a combatant during an armed conflict, while the White CG must not be considered a combatant. The study

¹ Philip Rich, “The Organizational Taxonomy: Definition and Design,” *Academy of Management Review* 17, no. 4 (October 1992): 774, <https://doi.org/10.5465/AMR.1992.4279068>.

achieved its objective of developing the first applicable CG nomenclature, which also fulfills the classification requirements of a CG. The primary recommendation from this study is to classify respective CGs in relation to the three models and follow their distinct attributes. This model will contribute to future work on enhancing maritime security cooperation mechanisms, distinguishing CGs from naval classifications, fostering CG norms, and realigning the combat status of CGs.

THIS PAGE INTENTIONALLY LEFT BLANK

ACKNOWLEDGMENTS

I would like to thank my loving wife, Mary, who was the warmest and best part of this journey. To my colleagues from MNDF at NPS, Shaan and Athif, I thank them for their motivation and moral support throughout my stay in Monterey. I would like to appreciate those at home, my amazing siblings, my beloved mother, and Anu for taking care of things in challenging situations. I also thank the heroes at the Maldives Coast Guard, who took the best care of my family, so I could get through this without any hindrance. I would also like to thank my kids: Minha, Layaan, and Rayaana for pushing me to work harder. You are part of a team that made this work possible.

To my thesis advisory group, Dr. Wayne Porter and Dr. Tommy Jamison, I thank you for guiding me and for being the best support team. Your patience, timely response, and thorough feedback gave weight to this work. I appreciate my colleagues from across the globe who helped me fact-check the respective cases, you know who you are. Furthermore, to all my professors at the Defense Analysis Department and the National Security Affairs Department at NPS, thank you for passing down the knowledge.

I also appreciate the work of the IGPO staff at NPS, especially Kathi, Erin, and Morgan, for your support throughout. To all my peers at NPS, both local and foreign, for being kind and friendly, the two elements needed to survive in a foreign land.

Finally, I dedicate this work to all the women and men of Coast Guards across the globe, who brave the elements to save lives and protect the seas every day.

THIS PAGE INTENTIONALLY LEFT BLANK

I. INTRODUCTION

The terms “Coast Guard” or “Coastguard” and their direct foreign translations are used extensively in academic literature and elsewhere without regard to the varying roles and applications of these organizations. Due to their various roles and applications, it would be misleading to assume a general classification can accurately describe every organization labeled as a “Coast Guard” (CG). Hence, CGs should be classified and referred to in terms of the attributes that they specifically represent. These organizations require a nomenclature model that can be referenced or applied, as they adapt and evolve over time in response to changes within their own governance and in their unique operating environment. This thesis attempts to develop such a nomenclature model for CGs, and there are four main rationales for doing so.

First is the aspect of maritime security cooperation. In 2018, Shishir Upadhyaya published a comprehensive study on this subject.² In this research, he defines maritime security cooperation as the engagement between navies and/or CGs or other maritime security agencies “over the entire range of common threats and challenges that exist in the maritime domain.”³ He also identifies key impediments that act as barriers to maritime security cooperation.⁴ These include relations between states, “disparities in force levels and technological gaps, language and culture differences,” and finally, the financial costs involved in undertaking the cooperation.⁵ These impediments are important to recognize because this suggests that forces with similar capabilities, responsibilities, and roles are more likely to conduct bilateral or multilateral cooperation engagements than forces of disparate size, capabilities, and mission sets. Classifying CGs as distinct from navies or

² Shishir Upadhyaya, “Maritime Security Cooperation in the Indian Ocean Region: Assessment of India’s Maritime Strategy to Be the Regional ‘Net Security Provider’” (University of Wollongong, Australia, 2018), <https://ro.uow.edu.au/cgi/viewcontent.cgi?article=1299&context=theses1>.

³ Upadhyaya, 101.

⁴ Upadhyaya, 118–19.

⁵ Upadhyaya, 118–19.

even maritime police may contribute to such alignment among national maritime security forces.

The second reason for uniquely classifying CGs is to minimize the confusion created by forcing the ill-fitting attributes of naval classification regimes on often vastly different CG missions, capabilities, and capacities. In such a study of naval classifications, Steven Haines identifies eight categories of navies based on size, reach, combat capabilities, and utilization.⁶ In this classification methodology, the U.S. Navy would represent the highest aggregate score as a “global force projection navy,” while smaller, regional “token navies” were among the lowest ranked for their combat capacity.⁷ A popular schema was proposed by two maritime academics, Michael Lindberg and Daniel Todd, in which navies were classified in terms of their missions, capabilities, and operational environment.⁸ Interestingly, Lindberg and Todd described CGs as being “constabulary” organizations. Lindberg and Todd were the first to differentiate maritime forces in terms of three distinct operating environments—categorizing them as the commonly used blue water, green water, and brown water navies.⁹

According to another academic in the field, Hong Ghermandi, Kirchberger uses Lindberg and Todd’s classification as the basis to categorize 149 naval forces, which also include CGs and riverine forces.¹⁰ Ghermandi explains that Kirchberger and other analysts used criteria that ranged from force structure, sustainability, function and capability, flexibility, and access to state-of-the-art technology.¹¹ In fact, a number of naval classifications have been used in the past. Most of these were also applied to CGs and other

⁶ Steven Haines, “War at Sea: Nineteenth-Century Laws for Twenty-First Century Wars?,” *International Review of the Red Cross*, War and Security at Sea, 98, no. 2 (2016): 430.

⁷ Haines, 430.

⁸ Michael Lindberg and Daniel Todd, *Brown-, Green- and Blue-Water Fleets: The Influence of Geography on Naval Warfare, 1861 to the Present* (Westport, Connecticut: Praeger Greenwood, 2002), 196.

⁹ Lindberg and Todd, 196.

¹⁰ Hong Ghermandi, “Asian and European Middle Powers: A Comparative Analysis on Energy Security and Naval Forces” (International Studies Association’s International Conference, Hong Kong, 2017), 9.

¹¹ Ghermandi, 8.

maritime agencies. But it is evident in this literature that the inclusion of CGs in such classifications can become problematic, awkward, and ineffective. This is because CGs, particularly those of smaller nations and those with smaller jurisdictional maritime bodies, may have missions more closely related to maritime law enforcement (MLE), maritime safety, maritime emergency response (MER), and fisheries protection, rather than to warfighting and national defense. Further, it may not be accurate to identify CGs in terms of their extended reach, especially if they have traditionally been a CG unit. One cannot expect CGs to operate as a Mahanian navy.

The third rationale for pursuing a robust nomenclature model for CGs is to provide internationally recognized terminology and norms that can be used by nations to develop laws, doctrines, or strategies that clearly distinguish the roles and responsibilities of their CGs from their own navies. One norm exercised by the U.S. Coast Guard (USCG) is the MLE authority rendered by the Posse Comitatus Act of 1878 (18 U.S.C. 1385).¹² This authority ensures that U.S. Navy vessels are required by law to carry USCG officers aboard for missions that entail specific MLE operations.¹³ Many nations might adopt this (or other internationally recognized norms) as their own best practice, but in a manner that fits the nation's laws and requirements. A commonly accepted nomenclature model would help to facilitate this.

The fourth reason for developing a nomenclature model is minimizing the legal ambiguity in countering coast guards during traditional and non-traditional conflicts. This is particularly important in regard to the latter, which could entail irregular activities that may fall between war and peace.¹⁴ A most conspicuous case is the gray zone activities employed in the Yellow, East, and South China Seas by the China Coast Guard and

¹² Jennifer K. Elsea, "The Posse Comitatus Act and Related Matters: The Use of the Military to Execute Civilian Law," Report No. R42659. Washington, D.C.: *Congressional Research Service*, November 6, 2018, 61.

¹³ Dan Parsons, "South China Sea Dispute Shaping Up as Coast Guard Showdown," *National Defense*, June 2, 2014, <https://www.nationaldefensemagazine.org/articles/2014/6/1/2014june-south-china-sea-dispute-shaping-up-as-coast-guard-showdown>.

¹⁴ Andrew S. Erickson and Ryan D. Martinson, eds., *China's Maritime Gray Zone Operations*, Studies in Chinese Maritime Development (Annapolis, Maryland: Naval Institute Press, 2019), 47.

People's Armed Forces Maritime Militia (PAFMM).¹⁵ A nomenclature model for CGs would lead to the categorization of maritime roles and applications of CGs. This could provide legally proportionate responses to those CGs that may engage or would be likely to adopt these gray-zone or hybrid tactics that conflict with internationally recognized norms. Thus, a nomenclature model can assist strategic and operational planners to develop guiding documents, leading to standard operating procedures (SOP) and operation plans.

The final point of relevance for the nomenclature is to provide a guide for future legal norms recognized by international legal instruments. This would include the consideration of each nation's strategic objective for its CG. In the case of a navy, it is clear that it is a maritime warfighting organization within the armed forces of a nation. Such a distinctive norm is also needed for CG and important for determining the immunity status a CG vessel (or aircraft) would have during an armed conflict. Some CG platforms may qualify as warships or military aircraft, while others would not qualify for these definitions under the UN Convention on the Law of the Sea of 1982 (UNCLOS).¹⁶ As a result, questions may arise over the obligation of CGs in an armed conflict. This includes the question of targeting, since some CGs may be assigned to MER roles, in which case they would be protected under the Second Geneva Convention.¹⁷ Moreover, some CGs are "disguised" as navies (or "quasi-navies") for strategic deception or to gain an advantage in a conflict. For this purpose, some CGs are equipped with weapons, sensors, and even the distinctive gray paint scheme of naval platforms that are more appropriate for navies.¹⁸

Therefore, the norms pertaining to a CG organization should be identified and promoted in order to deescalate future maritime conflicts and disputes in the "Gray Zone," an area dominated by CGs. This is an important rationale for this study. Best identified as legal norms, they undergo a set of processes and eventually become customary and

¹⁵ Erickson and Martinson, 25.

¹⁶ "United Nations Convention on the Law of the Seas" (1982), Article 29, https://www.un.org/Depts/los/convention_agreements/texts/unclos/unclos_e.pdf.

¹⁷ *The Geneva Convention on the Protection of Civilian Persons in Time of War* (1949), GCII, Ch III-V.

¹⁸ Ordu, "SBS Storms Are Stronger than Typhoons," June 11, 2020, <https://ordu.az/az/news/162490/dsx-nin-tufanlari-typhoon-larla-daha-gucludur-herbi-ekspert-arasdirma>.

international law.¹⁹ This can only be accomplished by developing a CG nomenclature model. Currently, absent such legal norms, any state can establish an organization and call it a “Coast Guard,” along with a structure that fits their national interests. There is no correct or incorrect way to establish a CG, but this issue is not within the scope of the research. However, a commonly accepted nomenclature may help policymakers and strategists adjust existing CGs based on their national interests. This nomenclature would also be a reference for nations that may seek to design and develop the CG best suited for their respective maritime security system. As countries gear up to contest their maritime claims, the CG organization has become more ambiguous in its roles and applications due to the absence of this nomenclature. Hence, a nomenclature model is imperative to clear up this ambiguity.

¹⁹ Prosper Weil, “Towards Relative Normativity in International Law?,” *The American Journal of International Law* 77, no. 3 (July 1983): 427.

THIS PAGE INTENTIONALLY LEFT BLANK

II. LITERATURE REVIEW

CGs have existed for hundreds of years; enforcing laws, participating in conflicts, protecting the marine environment, and saving lives at sea. During the course of their existence, these forces have evolved to suit national security and even political needs. A byproduct of these diverse applications, CGs are one of the few governmental organizations lacking a taxonomy or common nomenclature, despite having a variety of applications across the globe. Some CGs bear marks of a navy with their gray hulls and military organizational structures suited to national defense. Others are limited to MLE and MER operations and bear a civil organizational structure. In the existing literature on these entities, there is a clear absence of a nomenclature that would determine fundamental norms and organizational authorities for a CG organization.

In a 2009 report released by The Nippon Foundation, Prabhakaran Paleri, a former Director-General of the Indian Coast Guard, lists over 142 “coast guards.”²⁰ He finds that they vary significantly by design and in their central characteristics. In his report, Paleri also identifies over 107 different duties and functions of CGs, ranging from air interception, bomb disposal, boating safety, and icebreaking to countering terrorism.²¹ Despite this disparity of missions, Paleri goes on to define CGs as law enforcement entities.²² This may be the traditional thinking which generally assumed that CGs are MLE agencies (MLEA). Although a large majority might be primarily MLEAs, some may not. Some may primarily be MER agencies (MERA). Paleri’s view of CGs may have been influenced by the times. The study was published during the height of Somali piracy in the Western Indian Ocean, right before the South China Sea disputes erupted. Since then, CG activity across the globe has increased, throwing the CG roles into the complex system of a broader spectrum of missions.

²⁰ Prabhakaran Paleri, “Coast Guards of the World and Emerging Maritime Threats,” Ocean Policy Research Foundation, 2009, 124, https://www.spf.org/_opri_media/publication/pdf/200903_ISSN1880-0017.pdf.

²¹ Paleri, 125–28.

²² Paleri, 49.

One striking observation made by Paleri is the presence of “misgivings and [a] serious knowledge deficit associated with the appreciation of the coast guard as a maritime force, service, or agency.”²³ He attributes this to bureaucratic conflicts and political ignorance²⁴—possibly sea blindness. But considering some lead activities taken up by CGs across the globe, this stance may shift. However, it should also be noted that in the absence of robust norms or international legal instruments that may ideally define the objective and goals of a CG organization, it may be unfair to place blame on political ignorance. Paleri’s comprehensive study also reveals that there are apparent variations among the CGs; such as their designs, characteristics, and the terrains in which they operate.²⁵ It would be interesting to learn whether these variations have increased or eroded over time. Furthermore, Paleri’s research identifies the need to define a nomenclature model for CGs and identify the core duties of CG organizations.

For its part, the EU has identified separate roles for a CG, which are related to its collective collaborative organizations.²⁶ Frontex, the European Border and Coast Guard Agency, determines the roles of a CG within its context as undertaking tasks related to search and rescue (SAR), fishery enforcement, customs interdictions, maritime law enforcement, and marine environment protection.²⁷ The European Coast Guard Functions Forum (ECGFF) provides institutional training for member states in the CG field.²⁸ There are 30 institutions from 12 countries taking part in the network.²⁹ This forum identifies 12 functions for a CG. They include operations ranging from civil MER and constabulary roles to maritime administration.³⁰ But, it is the last function in the list that is most striking.

²³ Paleri, 48.

²⁴ Paleri, 48.

²⁵ Paleri, 124.

²⁶ Frontex, “European Cooperation on Coast Guard Functions,” accessed April 2, 2022, <https://frontex.europa.eu/we-support/european-cooperation-on-coast-guard-functions/>.

²⁷ Frontex.

²⁸ European Coast Guard Functions Forum, “What Is ECGF Training Network?,” accessed April 2, 2022, <https://ecgf.efca.europa.eu/about>.

²⁹ European Coast Guard Functions Forum.

³⁰ European Coast Guard Functions Forum, “Coast Guard Functions,” accessed April 2, 2022, <https://ecgf.efca.europa.eu/coast-guard-functions>.

It states, “and activities related to the above Coast Guard Functions.”³¹ In other words, every other activity related to the CG that may support an individual state’s interpretation can also be included. This is a flexibility that would be required if one is to engage a maritime agency with under-defined or varying roles.

Perhaps South Korean maritime security scholar, Suk Kyoon Kim, comes closest to developing a CG nomenclature in his recent book, *Coast Guards and International Maritime Law Enforcement*.³² In Chapter I, “Overview of Coast Guards,” Kim provides a description of the types of CGs existing around the globe.³³ He first provides a description of the U.S. Navy (USN) and the USCG with details of their responsible departments, missions, area of operations, law enforcement authority, and size of assets before moving on to the types of CGs.³⁴ The distinct types of CGs Kim lists and describes are “military force,” “paramilitary force,” “police force,” “civil service,” “volunteer organization,” and “non-separate coast guard: coast guard function” organizations.³⁵ In each of the descriptions, he gives a brief overview of a few CGs that may fall within that type. It is noteworthy that the objective of the book was not to determine a nomenclature for CGs, but rather to understand the evolution and law enforcement functions of the CGs. Kim also offered a perceived “typology,” to set the stage for the main content of the book.

In a 2016 workshop held in Singapore entitled, “Navies, Coast Guards, The Maritime Community, and International Stability,” maritime scholars, Ian Bowers and Lean Collin Koh compiled a detailed set of studies by academics exploring the “Coast Guard-Navy” nexus.³⁶ Their work, published as a book, *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*, presents a number of overlapping

³¹ European Coast Guard Functions Forum.

³² Suk Kyoon Kim, *Coast Guards and International Maritime Law Enforcement*. (UK: Cambridge Scholars Publishing, 2020).

³³ Kim, 1.

³⁴ Kim, 5–8.

³⁵ Kim, 9–20.

³⁶ Ian Bowers and Swee Lean Collin Koh, eds., *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus* (London: Palgrave Macmillan, 2019), v.

roles and responsibilities among navies and CGs.³⁷ This compilation describes the responsibilities and functions in the maritime domain of selected CGs and navies from Southeast Asia, Northeast Asia, Europe, and North and South America. Referencing the Paleri study, Bowes and Koh conclude that CG organizations carry out maritime security and MLE duties.³⁸ This brings to the forefront two terms that are frequently related to CGs; maritime security and MLE.

In his paper “What is Maritime Security?,” international relations scholar Christian Bueger elaborates on the presence of maritime security properties in national security, the marine environment, economic development, and human security.³⁹ Similarly, Linda Jakobson includes marine traffic control, environmental protection, the elimination of smuggling, and the protection of the Exclusive Economic Zone (EEZ) as part of maritime security.⁴⁰ She goes further by including maritime security under the umbrella of “maritime affairs,” which encompasses maritime economy in addition to maritime security.⁴¹ Meanwhile, Paleri defines maritime security as a fundamental part of national security, “aimed at the sustainable well-being of the people of a nation.”⁴² Due to the varying definitions of maritime security, it is clear that if CGs are described simply as maritime security forces, this may add yet another layer to the ambiguity of their roles and responsibilities.⁴³

Looking at the definition of maritime security at institutional levels is also important. During the height of Indian Ocean piracy, on March 8, 2008, the United Nations General Assembly (UNGA) released a report that defined maritime security for the first

³⁷ Bowers and Koh, *Grey and White Hulls*.

³⁸ Bowers and Koh, 3.

³⁹ Christian Bueger, “What Is Maritime Security?” *Marine Policy* 53 (March 2015): 161, <https://doi.org/10.1016/j.marpol.2014.12.005>.

⁴⁰ Linda Jakobson, *China’s Unpredictable Maritime Security Actors* (Sydney, Australia: Lowy Institute for International Policy, 2014), 8, https://www.lowyinstitute.org/sites/default/files/chinas-unpredictable-maritime-security-actors_3.pdf.

⁴¹ Jakobson, 8.

⁴² Paleri, “Coast Guards of the World and Emerging Maritime Threats,” 189.

⁴³ United States Coast Guard, “Doctrine for the U.S. Coast Guard,” February 2014, 18, https://media.defense.gov/2018/Oct/05/2002049081/-1/-1/1/CGPUB_1-0_DOCTRINE.PDF

time for the UN.⁴⁴ It defined maritime security as “protection from direct threats to the territorial integrity of a State, such as an armed attack from a military vessel.”⁴⁵ It also expanded on what is considered a threat by indicating the possibility of including crimes, such as piracy or terrorist acts.⁴⁶ The UK maritime doctrine, *UK Maritime Power*, identifies maritime security operations as “humanitarian assistance and disaster relief (HADR), constabulary operations, counter piracy, counter-drug, counter people trafficking and non-combatant evacuation operations (NEO).”⁴⁷ It does not, however, identify warfighting as part of maritime security.⁴⁸ The Indian Maritime Doctrine defines maritime security simply as attaining freedom from a “threat at or from the sea.”⁴⁹ These latter definitions are succinct, but quite broad. Going back to Bueger, we find different states define maritime security in terms that are specific to their own interests.⁵⁰ This would suggest varying structures for CGs, intended to address a broad array of maritime security goals.

Bowers and Koh collectively identify CGs, maritime police, and maritime militias as MLEAs, and assume all these MLEAs fall under a civilian organizational structure.⁵¹ This is not necessarily the case. MLE, according to Rob McLaughlin, includes actions taken to enforce all applicable laws in all jurisdictional waters of a state and in international waters.⁵² McLaughlin provides three preconditions for MLE: the requirement that the

⁴⁴ United Nations General Assembly, *A/63/63 General Assembly - Security Council Report, Oceans and the Law of the Sea*, A/63/63 (New York: UN General Assembly, 2008), https://www.securitycouncilreport.org/atf/cf/%7B65BFCF9B-6D27-4E9C-8CD3-CF6E4FF96FF9%7D/a_63_63.pdf.

⁴⁵ United Nations General Assembly, 15.

⁴⁶ United Nations General Assembly, 15.

⁴⁷ Government of the United Kingdom, “UK Maritime Power (JDP 0–10),” October 4, 2017, 6, <https://www.gov.uk/government/publications/uk-maritime-power-jdp-0-10>.

⁴⁸ Government of the United Kingdom, 7.

⁴⁹ Indian Navy, “Indian Maritime Doctrine” Sivakasi: Integrated Headquarters, Ministry of Defense (Standard Press, 2015), 14.

⁵⁰ Bueger, “What Is Maritime Security?,” 163.

⁵¹ Bowers and Koh, *Grey and White Hulls*, 3.

⁵² Rob McLaughlin, “Authorizations for Maritime Law Enforcement Operations,” *International Review of the Red Cross*, War and Security at Sea, 98, no. 2 (2016): 466.

coastal state has codified the law; the coastal state has authority to regulate the specific maritime zone; and the MLEA (or “Coast Guard”) is authorized to enforce the law.⁵³ Hence, jurisdiction and enforcement authority are fundamental principles of MLE. An interesting aspect of this assertion is the uncertainty in distinguishing between MLE and some tactics of naval warfare under the scope of International Humanitarian Law (IHL).⁵⁴ Furthermore, not all states codify local maritime security laws or interpret them in the same way.

It is also important to address how states organize the CGs and other MLEAs in their national maritime security system. Bowers and Koh offer three organizational models used by nations to address the Navy-Coast Guard nexus: the “sole-agency” structure, which has one maritime security agency; a “dual agency” structure, in which military and a paramilitary or a civil maritime agency co-exist; and a “multiple-agency” structure, where multiple agencies conduct maritime security functions.⁵⁵ Depending on the model in place, the legal responsibilities of CGs would vary with respect to national maritime security. Rather than determining the role of a given CG, the organizational models would determine the architecture of a nation’s maritime security system. For instance, despite having a dual or multi-agency structure, a country like Iceland, which is opposed to militarization, would not include combat as a role for its CG. Hence, other than determining the maritime structure of nations, it would also be relevant for states to consider the legally assigned mandates for their respective CGs.

One other important organizational aspect to consider is the paramilitary identity. Paramilitary CGs represent a unique model. Paleri identifies paramilitary CGs as non-military armed forces, which may or may not be distinguished by domestic law.⁵⁶ These further calls into question what specific indicators or attributes, outside of a nation’s domestic laws, define a paramilitary CG. Kim interprets paramilitary CGs as civilian

⁵³ McLaughlin, 467–68.

⁵⁴ McLaughlin, 489.

⁵⁵ Bowers and Koh, *Grey and White Hulls*, 5–7.

⁵⁶ Paleri, “Coast Guards of the World and Emerging Maritime Threats,” 192.

services subject to military culture, with platforms “armed to the extent necessary for self-defense and law enforcement.”⁵⁷ These are criteria that require detailed emphasis. Especially, the “extent necessary” for self-defense can be relative. Nonetheless, this does not mean an armed CG that uses military ranks can necessarily be classified as a paramilitary force. The most important distinction to draw here is whether a CG qualifies as a legal target during wartime under the law of armed conflict (LOAC) or whether it is immune.

As already stated, a robust nomenclature model for CGs is needed to provide internationally recognized terminology and norms that could then be used by nations to develop laws, doctrines, or strategies. Martha Finnemore and Duncan Hollis define norms as “social creatures that grow out of specific contexts via social processes and interactions among particular groups of actors.”⁵⁸ Their research is focused on cyber-norms, a domain of warfare that is in dire need of an international legal convention. Finnemore and Hollis’ definition is similar to that provided by Beth Simmons and Richard Steinberg, who define norms as, “collective understandings of the proper behavior of actors.”⁵⁹ The latter study goes on to judge the robustness of an international norm through three criteria: specificity, durability, and concordance.⁶⁰ Hence, time, practitioners in the field, and scholars ultimately determine the validity and reliability of the norms.

A. RESEARCH QUESTION

This literature review reveals that there is a gap in the identification of nomenclature and standardization of norms related to CGs that would distinguish them from navies or other maritime security or administrative organizations. Closing this gap can contribute to the de-escalation of future maritime conflicts and disputes, as well as

⁵⁷ Suk Kyoon Kim, “The Expansion of and Changes to the National Coast Guards in East Asia,” *Ocean Development & International Law* 49, no. 4 (October 2, 2018): 315.

⁵⁸ Martha Finnemore and Duncan B. Hollis, “Constructing Norms for Global Cybersecurity,” *The American Journal of International Law* 110, no. 3 (2016): 427.

⁵⁹ Beth A Simmons and Richard H Steinberg, eds., *International Law and International Relations* (Cambridge, England; New York: Cambridge University Press, 2007), 236.

⁶⁰ Simmons and Steinberg, 237.

offer opportunities to improve inter-CG cooperation. If widely accepted, such nomenclature and norms might eventually become the basis for internationally recognized rules and law.⁶¹ Currently, any state can establish an organization and call it a “Coast Guard,” with a structure that fits that state’s specific national interests.

This research seeks to answer the question: Can the CGs of each nation be classified into a model to derive a nomenclature for the agency by thoroughly analyzing representative CGs in its unique maritime environment and respective maritime security system? Through exploratory research, this thesis offers the foundation to develop a nomenclature model for CGs. Such a model may be the first of its kind and could be assessed and refined by the larger scholarly community to form a basis for future norms.

⁶¹ Weil, “Towards Relative Normativity in International Law?,” 427.

III. METHODOLOGY

A. SAMPLING PROCESS

The objective of this methodology is to provide an effective method to analyze a select few CGs, to determine whether a valid and reliable nomenclature model for CGs can be produced. The model would be deemed valid if it supported any existing CG being placed in a category within a defined nomenclature in the proposed model. It would be reliable in the sense that the analytical and the nomenclature processes are based on well-cited, defensible qualitative data that lacks ambiguity. Hence, the research design also ensures that the cognitive biases of the researcher that may hinder an accurate analysis of the selected cases are taken into account.

This research analyzes selected CGs in terms of their organizational representation within a maritime security system of a nation-state. Thus, CG samples are drawn from a set of multiple strata based on geography and type of organization. Organizational types include military, paramilitary, and civil-government or civil-non-government entities as they are generally understood. Geography would include continental coastal states, continental land-locked states, and island states. The stratified sampling applied in the research is shown in Figure 1.

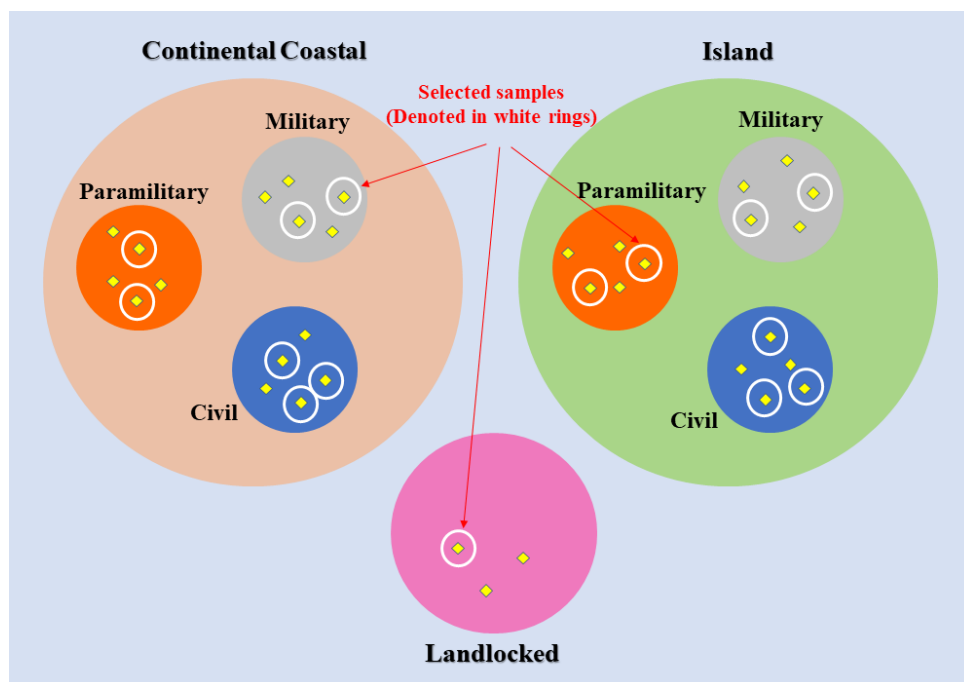


Figure 1. Stratified sampling applied in this research with geographical and organizational strata.

Consideration is given to organizations that are geographically diverse and that represent different sub-continent across the globe. There is no indication that introducing such prerequisites will provide the best outcome, but these conditions would help eliminate any bias within the sample group of CGs. Further, this approach helps avoid selecting a convenience sample. For example, readily available data in English would be more convenient for a researcher, but the outcome of this convenience could be unreliable and invalid. Each of the selected organizations is then qualitatively analyzed as a separate case based on identified attributes.

The research incorporates information from organizations under the given name of “Coast Guard” or “Coastguard.” An example of this would be the Japanese Coast Guard or the United States Coast Guard.⁶² These would also include organizations with direct foreign translations of the same term, such as Italy’s *Guardia Costiera* or Columbia’s

⁶² United States Coast Guard, “United States Coast Guard,” accessed September 7, 2021, <https://www.uscg.mil/>.

Guardacostas.⁶³ States that have organizations adopting the term “coast guard” with other nouns are also included. An example of this could be the Maritime and Coastguard Agency of the United Kingdom, which is the parent agency of Her Majesty’s Coastguard.⁶⁴

The research omits organizations that may be perceived to operate as a “coast guard” but do not adopt the name or its direct English translation, and organizations that use the English equivalent for a locally adopted name. An example of this would be the Pakistan Maritime Security Agency, which is frequently misrepresented as a CG in literature.⁶⁵ This research focuses on proposing a nomenclature specifically for organizations that adopt, or that would adopt, the name “coast guard.” Primarily, the objective of the research is to develop a nomenclature specifically as it applies to “coast guards,” not the broader maritime security organizations. Hence, it is assumed that maritime agencies or forces that have adopted different names are unique and indigenous organizations, developed to reflect their namesakes. In this regard, they are exempt from this research.

B. SELECTED SAMPLES

Table 1 presents 15 categories of CGs that are analyzed in the study. Each of the nine categories is presented with a conclusion in the analysis. The information acquired from the analysis is then used to build a CG nomenclature model.

Table 1. Selected CG samples for analysis.

No.	Category	Coast Guard
1	Continental Military	China Coast Guard (CCG)
2		United States Coast Guard (USCG)

⁶³ Armada Nacional, “Comando de Guardacostas,” accessed September 7, 2021, <https://www.armada.mil.co/es/content/comando-de-guardacostas>.

⁶⁴ Government of the United Kingdom, “Maritime and Coastguard Agency,” accessed September 7, 2021, <https://www.gov.uk/government/organisations/maritime-and-coastguard-agency>.

⁶⁵ Pakistan Maritime Security Agency, “Pakistan Maritime Security Agency,” accessed September 7, 2021, <http://pmsa.gov.pk/>.

No.	Category	Coast Guard
3	Continental Paramilitary	Italian Coast Guard (<i>Guardia Costieri</i> , ICG)
4		Kenya Coast Guard Service (KCGS)
5	Continental Civil (Government)	Canadian Coast Guard (CACG)
6		Georgian Border Police Coast Guard (GCG)
7	Continental Civil (Non-Gov.)	Australian Volunteer Coast Guard (AVCG)
8	Island Military	Jamaica Defense Force Coast Guard (JDFCG)
9		Maldives National Defense Force Coast Guard (MCG)
10	Island Paramilitary	Icelandic Coast Guard (<i>Landhelgisgæsla Íslands</i> , ISCG))
11		Japan Coast Guard (JCG)
12	Island Civil (Government)	Mauritius National Coast Guard (MNCG)
13		Her Majesty's Coastguard (HMCG)
14	Island Civil (Non-Government)	Coastguard New Zealand (CGNZ)
15	Landlocked	Azerbaijani Coast Guard (AZCG)

C. ANALYTICAL PROCESS

In the following chapters, the selected CG organizations are qualitatively analyzed using openly available resources. The analysis considers each CG as an individual case based on its roles and responsibilities, organizational ontology, strategic status, and physical characteristics, as well as the actual behavior and application of the organization. The following sections explain the rationale for and scope of these attributes.

1. Organizational Ontology

This attribute describes the origin and the hierarchical structure of the CG within the government or civil agencies responsible for the organization. This section also briefly addresses the evolution of the organization and its role as either a military, civil-constabulary, or civil-voluntary non-government organization (NGO). The main

requirement of this attribute is to understand the organizational structure and detailed composition of the CG. Further, this analysis determines what tier the CG occupies within its hierarchical system. Tier I organizations are considered to be directly below the highest echelon of the agency, without any intermediaries in-between, for example the government CGs operated directly under the President or Prime Minister. Tier II organizations will have an intermediary agency, such as a Minister or Secretary. Tier III organizations will ideally have two intermediary agencies between the CG and the highest command echelon. An example of this would be a CG embedded within a navy, while the navy is accountable to a defense secretary, who in turn answers to a president of prime minister.

2. Roles and Responsibilities

This attribute describes the break-down of tasks and missions of the selected CG organization as mandated under the respective laws or similar legal instruments within each state. This attribute is necessary to identify the fundamental utilization of the CG by the state.

3. Strategic Status

The attribute of strategic status is intended to identify the strategic value of each CG organization within its respective national maritime security systems. This would include the unique strategic role(s) played by the organization in order to achieve the strategic maritime objectives of the state. It is important to analyze a CG in these terms to understand the strategic value of establishing a specific CG for that nation state.

4. Physical Characteristics

This attribute addresses the physical characteristics of the CG. These include the appearance of the platforms and their (unclassified) weaponry, and some of the uniforms or gear utilized by the personnel. In plain terms, this attribute describes how one would observe and evaluate a specific CG platform and its personnel. The physical characteristics help to identify similarities or disparities among the CG platforms and personnel of different states.

5. Behavior and Application

This attribute determines the practical application or the current employment and the traits of the CGs in their unique maritime domain. This attribute describes the actual operational behavior of a CG in comparison to its mandates and roles.

D. CLASSIFICATION PROCESS

The outcome from the analytical process is expected to derive organizational and behavioral data related to the different CGs studied, which can then be applied to develop a nomenclature for the general population of CGs. To accomplish this, the following steps are presented in Chapter XI.

Step I: Findings and Collation—The outcomes of the analysis are presented on a table.

Step II: Modeling—A final proposed nomenclature model is developed.

The sampling process and the analytical process contribute to the development of a nomenclature model for CGs. The results from the analysis will determine whether it is possible to derive a practical and applicable model for CGs.

IV. CASE 1: CONTINENTAL MILITARY COAST GUARDS

A. INTRODUCTION

This chapter launches the case studies required to develop a CG nomenclature. More particularly, the chapter analyzes two military CGs, the China Coast Guard (CCG) and the USCG. These two CGs belong to the two continental nations that are part of the strategic competition redefining the unipolar order of the post-Cold War years.⁶⁶ Most importantly, these two CGs are currently the largest among the CG agencies in the world. The USCG is one of the oldest in the world and predates its navy.⁶⁷ By comparison, the CCG was established quite recently. Nonetheless, it has been in the news often and controversially. The CCG, which has rapidly become a formidable force since its founding, has been developed to assert China's new maritime claims in the South China Sea (SCS) and the East China Sea (ECS). This has created a chain of events that has led to clashes in the region. Hence, an analysis of the CCG may derive some important notions as to developing a CG in the modern-day. Unlike the CCG, the USCG appears to be operating across the globe, promoting U.S. maritime interests in collaboration with the USN.

The analysis applies the five main attributes described in the previous chapter to these two CGs. The case analysis begins with an overview of each country's maritime background and the reasons each country developed a CG. The attributes used are organizational ontology, which examines the origin, evolution, and the structure of the organization; roles and responsibilities as derived from legal instruments; the strategic status of each CG within the nation; the physical characteristics of each CG, such as the platforms and personnel; and the behavior of the organizations compared to their mandated roles. A conclusion follows the analysis. This framework is applied to all the cases analyzed in the chapters that follow.

⁶⁶ Emma Ashford, "Great-Power Competition Is a Recipe for Disaster," *Foreign Policy*, April 1, 2021, <https://foreignpolicy.com/2021/04/01/china-usa-great-power-competition-recipe-for-disaster/>.

⁶⁷ GoCoastGuard, "The Coast Guard: America's Oldest Maritime Defenders," accessed April 1, 2022, <https://www.gocoastguard.com/about-the-coast-guard/learn-the-history>.

B. CHINA COAST GUARD

Parts of this section are drawn from an article written by this author and previously published by the Center for International Maritime Security (CIMSEC).⁶⁸

China is a large maritime state that opens into the North Pacific Ocean. China's maritime coastline borders the Bohai Sea, Yellow Sea, East China Sea, and South China Sea. The mainland has a coastline of 18,400 km (11,433 mi), and its offshore islands have a coastline of 13,600 km (8,451 mi).⁶⁹ This brings China's coastline to a total of approximately 32,000 km (19,884 mi). These data do not include China's recent island reclamations in the South and the East China Sea, which, if included, would extend its coastline even further. Extending beyond its coastline, China has also claimed an Exclusive Economic Zone (EEZ) of 3 million sq km (1.2 million sq mi), within which are also its Territorial Waters and Contiguous Zone (Figure 2).⁷⁰ Yet China's maritime interests do not stop the previously mentioned seas. In recent times, China has also embarked on securing its Sea Lines of Communication (SLOC) extending from the oil-rich Middle East through the Indian Ocean.⁷¹ Protecting China's vast maritime claims and securing its energy routes requires a strong and formidable maritime security infrastructure.

⁶⁸ Ahmed Mujuthaba, "China Coast Guard: On a Trajectory for Peace or Conflict?," Center for International Maritime Security, February 16, 2022, <https://cimsec.org/china-coast-guard-on-a-trajectory-for-peace-or-conflict/>.

⁶⁹ Ying Wang and David G. Aubrey, "The Characteristics of the China Coastline," *Continental Shelf Research* 7, no. 4 (April 1987): 329.

⁷⁰ Bowers and Koh, *Grey and White Hulls*, 17.

⁷¹ Bernard D. Cole, *China's Quest for Great Power: Ships, Oil, and Foreign Policy* (Annapolis, Maryland: Naval Institute Press, 2016), 8.

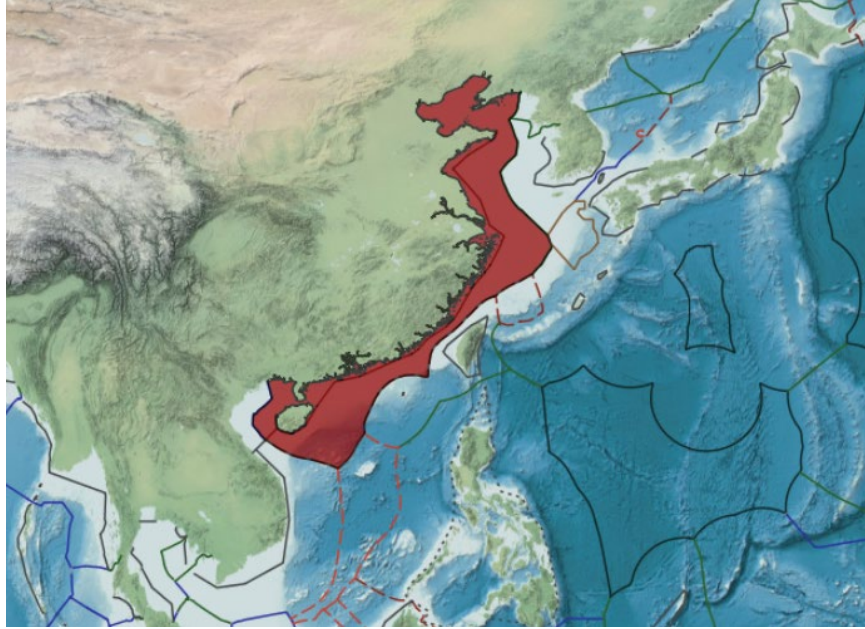


Figure 2. China's maritime domain, with its EEZ highlighted in red.⁷²

China has the People's Liberation Army Navy (PLAN) and the CCG to achieve the objectives of securing its maritime interests. But what is significant is the rapid development of these forces in recent years. Additionally, the PAFMM, comprised of civilians, engages in government-sanctioned tasks at sea.⁷³ The PLAN has become the largest navy in terms of the number of platforms.⁷⁴ The CCG as it appears today was developed in 2013.⁷⁵ In less than a decade, it has developed into the world's largest CG.⁷⁶ Since its inception, the CCG has been at the forefront of several controversies in the

⁷² Source: Marine Regions, "China MRGID 8486," accessed April 2, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8486&zone=eez>.

⁷³ Department of Defense, *Military and Security Developments Involving the People's Republic of China 2020*, Annual Report to Congress (Washington, D.C.: Office of the Secretary of Defense, 2020), 29, <https://media.defense.gov/2020/Sep/01/2002488689/-1/-1/1/2020-DOD-CHINA-MILITARY-POWER-REPORT-FINAL.PDF>.

⁷⁴ Department of Defense, 44.

⁷⁵ "The Coast Guard Law of the People's Republic of China," Japan Ministry of Defense, accessed July 30, 2021, <https://www.mod.go.jp/en/>.

⁷⁶ Ryan D. Martinson, "China's Second Navy," *Proceedings: U.S. Naval Institute*, April 26, 2015, <https://www.usni.org/magazines/proceedings/2015/april/chinas-second-navy>.

disputed zones. To understand the CCG, it is important to understand the requirement of building the current force.

One of the urgent needs precipitating the development of China's CG organization was the weakness of Chinese maritime agencies relative to their regional competitors. Lyle Goldstein, a maritime scholar, states that the regional CGs of the Pacific region, namely the Japan Coast Guard (JCG) and the USCG, were comparatively large and more effective compared to their Chinese counterparts.⁷⁷ Further, Goldstein also refers to Chinese experts raising the concern of rivalry among the maritime enforcement agencies within China, which contributed to a weaker and less collaborative maritime enforcement construct.⁷⁸

The other need may have been the prospect for future development of the PLAN as a blue water navy. Most strategists indicate that China's need for naval expansion was the result of its humiliation during the 1995–96 Taiwan Strait crisis.⁷⁹ This triggered the rapid development of the PLAN, which was well on its way to becoming the world's largest navy by numbers in 2020, and saw the establishment of the first People's Liberation Army Support Base in Djibouti. This base, which is operated by the PLAN, puts China's global power projection and economic ambitions in line.⁸⁰ Meanwhile, the role of regional law enforcement exercised by PLAN platforms was projected as disproportionate aggression.

The most important driver for developing and strengthening a CG may have been the hotly contested maritime claims by China in the SCS and the ECS. Scholars claim that Chinese sovereignty over the South China Sea territories was never contested before the 1930s, but from that point, China's vulnerable status was exploited by global powers such

⁷⁷ Lyle Goldstein, *Five Dragons Stirring Up the Sea: Challenges and Opportunities in China's Improving Maritime Enforcement Capabilities*, China Maritime Study, no. 5 (Newport, RI: China Maritime Studies Institute, U.S. Naval War College, 2010), 3.

⁷⁸ Goldstein, 2.

⁷⁹ Cole, *China's Quest for Great Power*, 52.

⁸⁰ Andrew Jacobs and Jane Perlez, "U.S. Wary of Its New Neighbor in Djibouti: A Chinese Naval Base," *The New York Times*, February 25, 2017, sec. World, <https://www.nytimes.com/2017/02/25/world/africa/us-djibouti-chinese-naval-base.html>.

as France and Japan.⁸¹ Since then China has struggled to exercise complete authority over the territories — competing, and sometimes clashing, with regional states such as Taiwan, Vietnam, Malaysia, Brunei, and the Philippines; which also claim sovereignty over the island chains.⁸² Along with this, the USN has continuously challenged China's claims by conducting Freedom of Navigation Operations (FONOP) in the waters, mostly policed by the CCG.

The other contested territory is in the ECS. Since claiming its disputed control over the Senkaku/Diaoyu Islands in the ECS at the end of the Sino-Japanese War in 1895, China has been continuously demanding its sovereign rights over the islands against Japan.⁸³ The Chinese trace their claims over the ECS territories as far back as 1372, when China claims to have discovered the islands and named the islands in 1403.⁸⁴ Meanwhile, the Japanese claim that the Senkaku/Diaoyu Islands were annexed by Japan into its Okinawa Prefecture on January 14, 1895, before the Treaty of Shimonoseki ended the Sino-Japanese War.⁸⁵ Clashes have stemmed from these competing claims. They include a 2010 incident in which a Chinese fishing boat collided with two JCG vessels; the 2012 Japanese nationalization of the islands, resulting in the Chinese claiming territorial sea baselines; and the 2013 establishment of an Air Defense Identification Zone by China in the area.⁸⁶

1. Organizational Ontology

In 2013, four Chinese maritime law enforcement agencies were integrated to form the China Coast Guard Bureau, or the CCG.⁸⁷ These integrated agencies included the

⁸¹ Jianming Shen, "China's Sovereignty Over the South China Sea Islands: A Historical Perspective," *Chinese Journal of International Law* 1, no. 1 (January 1, 2002): 98–99, <https://academic.oup.com/chinesejil/article-lookup/doi/10.1093/oxfordjournals.cjilaw.a000432>.

⁸² Shen, 97.

⁸³ Council on Foreign Relations, "Timeline: China's Maritime Disputes," accessed August 18, 2021, <https://www.cfr.org/timeline/chinas-maritime-disputes>.

⁸⁴ Jean-Marc F. Blanchard, "The U. S. Role in the Sino-Japanese Dispute over the Diaoyu (Senkaku) Islands, 1945–1971," *The China Quarterly*, no. 161 (2000): 101, <http://www.jstor.org/stable/655982>.

⁸⁵ Blanchard, 102.

⁸⁶ Council on Foreign Relations, "Timeline."

⁸⁷ "The Coast Guard Law of the People's Republic of China."

China Marine Surveillance, China Fisheries Law Enforcement, Maritime Police, and Border Control and Maritime Anti-smuggling Police.⁸⁸ This process was an outcome of the 18th National Party Congress in 2012, which was called to implement the “Maritime Great Power” strategy.⁸⁹

In 2018, the CCG was transferred to the People’s Armed Police (PAP) under the Central Military Commission (CMC).⁹⁰ According to a 2020 United States Defense Department report, the PAP is a paramilitary force of China’s armed forces and an armed wing of the Chinese Communist Party (CCP).⁹¹ Despite this notion that PAP is a paramilitary force, others insinuate that the PAP’s inception into the CMC categorizes the agency as a military arm of the Chinese armed forces.⁹²

Under the CMC, categorizes the CCG as a military entity within the country’s security structure. Further, having two levels of command (the PAP and the CMC), the CCG is a tier III organization within the hierarchical structure.

2. Roles and Responsibilities

Under Article 12 of the “Coast Guard Law of the People’s Republic of China,” adopted on January 22, 2021, the CCG is responsible to:⁹³

- Protect the jurisdiction, sovereignty, security, and Chinese maritime interests;

⁸⁸ China Power, “Are Maritime Law Enforcement Forces Destabilizing Asia?,” August 18, 2016, <https://chinapower.csis.org/maritime-forces-destabilizing-asia/>.

⁸⁹ Bowers and Koh, *Grey and White Hulls*, 19.

⁹⁰ Bowers and Koh, 24.

⁹¹ Department of Defense, *Military and Security Developments Involving the People’s Republic of China 2020*, 69.

⁹² Lyle Morris, “China Welcomes Its Newest Armed Force: The Coast Guard,” War on the Rocks, April 4, 2018, <https://warontherocks.com/2018/04/china-welcomes-its-newest-armed-force-the-coast-guard/>.

⁹³ National People’s Congress of China, “Coast Guard Law of the People’s Republic of China,” Xinhua News Agency, January 22, 2021, https://m.gmw.cn/2021-01/29/content_1302079361.htm.

- Protect key natural and artificial structures of China in the EEZ and the Continental Shelf (CS);
- Secure maritime borders, prevent terrorist activities, and maintain maritime security;
- Conduct counter-smuggling operations at sea;
- Enforce all maritime development activities;
- Respond to marine pollution;
- Protect against fishery exploitation;
- Perform MLE; and
- Perform SAR at sea.

These roles indicate that the CCG has evolved from its predecessors into a multi-role maritime agency with MER and MLE being the primary mandates of the organization. This indicates that the CCG is both an MLEA and a MERA. In addition to this, the roles also reflect the enforcement of China's recent maritime claims in the Yellow Sea, SCS, and the ECS.

3. Strategic Status

The CCG's role in the disputed maritime zones, as an agency of strategic importance, is an interesting area to analyze. The zones where the CCG operates are so vulnerable that Robert Kaplan has described this region as the battleground of the next global conflict.⁹⁴ China's maritime law enforcement agencies, and later the CCG, have been instrumental in applying coercive force in hot zones, such as the Scarborough Shoal in the Philippine Sea.⁹⁵ It has also been used to assert the same authority in the East China

⁹⁴ Robert D. Kaplan, "The South China Sea Is the Future of Conflict," *Foreign Policy*, August 15, 2011, <https://foreignpolicy.com/2011/08/15/the-south-china-sea-is-the-future-of-conflict/>.

⁹⁵ Department of Defense, *Military and Security Developments Involving the People's Republic of China 2020*, 71.

Sea, specifically in the Diaoyu/Senkaku Islands.⁹⁶ Rather than mobilizing the PLAN, China utilizes the CCG to manage the disputed waters.⁹⁷ The U.S. Department of Defense (DOD) claims that the rapid expansion of the CCG has enhanced its “ability to enforce their [Beijing’s] claims.”⁹⁸

As the current CCG was first formed in 2013, China also began *terra firma* activity to reclaim its first reef, the Johnson Reef, in the South China Sea, completing it in December 2013.⁹⁹ This is an indicator that the CCG was developed and organized for the primary purpose of asserting China’s new maritime claims. Since its inception, the CCG has continued to accompany militia vessels of the PAFMM, supporting and safeguarding them in their gray-zone activities by overwhelming foreign vessels.¹⁰⁰ Hence, the CCG remains an important strategic asset to China as they continue to assert authority over its maritime claims.

4. Physical Characteristics

Similar to most CG surface platforms, the vessels of the CCG are painted white, with a thin blue stripe followed by a red wider stripe, which again is followed by three narrow blue stripes painted at the bow.¹⁰¹ The mid-ship area of the hull bears the dark blue Mandarin inscription for CG immediately followed by the English inscription “COAST GUARD.” It also has a hull number on the bow. Most of the hulls are similar to naval

⁹⁶ Yang Sheng and Leng Shumei, “China’s Coast Guard Continues Patrolling Waters Surrounding Diaoyu, Defying U.S. Reaffirming Security Commitment to Japan,” *Global Times*, April 25, 2021, 6, <https://www.globaltimes.cn/page/202104/1222054.shtml>.

⁹⁷ Bowers and Koh, *Grey and White Hulls*, 29.

⁹⁸ Department of Defense, *Military and Security Developments Involving the People’s Republic of China 2020*, 71.

⁹⁹ Gregory Poling, Harrison Pretat, and Tabitha G. Mallory, *Pulling Back the Curtain on China’s Maritime Militia* (Washington, D.C.: Center for Strategic and International Studies, 2021), 6, <https://www.csis.org/analysis/pulling-back-curtain-chinas-maritime-militia>.

¹⁰⁰ Poling, Pretat, and Mallory, 13.

¹⁰¹ China.org, “China Coast Guard Vessels Patrol Diaoyu Islands,” September 16, 2013, http://www.china.org.cn/photos/2013-09/16/content_30044828.htm.

frigates and corvettes.¹⁰² The CCG 3901 and the CCG 2901 remain the largest CG vessels in the world, at 12,000 tons (Figure 3).¹⁰³



Figure 3. CCG Ship 3901 *Haijing*.¹⁰⁴

According to the U.S. DOD, the larger modern CCG ships are capable of conducting helicopter operations, equipped with high-capacity water cannons, and fitted with main guns ranging from 30 mm to 76 mm.¹⁰⁵ The CCG further operates the Z-18 maritime patrol helicopter and the MA-60H maritime patrol aircraft.¹⁰⁶ It does not possess any of PLAN's anti-submarine or anti-ship capacities such as anti-ship or surface-to-air

¹⁰² Jr Ng, "Coast Guard with Muscles," *Asian Military Review* (blog), September 9, 2019, <https://www.asianmilitaryreview.com/2019/09/coast-guard-with-muscles/>.

¹⁰³ Bowers and Koh, *Grey and White Hulls*, 29.

¹⁰⁴ Source: Ng, "Coast Guard with Muscles."

¹⁰⁵ Department of Defense, *Military and Security Developments Involving the People's Republic of China 2020*, 71.

¹⁰⁶ Bowers and Koh, *Grey and White Hulls*, 29.

missiles.¹⁰⁷ Nevertheless, the high-impact armaments of the CCG and its tonnages are sufficient to pack a “coercive punch” against its competitors in the region.

In addition to the surface platforms, the CCG also utilizes its own fleet of aircraft. The aircraft are also white in color, with similar racing stripes that are distinctive of the CCG’s surface platforms.¹⁰⁸ Some of these platforms include the fixed-wing *Xian-MA-60* aircraft and the rotary *Harbin Z-9A Haitun* helicopter (Figure 4).¹⁰⁹



Figure 4. CCG *Harbin* helicopter in flight.¹¹⁰

Most of the personnel in the CCG are from the former Border Defense Coast Guard force, who are active-duty officers and sailors.¹¹¹ The training pipeline of all skilled or technical personnel and the guidelines on board the ships are also similar to those of the

¹⁰⁷ Ng, “Coast Guard with Muscles.”

¹⁰⁸ JetPhotos, “China Coast Guard Aviation Photos,” accessed April 1, 2022, <https://www.jetphotos.com/>.

¹⁰⁹ JetPhotos.

¹¹⁰ Source: JetPhotos.

¹¹¹ Bowers and Koh, *Grey and White Hulls*, 33.

PLAN.¹¹² Hence, the composition, discipline, and hierarchy of the CCG are similar to that of military naval culture. The CCG merely replaces the PLAN's white naval uniform with a light-blue top and a darker blue bottom (Figure 5).¹¹³



Figure 5. Commonly worn CCG uniform.¹¹⁴

5. Behavior and Application

The most interesting aspect of the CCG's operations is its gray-zone tactics and its role assisting in the gray-zone tactics. The CCG is known to engage in these activities in the Yellow Sea, ECS, and SCS with the PAFMM.¹¹⁵ The CCG has adopted tactics such as ramming into other states' CG and fishing vessels and actively promoting and

¹¹² Bowers and Koh, 33.

¹¹³ Global Security, "China Coast Guard - Uniforms," accessed January 8, 2022, <https://www.globalsecurity.org/intell/world/china/ccg-uniforms.htm>.

¹¹⁴ Source: Global Security.

¹¹⁵ Erickson and Martinson, *China's Maritime Gray Zone Operations*, 25.

accompanying PAFMM vessels taking up these tactics in disputed waters.¹¹⁶ These tactics go beyond the traditional law enforcement approaches, although they fall short of a warfare response.¹¹⁷

The recent introduction of the “China Coast Guard Law” added potency to its gray-zone activities.¹¹⁸ Article 21 of this law states that the CCG has the authority to use force against foreign warships and foreign ships operated for non-commercial purposes.¹¹⁹ This change in the law could contribute to the escalation of incidents beyond the threshold of MLE or peaceful actions. An international conflict is not limited only to armed confrontation between military personnel, but it also includes confrontation between state civil or paramilitary forces, such as CGs.¹²⁰ Since not all nations interpret the Chinese version of UNCLOS and accept Beijing’s claims, peaceful legal challenges or mere undertakings of innocent passage may be met with lethal force by the CCG. Thus, the new law has given the CCG the flexibility to operate within three spectrums: constabulary, gray zone, and combat zones.

C. UNITED STATES COAST GUARD

The United States is a coastal state that has maritime borders extending into both the Atlantic and Pacific Oceans. The East Coast of the United States borders the Atlantic Ocean, and its West Coast borders the Pacific Ocean, accounting for a coastline with a total of 97,396.12 km (60,519 mi).¹²¹ Additionally, that State of Alaska has a coastline of

¹¹⁶ Lyle J. Morris, “Gray Zone Challenges in the East and South China Sea,” *Maritime Issues*, January 7, 2019, 3.

¹¹⁷ Shawn Lansing, “A White Hull Approach to Taming the Dragon: Using the Coast Guard to Counter China,” *War on the Rocks*, February 22, 2018, <https://warontherocks.com/2018/02/white-hull-approach-taming-dragon-using-coast-guard-counter-china/>.

¹¹⁸ Guangming Daily, “The Maritime Police Law of the People’s Republic of China,” January 29, 2021, https://m.gmw.cn/2021-01/29/content_1302079361.htm.

¹¹⁹ Guangming Daily.

¹²⁰ Wolff Heintschel von Heinegg, “The Difficulties of Conflict Classification at Sea: Distinguishing Incidents at Sea from Hostilities,” *International Review of the Red Cross* 98, no. 902 (August 2016): 451, <https://doi.org/10.1017/S1816383117000327>.

¹²¹ WorldAtlas, “US States with the Longest Coastlines,” September 8, 2020, <https://www.worldatlas.com/articles/us-states-by-length-of-coastline.html>.

54,563 km (33,904 mi), bordering the North Pacific Ocean and the Arctic Sea.¹²² Hawaii is an archipelagic Pacific Ocean state of the United States with a coastline of 1,693 km (1,052 mi).¹²³ These huge coastlines also extend outwards into one of the world's largest EEZs, amounting to 11,351,918 sq km (4,383,000 sq mi).¹²⁴ Figure 6 shows the U.S. mainland EEZ in red. This would make the United States account for one of the largest maritime jurisdictions in the world.

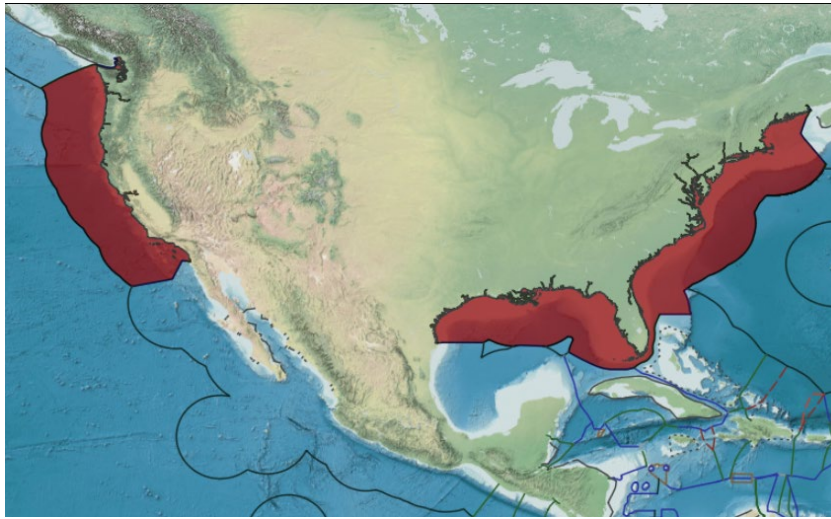


Figure 6. The U.S. mainland maritime domain, with its EEZ highlighted in red.¹²⁵

To maintain its maritime integrity, the United States is required to develop and sustain an efficient agency or agencies. One of these is the USCG, which is one of the most dominant and influential CGs in existence. The birth of the USCG goes back to August 4, 1790, when the new nation established the Revenue Marine, on which day the USCG also

¹²² WorldAtlas.

¹²³ WorldAtlas.

¹²⁴ WorldAtlas, "Countries with the Largest Exclusive Economic Zones," June 29, 2018, <https://www.worldatlas.com/articles/countries-with-the-largest-exclusive-economic-zones.html>.

¹²⁵ Source: Marine Regions, "United States MRGID 8456," accessed April 2, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8456&zone=eez>.

continues to celebrate its founding.¹²⁶ The Revenue Marine, with its Revenue Cutters, was subordinate to the guardianship of the then U.S. Treasury Secretary, Alexander Hamilton, due to the agency's role as a revenue collecting service.¹²⁷ In 1869, the Treasury Department reorganized the Revenue Cutter Service (USRCS) with further roles and assigned it under a newly formed agency, the Revenue Marine Bureau.¹²⁸

The USRCS did not adopt the name "United States Coast Guard" until after the turn of the 20th century. During the Taft administration, the Cleveland Commission, which was created to improve government service efficiency, discouraged the formation of multifunctional agencies.¹²⁹ Despite the recommendations of the Commission, discussions within the services and the government led to the renaming of the USRCS as the USCG and the absorption of the U.S. Life-Saving Service into it.¹³⁰ This was finalized in the legislature on January 28, 1915, with Captain Ellsworth Bertholf as its first Commandant.¹³¹ By 1945, the Lighthouse Service and the Bureau of Marine Inspection and Navigation would also be assimilated into the USCG.¹³²

1. Organizational Ontology

Under Title XIV of the U.S. Code, the USCG is considered as a "military service and a branch of the armed forces of the United States at all times."¹³³ Before the formation of the United States Department of Homeland Security (DHS), under which USCG currently resides, it was under the U.S. Department of Transportation. It does not fall under the U.S. DOD due to its constabulary roles in the maritime domain, which were authorized

¹²⁶ United States Coast Guard, "Doctrine for the U.S. Coast Guard," 28.

¹²⁷ United States Coast Guard, 28.

¹²⁸ United States Coast Guard, 33.

¹²⁹ United States Coast Guard, 37.

¹³⁰ United States Coast Guard, 38.

¹³¹ United States Coast Guard, 38.

¹³² United States Coast Guard, 27.

¹³³ Jonathan G. Odom, "The United States," in *Grey and White Hulls*, ed. Ian Bowers and Swee Lean Collin Koh (Singapore: Springer Singapore, 2019), 205–6, https://doi.org/10.1007/978-981-13-9242-9_11.

under Title XIV of the U.S. Code.¹³⁴ Although under the 1878 “Posse Comitatus Act” of the United States no service of its military should engage in federal law enforcement, the USCG has been exempt from the Act.¹³⁵

The USCG remains a unique organization within the U.S. armed forces, retaining its maritime law enforcement authority as it sits under DHS. In an additional provision in 1981 to the “Posse Comitatus Act,” the Navy would be required to provide its platforms to assist the USCG when and if required for its MLE purposes.¹³⁶ The USCG utilizes this provision by embarking boarding parties onboard USN ships in its counter-drugs operations in the southern waters of the United States.¹³⁷ Under Title XIV of the U.S. Code 3(b), the USCG would fall under the DOD if the U.S. Congress declares war and directs such a transfer, or when the President directs such a transfer.¹³⁸ According to Bowers and Koh, this was the case during both the World Wars, which USCG units attached to the USN.¹³⁹ This would include the attachment of USCG Law Enforcement Detachments (LEDET) to the USN; meanwhile, the USCG as a whole would remain an independent service within the DHS.

Despite falling under DHS, there is no question that the USCG is a functioning military hierarchical organization. The USCG personnel “are subject to the Uniform Code of Military Justice,” and they have actively contributed to the major warfighting efforts the United States has undertaken.¹⁴⁰ In addition to being a military organization, it can be considered as a tier II command structure, as the USCG is primarily accountable to the

¹³⁴ Sukjoon Yoon, “Establishing a Maritime Security Joint-Force Partnership Between the Republic of Korea Navy and the Korea Coast Guard,” in *Grey and White Hulls*, ed. Ian Bowers and Swee Lean Collin Koh (Singapore: Springer Singapore, 2019), 56, https://doi.org/10.1007/978-981-13-9242-9_4.

¹³⁵ Elsea, *The Posse Comitatus Act and Related Matters: The Use of the Military to Execute Civilian Law*, 31.

¹³⁶ Elsea, 46.

¹³⁷ Odom, “The United States,” 209.

¹³⁸ Odom, 213.

¹³⁹ Odom, 213.

¹⁴⁰ Richard J. Samuels, “‘New Fighting Power!’ Japan’s Growing Maritime Capabilities and East Asian Security,” *International Security* 32, no. 3 (January 2008): 93, <https://doi.org/10.1162/isec.2008.32.3.84>.

Department of Homeland Security. This further denotes that the USCG has a minimal bureaucracy within the maritime security structure.

2. Roles and Responsibilities

Under the “2002 Homeland Security Act,” the USCG executes 11 main roles.¹⁴¹ They include:

- Port security;
- Counter drug operations;
- Managing Aids to Navigation (ATON);
- Maritime search and rescue (SAR);
- Marine resource protection;
- Maritime safety;
- Defense readiness;
- Counter migration operations;
- Maritime environment protection;
- Polar, Ice and Alaska Operations (including the International Ice Patrol);
and
- MLE.

The roles of the USCG indicate that this organization conducts a wide range of operations in the maritime domain—from benign to combat operations.

¹⁴¹ United States Coast Guard, “USCG Missions,” accessed January 15, 2022, <https://www.history.uscg.mil/home/Missions/>.

3. Strategic Status

Strategically the USCG is becoming a significant asset in projecting U.S. maritime power. The USN has traditionally led the U.S. naval power projection and in U.S. interventions in foreign waters. The USN still remains the most formidable navy since overtaking the Royal Navy following the World Wars.¹⁴² Despite the growth of the PLAN in the number of combatant platforms, the USN is expected to remain the most powerful navy in the years to come, according to analysts.¹⁴³ Although the USCG is not a navy, it can contribute a lethal punch during maritime conflicts and is ranked as the world's 12th largest "navy" in terms of its current capacity.¹⁴⁴ The most recent tri-service maritime strategy released in December 2020, titled "Advantage at Sea," outlines the importance of USN, USCG, and USMC being integrated in their defense against the rivals of the United States.¹⁴⁵ The tri-service strategy outlines how the USCG is and will be utilized as a tool for crisis management through its ability to de-escalate maritime stand-offs nonlethally during a crisis.¹⁴⁶

This de-escalation capability is an important aspect of the USCG that would be required in some of the hot zones around the globe, such as in confrontations with China. Analysts have cited the utilization of the USCG in the South China Sea and the Philippine Sea in dealing with the PAFMM and the CCG.¹⁴⁷ David Axe details how the USCG can be instrumental, with capable platforms, to neutralize the gray-zone activities that are being

¹⁴² Jerry Hendrix, "Sea Power Makes Great Powers," *Foreign Policy*, October 10, 2021, <https://foreignpolicy.com/2021/10/10/us-navy-sea-power-china-decline-military-strategy/>.

¹⁴³ Benjamin Mainardi, "Yes, China Has the World's Largest Navy. That Matters Less Than You Might Think.," *The Diplomat*, April 7, 2021, <https://thediplomat.com/2021/04/yes-china-has-the-worlds-largest-navy-that-matters-less-than-you-might-think/>.

¹⁴⁴ David Axe, "China's Maritime Militia Is a Problem—The U.S. Coast Guard Could Be the Solution," *Forbes*, December 18, 2020, <https://www.forbes.com/sites/davidaxe/2020/12/18/americas-sea-chiefs-just-made-a-compelling-argument-for-a-bigger-more-powerful-us-coast-guard/>.

¹⁴⁵ Department of the Navy, "Advantage at Sea: Prevailing with Integrated All-Domain Naval Power," December 2020, 7, <https://media.defense.gov/2020/Dec/16/2002553074/-1/-1/0/TRISERVICESTRATEGY.PDF>.

¹⁴⁶ Department of the Navy, 12.

¹⁴⁷ Axe, "China's Maritime Militia Is a Problem—The U.S. Coast Guard Could Be the Solution."

employed by the PAFMM and the CCG.¹⁴⁸ In testimony before the U.S. Congress in 2020, Amy Searight of the Center for Strategic and International Studies (CSIS) provided details of how Southeast Asian countries such as Malaysia, the Philippines, Vietnam, and Indonesia have been rapidly developing their CGs to counter the activities of PLAN, CCG, and PAFMM.¹⁴⁹ She further expressed the strategic importance of the USCG in developing and training these CGs in the face of Chinese aggression as well as non-traditional threats faced by the countries in that region.¹⁵⁰

Aside from the de-escalation role, the USCG is also at the forefront of the U.S. fight against illegal drugs. Although the maritime drug interdictions are monitored and coordinated by the Joint Interagency Task Force—South (JIATF-South), the actual operations are conducted by members of the USCG.¹⁵¹ In August 2021, the USCG made the largest drug bust in history in a joint operation at sea with the Canadian Navy, which amounted to a staggering \$1.4 billion worth of illegal narcotics.¹⁵² It is also at the forefront of disaster response, taking a pivotal part in hurricanes, such as Katrina, and also in man-made disasters such as the Deepwater Horizon oil spill.¹⁵³

The USCG also plays a key strategic role in the polar regions, employing some of its largest vessels in that area. The USCG has been engaged in icebreaking in the Arctic region since the U.S. purchased Alaska in 1867, although it was not until 1935 that the

¹⁴⁸ Axe.

¹⁴⁹ Amy E. Searight, “U.S. Coast Guard Cooperation with Southeast Asia: Maritime Challenges and Strategic Opportunities,” *The International Role of the U.S. Coast Guard* (Center for Strategic and International Studies (CSIS), March 10, 2020), 4–5, <http://www.jstor.org/stable/resrep37583>.

¹⁵⁰ Searight, 6–7.

¹⁵¹ United States Southern Command, “Coast Guard Offloads More than \$148 Million of Illegal Narcotics in Miami,” December 9, 2021, <https://www.southcom.mil/MEDIA/NEWS-ARTICLES/Article/2868400/coast-guard-offloads-more-than-148-million-of-illegal-narcotics-in-miami/>.

¹⁵² Patrick Reilly, “Coast Guard Seizes \$1.4B in Illegal Cocaine, Marijuana on Way to US,” *New York Post*, August 5, 2021, <https://nypost.com/2021/08/05/us-coast-guard-seizes-1-4b-in-illegal-cocaine-marijuana/>.

¹⁵³ So-Min Cheong, “From Frequent Hurricanes to the Deepwater Horizon Oil Spill in Coastal Louisiana: The Impact of Regulatory Change,” *Ecology and Society* 19, no. 2 (2014): 2, <http://www.jstor.org/stable/26269541>.

USCG first received legal authority to do so.¹⁵⁴ During the Second World War, the USCG icebreakers in the Arctic region played an important role in supplementing the Allied war efforts.¹⁵⁵ After the war, the USCG's icebreakers expanded into the Antarctic region.¹⁵⁶ In 2009, Ronald O'Rourke identified the vital need for USCG icebreakers for the United States to maintain leadership and influential presence in the polar regions to support national interests.¹⁵⁷ In a detailed analysis done on the Northern Sea Route by Marcus Keupp in 2015, he stated that Russia has far more superior icebreaking capability to maneuver its Northern fleet, while the U.S. capacity has remained limited.¹⁵⁸ Hence, the USCG's icebreaking capability needs to be developed further to maintain U.S. presence in the polar regions for expanded trade and research.

4. Physical Characteristics

Most of the USCG aircraft and surface platforms are painted white, with a wider orange stripe followed by a thin white and blue stripe, painted at the bow.¹⁵⁹ The stripes, a distinctive symbol known as "racing stripes," were first introduced by the USCG on April 6, 1967.¹⁶⁰ Eventually, CGs across the globe started to adopt the racing stripes, which remain a distinctive symbol of CGs although the stripes and colors of the many CGs worldwide vary. The mid-ship area of the hull has the English inscription "COAST GUARD" written in black. Not all USCG vessels or aircraft are white. Some of its vessels

¹⁵⁴ Donald L. Canney, "Icebreakers and the U.S. Coast Guard," U.S. Coast Guard Historian's Office, 1–3, accessed January 4, 2022, https://media.defense.gov/2019/Jul/25/2002162249/-1/-1/0/ICEBREAKERS_D.%20CANNEY_1999.PDF.

¹⁵⁵ Canney, 8.

¹⁵⁶ Canney, 9.

¹⁵⁷ Ronald O'Rourke, *Coast Guard Polar Icebreaker Modernization: Background, Issues, and Options for Congress*, CRS Report No. RL34391 (Washington, D.C.: Congressional Research Service, 2009), 1, <https://apps.dtic.mil/sti/pdfs/ADA513331.pdf>.

¹⁵⁸ Marcus Matthias Keupp, ed., *The Northern Sea Route: A Comprehensive Analysis*, 1st ed. 2015 (Wiesbaden: Springer Gabler, 2015), 22, <https://doi.org/10.1007/978-3-658-04081-9>.

¹⁵⁹ Diana Honings, "How the Coast Guard Earned Its Orange and Blue Stripes," gCaptain, April 20, 2017, <https://gcaptain.com/coast-guard-earned-iconic-orange-blue-stripe/>.

¹⁶⁰ Honings.

are either red or black depending on their role in the USCG. The black hulls are buoy tenders, and the red hulls are icebreakers.¹⁶¹

The surface platforms of the USCG are divided into the *Reliance* class, *Famous* class, *Haley* class, High Endurance Cutters, and the newest, largest, and most sophisticated National Security Cutters (Figure 7).¹⁶² These cutters have main guns with calibers ranging from 25 mm to 76 mm, the Phalanx close-in weapons system (CIWS), and also the Super Rapid Bloom Offboard Countermeasures (SRBOC) chaff and decoy launching system.¹⁶³ Furthermore, the National Security Cutters are fitted with unmanned aircraft systems (UAS) as well as detection and defense capabilities against chemical, biological, and radiological (CBR) attacks.¹⁶⁴

¹⁶¹ Edward Lundquist, “White, Black or Red, Coast Guard Needs New Hulls,” *Professional Mariner*, March 1, 2021, <https://professionalmariner.com/white-black-or-red-coast-guard-needs-new-hulls/>.

¹⁶² United States Coast Guard, “United States Coast Guard Assets,” accessed January 16, 2022, <https://www.uscg.mil/Assets/Category/16546/>.

¹⁶³ United States Coast Guard, “High Endurance Cutter - Coast Guard Assets,” April 17, 2019, <https://www.uscg.mil/Assets/Article/1816440/high-endurance-cutter/>.

¹⁶⁴ United States Coast Guard, “National Security Cutter - Coast Guard Assets,” April 17, 2019, <https://www.uscg.mil/Assets/Article/1816423/national-security-cutter/>.



Figure 7. USCG National Security Cutter.¹⁶⁵

In addition to its surface platforms, the USCG also operates several fixed-wing aircraft (Figure 8). The USCG operates the C-130J for long-range missions such as SAR, drug and migrant interdiction, and for general transportation.¹⁶⁶ It also operates two long-range C-37A Gulfstream command-and-control aircraft.¹⁶⁷ For medium-range missions, the USCG utilizes the C-27J Spartan and the HC-144 Ocean Sentry.¹⁶⁸

¹⁶⁵ Source: Naval Technology, “Legend Class National Security Cutter,” March 5, 2021, <https://www.naval-technology.com/projects/legendclassnsc/>.

¹⁶⁶ United States Coast Guard, “Coast Guard Accepts 14th C-130J Aircraft,” accessed January 16, 2022, <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Newsroom/Latest-Acquisition-News/Article/2178811/coast-guard-accepts-14th-c-130j-aircraft/>.

¹⁶⁷ United States Coast Guard, “Assistant Commandant for Capability (CG-7): Office of Aviation Force CG-711,” accessed January 16, 2022, <https://www.dco.uscg.mil/Our-Organization/Assistant-Commandant-for-Capability-CG-7/Office-of-Aviation-Force-CG-711/Fixed-Wing-Sensors-Division-CG-7113/>.

¹⁶⁸ United States Coast Guard, “C-27J Medium Range Surveillance Aircraft,” December 2020, <https://www.dcms.uscg.mil/Portals/10/CG-9/Acquisition%20PDFs/Factsheets/C27J.pdf>.



Figure 8. A group of USCG aircraft.¹⁶⁹

The USCG also operates two main types of rotary aircraft. This includes the medium-range MH-60 Jayhawk and the short-range MH-65 Dolphin helicopters.¹⁷⁰ The USCG also operates UASs, which are launched from its cutters.¹⁷¹ Among the aircraft, the helicopters are equipped with a 7.62 mm machine gun and a 0.5 caliber rifle.¹⁷²

Being an armed force of the United States, the USCG follows strict military customs and traditions that align with the naval customs and traditions. The USCG uses a short sleeve light blue shirt and a dark blue bottom called the tropical blue uniform.¹⁷³ The

¹⁶⁹ Source: Experimental Air Association, “Aircraft Announced to Celebrate USCG Aviation Centennial at Oshkosh,” EAA, June 2, 2016, <https://www.eaa.org/airventure/aaa-airventure-news-and-multimedia/aaa-airventure-news/aaa-airventure-oshkosh/06-02-2016-aircraft-announced-to-celebrate-uscg-aviation-centennial-at-oshkosh>.

¹⁷⁰ United States Coast Guard, “Aviation Programs,” accessed January 16, 2022, <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Air-Programs/>.

¹⁷¹ United States Coast Guard, “SUAS for NSC,” December 2020, <https://www.dcms.uscg.mil/Portals/10/CG-9/Acquisition%20PDFs/Factsheets/sUAS%20for%20NSC.pdf>.

¹⁷² United States Coast Guard, “MH-65 Short Range Recovery Helicopter,” September 12, 2021, <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Air-Programs/SRR-MH-65/>.

¹⁷³ “Uniform Regulations - COMDISNT M1020.6K” (United States Coast Guard, July 7, 2020), 3–16.

USCG also has a white dress uniform for official events, which is almost similar to that of the USN.¹⁷⁴ In addition to this, the USCG has a service dress blue uniform.¹⁷⁵ The operational dress uniform is dark blue in color, which is one of the most common uniforms in the USCG operational units (Figure 9).¹⁷⁶ According to USCG Commandant Instruction M1020.6J, USCG personnel assigned to specific commands and to certain roles can use the Navy Working Uniform (NWU), which is a green digital combat uniform.¹⁷⁷



Figure 9. Two of the most common uniforms worn by USCG.¹⁷⁸

5. Behavior and Application

The USCG in recent years has been demonstrating its operational capacity in drug-interdiction operations, MER operations, and disaster response operations. In its role as an MLEA, on December 20, 2021, a USCG LEDET assigned to the USN found over 1,400

¹⁷⁴ “USCG Uniform Regulations,” 3–15.

¹⁷⁵ “USCG Uniform Regulations,” 3–14.

¹⁷⁶ “USCG Uniform Regulations,” 3–19.

¹⁷⁷ “Uniform Regulations - COMDISNT M1020.6J” (United States Coast Guard, April 2020), 5–29.

¹⁷⁸ Source: United States Embassy in Guatemala, “Visit of Rear Admiral Peter Gautier of the U.S. Coast Guard,” March 12, 2019, <https://gt.usembassy.gov/visit-of-rear-admiral-peter-gautier-of-the-u-s-coast-guard/>.

AK-47 assault rifles and 226,600 rounds of ammunition on a stateless vessel in the North Arabian Sea.¹⁷⁹ The discovery occurred when LEDETs were conducting boarding operations onboard USN platforms in the Middle East.

With the recent modernization of the USCG fleet, inclusive of its new National Security Cutters, the USCG looks to be making an effort to replace its aging fleet rather than moving to compete against another agency or a foreign CG. The weapons systems onboard the newer vessels do not appear to go beyond their normal roles of operation. That said, the larger vessels equipped with the Phalanx CIWS, CBR defense, and the SRBOC chaff and decoy launching system are indications of the threat environment in which the USCG expects to operate in the future.

It is also notable that the USCG developed a Deployable Specialized Forces (DSF) program as part of Title 46 U.S.C. 70106, which was enacted after the 9/11 terror attacks.¹⁸⁰ Under this authority, the USCG formed several teams; the most kinetic among them include the Maritime Security Response Team (MSRT), Maritime Safety and Security Teams (MSST), Tactical Law Enforcement Teams (TACLET), and Port Security Units (PSU).¹⁸¹ The capabilities or the responsibilities of these units are associated more with a maritime SWAT than a maritime special operations force (SOF). This aligns with the low-threshold military operations that are designated to the USCG.

D. CONCLUSION

This chapter has covered two different CGs that belong to two continental states, The People's Republic of China and the United States. The CCG is mainly engaged in asserting the newly contested maritime claims in the SCS and the on behalf of the Chinese

¹⁷⁹ United States Navy, "U.S. Navy Seizes 1,400 Assault Rifles During Illicit Weapons Interdiction," December 22, 2021, <https://www.navy.mil/Press-Office/News-Stories/Article/2882679/us-navy-seizes-1400-assault-rifles-during-illicit-weapons-interdiction/>.

¹⁸⁰ Deployable, Specialized Forces, 70106 46 U.S.C. § (2022), <https://uscode.house.gov/view.xhtml?req=granuleid:USC-prelim-title46-section70106&num=0&edition=prelim>.

¹⁸¹ United States Coast Guard, "Deployable Specialized Forces (DSF) Safety Program," accessed January 16, 2022, <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Human-Resources-CG-1/Health-Safety-and-Work-Life-CG-11/Safety-and-Environmental-Health/Safety/DSF/>.

government. The USCG is mainly engaged in border protection operations such as counter-drug operations across the U.S. maritime jurisdiction and around the globe. Their primary roles and responsibilities are similar, although both face different maritime challenges. One of the most striking similarities is in the development of the surface platforms of the two CGs. The CCG appears to be developing high tonnage vessels with higher than usual caliber weapons for CG vessels. The USCG has also launched a development program on a similar track. It is not within the scope of this paper to determine whether there is a competition between the USCG and CCG in building larger and more powerful ships—and, most importantly, where it would lead.

The two CGs often operate as military platforms that have constabulary roles. Their culture, traditions, and methods of training are consistent with traditional navies. Some may determine that the USCG is a paramilitary force that falls under DHS.¹⁸² Similarly, the U.S. government considers the CCG to be a paramilitary force, which can also be argued.¹⁸³ In light of the analysis of their characteristics, organizational ontology, and mandated combat roles, however, this research identifies the two CGs as military organizations operating as MLEAs and MERAs.

¹⁸² Kim, “The Expansion of and Changes to the National Coast Guards in East Asia,” 315.

¹⁸³ Department of Defense, *Military and Security Developments Involving the People’s Republic of China 2020*, 70.

THIS PAGE INTENTIONALLY LEFT BLANK

V. CASE 2: CONTINENTAL PARAMILITARY COAST GUARDS

A. INTRODUCTION

This chapter examines two paramilitary CGs, the *Guardia Costiera* (ICG) of Italy and the Kenya Coast Guard Service (KCGS). These two CGs were selected as two organizations belonging to continental states and having a paramilitary nature within their organizational structure, functions, and characteristics. Since there is no clear delineation of what constitutes a paramilitary organization, these two cases generally seemed to exhibit features of what Suk Kyoon Kim identifies as paramilitary CGs in his paper.¹⁸⁴ He states that paramilitary CGs are civilian services that are subject to military culture and possess platforms armed with weaponry necessary for self-defense.¹⁸⁵ In terms of the importance of the two agencies, they represent two different regions that face different types of maritime threats.

The CGs will be analyzed through five different attributes that were applied to analyze the previous case. The analysis will be followed by a conclusion.

B. ITALIAN COAST GUARD (*GUARDIA COSTIERA*)

Italy is a coastal country, located in Southern Europe on the Mediterranean Sea. The Mediterranean Sea is further divided into the Adriatic Sea, Ionian Sea, and the Tyrrhenian Sea, surrounding the Italian peninsula along the Northeast, South, and West, respectively.¹⁸⁶ Italy has a coastline of 7,600 km (4600 mi).¹⁸⁷ The country also has declared an EEZ, which is approximately 315,943 sq km (121,986 sq mi) (Figure 10).¹⁸⁸

¹⁸⁴ Kim, “The Expansion of and Changes to the National Coast Guards in East Asia.”

¹⁸⁵ Kim, 315.

¹⁸⁶ Grace and Tom Cech, “Between Two Seas,” ArcGIS StoryMaps (blog), January 31, 2020, <https://storymaps.arcgis.com/stories/2a36015d065247aabb2f107c2eec9690>.

¹⁸⁷ Cech.

¹⁸⁸ Sea Around Us, “Catches by Taxon in the Waters of Italy (Mainland),” accessed February 4, 2022, <http://www.seaaroundus.org/data/#/eez/380?chart=catch-chart&dimension=taxon&measure=tonnage&limit=10>.



Figure 10. Italian maritime domain, with its EEZ highlighted in red.¹⁸⁹

Italian waters are in direct proximity to key strategic sea lanes. These include the Sicilian Channel, which bridges the Sicilian coast and the coast of Tunisia, in North Africa.¹⁹⁰ With this proximity to the African continent and to the essential shipping routes between Asia, Africa, and Europe, it is vital for the Italian state to establish and develop an efficient maritime security infrastructure to protect its maritime interests.

Much like some other European states, such as Greece and Spain, located in the southern periphery of Europe, Italy has been greatly affected by large numbers of migrants crossing from the African and Asian continents. It is estimated that between 2014 and 2017, an estimated 1.8 million migrants crossed into Southern Europe, with 624,747 of them arriving in Italy.¹⁹¹ In October 2013, the Italian Navy and its CG began operation *Mare*

¹⁸⁹ Source: Marine Regions, “Italy MRGID 5682,” accessed April 2, 2022, <https://www.marinerregions.org/eezdetails.php?mrgid=5682&zone=eez>.

¹⁹⁰ Cech, “Between Two Seas.”

¹⁹¹ Teresa Fiore and Ernest Ialongo, “Introduction: Italy and the Euro–Mediterranean ‘Migrant Crisis’: National Reception, Lived Experiences, E.U. Pressures,” *Journal of Modern Italian Studies* 23, no. 4 (August 8, 2018): 482, <https://doi.org/10.1080/1354571X.2018.1500787>.

Nostrum, in order to rescue migrants making the passage from the lawless Libyan coast.¹⁹² The Italian government suspended the operation in 2014 and merged it with a combined European effort.¹⁹³ With the Italian maritime agencies and their European partners experiencing only limited success in minimizing migrant deaths, a large number of NGOs joined the effort.¹⁹⁴ The NGO-led maritime rescue efforts, however, were not well received by the Italian government. Fearing an increased influx of migrants due to the NGO efforts, in June 2018, the Italian government elevated its response by “declaring Italian ports closed to foreign-flagged ships carrying irregular migrants,” and also went so far as to criminalize such NGOs.¹⁹⁵ This remains a challenge for the Italian government.

One of the agencies at the forefront of this migrant crisis and in confrontations with the NGO rescue organizations at sea is the ICG, or the *Guardia Costiera*. The ICG has been established as the focal point for Italy’s maritime matters.¹⁹⁶

1. Organizational Ontology

The origins of the ICG go back to the mid-19th century, with the formation of the Corps of the Port Captaincies, on July 20, 1865.¹⁹⁷ This agency was militarized for World War I but was later handed over to the Ministry of Merchant Marine in 1948.¹⁹⁸ It was on June 8, 1989, that the Coast Guard was established as part of the Corps of the Port Captaincies.¹⁹⁹ The decree for the establishment of the ICG states the need to enhance

¹⁹² Eugenio Cusumano and Matteo Villa, *Sea Rescue NGOs: A Pull Factor of Irregular Migration?* (Luxembourg: Publications Office of the European Union, 2019), 2, <https://data.europa.eu/doi/10.2870/644458>.

¹⁹³ Cusumano and Villa, 2.

¹⁹⁴ Cusumano and Villa, 3.

¹⁹⁵ Cusumano and Villa, 3.

¹⁹⁶ European Coast Guard Functions Training Network, “Italian Coast Guard,” accessed February 3, 2022, <https://ecgf.efca.europa.eu/institution/italian-coast-guard>.

¹⁹⁷ Guardia Costiera, “Guardia Costiera: Our History,” accessed February 4, 2022, <https://www.guardiacostiera.gov.it/en/Pages/organization-s-history.aspx>.

¹⁹⁸ Guardia Costiera.

¹⁹⁹ Guardia Costiera.

safety of marine navigation, MLE, maritime SAR, and enforcement of maritime economic activities.²⁰⁰

Although the ICG is currently managed by the Ministry of Infrastructure and Transport, it is under the direct command of the Italian Navy (*Marina Militare*).²⁰¹ Hence, it has a dual function that also extends into the Ministry of Defense.²⁰² Due to its MLE and MER roles, the ICG also works with the Ministry of Environment; Ministry of Agricultural, Food and Forestry Policies; and the Ministry of Labor and Social Policy.²⁰³ Thus, the ICG is positioned as a tier-III auxiliary branch of the Italian Navy that undertakes civil policing and administrative duties at sea, as well as combat operations if required.

2. Roles and Responsibilities

The roles and responsibilities assigned to the ICG, stated under Article I of the “Constitution of the Coast Guard,” are as follows:²⁰⁴

- Safety of navigation;
- Maritime SAR;
- MLE; and
- Marine pollution response.

²⁰⁰ Republic of Italy, “Ministry of the Merchant Navy: Decree 8 June 1989 - Constitution of the ‘Coast Guard.’ (GU General Series n. 146 of 24–06-1989),” *Official Gazette*, accessed February 4, 2022, https://www.gazzettaufficiale.it/atto/serie_generale/caricaDettaglioAtto/originario?atto.dataPubblicazioneGazzetta=1989-06-24&atto.codiceRedazionale=089A2774.

²⁰¹ Marina Militare, “Coast Guard - Port Authorities,” accessed February 4, 2022, <https://www.marina.difesa.it/EN/thefleet/coastguard/Pagine/default.aspx>.

²⁰² European Coast Guard Functions Training Network, “Italian Coast Guard.”

²⁰³ Marina Militare, “Coast Guard - Port Authorities.”

²⁰⁴ Republic of Italy, “Ministry of the Merchant Navy: Decree 8 June 1989 - Constitution of the ‘Coast Guard.’ (GU General Series n. 146 of 24–06-1989).”

In addition to these, the ICG's official website identifies fishery enforcement, administration of merchant navy, certification of lifeguards, and protection of underwater archaeological sites as part of their mission.²⁰⁵

3. Strategic Status

The multi-functional role of the ICG and its ongoing migrant interdiction operations have elevated the strategic importance of the organization. Unlike the ICG, the Italian Navy is primarily assigned to conduct traditional naval roles.²⁰⁶ Despite this principal mandate, there are indications that in the future the Italian Navy could expand beyond this traditional military role by adding a law enforcement role due to the increasing number of migrant crossings.²⁰⁷ Currently, the ICG fulfills these MER and MLE roles. This prospective transformation of the Italian Navy may well be the result of the ICG being overburdened with too many responsibilities within the Italian maritime jurisdiction.

Since 2013, the Italian Navy, not the ICG, has had the lead in rescue operations related to the migrant crisis, despite the ICG being the lead agency for coordinating maritime SAR in Italy.²⁰⁸ This may be because the ICG remains under the direct operational command of the Italian Navy, despite the former's MER and constabulary application. This could also pose a challenge for the ICG. One such example is the ICG's tasking to assist in the development of the Libyan Coast Guard (LCG). In 2017, operation *Mare Sicuro* was launched by Italy to help develop the LCG—not as a CG mission, but as a naval mission.²⁰⁹ The reason, once again, may have been that the Italian Navy was the

²⁰⁵ Guardia Costiera, "Guardia Costiera: Our Missions," accessed February 4, 2022, <https://www.guardiacostiera.gov.it/en/activities>.

²⁰⁶ Alessandra Giada Dibenedetto, "Ensuring Security in the Mediterranean Sea: The Italian Navy and Coast Guard," in *Grey and White Hulls*, ed. Ian Bowers and Swee Lean Collin Koh (Singapore: Springer Singapore, 2019), 160, https://doi.org/10.1007/978-981-13-9242-9_9.

²⁰⁷ Dibenedetto, 161.

²⁰⁸ Coast Guard, "Search and Rescue," accessed February 4, 2022, <https://www.guardiacostiera.gov.it/en/Pages/search-and-rescue.aspx>.

²⁰⁹ Annick Pijnenburg, "From Italian Pushbacks to Libyan Pullbacks: Is Hirsi 2.0 in the Making in Strasbourg?," *European Journal of Migration and Law* 20, no. 4 (November 29, 2018): 403, <https://doi.org/10.1163/15718166-12340036>.

parent agency of the ICG. Hence, any CG operations would also fall under the ambit of the Italian Navy.

The ICG also plays a vital part in the European Border and Coast Guard Agency (Frontex), which is the unified border control agency for EU states.²¹⁰ The member state CGs and other border protection agencies of the EU contribute to this mechanism. The EU's maritime security cooperation mechanisms are further enhanced through the combined efforts of two other agencies, in which ICG is a partner. This includes the European Fisheries Control Agency (EFCA) and the European Maritime Safety Agency (EMSA).²¹¹ The Tripartite Working Arrangement of these three EU agencies includes cooperation on information fusion and sharing, providing surveillance and communication services, capacity building, enhancing cooperation among CGs, and sharing of capacity.²¹² This is a vital strategic mandate of the ICG, which is beyond that of other local authorities.

The ICG's leadership role in matters of such strategic importance remains minimal, due to the overlapping functions and the growing civil operations of the Italian Navy. Since the Italian Navy has command authority over the ICG, it is the lead MLEA in ongoing MLE operations, despite the fact these are conducted by the ICG. This does not imply that the ICG should be left to counter these non-traditional threats and conduct civil MER and maritime policing roles alone or to undermine the navy's mandate to conduct military operations other than war. However, the defining international norms of the navy as a military organization would not include the navy leading missions of a civil nature, especially in the presence of a CG in Italy. In fact, the ICG is mandated for such missions by law. The command-and-control structure of the ICG under the navy may be hampering

²¹⁰ Frontex, "Frontex: Who We Are," accessed February 4, 2022, <https://frontex.europa.eu/about-frontex/who-we-are/structure/>.

²¹¹ Frontex, "European Cooperation on Coast Guard Functions," accessed February 4, 2022, <https://frontex.europa.eu/we-support/european-cooperation-on-coast-guard-functions/>.

²¹² Frontex, "Tripartite Working Arrangement Between the European Border and Coast Guard Agency (Frontex) and the European Fisheries Control Agency (EFCA) and the European Maritime Safety Agency (EMSA)," March 18, 2021, 2–3, https://frontex.europa.eu/assets/Key_Documents/Working_Arrangements/WA_between_Frontex_EFCA_EMSA.pdf.

these roles. In such circumstances of civil operations, the Italian Navy should play a supporting rather than a supported role, which is not the current case.²¹³

4. Physical Characteristics

The ICG platforms are painted white, including the hull and its superstructure. Article 1 of the Ministry of Transport's December 27, 2006 decree describes the racing stripe and the decal bearing an anchor as the logo of the ICG.²¹⁴ This decree describes three stripes inclined to 60 degrees, a wider red stripe followed by two thin stripes of green and white (Figure 11). The white round decal bearing the image of an anchor is in the center of the red stripe. On most of these platforms, the center of the hull has the Italian inscription "GUARDIA COSTIERA," printed in red.²¹⁵ The classes of vessels with these characteristics include the *DATTILO* class, *GEOGORETTI* class, *FIORILLO* class, *DE GRAZIO* class, and smaller classes of 700, 2000, 200, 800, and 600 boats.²¹⁶ The ICG aircraft are also white in color and display the same red, white, and green stripes.²¹⁷

²¹³ Bowers and Koh, *Grey and White Hulls*, 169.

²¹⁴ Ministry of Transport, "Decree 27 December 2006," December 27, 2006, <https://www.guardiacostiera.gov.it/stampa/Documents/decreto27122006.pdf>.

²¹⁵ Coast Guard, "DATTILO Class," accessed February 4, 2022, <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/Classe-DATTILO---940.aspx>.

²¹⁶ Coast Guard.

²¹⁷ Coast Guard, "Aircraft," accessed February 4, 2022, <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-aerei.aspx?CategoriaArchivio=Aerei&CategoriaArchivioID=19>.



Figure 11. ICG Ship Ubaldo Diciotti at berth.²¹⁸

The surface platforms of the ICG range from 94 meter (308 feet) *DATTILO* class vessels to 20 meter (66 feet) Class 329 patrol boats.²¹⁹ Even the largest vessels have very light armament, which includes four light-mounted machine guns.²²⁰ There are two *DATTILO* class Offshore Patrol Vessels (OPV) currently in the ICG, which have a range of 4,000 miles and a fuel economy range of 6,500 miles.²²¹ The ICG has also recently contracted to build a new 84-meter (276 feet) multi-role OPV.²²² The armaments for the vessel are not yet clear. This vessel will have the capability to cover a range of 4,800 miles, at an endurance of 20-days.²²³

²¹⁸ Source: Marine Traffic, “Ship UBALDO DICIOTTI (Patrol Vessel),” accessed April 1, 2022, <https://www.marinetraffic.com/en/ais/details/ships/shipid:281868/mmsi:247330700/imo:9690420/vessel:UBALDO DICIOTTI>.

²¹⁹ Coast Guard, “Maritime Vessels,” accessed February 4, 2022, [https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-navali.aspx?CategoriaArchivio=Componente%20ricerca%20e%20soccorso%20in%20mare%20\(SAR\)&CategoriaArchivioID=12](https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-navali.aspx?CategoriaArchivio=Componente%20ricerca%20e%20soccorso%20in%20mare%20(SAR)&CategoriaArchivioID=12).

²²⁰ Coast Guard, “Data Sheet DATTILO - CP 940 Ship,” accessed February 4, 2022, <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/Scheda-dati-Nave-DATTILO---CP-940.aspx>.

²²¹ Coast Guard, “DATTILO Class.”

²²² Xavier Vavasaur, “Fincantieri to Design and Build New Multirole OPV for Italian Coast Guard,” Naval News, November 15, 2021, <https://www.navalnews.com/naval-news/2021/11/fincantieri-to-design-and-build-new-multirole-opv-for-italian-coast-guard/>.

²²³ Vavasaur.

The ICG also operates a number of fixed-wing and rotary aircraft. This includes the medium-range Piaggio 180-Forward II maritime patrol aircraft and the medium-long range ATR42 fixed-wing aircraft (Figure 12).²²⁴ The ICG also fields the Agusta Westland AW139 medium-type helicopter.²²⁵ These fixed-wing and rotary aircraft are designed to launch search and rescue operations and to conduct surveillance at sea; hence, none of these aircraft are equipped with any armaments.²²⁶



Figure 12. ICG ATR 42 MPA.²²⁷

The officers of the ICG are trained in the Italian Naval Academy, and the sailors are trained in naval Petty Officer Schools.²²⁸ This indicates that ICG personnel follow naval customs and traditions within the realm of military discipline. If a crew of a vessel is

²²⁴ Coast Guard, “Aircraft.”

²²⁵ Coast Guard, “Agusta Westland 139,” accessed February 4, 2022, <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/aeromobile-piaggio-p166.aspx>.

²²⁶ Coast Guard, “Aircraft.”

²²⁷ Source: Coast Guard, “ATR42 MP,” accessed April 1, 2022, <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/atr42-mp.aspx>.

²²⁸ Guardia Costiera, “Guardia Costiera: Our People,” accessed February 4, 2022, <https://www.guardiacostiera.gov.it/en/Pages/staff.aspx>.

under armed forces discipline, the vessel under a military entity will qualify as a warship under Article 29 of the UNCLOS.²²⁹ Hence, ICG vessels may be considered warships under the Convention. The sailors and officers of the ICG also use the white short-sleeved summer dress uniform like the Italian Navy.²³⁰ The field working uniform is a dark blue rig with long sleeves (Figure 13).²³¹ The latter could be the only uniform that would distinguish a member of the ICG from a member of the Italian Navy.



Figure 13. ICG sailors in the field working uniform.²³²

The physical characteristics of the ICG's Order of Battle indicate that the vessels are lightly armed, sufficient for self-defense only, and even the largest of the vessels is constructed with MER and MLE roles in mind. Additionally, the ICG personnel are trained

²²⁹ United Nations Convention on the Law of the Seas, Article 29.

²³⁰ Valenciaport, "Valenciaport Receives the Visit of a Representation of the Italian Coast Guard," September 23, 2021, <https://www.valenciaport.com/en/valenciaport-receives-the-visit-of-a-representation-of-the-italian-coast-guard/>.

²³¹ Informazioni Marittime, "Coast Guard, Online Double Issue of the Newsletter," accessed February 4, 2022, <https://www.informazionimarittime.com/post/guardia-costiera-online-numero-doppio-del-notiziario>.

²³² Source: Informazioni Marittime, "Guardia Costiera, Online Numero Doppio Del Notiziario," [Coast Guard, Online Double Issue of the Newsletter] accessed April 1, 2022, <https://www.informazionimarittime.com/post/guardia-costiera-online-numero-doppio-del-notiziario>.

and disciplined within the norms of a traditional navy, because the ICG is also considered a reserve force of the Italian Navy.

5. Behavior and Application

The ICG is an entity within an entity, the functional arm of the “Corps of the Port Captaincies” under the command and control of the Italian Navy.²³³ Most of the roles and functions of the ICG identify it as a MERA and an MLEA.²³⁴ Similarly, the roles of the CGs of the EU states are also guided by the principles of the EU Frontex.²³⁵ The SAR units of the ICG collaborate closely with the national maritime rescue coordination center (MRCC), enhancing an efficient national SAR system, but the ICG appears to be overwhelmed by the migrant issue and its related SAR response in the Mediterranean Sea.²³⁶

The migrant crisis in Italy is among the biggest challenges the country has faced in recent times. The ICG, with its core mandate of border control and maritime SAR, has been conducting enforcement along with rescue operations. According to the ICG, it rescued 61,876 persons in distress in the Mediterranean Sea between 2016 and 2018.²³⁷ The ICG has also been active with the tasks of Frontex. Similar to SAR operations, the ICG has been conducting marine environment protection missions. This includes enforcing activities in 27 marine protected areas and two underwater marine parks and archaeological sites.²³⁸ The ICG has also been conducting law enforcement patrols in the Mediterranean Sea, and

²³³ Marina Militare, “Coast Guard - Port Authorities.”

²³⁴ Guardia Costiera, “Guardia Costiera: Our Missions.”

²³⁵ Frontex, “European Cooperation on Coast Guard Functions.”

²³⁶ Elan Head, “Saving Lives in the Mediterranean,” *Vertical Mag*, June 6, 2017, <https://verticalmag.com/features/saving-lives-mediterranean/>.

²³⁷ Coast Guard, “Search and Rescue.”

²³⁸ Coast Guard, “Protection of The Marine and Coastal Environment,” accessed February 4, 2022, <https://www.guardiacostiera.gov.it/en/Pages/protection-of-the-marine-and-coastal-environment.aspx>.

has recently seen a rise in Tunisian fishing vessels off Lampedusa, Italy.²³⁹ In December 2021, the ICG seized over 170 tons of illegal fish products worth 600,000 Euros.²⁴⁰

The ICG's behavior and application are similar to marine police or a civil law enforcement agency mandated with constabulary roles in the spectrum of civil assistance. These are the same operations that are identified by the organizations' legal decree.

C. KENYA COAST GUARD SERVICE

Kenya, the largest East African nation, is located between Uganda, South Sudan, Ethiopia, Somalia, and Tanzania. Its coastline opens into the Western Indian Ocean. The country's Indian Ocean coastline extends along 536 km (333.1 mi).²⁴¹ It also has three major lakes that are substantial enough to support economic activities. The lakes shared with adjoining countries include Lake Victoria (62,940 sq km / 24,301.27 sq mi), which Kenya shares with Uganda and Tanzania, and Lake Turkana (6,400 sq km / 2,471 sq mi), a salt-water lake it shares with Ethiopia.²⁴² The third lake is much smaller in scale, which is Lake Naivasha—a freshwater lake that has a surface area of about 150 sq km (57.9 sq mi).²⁴³ The country has declared an EEZ of 142,000 sq km (54,826.5 sq mi) (Figure 14).²⁴⁴ Both its freshwater and oceanic domains are of vital interest for Kenya and its economic progress.

²³⁹ Malta Movements - Transportation, "Law Enforcement – Guardia Di Finanza Fire 400 Shots after Tunisian Fishing Trawler Ram the Patrol Craft – 29.09.2020," October 6, 2020, <https://maltashipnews.com/2020/10/06/law-enforcement-guardia-di-finanza-fire-400-shots-after-tunisian-fishing-trawler-ram-the-patrol-craft-29-09-2020/>.

²⁴⁰ ANSAMed, "Italy: Coast Guard Seizes 170 Tons of Fish Ahead of Christmas," December 21, 2021, http://www.ansamed.info/ansamed/en/news/nations/italy/2021/12/21/italycoast-guard-seizes-170-tons-of-fish-ahead-of-christmas_1dee79bb-5b97-4969-a26e-30fe10368ea3.html.

²⁴¹ International Hydrography Organization, *Kenya: Capacity Building Assessment*, (Monaco:IHO, 2010), <https://iho.int/uploads/user/Capacity%20Building/Reports%20Assessments/2010/5-Report%20KenyaCM.pdf>.

²⁴² Central Intelligence Agency, "Kenya," in *The World Factbook* (Central Intelligence Agency, January 25, 2022), <https://www.cia.gov/the-world-factbook/countries/kenya/#geography>.

²⁴³ United States Geological Survey, "Lake Naivasha, Kenya," accessed February 5, 2022, <https://eros.usgs.gov/image-gallery/earthshot/lake-naivasha-kenya>.

²⁴⁴ Kenya Marine and Fisheries Research Institute, "About Us - Kenya Marine and Fisheries Research Institute," accessed February 5, 2022, <https://www.kmfri.co.ke/index.php/contact-us/images/6-ps-visit-to-kisumu-centre/detail/19-dsc05745?tmpl=component>.

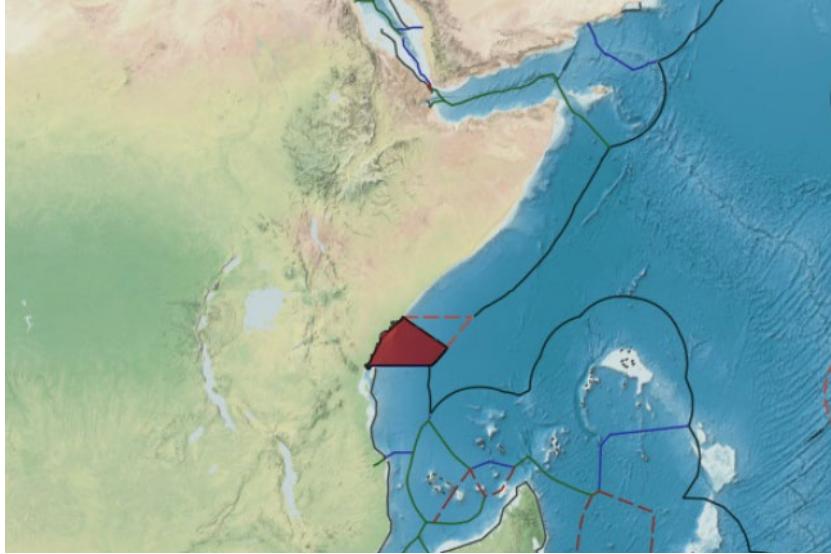


Figure 14. Kenya's maritime domain, with its EEZ highlighted in red.²⁴⁵

In 2017, the Kenyan government launched the Presidential Blue Economy Task Force in order to boost its economy by utilizing its maritime resources.²⁴⁶ The objectives of this task force include enhancing stakeholder participation and prioritizing the sustainable use of ocean resources.²⁴⁷ Kenya's maritime economy suffered heavily during the years of the Horn of Africa piracy. It is estimated that from 2008 to 2012, the Kenyan shipping industry lost \$300–\$400 million annually, and its \$15 million *per annum* cruise liner industry revenues dropped to almost zero.²⁴⁸ Despite those challenges, Kenya has put mitigation measures in place and sought the assistance of its international partners in bolstering its maritime security and maritime economy. The President of Kenya has announced that Kenya has prioritized the “sustainable utilization of its ocean and blue

²⁴⁵ Source: Marine Regions, “Kenya MRGID 8349,” accessed April 2, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8349&zone=eez>.

²⁴⁶ United Nations, “Kenya: Promoting the Blue Economy at Home and Abroad - Nairobi Convention,” UNEP, accessed February 5, 2022, <https://www.unep.org/nairobiconvention/kenya-promoting-blue-economy-home-and-abroad>.

²⁴⁷ United Nations.

²⁴⁸ Alex Benkenstein, “Prospects for the Kenyan Blue Economy,” *Policy Insights* 62 (South African Institute of International Affairs, 2018), 3, <https://saiia.org.za/research/prospects-for-the-kenyan-blue-economy/>.

economy resources as an enabler for the Vision 2020 economic blueprint.”²⁴⁹ One other important outcome of the President’s Blue Economy Task Force was the establishment of a KCGS, which was launched by President Kenyatta on November 19, 2018.²⁵⁰

During the launching ceremony of the KCGS, the President Kenyatta stated that the “Coast Guard will ensure that our oceans will no longer be used by drug traffickers, human traffickers, illegal arms traffickers, and illegal fishing. It will also guard against the exploitation of natural resources by foreign countries, and ensure that never again will foreign vessels steal our fish.”²⁵¹ During his speech, the president also declared that due to illegal activities in Kenya’s territorial waters, it loses an estimated \$100 million.²⁵² These statements outline the urgent need that drove the establishment of a CG in Kenya and the strategic importance of such an organization in securing Kenya’s economic ambitions for the future.

1. Organizational Ontology

The KCGS was formed under “The Kenya Coast Guard Service Act, 2018,” specifically, Article 5 of the document.²⁵³ The law states that the KCGS must be a uniformed service, comprised of uniformed members deputed from national security organs (Kenyan Defense Forces, Kenyan National Police, Kenya Wildlife Service, and the Kenyan intelligence services), and combined with civil members from other relevant agencies of the Kenyan public service.²⁵⁴ The jurisdiction of the KCGS is stated in Article

²⁴⁹ Office of the President of Kenya, “Blue Economy Key to the Attainment of Kenya’s Vision 2030, President Kenyatta Says,” December 3, 2020, <https://www.president.go.ke/2020/12/03/blue-economy-key-to-the-attainment-of-kenyas-vision-2030-president-kenyatta-says/>.

²⁵⁰ Kenya Coast Guard Service, “President Launches Kenya Coast Guard Service,” 2019, <https://kcg.go.ke/president-launches-kenya-coast-guard-service/>.

²⁵¹ “President Uhuru’s Speech as He Commissions the Kenya Coast Guard Service,” November 19, 2018, NTV Kenya, video, 19:54, <https://www.youtube.com/watch?v=FhuEmzsyCfs>.

²⁵² COMRED, “The Role of Coastal Kenya Communities in Maritime Security,” Coastal and Marine Resources Development. May 31, 2021, <https://comred.or.ke/the-role-of-coastal-kenya-communities-in-maritime-security/>.

²⁵³ The Kenya Coast Guard Service Act, 2018, No. 11 of 2018 § (2018), Article 5, <http://kenyalaw.org/kl/fileadmin/pdfdownloads/Acts/KenyaCoastGuardServiceActNo11of2018.pdf>.

²⁵⁴ The Kenya Coast Guard Service Act, 2018, Article 6.

8 of the law, which limits its operations to within the territorial waters of the country.²⁵⁵ Under Article 9, however, the National Security Council can attach the KCGS's uniformed component to the Kenyan Defense Forces in times of war.²⁵⁶

Under the KCGS law, the KCGS is subordinate to the Council of the Kenya Coast Guard Service, which includes the senior-most representation from the ministries of Interior, Finance, Defense, Transport, Fisheries, Environment, the Attorney General, the Kenya Defense Forces, National Police Service, the National Intelligence Service, and the KCGS.²⁵⁷ There is also a subordinate advisory body, the Technical Committee of the Kenya Coast Guard Service, which has the additional representation of the Solicitor General, Maritime Authority, and Ports Authority.²⁵⁸ This system symbolizes the importance of harmonizing the duties of KCGS that were previously performed by the stakeholders within the council. Furthermore, this also establishes a collaborative national-level oversight mechanism from the stakeholders during the first few years of the KCGS operations.

The organizational hierarchy and the composition of its personnel indicate that the KCGS falls within the military and civil structure, leaning more towards a police structure. Yet, it is a combination of personnel from different organizational backgrounds. The KCGS has a mixture of armed forces personnel, law enforcement personnel, and civil employees within its ranks. In the future, possibly after the organization establishes itself, it may evolve towards a more civil or even a military structure.

2. Roles and Responsibilities

There are 12 functions allocated to the KCGS under Article 8 of the “The Kenya Coast Guard Service Act, 2018.”²⁵⁹ They are as follows:

²⁵⁵ The Kenya Coast Guard Service Act, 2018, Article 8.

²⁵⁶ The Kenya Coast Guard Service Act, 2018, Article 9.

²⁵⁷ The Kenya Coast Guard Service Act, 2018, Article 10.

²⁵⁸ The Kenya Coast Guard Service Act, 2018, Article 13–14.

²⁵⁹ The Kenya Coast Guard Service Act, 2018, Article 8.

- Enforce maritime security and safety;
- Enforce marine pollution control;
- Prevent drug trafficking;
- Prevent trafficking of contraband;
- Prevent arms trafficking;
- Enforce sanitation measures;
- Protect port and coastal security;
- Perform maritime SAR;
- Protect fisheries and other resources;
- Protect marine archaeological or historical sites and objects;
- Support Kenyan Defense Forces during war (when sanctioned by National Security Council); and
- Perform other functions conferred to KCGS by the current law or another written law.

As mentioned before, the article states the jurisdiction of the KCGS as the territorial waters of the country, which is where police jurisdiction lies in most countries. This could extend into other areas under a hot pursuit, which is also under the purview of the powers allocated to the KCGS by law.²⁶⁰ This would mean that KCGS may be required to venture beyond the 12-NM territorial waters or call for support from the Kenya Navy in the event of hot pursuit.

²⁶⁰ The Kenya Coast Guard Service Act, 2018, Article 9 (2f).

3. Strategic Status

In 2017, a critical World Wildlife Fund report focused on the revival of the western Indian Ocean economy recommended that the littoral states adopt “a sustainable, inclusive blue economy approach” as one of the key strategies to develop the states.²⁶¹ Kenya has made several efforts to develop its blue economy since 2016 as part of the “Kenya Vision 2030,” the country’s roadmap for its development, extending from 2008 to 2030.²⁶² The Blue Economy Implementation Committee, established in 2017 and chaired by the Chief of Defense Forces, demonstrated the country’s active priority for developing the country’s blue economy.²⁶³ The head of the military’s appointment indicated the importance of security institutions in fostering the blue economy. Developing a CG organization was one of the priorities of the committee.²⁶⁴

The strategic importance of developing a CG in Kenya was to foster the growth of its blue economy. As the Kenyan Navy is focused on traditional and non-traditional threats within and outside the territorial waters of the country, the CG would focus on securing the economic growth within state waters.²⁶⁵ After adopting the roles of enforcement and security-related mandates from other civil and constabulary agencies in Kenya’s maritime sector, the KCGS has become the leading domestic maritime enforcement authority in the country. Due to this important role for the KCGS, it has also become the recipient of assistance from a number of Kenya’s international partners.

The Djibouti Code of Conduct (DCoC) is a multinational mechanism established in 2009 between states from the western Indian Ocean region to suppress the growing threat

²⁶¹ David O. Obura, “Reviving the Western Indian Ocean Economy: Actions for a Sustainable Future” (Gland, Switzerland: World Wildlife Fund, 2017), 53.

²⁶² Japan International Cooperation Agency, *Data Collection Survey on Blue Economy in the Republic of Kenya: Final Report* (Tokyo, Japan: Japan International Cooperation Agency, 2018), 23 (4-1), <https://openjicareport.jica.go.jp/pdf/12320339.pdf>.

²⁶³ Laban Wanambisi, “Military Boss to Chair Blue Economy Implementation Committee,” Capital News, January 14, 2017, <https://www.capitalfm.co.ke/news/2017/01/military-boss-chair-blue-economy-implementation-committee/>.

²⁶⁴ FISH-i, “Kenya Hosts Sustainable Blue Economy Conference,” December 19, 2018, <https://fish-i-network.org/kenya-hosts-sustainable-blue-economy-conference/>.

²⁶⁵ Goldberg, “Kenya Navy; Inception, Roles and Achievements,” Strategic Intelligence Service, April 10, 2015, <https://intelligencebriefs.com/kenya-navy-inception-roles-and-achievements/>.

of piracy.²⁶⁶ This mechanism initially focused on capacity building, legislative revision, and information sharing.²⁶⁷ The mandate of the DCoC has since been extended beyond piracy, under the Jeddah Amendment of 2017, with other maritime crimes being incorporated within its ambit.²⁶⁸ The mechanism has been instrumental for developing the KCGS, and the KCGS has been a key contributor to the DCoC.²⁶⁹ In addition to this mechanism, the UNODC's Global Maritime Crime Programme has also been an valuable development tool for KCGS.²⁷⁰ This UN program was established to enhance inter-agency and regional cooperation and to promote maritime governance, mainly through law enforcement agencies.²⁷¹ The KCGS has been developing its Visit, Board, Search, and Seizure (VBSS) capabilities through this program.²⁷²

On March 25, 2021, Kenya partnered with some EU member states to protect and foster the blue economy of the country.²⁷³ Under this new concept of “Go Blue,” Kenya's EU partners have extended aid to strengthen the performance of the new KCGS.²⁷⁴ Another EU-sponsored program the KCGS actively engages in is INTERPOL's Maritime Security program, MASE.²⁷⁵ MASE is an INTERPOL initiative to help member states fight and prosecute maritime crimes such as Illegal, Unregulated, and Unreported fishing

²⁶⁶ International Maritime Organization, “Djibouti Code of Conduct” (Maritime Safety Division, 2015), 2, <https://www.marsecoc.org/wp-content/uploads/2021/08/IMO-Newsletter-about-Djibuti-CoC.pdf>.

²⁶⁷ International Maritime Organization, 4–6.

²⁶⁸ Djibouti Code of Conduct, “Jeddah Amendment – DCoC,” accessed February 6, 2022, <https://dcoc.org/about-us/jeddah-amendment/>.

²⁶⁹ Shailaja A. Lakshmi, “Coast Guard Training in Kenya,” MarineLink, June 26, 2019, <https://www.marinelink.com/news/coast-guard-training-kenya-467778>.

²⁷⁰ United Nations: Office on Drugs and Crime, “Indian Ocean West: Global Maritime Crime Programme,” accessed February 6, 2022, [/www.unodc.org/unodc/en/piracy/Indian-Ocean.html](https://www.unodc.org/unodc/en/piracy/Indian-Ocean.html).

²⁷¹ “Annual Report 2019: Global Maritime Crime Programme,” Annual Report (UNODC, 2020), 6.

²⁷² Jolien Abrams, “UNODC Resuming In-Person Maritime Law Enforcement Capacity Building with Kenya Coast Guard,” UNODC, September 18, 2020, <https://www.unodc.org/easternafrika/en/Stories/unodc-resuming-capacity-building-in-mombasa.html>.

²⁷³ United Nations Environment Programme, “New Programme to Support Kenya's Coast and Blue Economy,” March 30, 2021, <http://www.unep.org/news-and-stories/story/new-programme-support-kenyas-coast-and-blue-economy>.

²⁷⁴ Go Blue, “Go Blue Security,” 2021, <http://www.goblue.co.ke/programme-components/security>.

²⁷⁵ INTERPOL, “The Maritime Security Programme,” accessed February 6, 2022, <https://www.interpol.int/en/Crimes/Maritime-crime/The-Maritime-Security-Programme>.

(IUUF), human trafficking, drug trafficking, and trafficking of other contraband.²⁷⁶ There are a variety of other programs to bring the KCGS up to speed with its economic development goals.

The KCGS's strategic role in the maritime domain appears to be quite limited due to its nascency in Kenya's maritime security system. Despite this, the organization is keeping a constant upward trajectory in its development. It is not only deployed in the Indian Ocean but also to the major lakes within Kenya that are bordered by other countries.²⁷⁷ This gradual expansion of the organization's areas of operation is a testament to the potential elevation of its strategic status in the future. The government has also expedited acquiring more vessels for the KCGS to enable the service to increase its independent operability beyond the Kenya Navy.²⁷⁸ Once this initial phase of its inception is complete, the KCGS would become the most important strategic asset of the Kenyan state by delivering the objective of a secure environment to nurture Kenya's blue economy.

4. Physical Characteristics

The vessels of the KCGS are painted gray, similar to most naval vessels.²⁷⁹ What distinguishes its vessels from naval vessels is the presence of the racing stripe on either side of the hull of the vessel's forward area. The racing stripe includes a wider black stripe, followed by much narrower white, red, and white stripes and a green stripe of equal width.²⁸⁰ The tricolors represent the colors of the Kenyan national flag. The vessels also have the inscription, "KENYA COAST GUARD," painted on them.²⁸¹ The larger vessels

²⁷⁶ INTERPOL.

²⁷⁷ Gaitano Pessa and Ian Byron, "Kenya: Coast Guard Service Deployed on Lake Victoria," *The Nation*, December 18, 2019, sec. News, <https://allafrica.com/stories/201912180845.html>.

²⁷⁸ Africa Intelligence, "Nairobi Urgently Seeks New Ships for Navy and Coast Guard," July 12, 2021, https://www.africaintelligence.com/eastern-and-southern-africa_business/2021/07/12/nairobi-urgently-seeks-new-ships-for-navy-and-coast-guard,109678999-art.

²⁷⁹ Bonface Otieno, "Kenya, Canada to Undertake Fish Projects in Coast," *Business Daily*, December 19, 2020, <https://www.businessdailyafrica.com/bd/corporate/shipping-logistics/kenya-canada-to-undertake-fish-projects-in-coast-2260946>.

²⁸⁰ Otieno.

²⁸¹ OfficialKCGS, "Kenya Coast Guard Service (@OfficialKCGS)," Twitter, accessed February 6, 2022, <https://twitter.com/OfficialKCGS>.

have this painted on both sides of their superstructure, while the smaller vessels have the inscription on either side of the hull.²⁸² These distinctive racing stripes and the same color scheme are seen on larger as well as some smaller craft of the KCGS.²⁸³ Other smaller craft are white in color, both the hull and the wheelhouse, with different racing stripes of black, white, and red, followed by another white and green stripe.²⁸⁴

The largest KCGS vessel, the OPV KCGS *Doria* (Figure 15), which was also commissioned during the launching ceremony to establish the KCGS, represents the design characteristics of a naval ship, except for the presence of the racing stripe.²⁸⁵ The vessel was initially introduced to Kenya's Department of Fisheries on February 17, 2018, at which time the racing stripe was not present.²⁸⁶ The armament on board the 55 meter (180 feet) OPV is a forward-mounted *Oerlikon* 20 mm machine gun.²⁸⁷ The KCGS personnel carry small arms to conduct VBSS and other maritime operations, but there is no other known weaponry installed on the ship. It also has a helicopter deck, although the KCGS does not appear to operate its own indigenous aircraft.²⁸⁸

²⁸² OfficialKCGS.

²⁸³ Gaitano Pessa, "Coast Guard Joins Fight Against Illegal Fishing in Lake Victoria," January 15, 2020, <https://newszetu.com/coast-guard-joins-fight-against-illegal-fishing-in-lake-victoria/>.

²⁸⁴ Kenya Coast Guard Service, "In Our Continuous Endeavour to Ensure the Security and Safety of Our Territorial Waters, Our Inland Squadron Patrols in L.Victoria Have Been Bolstered with the Launch of an Additional Patrol Boat to Be Deployed in Mbita, Homa Bay County," Twitter, @OfficialKCGS, August 24, 2021, <https://twitter.com/OfficialKCGS/status/1430236857179197441>.

²⁸⁵ Philip Mwakio, "Uhuru Unveils Kenya Coast Guard Service," *The Standard*, November 20, 2018, <https://www.standardmedia.co.ke/coast/article/2001303305/uhuru-unveils-kenya-coast-guard-service>.

²⁸⁶ Philip Mwakio, "Kenyans to Establish Coast Guard After Law Passed," *The Standard*, accessed February 6, 2022, <https://www.standardmedia.co.ke/coast/article/2001296454/kenyans-to-establish-coast-guard-after-law-passed>.

²⁸⁷ Pakistan Defence, "Kenyan Coast Guard Service (KCGS) Commissions Bangladesh Made Ship," December 10, 2018, <https://defence.pk/pdf/threads/kenyan-coast-guard-service-kcgs-commissions-bangladesh-made-ship.591113/>.

²⁸⁸ Pakistan Defence.



Figure 15. KCGS Offshore Patrol Vessel *Doria*.²⁸⁹

The KCGS has both officers and enlisted ranks, which are classified through army ranks for officers and senior enlisted sailors.²⁹⁰ The junior ranks use naval ratings.²⁹¹ The working uniforms of the KCGS are plain navy blue, with a black beret as headgear (Figure 16).²⁹² The KCGS demonstrates the maritime cultures of naval formations, unlike civil formations.²⁹³ Due to these characteristics, there is some ambiguity in identifying the KCGS strictly as a civil policing organization, especially when keeping in mind the inclusion of a mixture of both military and civil personnel within the organization.

²⁸⁹ Source: Patrick Beja and Philip Mwakio, “New Twist in Seizure of Fishing Vessels,” *The Standard*, May 22, 2019, <https://www.standardmedia.co.ke/business/news/article/2001326581/new-twist-in-seizure-of-fishing-vessels>.

²⁹⁰ “Kenya Coast Guard Service Act,” 234 (First Schedule).

²⁹¹ “Kenya Coast Guard Service Act,” 234 (First Schedule).

²⁹² Kenya Coast Guard Service, “Home,” accessed February 6, 2022, <https://kcgs.go.ke/>.

²⁹³ Mohamed Ahmed, “Maritime Agency Steps up Security to Curb Indian Ocean Crimes,” *Business Daily*, September 20, 2020, <https://www.businessdailyafrica.com/bd/corporate/shipping-logistics/maritime-agency-steps-up-security-to-curb-indian-ocean-crimes-2282430>.



Figure 16. KCGS personnel in their working blue uniform.²⁹⁴

5. Behavior and Application

The KCGS is moderated by a ministerial-level council within the maritime security structure of Kenya. The chair of the council is the Interior Minister of Kenya.²⁹⁵ The performance accountability, stakeholder coordination, deconfliction of overlapping mandates, and development trajectory of the KCGS is maintained and supervised closely by the council and its subordinate technical committee.²⁹⁶ The KCGS is being forged into a professional organization by several national agencies. Hence, there is little room for the organization to stray from its functions as laid down by the CG law.

The KCGS has also been active in community engagement activities, maritime SAR, apprehension of illegal fishers, marine safety advisories, and joint operations with stakeholders.²⁹⁷ Additionally, the KCGS has been deployed to Lake Victoria to fend off

²⁹⁴ Beja and Mwakio, “New Twist in Seizure of Fishing Vessels.”

²⁹⁵ Nyongesa Sande, “Kenya Coast Guard Service,” May 16, 2021, <https://www.nyongesasande.com/kenya-coast-guard-service/>.

²⁹⁶ The Kenya Coast Guard Service Act, 2018, Section 10.

²⁹⁷ OfficialKCGS, “Kenya Coast Guard Service (@OfficialKCGS).”

the illegal fishers from neighboring Uganda and also to curb marine pollution.²⁹⁸ Indicative of its focused efforts here, the KCGS established a station along the shoreline of the lake, in Mbita town, in December 2021.²⁹⁹ In addition to this lake, the KCGS has been deployed in Lake Naivasha since October 2021, to curb local illegal fishers from operating after a string of complaints from legally licensed fishers.³⁰⁰ This succession of deployments shows the KCGS's growing benefit to Kenya. Meanwhile, in the Indian Ocean, the KCGS has also been undertaking its operations as designated by law.

The KCGS's application of its roles is mostly related to MER and MLE within its territorial waters. Unlike most other CGs, its jurisdiction does not extend to the EEZ of Kenya. The KCGS is seen as a civil organization, conducting civil roles, but with the tradition and culture of a navy.

D. CONCLUSION

This chapter covered two continental paramilitary CGs, the *Guardia Costiera* of Italy and the Kenya Coast Guard Service. The two CGs face different maritime challenges due to their geographical locations. The ICG is overwhelmed with migration activities in the Mediterranean Sea, and the KCGS is actively engaged in curbing illegal activities, mainly fishing activities. The ICG has a history that spans over 150 years while the KCGS just celebrated its third anniversary in November 2021. A further distinction can be found in their respective structures. The ICG is considered a civil entity embedded within the command-and-control structure of the Italian Navy, while the KCGS is a civil entity with a military culture overseen by a high-level council composed of various stakeholders. There are also differences in the characteristics of platforms, uniforms, and the rank structure of both organizations.

²⁹⁸ Pessa, "Coast Guard Joins Fight Against Illegal Fishing in Lake Victoria."

²⁹⁹ James Omoro, "New Station to Improve Security in Lake Victoria," *The Standard*, December 24, 2021, <https://www.standardmedia.co.ke/nyanza/article/2001432643/new-station-to-improve-security-in-lake-victoria>.

³⁰⁰ Business Daily, "How Kenya Coast Guards Are Confronting Illegal Fishing on Lake Naivasha," Business Daily, October 12, 2021, <https://www.businessdailyafrica.com/bd/data-hub/kenya-guards-confronting-illegal-fishing-lake-naivasha-3581220>.

The similarities among the agencies include their civil roles. Both CGs are allocated roles under a specific law that governs each organization. The ICG functions under the command structure of the Italian Navy, while the independent KCGS can be called on to support the Kenya Navy during wartime. Neither the ICG nor the KCGS is equipped with armament that can be deemed offensive weapons. Both CGs continue to function as MERAs and MLEAs, which undertake no military function except in wartime. These attributes indicate that they may be required to distinguish their role further during a breakout of hostilities. They may be in violation of international law if they undertake their traditional roles, especially MER operations, during wartime.³⁰¹

³⁰¹ The Geneva Conventions, GCII, Ch III–V.

VI. CASE 3: CONTINENTAL CIVIL GOVERNMENT AND NON-GOVERNMENT COAST GUARDS

A. INTRODUCTION

This chapter analyzes one civil non-government CG, the Australian Volunteer Coast Guard (AVCG), and two civil government CGs, which are the Canadian Coast Guard or *Garde Cotiere* (CACG) and the Georgian Border Police Coast Guard (GCG). These CGs were selected as agencies belonging to continental nations. The AVCG was selected because it identifies as the Australian CG in the absence of a federal CG agency in Australia. The CACG represents the country with the largest coastline; hence, it was pertinent to analyze how this CG operates in its maritime domain and how it engages with other maritime agencies in the country. The GCG was chosen as a key agency that operates in a hostile maritime domain and adopts a civil policing hierarchical structure.

These organizations are also analyzed through the five variables used to study other agencies in this paper. Each case is introduced with a section on the maritime background of the nation and its geographical relevance to establishing maritime security agencies such as a CG. The analysis applies the attributes used previously to examine the CGs, which include the organizational ontology of the agency, the roles and responsibilities that are derived from the legislation related to the respective agencies, the strategic status of the agency within the security system of the state, their physical characteristics of platforms and personnel, and finally the behavior and application of the agencies. The chapter ends with a brief conclusion.

B. AUSTRALIAN VOLUNTEER COAST GUARD

Australia is the largest country in Oceania, which is administratively comprised of six states, two territories, and several off-shore islands.³⁰² The Australian mainland has a coastline of approximately 34,000 km (21,127 mi), which is one of the longest in the

³⁰² GeoNames, “Administrative Division of Australia,” accessed February 13, 2022, <https://www.geonames.org/AU/administrative-division-australia.html>.

world.³⁰³ The coastline opens into the Pacific Ocean in the east, the Indian Ocean in the west, and the Southern Ocean in the south. The country's EEZ is approximately 8.15 million sq km (3.15 million sq mi), which also includes the EEZ areas of its five off-shore island territories (Figure 17).³⁰⁴ Australia also claims 2 million sq km of EEZ off its Antarctic Territory.³⁰⁵ The area of water three nautical miles (3.5 miles) seaward of each state falls under the jurisdiction of that respective state, while the rest of the country's maritime jurisdiction is administered by the Australian federal government.³⁰⁶ This waterbody under state jurisdiction, known as the coastal waters, totals 410,977 sq km (158,679 sq mi).³⁰⁷

³⁰³ Geoscience Australia: Australian Government, "Australia's Coasts and Estuaries," May 15, 2014, <https://www.ga.gov.au/scientific-topics/marine/coasts-estuaries>.

³⁰⁴ Geoscience Australia: Australian Government, "Oceans and Seas," May 15, 2014, <http://www.ga.gov.au/scientific-topics/national-location-information/dimensions/oceans-and-seas>.

³⁰⁵ Geoscience Australia: Australian Government.

³⁰⁶ Geoscience Australia: Australian Government, "Maritime Boundary Definitions," May 15, 2014, <https://www.ga.gov.au/scientific-topics/marine/jurisdiction/maritime-boundary-definitions#heading-3>.

³⁰⁷ Geoscience Australia: Australian Government, "Area of Australia - States and Territories," May 15, 2014, <https://www.ga.gov.au/scientific-topics/national-location-information/dimensions/area-of-australia-states-and-territories#heading-3>.



Figure 17. Australian maritime domain, with its EEZ highlighted in red.³⁰⁸

To maintain a watchful eye on these water bodies, the Australian government and its subordinate states have established a robust maritime security and safety system. The Australian Maritime Safety Authority (AMSA) coordinates SAR for both maritime and aviation sectors within the Australian Search and Rescue Region, promotes and maintains maritime navigational safety, and combats marine pollution response.³⁰⁹ The Australian Border Force (ABF) conducts law enforcement related to customs and immigration within the jurisdiction of Australia, including its maritime domain.³¹⁰ The Royal Australian Navy (RAN) is part of the Australian Defense Force (ADF), which is responsible for the protection of Australia and its interests in the maritime domain.³¹¹ Meanwhile, a joint command, the Maritime Border Command (MBC) is established jointly by the ABF and ADF to protect Australia's maritime domain from "civil maritime security threats" (non-

³⁰⁸ Source: Marine Regions, "Australia MRGID 8323," accessed April 2, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8323&zone=eez>.

³⁰⁹ Australian Maritime Safety Authority, "Who We Are," accessed February 13, 2022, <https://www.amsa.gov.au/about/who-we-are>.

³¹⁰ Australian Border Force, "Who We Are," accessed February 13, 2022, <https://www.abf.gov.au/about-us/who-we-are>.

³¹¹ Sea Power Centre, *Australian Maritime Doctrine (RAN Doctrine 1)* (Jervis Bay, Australia: Sea Power Centre, 2010), 39.

traditional threats), and to work alongside other agencies of international, federal, state, and territory governments.³¹²

The aforementioned federal agencies are enhanced by state and territory agencies, such as the state and territory maritime police units to enforce their respective jurisdictions. These agencies and their international cooperation mechanisms ensure a stable and secure maritime domain for Australia. Nonetheless, because more than 80 percent of Australians reside in coastal zones and it's the country's maritime domain is so vast, the Australian government also relies on several other civil volunteer agencies that contribute to the safety of the maritime domain.³¹³ One such organization is the Australian Volunteer Coastguard Association Inc., commonly referred to as the Australian Volunteer Coast Guard.³¹⁴

1. Organizational Ontology

The AVCG was established on September 14, 1961, as the Australian Coast Guard by the Beaumaris Motor Yacht Club in Victoria, which was seeking to expand its community service to small boat safety.³¹⁵ Their concept and model came from the USCG Auxiliary (USCGAUX), which is also a voluntary organization. The USCGAUX was established initially as a reserve of the USCG, but under title 14 of U.S.C. 14, it was later transformed into an auxiliary of the USCG.³¹⁶ Similar to the USCGAUX, the AVCG was also established as a volunteer organization, whose focus is mainly on marine search and rescue and promoting boating safety within Australia's coastal waters (within the three nautical mile limit from the shoreline).³¹⁷

³¹² Australian Border Force, "Maritime Border Command," accessed February 13, 2022, <https://www.abf.gov.au/about-us/what-we-do/border-protection/maritime>.

³¹³ Bob Cechet et al., "Australia's Coastline: Adapting to Climate Change: Assessing Infrastructure Vulnerability to Rising Sea-Levels," AUSGEO News (Geoscience Australia: Australian Government, March 2011), 2, <https://www.ga.gov.au/ausgeonews/ausgeonews201103/climate.jsp>.

³¹⁴ Australian Volunteer Coast Guard, "About Us," accessed February 13, 2022, <https://coastguard.com.au/about-us/>.

³¹⁵ Australian Volunteer Coast Guard, "Our History," accessed February 13, 2022, <https://coastguard.com.au/about-us/history/>.

³¹⁶ United States Coast Guard Auxiliary, "USCGAUX: About The Auxiliary," accessed February 13, 2022, <http://cgaux.org/about.php>.

³¹⁷ Australian Volunteer Coast Guard, "About Us."

The AVCG is managed by a national board, which assigns a National Commodore to head the organization.³¹⁸ The volunteers from the states and territories that join the AVCG Association are assigned a State Commodore who commands a certain number of squadrons with Squadron Commodores, each commanding a select number of flotillas, each of which is also commanded by a Commodore.³¹⁹ The flotillas are given acronyms in accordance with their state or territory.³²⁰ For example, the flotillas that belong to Victoria state will have the acronyms VF1, VF2, ... etc. As of early 2022, there are 45 active AVCG flotillas along the Australian coast.³²¹ Each of these flotillas operates small boats transformed into AVCG platforms, and they are manned by volunteers who wear a distinct uniform.³²² Due to the civil and voluntary nature of the organization, it does not appear to be subject to any form of strict military regulations or discipline. The organization has a hierarchical system similar to most professional organizations. The designation of the commanders does carry a naval military nomenclature, but they do not fall under a military or government registry.

2. Roles and Responsibilities

The roles and responsibilities of the AVCG are reflected as services provided by the organization. They are as follows:³²³

- Maritime SAR;
- Offshore vessel tracking;
- Recreational vessel tracking;

³¹⁸ Australian Volunteer Coast Guard, “Our History.”

³¹⁹ Australian Volunteer Coast Guard.

³²⁰ Australian Volunteer Coast Guard, “Full Flotilla List,” accessed February 20, 2022, <https://coastguard.com.au/locations/full-flotilla-list/>.

³²¹ Australian Volunteer Coast Guard.

³²² Bendigo Advertiser, “Support for Our Critical Services,” February 20, 2017, <https://www.bendigoadvertiser.com.au/story/4480165/support-for-our-critical-services/>.

³²³ Australian Volunteer Coast Guard, “About Us.”

- Marine radio monitoring;
- Public education, which includes marine licensing, radio licensing, and coastal navigation;
- Membership for “Marine Assist;”
- Community events; and
- Memorial services.

These services contribute to boating safety and maritime SAR within the ambit of state and territory systems. Collectively these roles and mandates determine that the AVCG is determined to undertake maritime safety and maritime safety awareness within the coastal waters of Australia.

3. Strategic Status

The AVCG is not a state entity; hence, it cannot be compared or positioned with other state agencies that provide SAR services within the Australian SAR system. Voluntary organizations such as the AVCG are supplementary, but crucial agencies within that SAR system. The national SAR authority of Australia falls under AMSA, while the ADF has authority over military SAR, and the state and territory SAR authority falls under the State and Territory Police.³²⁴ The Joint Rescue Coordination Center (JRCC) conducts SAR responsibility on behalf of AMSA and other State and Territory Police.³²⁵ Despite the responsibilities falling on these organizations, the AVCG and other such organizations are identified as important support organizations for SAR.³²⁶

³²⁴ Australian Maritime Safety Authority, “Search and Rescue Arrangements in Australia,” accessed February 20, 2022, <https://www.amsa.gov.au/safety-navigation/search-and-rescue/search-and-rescue-arrangements-australia>.

³²⁵ Australian Maritime Safety Authority, “National Search and Rescue Manual,” 44, accessed February 20, 2022, <https://www.amsa.gov.au/national-search-and-rescue-council/national-search-and-rescue-manual>.

³²⁶ Australian Maritime Safety Authority, “Search and Rescue Arrangements in Australia.”

It is estimated that the AVCG rescues over a thousand people each year.³²⁷ This is a considerable achievement for a volunteer organization that is recognized by the local communities. AVCG also manages an insurance-like service known as “Marine Assist” for recreational boating subscribers, which provides extra care and assistance such as towing service during a breakdown.³²⁸ Additionally, it operates a mobile application called the “SAFETRX,” which is an alerting and monitoring application for boaters in trouble.³²⁹ These initiatives are beneficial mechanisms for the target communities. Although the AVCG is a national civil volunteer organization, most of its operations are localized to specific communities. It, however, does not cover the whole of the Australian coastline, and is absent from the state which covers the country’s largest coastline, Western Australia.³³⁰ This may be because there are other volunteer rescue organizations in the region, such as the Volunteer Marine Rescue.³³¹

Despite the fact that Australia has no federal CG, the AVCG operates as an auxiliary to a CG. This was the model it adopted during its inception. Although the organization’s name evolved from the Australian Coast Guard to the AVCG as we see today, this name change may have been prompted by the government’s interest in developing a federal CG. Twenty-one years ago, in 2001, the opposition Labor Party leader Kim Beazley announced that a federal Australian Coast Guard would help address most of the country’s maritime issues.³³² This was in response to the global concerns following the September 11, 2001 attacks in the United States. Eventually, in November 2002,

³²⁷ Australian Volunteer Coast Guard, “About Us.”

³²⁸ Australian Volunteer Coast Guard, “Marine Assist,” accessed February 20, 2022, <https://coastguard.com.au/marine-assist/>.

³²⁹ Australian Volunteer Coast Guard, “SafeTrx,” accessed February 20, 2022, <https://coastguard.com.au/safetrx/>.

³³⁰ Australian Volunteer Coast Guard, “Full Flotilla List.”

³³¹ Phillip Krasnoff, “Marine: Volunteer Marine Rescue (VMR),” accessed February 20, 2022, <http://www.ses.sa.gov.au/marine.jsp>.

³³² Rusri Ratnapala, Fiona Ferrari, and David Lim, “The Beazley Vision,” *The Sydney Morning Herald*, September 6, 2001, sec. National, <https://www.smh.com.au/national/the-beazley-vision-20010906-gdhuyh.html>.

Beazley submitted a proposal to the Australian Parliament to form an Australian Coastguard.³³³

This plan of the Labor Party, which also included the formation of a Department of Homeland Security, was abandoned after the Labor Prime Minister, Kevin Rudd, took office in 2008 and decided to do a review of the existing security structure.³³⁴ The review concluded that the existing Australian security structure was sufficient, but needed to strengthen existing agencies.³³⁵ This was the point at which Australia abandoned the formation of a federal Australian Coast Guard and a Homeland Security Department. In the absence of a federal CG in Australia, the federal agency that undertakes the responsibility and representation of a federal CG is the ABF.³³⁶

The decision of the Australian government not to designate an agency as a federal CG has left the AVCG as the only agency within Australia that adopts the name. Hence, it is often referred to as the Australian Coast Guard. Despite this fact, the AVCG does not carry a strategic status within Australia's maritime security system. The AVCG is a community service provider that supports state and territory agencies across Australia, but it is not the only organization providing such services. There are a number of similar organizations that conduct such voluntary service in the country.

4. Physical Characteristics

The majority of AVCG vessels are smaller in size due to the proximity of their operational domain to the land. These platforms are painted completely in bright yellow (Figure 18).³³⁷ The diagonal racing stripes in navy blue appear across the hull, between

³³³ Parliament of Australia, "ParlInfo - An Australian Coastguard.," 2002, <https://parlinfo.aph.gov.au/parlInfo/search/display/display.w3p;query=Id:%22media/pressrel/EWZ76%22>.

³³⁴ Nigel Brew, "A Quick Guide to the History of Proposals for an Australian Department of Homeland Security," text, Parliament of Australia, July 14, 2014, Australia, https://www.aph.gov.au/About_Parliament/Parliamentary_Departments/Parliamentary_Library/pubs/rp/rp1718/Quick_Guides/HomelandSecurity.

³³⁵ Brew.

³³⁶ David Brewster, "It's Time for a 'Quad' of Coast Guards," Lowy Institute, August 12, 2019, <https://www.lowyinstitute.org/the-interpreter/time-quad-coast-guards>.

³³⁷ Australian Volunteer Coast Guard, "About Us."

the bow and midline. The stripes include a wider stripe followed by a narrower stripe, with the AVCG crest placed within the wider stripe on some platforms.³³⁸ Next to the stripes are the words “COAST GUARD” printed in navy blue on both sides of the hull, with some vessels also bearing the inscription “AUSTRALIAN VOLUNTEER” in a considerably smaller size.³³⁹



Figure 18. AVCG rescue boat on a mission.³⁴⁰

Despite having followed the USCGAUX model in their functions and customs, the AVCG does not follow the same pattern as the USCGAUX vessels in their paint scheme and inscriptions. By contrast, the USCGAUX, its volunteer counterpart, follows a paint scheme like the USCG’s but with the inscription “COAST GUARD AUXILIARY” printed on either side of the hull.³⁴¹ For the USCGAUX, this may have been to distinguish its platforms from those of the USCG. Since there is no federal CG in Australia, no such

³³⁸ Australian Volunteer Coast Guard.

³³⁹ Australian Volunteer Coast Guard.

³⁴⁰ Source: Boat Watch, “SV Activates Epirb, Australia,” December 30, 2020, <https://boatwatch.org/resolved/sv-activates-epirb-australia/>.

³⁴¹ Herb Herman, “The 15th Anniversary of the U.S. Coast Guard Auxiliary in Port Jefferson,” TBR News Media, December 9, 2018, <https://tbrnewsmedia.com/the-15th-anniversary-of-the-u-s-coast-guard-auxiliary-in-port-jefferson/>.

confusion would occur, and therefore, the AVCG displaying the CG inscriptions on their vessels seems more appropriate.

The working uniform is black pants and a white shirt with black shoulder boards indicating the rank of the AVCG volunteer (Figure 19).³⁴² The field uniform of the AVCG is a navy-blue polo shirt with a bright yellow yoke.³⁴³ The shirts have the AVCG crest printed on either side of their sleeves. At the back of the shirts is the inscription “COAST GUARD” printed in white.³⁴⁴ They also have different rigs for foul weather and firefighting. Instead of the full name of the agency, these rigs have the inscription “COAST GUARD” printed on the back.³⁴⁵ The AVCG maintains a professional uniformity in executing their service, projecting a well-organized CG agency.



Figure 19. AVCG volunteers in the white working uniform.³⁴⁶

³⁴² Daily Telegraph, “Coast Guard Keeps Watch for 30 Years,” March 4, 2009, sec. Ballina, <https://www.ballinaadvocate.com.au/news/coast-guard-keeps-watch-30-years/180456/>.

³⁴³ Australian Volunteer Coast Guard, “Volunteer,” accessed February 21, 2022, <https://coastguard.com.au/volunteer/>.

³⁴⁴ Australian Volunteer Coast Guard.

³⁴⁵ Australian Volunteer Coast Guard.

³⁴⁶ Source: Bendigo Advertiser, “Support for Our Critical Services.”

5. Behavior and Application

The AVCG does not operate as a military or an MLEA. Moreover, it does not have law enforcement authority, but it undertakes corrective measures based on the consent of boat operators. The AVCG is seen as a successful corporate volunteer organization with a succinct mission, maritime boating safety. To achieve this objective, they have made other arrangements, which have been discussed in the paper. Most of the AVCG's training is conducted through the Australian Coast Guard Maritime Academy, which is also a civilian entity of the AVCG.³⁴⁷ The training offered includes small boat operator courses such as Master level (boat captain) certificates and coxswain courses (boat operators) for vessels less than 24 meters (79 feet) in length.³⁴⁸ This is the AVCG's educational institute that is operated as a business. Registered in 2010 as the Australian Coast Guard Maritime Academy Pty Ltd, it has an annual income of over \$190,000.³⁴⁹ At the same time, there are various charitable mechanisms that can sustain the operations of volunteer organizations such as the AVCG.

A 2018 review conducted on the volunteer marine rescue organizations in the Queensland region stated that some units within such organizations spend over 80 percent of their volunteer time on fundraising, as that was the only way to sustain the costs of insurance, operational costs, and vessel maintenance.³⁵⁰ This is in addition to government incentives provided to the organizations. The review also criticized the operations of these volunteer maritime SAR capabilities in Queensland as being poorly integrated and lacking

³⁴⁷ Australian Coast Guard Maritime Academy, "The Australian Coast Guard Maritime Academy – ACGMA," accessed February 21, 2022, <https://www.acgma.edu.au/>.

³⁴⁸ Australian Coast Guard Maritime Academy, "Courses – The Australian Coast Guard Maritime Academy," accessed February 21, 2022, <https://www.acgma.edu.au/courses/>.

³⁴⁹ Dun & Bradstreet, "Australian Coast Guard Maritime Academy Pty Ltd," Competitors, Financials & Contacts, accessed February 21, 2022, https://www.dnb.com/business-directory/company-profiles.australian_coast_guard_maritime_academy_pty_ltd.5b6a489985e696cc366e5d0880a6f3fc.html.

³⁵⁰ Campbell Darby, *Review into Volunteer Marine Rescue Organizations in Queensland*, Blue Water Review (Queensland, Australia: Government of Queensland, 2018), 7–8, <https://www.qfes.qld.gov.au/sites/default/files/2021-03/Review-into-VMR-Organisations-in-QLD.pdf>.

coherency, which in turn increases costs and exposes the boaters and volunteers to an “increased risk.”³⁵¹

The AVCG is a corporation, registered in 1970 as The Australian Volunteer Coast Guard Association Incorporated, that has annual revenues of \$1.62 million.³⁵² The review done by the Queensland government criticized other volunteer organizations for having a lack of financial transparency, “flawed” election arrangements, removal of members who criticize the system, designations that create conflicts of interest, and avoidable costs within the organization.³⁵³ These are issues that may arise within any corporate organization, especially charities financed by community fund-raising events. However, the maritime security agencies within the governance system of the state, territory, or federal governments rarely face these financial criticisms or transparency issues since they are bound by strict regulations to address the matters.

Despite some of the corporate challenges, fundraising limitations, and an increased frequency of operations, the AVCG has been an instrumental partner of the state emergency services in Australia. The country may continue without a federal CG for the time being, but Australia currently hosts a capable civil NGO volunteer MERA with a corporate backbone.

C. CANADIAN COAST GUARD (*GARDE COTIERE*)

Canada has the world’s longest coastline, approximately 243,000km (150,993 mi) long.³⁵⁴ This vast coastline is largely attributable to its 36,563 islands lying in the Canadian

³⁵¹ Darby, 9.

³⁵² Dun & Bradstreet, “The Australian Volunteer Coast Guard Association Incorporated,” Competitors, Financials & Contacts, accessed February 21, 2022, https://www.dnb.com/business-directory/company-profiles.the_australian_volunteer_coast_guard_association_incorporated.3c3c3cf658bc1f1b202a3344a447e425.html.

³⁵³ Darby, *Review into Volunteer Marine Rescue Organizations in Queensland*, 26–28.

³⁵⁴ Government of Canada: Canadian Coast Guard, “Who We Are and What We Do,” May 16, 2019, <https://www.ccg-gcc.gc.ca/corporation-information-organisation/who-we-are-qui-nous-sommes-eng.html>.

Arctic Archipelago.³⁵⁵ The coastline of Canada opens into the North Atlantic Ocean in the east, the Arctic Ocean in the north, and the North Pacific Ocean in the west. The country has an EEZ of approximately 2.9 million sq km (1.1 million sq mi), and a CS that encompasses an additional water body of approximately 1.5 million sq km (579,000 sq mi) (Figure 20).³⁵⁶



Figure 20. Canadian maritime domain, with its EEZ highlighted in red.³⁵⁷

Canada also has vast freshwater bodies, including four of the five great lakes, totaling an area of 191,702 sq km (119,118 sq mi).³⁵⁸ The Great Lakes are a group of five

³⁵⁵ Central Intelligence Agency, “Canada,” in *The World Factbook*, February 16, 2022, <https://www.cia.gov/the-world-factbook/countries/canada/>.

³⁵⁶ Fisheries and Oceans Canada, “Canada’s Ocean Estate: A Description of Canada’s Maritime Zones,” 2007, 2–3, <https://waves-vagues.dfo-mpo.gc.ca/Library/40622952.pdf>.

³⁵⁷ Source: Marine Regions, “Canada MRGID 8493,” accessed April 2, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8493&zone=eez>.

³⁵⁸ Central Intelligence Agency, “Canada.”

lakes that make up the largest group of freshwater lakes in the world, and they are referred to as smaller inland seas due to their sea-like phenomena.³⁵⁹

The Canadian government has established a number of mechanisms to regulate and enforce activities in these water bodies. These include mechanisms for SAR, marine communications and traffic services, vessel inspections, navigation, marine environment response, icebreaking, and general maritime safety and security operations.³⁶⁰ The main activities fall on the Transport Canada, Fisheries and Oceans Canada, Transportation Safety Board of Canada, Canadian Transportation Agency, Canada Border Services Agency, Environment and Climate Change Canada, Department of National Defense, the Royal Canadian Mounted Police (RCMP), and the CACG.³⁶¹ Two key agencies within this maritime security system are the Royal Canadian Navy (RCN) and the CACG.

The policing entities of the maritime security system of Canada were formed to support a long line of agencies that were established to protect marine resources, such as fisheries activities and maritime navigational safety.³⁶² Among these agencies was the Department of Marine and Fisheries, which was established in 1868.³⁶³ Other key agencies included the Department of Militia and Defense, the Marine Police, the Fisheries Protection Service (FPS), and eventually the RCN in 1910.³⁶⁴ After the formation of the RCN, the FPS and the RCN played key roles, with overlapping mandates to enforce Canadian waters, even after the First World War.³⁶⁵ This resulted in pressure from several agencies in 1940

³⁵⁹ McGill School of Computer Science, “Great Lakes,” 2007, https://www.cs.mcgill.ca/~rwest/wikispeedia/wpcd/wp/g/Great_Lakes.htm.

³⁶⁰ Government of Canada, “Canadian Coast Guard,” May 16, 2019, <https://www.ccg-gcc.gc.ca/index-eng.html>.

³⁶¹ Canada Transport, “Marine Transportation” (AEAD, March 19, 2020), <https://tc.canada.ca/en/marine-transportation>.

³⁶² Timothy Choi, “Ready to Secure: A Sea Control Perspective on Canadian Fisheries Enforcement,” in *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*, ed. Ian Bowers and Swee Lean Collin Koh (London: Palgrave Macmillan, 2019), 228.

³⁶³ Government of Canada: Canadian Coast Guard, “The Canadian Coast Guard at 60,” December 23, 2021, <https://www.ccg-gcc.gc.ca/ccg60gcc-eng.html>.

³⁶⁴ Choi, “Canadian Fisheries Enforcement,” 226–30.

³⁶⁵ Choi, 234.

to form a national CG.³⁶⁶ It was not until 1962, after the Royal Commission on Government Organizations (GLASSCO) recommended the consolidation of Canada's various civil marine patrol and law enforcement activities under a CG, that the CACG was born.³⁶⁷

1. Organizational Ontology

The CACG was formed after Canada's Department of Transport fleet of ships was collectively arranged under a CG organization.³⁶⁸ Initially, the CACG was a subordinate agency to Canada's Department of Transport, which was later transferred to the Department of Fisheries and Oceans in 1995.³⁶⁹ Currently, the CACG is a civilian agency with a Special Operating Agency (SOA) status within Fisheries and Oceans Canada.³⁷⁰ An SOA within Canada's bureaucracy is an autonomous agency with limited dependency on its parent department, in this case, Fisheries and Oceans Canada.³⁷¹ This status is given to certain agencies within the Canadian government to improve their performance by eliminating bureaucratic control in order to facilitate "initiative, creativity, delegation of authority and results."³⁷² This would mean that the CACG is not dependent on the decisions of the Fisheries and Oceans Canada for its day-to-day functioning and decision making. The CACG was moved into Fisheries and Oceans Canada in order to cut costs, and under the move, the Department's Science and Conservation and Protection fleets were also integrated into the CACG.³⁷³

³⁶⁶ Government of Canada: Canadian Coast Guard, "The Canadian Coast Guard at 60."

³⁶⁷ J.Y. Forcier, *The Canadian Navy and the Canadian Coast Guard: Cooperating Sea Services or Co-Existing Federal Fleets*, Strategic Studies Working Group Papers (Ottawa, Canada: Canadian Defense and Foreign Affairs Institute & Canadian International Council, 2011), 6, <https://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.637.3978&rep=rep1&type=pdf>.

³⁶⁸ Government of Canada - Canadian Coast Guard, "The Canadian Coast Guard at 60."

³⁶⁹ Government of Canada - Canadian Coast Guard.

³⁷⁰ Government of Canada - Canadian Coast Guard, "Who We Are and What We Do."

³⁷¹ Government of Canada - Treasury Board of Canada, "Becoming a Special Operating Agency," May 13, 1998, https://www.tbs-sct.gc.ca/pubs_pol/opepubs/tb_b4/bsoa-doss01-eng.asp#02.

³⁷² Government of Canada - Treasury Board of Canada.

³⁷³ Government of Canada - Canadian Coast Guard, "History of the Canadian Coast Guard," November 29, 2019, <https://www.ccg-gcc.gc.ca/corporation-information-organisation/history-eng.html>.

The CACG is headed by a Commissioner.³⁷⁴ The Commissioner of the CACG is a uniformed civilian with a civilian mandate. The Commissioner reports directly to the Deputy Minister of Fisheries, Oceans, and the Canadian Coast Guard,³⁷⁵ and is equivalent to an Associate Deputy Minister in the Canadian government's hierarchical structure.³⁷⁶ The CACG has four regional commands, namely the Atlantic, Western, Central, and Arctic, with an Assistant Commissioner heading each of these regions.³⁷⁷ Two Deputy Director Generals look after "Personnel" and "Innovation, Planning, and Engagement;" while two Deputy Commissioners look after "Operations" and "Shipbuilding and Material."³⁷⁸ All these appointments are accountable directly to the Commissioner of CACG, and they are all uniformed civilians.

This organizational structure, which was restructured in 2012, identifies the CACG as a uniformed civil organization, similar to a police force.³⁷⁹ The CACG operates as an unarmed federal service, although arming the vessels and personnel may happen eventually, since the issue has been raised on several occasions by Canadian policymakers.³⁸⁰ According to a 2003 parliamentary report, resistance to arming the CACG has come from within the organization rather than outside of it.³⁸¹ Currently, the CACG remains a civil agency within the federal government of Canada.

³⁷⁴ Government of Canada, "Commissioner of the Canadian Coast Guard," May 16, 2019, <https://www.ccg-gcc.gc.ca/corporation-information-organisation/commisioner-commissionnaire-eng.html>.

³⁷⁵ Government of Canada.

³⁷⁶ Government of Canada.

³⁷⁷ Government of Canada - Canadian Coast Guard, "Organizational Structure," January 12, 2013, <https://www.dfo-mpo.gc.ca/about-notre-sujet/organisation-eng.htm>.

³⁷⁸ Government of Canada - Canadian Coast Guard.

³⁷⁹ Government of Canada, "Commissioner of the Canadian Coast Guard."

³⁸⁰ CBC News, "Government to Consider Arming Coast Guard Vessels," November 14, 2012, <https://www.cbc.ca/news/canada/nova-scotia/government-to-consider-arming-coast-guard-vessels-1.1199547>.

³⁸¹ Canadian Parliament, *Canada's Coastlines: The Longest Under-Defended Borders in the World* (Ottawa, Canada: Standing Committee on National Security and Defense, 2003), 81, https://publications.gc.ca/collections/collection_2011/sen/yc33-0/YC33-0-372-17-1-eng.pdf.

2. Roles and Responsibilities

The roles and responsibilities of the CACG are derived from two separate Canadian laws. The first is from Section 41 of the “Ocean Act.”³⁸² The second is from Section 129 of the “Canada Shipping Act.”³⁸³ The mandates are as follows:

- Maritime SAR;
- Marine Pollution Response;
- Vessel Traffic Management;
- Management of Aids to Navigation resources;
- Ice-breaking and Ice-management;
- Management of maritime communication networks; and
- Support other agencies.

The CACG conducts multiple support roles with other agencies, mostly as a support role. These agencies include the “Customs, Immigration, the RCMP, Fisheries, and Transport Canada.”³⁸⁴

3. Strategic Status

The CACG has emerged as an important asset of the Canadian maritime security system as well as the whole of the Canadian state. The CACG places paramount importance on its mandates, especially in regions that are strategically vital for Canada. One such region is the Arctic, where the North-West Passage is opening Arctic shipping routes as a result of the melting ice caps. The CACG was the organization that pioneered the Polar

³⁸² Oceans Act, 31 1996 § (1996), <https://laws-lois.justice.gc.ca/eng/acts/o-2.4/>.

³⁸³ Canada Shipping Act, 26 2001 § (2001), <https://laws-lois.justice.gc.ca/eng/acts/C-10.15/FullText.html>.

³⁸⁴ Canadian Parliament, *Canada’s Coastlines: The Longest Under-Defended Borders in the World*, 78.

Code in 1993 with a group of other Arctic states and commercial shipping companies.³⁸⁵ In 2017, this was adopted by the International Maritime Organization (IMO) as the “International Code of Safety for Ships Operating in Polar Waters.”³⁸⁶ The Polar Code included a set of construction and operational requirements for vessels that intend to pass through the polar region.³⁸⁷ The measures were deemed necessary in light of a potential impending increase in the number of vessels through the North-West Passage and the need to establish mechanisms to protect these waters and coasts of the region.³⁸⁸

The CACG also plays a key role in providing icebreaking and ice-management services in this strategic region and in other Canadian waters. Canadian government vessels established icebreaking services in Canadian waters, the Great Lakes, and rivers during the late 19th century.³⁸⁹ The Arctic icebreaking peaked in the 1920s with increased polar explorations.³⁹⁰ The CACG is at the forefront of icebreaking in the polar region since the service is vital for Canada’s maritime trade.³⁹¹ Due to this important strategic requirement for Canada, there have been numerous calls to expand the icebreaking capability of the CACG and modernize its aging fleet operating in the Arctic and elsewhere.³⁹²

As part of the Arctic Council, Canada, along with seven other countries, has pledged under the “Declaration on the Establishment of the Arctic Council,” or the Ottawa

³⁸⁵ Rob Huebert, “Climate Change and Canadian Sovereignty in the Northwest Passage,” *The Calgary Papers in Military and Strategic Studies*, no. 4 (2011): 384, <https://journalhosting.ucalgary.ca/index.php/cpmss/article/view/36337>.

³⁸⁶ Pauline Pic et al., “The Polar Code and Canada’s Regulations on Arctic Navigation: Shipping Companies’ Perceptions of the New Legal Environment,” *The Polar Journal*, March 16, 2021, 3, <https://doi.org/10.1080/2154896X.2021.1889838>.

³⁸⁷ Huebert, “Climate Change and Canadian Sovereignty in the Northwest Passage,” 384–85.

³⁸⁸ Huebert, 385.

³⁸⁹ Government of Canada: Canadian Coast Guard, “History of Icebreaking in Canada,” May 16, 2019, <https://www.ccg-gcc.gc.ca/icebreaking-deglacage/history-historique-eng.html>.

³⁹⁰ Government of Canada: Canadian Coast Guard.

³⁹¹ Government of Canada: Canadian Coast Guard.

³⁹² Michael Meighen, “Canada’s Coast Guard Should Be Guardians of Canada’s Arctic Sovereignty,” *The Hill Times*, no. 859 (October 16, 2006): 2 & 25, <https://www.proquest.com/docview/208545914/abstract/3D54A33B5F484790PQ/1>.

Declaration, to cooperate with other parties for the well-being of the Arctic region.³⁹³ The Council's commitment is to maintain "peace, stability, and constructive cooperation in the Arctic" according to its Strategic Plan for 2021–2030.³⁹⁴ From this crucial Arctic Council, there are two main strategic functions that fall under the CACG. The first is cooperation among the Council members on aeronautical and maritime SAR.³⁹⁵ The second is cooperation among the Council states on marine oil pollution response and preparedness.³⁹⁶ In addition to these, the CACG is also a member of the Arctic Coast Guard Forum (ACGF). The ACGF was established to enhance cooperation and coordination among the CGs of the Arctic Council member states.³⁹⁷ The Forum meets twice each year and is composed of ACGF Working Groups that are subordinate to the Forum's Secretariat.³⁹⁸ Hence, the CACG is an important strategic agency in harmonizing the Arctic through the Arctic Council.

The CACG's other strategic importance is apparent in the establishment and operationalizing of the maritime security framework in Canada. Despite the CACG having no primary MLE mandates, it has been a strategic partner in Canada's Marine Security Working Group (MSWG) initiatives, since the Group's inception post 9/11.³⁹⁹ The CACG

³⁹³ Arctic Council, "Declaration on the Establishment of the Arctic Council: Joint Communiqué of the Governments of the Arctic Countries on the Establishment of the Arctic Council," September 19, 1996, 1–2, https://oaarchive.arctic-council.org/bitstream/handle/11374/85/EDOCS-1752-v2-ACMMCA00_Ottawa_1996_Founding_Declaration.PDF?sequence=5&isAllowed=y.

³⁹⁴ Arctic Council, "Arctic Council Strategic Plan 2021 to 2030," May 20, 2021, 6, https://oaarchive.arctic-council.org/bitstream/handle/11374/2601/MMIS12_2021_REYKJAVIK_Strategic-Plan_2021-2030.pdf?sequence=1&isAllowed=y.

³⁹⁵ Arctic Council, "Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic" (Arctic Council Secretariat, 2011), Appendix-II, <https://oaarchive.arctic-council.org/handle/11374/531>.

³⁹⁶ Arctic Council, "Agreement on Cooperation on Marine Oil Pollution Preparedness and Response in the Arctic," March 15, 2013, Appendix I, https://oaarchive.arctic-council.org/bitstream/handle/11374/529/EDOCS-2068-v1-ACMMSE08_KIRUNA_2013_agreement_on_oil_pollution_preparedness_and_response_signedAppendices_Original_130510.PDF?sequence=6&isAllowed=y.

³⁹⁷ Arctic Coast Guard Forum, "The Arctic Coast Guard Forum (ACGF)," accessed February 27, 2022, <https://www.arcticcoastguardforum.com/about-acgf>.

³⁹⁸ Arctic Coast Guard Forum.

³⁹⁹ Canadian Coast Guard, "Maritime Security Framework," 2010, 2, <https://www.ccg-gcc.gc.ca/publications/maritime-security-surete-maritime/framework-cadre/index-eng.html>.

manages its coordination, national security-related development strategies, and analysis of maritime security through the Department of Fisheries and Ocean's Maritime Security Branch. The Maritime Security Branch is accountable to the Commissioner of the CACG and is also a member of MSWG.⁴⁰⁰ One of the ways the CACG directly contributes to maritime security is through surveillance from its Automatic Identification System (AIS) and Long-Range Identification and Tracking (LRIT) networks, providing a common operating picture (COP).⁴⁰¹ Furthermore, they maintain a presence in the Great Lakes as well as Canada's jurisdictional waters as a deterrence.⁴⁰² In a supporting role, the CACG mans the chain of Marine Security Operations Centers (MSOC) and jointly patrols with RCMP, by embarking Maritime Security Enforcement Teams (MSET) in RCMP's jurisdiction.⁴⁰³

Collectively, the CACG plays an important role in the strategic sphere of the Canadian maritime security system, especially in the Arctic region. Remarkably, despite CACG's key role in SAR, the Ministry of Defense has been designated the Lead Minister for SAR (LMSAR) since 1976, a civil MER role traditionally aligned with CG organizations.⁴⁰⁴ Considering the traffic density and security dynamics in the region, the CACG's responsibilities may, in the future, be expanded or even developed into an armed constabulary force with a broader strategic security role.

4. Physical Characteristics

The CACG platforms are painted in bright red, with a white superstructure. Similar to most CG vessels, the CACG vessels have a racing stripe. The racing stripe is a single wider diagonal stripe with two black narrower outlines on the side that are painted on the

⁴⁰⁰ Canadian Coast Guard, "Maritime Security Contributions," 2011, 4, <https://www.ccg-gcc.gc.ca/publications/maritime-security-surete-maritime/contributions/index-eng.html>.

⁴⁰¹ Canadian Coast Guard, 5.

⁴⁰² Canadian Coast Guard, 7.

⁴⁰³ Canadian Coast Guard, 8–9.

⁴⁰⁴ Government of Canada: Canadian Coast Guard, "Maritime Search and Rescue (SAR) in Canada," May 16, 2019, <https://www.ccg-gcc.gc.ca/publications/search-rescue-recherche-sauvetage/sar-canada-res-eng.html>.

hull just a bit forward of the midship.⁴⁰⁵ On the center of the hull is the English inscription “Coast Guard,” where the second word is below the first one, printed in white.⁴⁰⁶ This inscription is followed by a French inscription “*Garde Côtière*,” which is also arranged and printed similar to the English inscriptions. The name of the vessel is printed on the bow in English block letters.⁴⁰⁷ The largest CACG ship listed among the 123 entries was the CACGS *Henry Larsen*, which is a 99.8 meter (327 feet), medium icebreaker (Figure 21).⁴⁰⁸ The smallest was the 12 meter (39 feet), Channel Survey and Sounding Vessel, CACGS *Helen Irene Battle*.⁴⁰⁹ None of the 123 vessels are armed.



Figure 21. CACG Ship *Henry Larsen*.⁴¹⁰

⁴⁰⁵ Government of Canada, “Canadian Coast Guard.”

⁴⁰⁶ Canadian Coast Guard, “Maritime Security Contributions,” 2.

⁴⁰⁷ Canadian Coast Guard, 2.

⁴⁰⁸ Government of Canada: Canadian Coast Guard, “Vessel - CCG Fleet: CCGS Henry Larsen,” accessed February 27, 2022, <https://inter-j01.dfo-mpo.gc.ca/fdat/vessels/70>.

⁴⁰⁹ Government of Canada: Canadian Coast Guard, “Vessel - CCG Fleet: CCGS Helen Irene Battle,” accessed February 28, 2022, <https://inter-j01.dfo-mpo.gc.ca/fdat/vessels/2283>.

⁴¹⁰ Source: Ships Monthly, “Canadian Coast Guard Awards Contracts,” November 14, 2015, <https://shipsmonthly.com/news/canadian-coast-guard-awards-contracts/>.

The CACG aircraft, which include only helicopters, are painted in the same color scheme, with the English and French inscriptions printed on the sides below the cockpit window.⁴¹¹ The black and white racing stripes are similar to those on the surface platforms, where the stripes are painted on the airframe just before the tail-boom.⁴¹² The helicopters in the CACG are employed in logistical transportation roles, medical evacuations, icebreaking surveillance patrols, SAR, environmental response, and scientific and conservation operations.⁴¹³ The two types of helicopters in service are the Bell Textron 412 EPI and the Bell Textron 429 (Figure 22).⁴¹⁴ The CACG operates a total of 23 helicopters, and none of them are armed.⁴¹⁵



Figure 22. CACG Bell Textron 429 helicopter.⁴¹⁶

⁴¹¹ The Arctic Coast Guard Forum, “The Arctic Coast Guard Forum: Canada,” accessed February 27, 2022, <https://www.arcticcoastguardforum.com/member-country/canada>.

⁴¹² The Arctic Coast Guard Forum.

⁴¹³ Government of Canada - Canadian Coast Guard, “Helicopter Service Information,” May 16, 2019, <https://www.ccg-gcc.gc.ca/fleet-flotte/helicopters/services-info-services-eng.html>.

⁴¹⁴ Government of Canada - Canadian Coast Guard, “Helicopters,” May 16, 2019, <https://www.ccg-gcc.gc.ca/fleet-flotte/helicopters/index-eng.html>.

⁴¹⁵ Government of Canada - Canadian Coast Guard, “The Canadian Coast Guard at 60.”

⁴¹⁶ Source: HeliHub, “Canadian Coast Guard Accepts Last of 15 Bell 429s,” March 15, 2016, <https://helihub.com/2016/03/15/canadian-coast-guard-accepts-last-of-15-bell-429s/>.

The CACG working uniform is a white or a light blue shirt with a navy-blue bottom and either a navy-blue beret, peak cap, or a ball cap (Figure 23).⁴¹⁷ The uniform has a navy-blue shoulder patch on two sides, on the top of the sleeves, with the English and French inscription for the CG, and navy-blue shoulder boards with the rank insignias.⁴¹⁸ The CACG also uses an official black winter uniform and dark blue rig for afloat operations.



Figure 23. CACG cadets in the working blue uniform at the CG College.⁴¹⁹

Most of the personnel are trained as officers and as specialized enlisted personnel through the Canadian Coast Guard College, where trainees receive military-like discipline indoctrination as well as wellness and “waterfront” training.⁴²⁰ These physical characteristics identify the CACG as an unarmed uniformed federal MERA.

⁴¹⁷ Fisheries and Oceans Canada - Canadian Coast Guard, “The Canadian Coast Guard College: Officer Training Program,” accessed February 27, 2022, <https://www.ccg-gcc.gc.ca/publications/college/docs/officer-prospectus-officier-eng.pdf>.

⁴¹⁸ Fisheries and Oceans Canada - Canadian Coast Guard.

⁴¹⁹ Source: Canadian Coast Guard [@CoastGuardCAN], “Tweet: Canadian Coast Guard,” Tweet, *Twitter*, December 14, 2017, <https://twitter.com/CoastGuardCAN/status/941314448496758789>.

⁴²⁰ Fisheries and Oceans Canada - Canadian Coast Guard, “The Canadian Coast Guard College,” 6.

5. Behavior and Application

The CACG has been extremely active in providing SAR services, managing icebreaking, engaging in vessel traffic management and surveillance, and supporting many other agencies in the Canadian maritime security system. As a result of the “National Shipbuilding Strategy of 2010” and the “Ocean Protection Plan of 2016,” the CACG is renewing its aging fleets of icebreakers and multi-role vessels to cater to the demands it faces.⁴²¹ These are all a contribution to the maritime security system of Canada, under the MSWG initiatives. Despite the ongoing efforts, the CACG’s role has not been expanded to include any major MLE mandates. If there are requirements to take arms on board, the CACG vessels embark RCMP personnel in their jurisdictional waters while the CACG personnel act as support personnel.

The CACG is employed in a variety of strategic logistics functions to advance other sectors. This includes icebreaking to facilitate transportation of goods and tourism; maritime security support roles to assist the RCMP, the RCN, and the Fisheries Department; and scientific and conservation operations to support the Fisheries Department and its affiliates. Notwithstanding these, the presence of the CACG vessels for deterrence and its surveillance operations demonstrate how the CACG could be utilized as a more effective force. Post 9/11, the CACG is being driven into Canada’s maritime security system without revision of its legal mandate, its effective authority, or the constabulary mechanisms it requires to exercise within such a system.

D. GEORGIAN BORDER POLICE COAST GUARD

Georgia is a country positioned at the eastern edge of the Black Sea, with a coastline of approximately 330 km (205 mi).⁴²² Most of this coastline is located in the Abkhazia region, which was annexed by Russia after the 2008 Russo-Georgian War.⁴²³ Hence,

⁴²¹ Government of Canada - Canadian Coast Guard, “The Canadian Coast Guard at 60.”

⁴²² D. Castilla-Espino et al., “Fishing Capacity of the Southeastern Black Sea Anchovy Fishery,” *Journal of Marine Systems* 135 (July 2014): 161, <https://doi.org/10.1016/j.jmarsys.2013.04.013>.

⁴²³ Adam DeKraker et al., “The Russo-Georgian War: Russian Influence,” *Small Wars Journal*, February 14, 2021, <https://smallwarsjournal.com/jrnl/art/russo-georgian-war-russian-influence>.

Georgia currently has full authority over 120 km (75 mi) of its coastline.⁴²⁴ Despite this, Georgia, and also the international community, recognize Abkhazia as an autonomous region within Georgia.⁴²⁵ The country shares its maritime border with Russia to the northwest and Turkey to the southwest. Georgia has also claimed an EEZ of approximately 22,944 sq km (8,859 sq mi), which also includes the EEZ area that extends from the coastline of Abkhazia (Figure 24).⁴²⁶ Georgia's is the smallest area of maritime space compared to other states in the Black Sea, such as Russia, Turkey, Ukraine, Romania, and Bulgaria.⁴²⁷

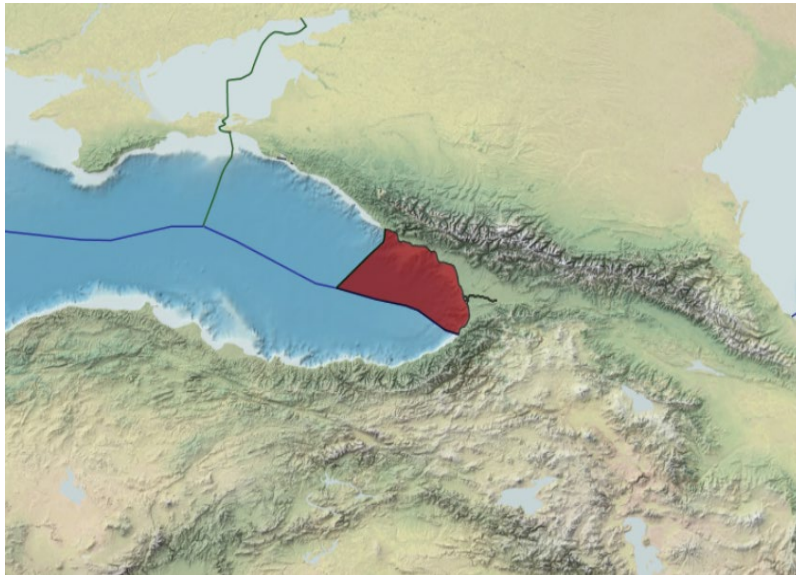


Figure 24. Georgian maritime domain, with its EEZ highlighted in red.⁴²⁸

⁴²⁴ PeakVisor, “Autonomous Republic of Abkhazia Mountains,” accessed March 18, 2022, <https://peakvisor.com/adm/autonomous-republic-of-abkhazia.html>.

⁴²⁵ “Constitution of Georgia,” 786 § (1995), Article 7(f), https://adsdatabase.ohchr.org/IssueLibrary/GEORGIA_Constitution.pdf.

⁴²⁶ Marine Regions, “Georgia MRGID 5678,” 2014, <https://www.marineregions.org/eezdetails.php?mrgid=5678>.

⁴²⁷ Ian C. Goulding, Kim A. Stobberup, and Tim O’Higgins, “Potential Economic Impacts of Achieving Good Environmental Status in Black Sea Fisheries,” *Ecology and Society* 19, no. 3 (2014): 1, <https://doi.org/10.5751/ES-06817-190332>.

⁴²⁸ Source: Marine Regions, “Georgia MRGID 5678,” accessed April 3, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=5678&zone=eez>.

Georgia also opens into the Black Sea, which is only accessible through the 27 km (17 mi) long and 3.2 km (2 mi) wide Bosphorus Straits.⁴²⁹ Turkey maintains control of this strait, along with the Dardanelles Strait and the Marmara Sea, enforcing the “1936 Convention Regarding the Regime of the Straits,” or the Montreux Convention. Under the Montreux Convention, “vessels of war” belonging to the non-Black Sea states are limited by their tonnages and require prior notification to the Turkish government.⁴³⁰ Turkey, having not signed the UNCLOS, has refused to assert UNCLOS amendments in the enforcement of the straits and continues to follow the provisions of the Montreux Convention.⁴³¹ These restrictions impose limitation on extra-regional powers, such as the United States, related to their ability to operate and maintain a constructive presence inside the Black Sea.

The Black Sea is also an area ridden with conflict. This is most clear where Russian and pro-North Atlantic Treaty Organization (NATO) and European interests are at odds. In 2008, this resulted in Russian naval conflicts with the Georgian Navy during the annexation of Abkhazia, and in 2014, with the annexation of Crimea.⁴³² The Russian engagement against the Georgian Navy during the Russo-Georgian War was Russia’s first armed engagement since the end of World War II.⁴³³ This Russian campaign was launched on August 7–8, 2008, not only to take control of the Georgian territory of Abkhazia but also to gain control over Georgia’s autonomous region of South Ossetia, which also bordered Russia inland.⁴³⁴

⁴²⁹ International Institute for Law of the Sea Studies, “Navigational Regimes of Particular Straits, Bosphorus and Dardanelles Case Study,” April 24, 2021, <http://iilss.net/tag/sea-of-marmara/>.

⁴³⁰ International Institute for Law of the Sea Studies, “1936 Convention Regarding the Regime of the Straits,” July 20, 1936, Section II, <http://iilss.net/wp-content/uploads/2021/08/1936-Convention-Regarding-the-Regime-of-the-Straits-Montreux-iilss-2.pdf>.

⁴³¹ International Institute for Law of the Sea Studies, “Bosphorus and Dardanelles Case Study.”

⁴³² Goulding, Stobberup, and O’Higgins, “Potential Economic Impacts of Achieving Good Environmental Status in Black Sea Fisheries,” 4.

⁴³³ Bosphorus Naval News, “Russian – Georgian War at Sea,” September 21, 2008, <https://turkishnavy.net/2008/09/21/russian-georgian-war-at-sea/>.

⁴³⁴ International Crisis Group, *Russia vs Georgia: The Fallout*, Report No. 195. (Brussels: International Crisis Group) August 22, 2008, <https://www.crisisgroup.org/europe-central-asia/caucasus/georgia/russia-vs-georgia-fallout>.

In confrontations during the Russian naval blockade off the coast of Abkhazia, several Georgian naval vessels were reportedly sunk.⁴³⁵ At the time, the Georgian Navy and the GCG had a total of 23 ships, of which only nine belonged to the navy.⁴³⁶ Two among these were equipped with anti-ship Exocet and Styx missiles.⁴³⁷ Meanwhile, Russia had deployed 39 fully combat-capable ships.⁴³⁸ The Georgian Navy was easily overpowered by the Russian Black Sea fleet that destroyed most of the Georgian Navy ships during the course of the five-day war.⁴³⁹ The Georgian Navy was subsequently disbanded after the war and the responsibility of defending Georgia's maritime territory was transferred to the Georgian Border Police Coast Guard, along with the navy's surviving units.⁴⁴⁰ Eventually, the latter became an important agency within the Georgian security system.

1. Organizational Ontology

The GCG has been a civil organization from its inception in 1998 under the Border Protection Department of Georgia.⁴⁴¹ Initially, the Georgian Border Service was established in 1992 under the Ministry of Defense, where the former was detached in March 1996 as the State Department of Border Protection.⁴⁴² In 1998, as per Article 32 of the "Law on the State Border of Georgia," border protection was directly transferred to the purview of the Internal Affairs Ministry of Georgia.⁴⁴³ The 1998 law gave the Ministry of

⁴³⁵ International Crisis Group, 3.

⁴³⁶ Bosphorus Naval News, "Russian – Georgian War at Sea."

⁴³⁷ Bosphorus Naval News.

⁴³⁸ Bosphorus Naval News.

⁴³⁹ Carolina Vendil Pallin and Fredrik Westerlund, "Russia's War in Georgia: Lessons and Consequences," *Small Wars & Insurgencies* 20, no. 2 (June 2009): 406, <https://doi.org/10.1080/09592310902975539>.

⁴⁴⁰ Michael Godwin, "Anchors Away for a New Georgian Navy," *Georgia Today*, July 8, 2021, sec. Newspaper, <https://georgiatoday.ge/anchors-away-for-a-new-georgian-navy/>.

⁴⁴¹ Mtisambebi, "The Border Police Has a New Head," February 9, 2018, <https://mtisambebi.ge/news/people/item/687-sasazgvro-polizias-axali-xelmwgvaneli-bybavs>.

⁴⁴² Mtisambebi.

⁴⁴³ Law of Georgia: On the State Border of Georgia, 1536 § (1998), Article 32, <https://matsne.gov.ge/ka/document/view/31966>.

Internal Affairs legal authority to enforce maritime law and protect maritime borders.⁴⁴⁴ The GCG was formed under this authority to execute these powers within the Ministry of Internal Affairs as an agency to protect the maritime borders of Georgia. Article 33 of the same statute also identified other stakeholders, including the Ministry of Defense and the Ministry of Foreign Affairs to name a few.⁴⁴⁵

The border force structure within the Ministry of Internal Affairs was restructured as the Border Police of Georgia, which is the responsible authority of the GCG. The restructuring came from the “Law on the Border Police of Georgia,” which defined the authorities, organizational structure, and objectives of the organization.⁴⁴⁶ As per the provisions, the Border Police of Georgia is a “law enforcement body,” accountable to the Ministry of Internal Affairs.⁴⁴⁷ This would make the GCG the MLE branch of the Georgian Border Police. After the elements of the Georgian Navy were merged with the GCG in 2008, it inherited naval roles of maritime defense in addition to its traditional policing roles.⁴⁴⁸

The GCG hence remains a mixture of military and police organizational structures. As such, it is a tier III organization under the Ministry of Internal Affairs and remains a civil-armed MLEA accountable to the head of the Georgian Border Police, which in turn is accountable to the Minister of Internal Affairs, reporting to the President of Georgia. Prior to this, the GCG was a tier II agency when it was under the Department of State Border Protection, which was formed in 1998 as an independent government entity.⁴⁴⁹

⁴⁴⁴ Law of Georgia: On the State Border of Georgia.

⁴⁴⁵ Law of Georgia: On the State Border of Georgia, Article 33.

⁴⁴⁶ Law of Georgia: On the Border Police of Georgia, 4138 § (2006), <https://matsne.gov.ge/ka/document/view/25882?publication=5>.

⁴⁴⁷ Law of Georgia: On the State Border of Georgia, Article 2.

⁴⁴⁸ Ministry of Internal Affairs of Georgia, “Border Police: Coast Guard,” 2013, <https://police.ge/en/ministry/structure-and-offices/border-police>.

⁴⁴⁹ On Approval of the Statute of the State Department of State Border Protection of Georgia (1998), Provision I, <https://matsne.gov.ge/ka/document/view/1239601>.

2. Roles and Responsibilities

The roles and mandates of the GCG are derived from Article 10 of the statute, “Law of Georgia: On the Border Police of Georgia,” which came into effect on December 27, 2006.⁴⁵⁰ The roles derived from the law are as follows:

- Maritime defense;
- Marine pollution response;
- MLE;
- Protection of the maritime borders;
- Counterterrorism operations;
- Prevention of trafficking of humans, drugs, weapons, weapons of mass destruction (WMD), and other illegal goods;
- Safety of navigation at sea;
- Countering illegal migration;
- Conduct of maritime SAR;
- Port security operations; and
- Undertaking of any roles obligated to the GCG under the Georgian Constitution.

Article 11 of the same law states that the Border Police of Georgia will be transferred to fall under the command and control of the Georgian Armed Forces whenever martial law is declared.⁴⁵¹ This would indicate that the GCG, especially in the absence of a navy, would be required to train and maintain combat readiness as an important mandate.

⁴⁵⁰ Law of Georgia: On the State Border of Georgia, Article 10.

⁴⁵¹ Law of Georgia: On the State Border of Georgia, Article 11.

The same article also indicates supportive roles in the event of natural disasters, “catastrophes,” and also during pandemics.⁴⁵²

3. Strategic Status

The GCG is an important element of the security system of Georgia, especially due to its limited coastline and the annexed maritime area in the north. In the absence of a navy, the GCG bears the responsibility of both policing and defending the maritime zones of the country. Despite its constabulary structure, the GCG has been engaged in maintaining and asserting Georgia’s sovereign rights, especially in the Abkhaz-controlled maritime areas that belong to Georgia. Regardless of the limitations, the GCG, strictly enforced a blockade of vessels trying to enter the annexed maritime borders without the consent of the Georgian government straight after the war in 2008.⁴⁵³ The GCG continued to enforce this blockade until Russia deployed its highly armed CG vessels to counter the blockade.⁴⁵⁴ It was a challenge for the GCG since it had to face off against the maritime force of one of the most powerful countries in the world.

In the face of an aggressor, the GCG has been a bold challenger, especially in the country’s absence of a navy. This is a testament to the strategic importance of the GCG in Georgia, and the GCG has been receiving assistance from various partner countries, especially the United States. One of the most important enhancements to GCG’s role was the establishment of a joint maritime operation center in Georgia, with the assistance of the U.S. government.⁴⁵⁵ This lead center, known as the Joint Maritime Operations Management Center (JMOC), was opened on June 24, 2014, jointly by Georgia’s Internal

⁴⁵² Law of Georgia: On the State Border of Georgia, Article 11.

⁴⁵³ “Tensions Rise Over Georgia’s Sea Blockade of Abkhazia,” Radio Free Europe Radio Liberty, September 2, 2009, https://www.rferl.org/a/Tensions_Rise_Over_Georgias_Sea_Blockade_Of_Abkhazia/1813300.html.

⁴⁵⁴ Yörük Işık, “A Storm Brews Over the Black Sea: Turkey’s Contradictory Maritime Policy,” Middle East Institute, October 29, 2021, <https://www.mei.edu/publications/storm-brews-over-black-sea-turkeys-contradictory-maritime-policy>.

⁴⁵⁵ The Tbilisi Times, “Alexander Jikaidze and Richard Norland Open Joint Maritime Operations Management Center,” June 24, 2014, <https://ttimes.ge/archives/22071>.

Affairs Minister and the U.S. Ambassador to Georgia.⁴⁵⁶ The objectives and function of this JMOC reflect Resolution Number 348 published by the Government of Georgia on December 17, 2013.⁴⁵⁷

Article 4 of Resolution Number 348 states the objectives of the JMOC as a center for establishing a joint coordinating platform for all the agencies within the security system, facilitating a unified response to maritime issues, providing a COP, and harmonizing state resources to reduce any overlapping.⁴⁵⁸ This makes the JMOC the primary coordination center for providing advisory decisions to operational and policy levels of the government. Operationally, the JMOC's collaborative functions relate to all GCG roles.⁴⁵⁹ The JMOC's stakeholders include 11 security-related agencies, among them the Georgian Intelligence Service and the Maritime Transport Agency of Georgia, which conduct joint exercises and operations related to maritime security issues.⁴⁶⁰ A 2018 resolution (number 503), concerning the regulations of this Center, states that during wartime the JMOC will be transferred to the Georgian Armed Forces, while the Center would remain under the Georgian Border Police during peacetime.⁴⁶¹ In other words, the JMOC would be managed

⁴⁵⁶ The Tbilisi Times.

⁴⁵⁷ On Establishment of a Joint Operations Management Center for the Subjects of State Border Protection and the Bodies of the Executive Power of Georgia Related to the Protection of the State Border in Order to Ensure the Control of the Legal Regime of the Georgian Maritime Space, 348 § (2013), <https://matsne.gov.ge/ka/document/view/2139540>.

⁴⁵⁸ On Establishment of a Joint Operations Management Center for the Subjects of State Border Protection and the Bodies of the Executive Power of Georgia Related to the Protection of the State Border in Order to Ensure the Control of the Legal Regime of the Georgian Maritime Space, Article 4.

⁴⁵⁹ On Establishment of a Joint Operations Management Center for the Subjects of State Border Protection and the Bodies of the Executive Power of Georgia Related to the Protection of the State Border in Order to Ensure the Control of the Legal Regime of the Georgian Maritime Space, Article 5.

⁴⁶⁰ On Establishment of a Joint Operations Management Center for the Subjects of State Border Protection and the Bodies of the Executive Power of Georgia Related to the Protection of the State Border in Order to Ensure the Control of the Legal Regime of the Georgian Maritime Space, Article 6.

⁴⁶¹ On Establishment of a Joint Management Center for Maritime Operations of the Georgian Executive Authorities Related to the Protection of the State Border Regime and in Relation to the Protection of the State Border Regime and to Approve the Rules for Information Management in Order to Ensure Control of the Legal Regime of the Georgian Maritime Space, 503 § (2018), Article 4, <https://matsne.gov.ge/ka/document/view/4352880>.

by the GCG. By operating a radar chain that covers the Georgian maritime coast, the GCG also contributes enhanced MDA to the Center which is needed to develop a COP.⁴⁶²

The establishment of the JMOC under the authority of the Georgian Border Police provides the GCG with a significant position at the national level. The GCG has also been enhancing interoperability with its maritime allies in the Black Sea. One of the key maritime exercises it participates in is the “Sea Breeze” exercise.⁴⁶³ Georgia has been participating in these naval exercises led by the USN and hosted by Ukraine since its inception in 1997.⁴⁶⁴ Since the Georgian Navy was merged with the GCG in 2008, the GCG has been representing the nation in these annual exercises and testing its combat readiness with over 30 navies from around the globe.⁴⁶⁵ In addition to its participation in multi-national exercises, the United States has been helping to develop the GCG to help Georgia become “a reliable partner for NATO in joint naval operations.”⁴⁶⁶

The country and its security agencies had been ramping up their capabilities to be in line with NATO standards, as announced by the Georgian President back in 2002 during the Prague NATO Summit.⁴⁶⁷ However, due to the Russo-Georgian War of 2008, Georgia was never able to obtain NATO membership. As an alternative, both NATO and Georgia created the “Georgia-NATO Commission.”⁴⁶⁸ This collaborative mechanism supplements Georgia’s security forces according to the standards set by the NATO alliance. Despite being a tier-III level organization, the Internal Ministry’s Development Strategy 2013 states that the GCG is currently being developed along a path of key strategic importance

⁴⁶² Ministry of Internal Affairs of Georgia, “Coast Guard,” accessed March 20, 2022, [//police.ge/ge/ministry/structure-and-offices/saqartvelos-sasazghvro-politsia/sanapiro-datsva](https://police.ge/ge/ministry/structure-and-offices/saqartvelos-sasazghvro-politsia/sanapiro-datsva).

⁴⁶³ Edward Lundquist, “Exercise Sea Breeze 2021 Comes to a Close in Black Sea,” *Seapower*, July 13, 2021, <https://seapowermagazine.org/exercise-sea-breeze-2021-comes-to-a-close-in-black-sea/>.

⁴⁶⁴ Lundquist.

⁴⁶⁵ Lundquist.

⁴⁶⁶ Civil, “U.S. Gifts Two Patrol Boats to Georgia,” October 18, 2018, <https://civil.ge/archives/259562>.

⁴⁶⁷ Franziska Smolnik, “The Strategic Partnership Between Georgia and the United States: Vision Wanted,” *Stiftung Wissenschaft Und Politik Research Paper* 15 (December 2020): 10, <https://doi.org/10.18449/2020RP15>.

⁴⁶⁸ Smolnik, 10.

for Georgia.⁴⁶⁹ It is likely that as the capabilities and the engagements of the GCG further develop, the strategic importance of the agency may be elevated.

4. Physical Characteristics

The GCG platforms are completely white in color, including both the hull and the superstructure.⁴⁷⁰ The racing stripe of GCG is unique from other racing stripes used to identify CGs and other maritime agencies. The GCG ships use the “five crosses” of the Georgian flag as a replacement, which depicts five crosses in red, in exchange for the traditional stripes, against a white background.⁴⁷¹ These are located forward on either side of the hull. The vessels have the inscription “COAST GUARD” in both English and in Georgian, painted in black on the mid-ship.⁴⁷² The pennant numbers of each vessel are also printed forward on either side of the hull. Smaller craft are not different from larger ships in terms of their color schemes.⁴⁷³ The largest among the GCG surface vessels are the U.S.-gifted Island-class ships (Figure 25).⁴⁷⁴ The GCG does not have its own inherent air capability. It depends on the Aviation Division of the Border Police to fulfill its missions at sea.⁴⁷⁵

⁴⁶⁹ “Strategy 2014: Ministry of Internal Affairs” (Georgia: Ministry of Internal Affairs, 2014), 32.

⁴⁷⁰ Civil, “U.S. Gifts Two Patrol Boats to Georgia.”

⁴⁷¹ Civil.

⁴⁷² Civil.

⁴⁷³ Defence Forum & Military Photos - DefenceTalk, “Georgian MRTP-33,” November 1, 2010, <https://www.defencetalk.com/military/photos/georgian-mrtp-33.41784/>.

⁴⁷⁴ Agenda, “US Gives Two Patrol Boats to Georgia on 20th Anniversary of Georgian Coast Guard,” October 18, 2018, <https://agenda.ge/en/news/2018/2161>.

⁴⁷⁵ Border Police of the Ministry of Internal Affairs of Georgia, “Main Division of Special Purpose Aviation,” August 27, 2016, <https://web.archive.org/web/20160827171452/http://bpg.gov.ge/ge/special-aviation>.



Figure 25. GCG ship underway in the Black Sea.⁴⁷⁶

Guided by Resolution Number 345, the GCG is an armed organization within Georgia and has the authority to engage with adversaries and uncompliant vessels.⁴⁷⁷ The weapons mounted on the ships are manned machine guns, with lighter calibers, likely with 12.7 mm rounds.⁴⁷⁸ The GCG also trains its tactical boarding teams to compatible levels with NATO, replacing most of its Soviet-era weapons with NATO standard weapons.⁴⁷⁹ This further includes detection equipment for chemical, biological, and nuclear hazards.

The existing uniforms of the Border Guard and the GCG were first approved under Presidential Decree 746 in 2005.⁴⁸⁰ The latest regulations, under Decree 94, were released

⁴⁷⁶ Source: Ships Hub, “Georgian Coast Guard,” accessed April 3, 2022, <https://shipshub.com/navy/55-1.html>.

⁴⁷⁷ On Approval of the Rules for the Use of Weapons against Offensive Vessels by a Coast Guard Ship (Boat) of the Border Police of Georgia, 345 § (2013), <https://matsne.gov.ge/ka/document/view/2139399>.

⁴⁷⁸ Agenda, “US Gives Two Patrol Boats to Georgia on 20th Anniversary of Georgian Coast Guard.”

⁴⁷⁹ Neil Walker, *Georgian Coast Guard Assessment Teams Pass Level 2 Assessment of NATO Certification Program*, Border Security Report, 2020, <https://border-security-report.com/georgian-coast-guard-assessment-teams-pass-level-2-assessment-of-nato-certification-program/>.

⁴⁸⁰ Sub-Agency of the Ministry of Internal Affairs of Georgia – On Approval of Clothing and Attributes of Military Personnel of the Department of State Border Protection, Decree 746 § (2005), <https://matsne.gov.ge/ka/document/download/95848/0/ge/doc>.

on February 12, 2010.⁴⁸¹ Most of the GCG uniforms, especially the summer rigs, resemble the white uniforms of navies, including the ceremonials (Figure 25).⁴⁸² Sailors wear a plain dark combat rig for working onboard ships.⁴⁸³ The 2010 decree also introduced the camouflaged battle dress uniform for GCG personnel to use during field engagements.⁴⁸⁴ The ranks, traditions, and culture of the GCG are consistent with most conventional navies, rather than with police forces.



Figure 26. GCG personnel in their white ceremonial uniforms at an official function.⁴⁸⁵

⁴⁸¹ Legislative Herald of Georgia, “Sub-Department of the Ministry of Internal Affairs of Georgia - On Approval of Uniforms and Attributes of Military Servicemen of the State Border Guard Department,” February 12, 2010, <https://matsne.gov.ge/ka/document/view/106906>.

⁴⁸² Border Police of the Ministry of Internal Affairs of Georgia, “Coast Guard - Border Police of the Ministry of Internal Affairs of Georgia,” July 2, 2016, <https://web.archive.org/web/20160702062111/http://bpg.gov.ge/ge/coast-guard>.

⁴⁸³ Sub-agency of the Ministry of Internal Affairs of Georgia – On Approval of Clothing and Attributes of Military Personnel of the Department of State Border Protection, 31.

⁴⁸⁴ Legislative Herald of Georgia, “Sub-Department of the Ministry of Internal Affairs of Georgia - On Approval of Uniforms and Attributes of Military Servicemen of the State Border Guard Department.”

⁴⁸⁵ Source: Georgia About, “About Law Enforcement – Border Police of Georgia,” April 26, 2014, <https://georgiaabout.com/2014/04/26/border-police-of-georgia/>.

5. Behavior and Application

The GCG, although a force under a civil organizational structure, more closely reflects its military structure and mandate than its constabulary roles. Also, despite having legal mandates for SAR and pollution response, which are MER operations considered by many as primary CG roles, the GCG is not the lead agency that provides these services in Georgia. The MRCC in Georgia is operated under the Maritime Transport Agency (MTA), which is the leading agency for coordinating SAR at sea.⁴⁸⁶ During maritime pollution response incidents, it is the MTA of Georgia, not the GCG, that coordinates as the leading agency.⁴⁸⁷ The MTA is an organization under the Ministry of Economy and Sustainable Development of Georgia.

As stated already, the GCG participates in a number of naval exercises, furthering its naval tactics and capabilities to operate with NATO units, adopting similar operational SOPs and standards. As described in the Development Strategy-2014 of the Interior Affairs Ministry, the GCG's development path is in alignment with NATO guidelines.⁴⁸⁸ Hence, the behavior of the GCG is more combat-oriented like that of a navy, rather than a civil MLE agency. In the future, the GCG could either split to form a Georgian Navy, or be developed into a more robust military force within the Ministry of Defense. Its current pipeline of training and capacity building is unlikely to take it on a different path. In view of this, the GCG should be categorized as a military CG, rather than a civil constabulary agency.

E. CONCLUSION

The chapter has covered the AVCG, CACG, and GCG. Among the three civil agencies, the AVCG was identified as similar to an auxiliary CG MERA, despite the absence of an Australian federal CG. The AVCG is engaged in a supporting role to local

⁴⁸⁶ Maritime Transport Agency of Georgia, "Functions and Structure," 2022, https://mta.gov.ge/index.php?m=149&parent_id=135.

⁴⁸⁷ Maritime Transport Agency of Georgia, "Maritime Transport Agency of Georgia - Response to Oil Spill," 2022, https://mta.gov.ge/index.php?m=152&parent_id=150.

⁴⁸⁸ Ministry of Internal Affairs - Georgia, "Strategy 2014," 32.

enforcement authorities and holds no strategic status within the maritime security structure of Australia. The AVCG and other volunteer organizations are key elements in SAR efforts along Australia's coastal regions. The case of the CACG is unique as the agency carries out extensive SAR operations and several supportive and logistic roles within the maritime domain of Canada. One of the key features of the CACG is its vital capability to carry out icebreaking in the polar regions north of Canada, especially the North-West Passage. The GCG was adapted to evolve into a navy due to the absence of a Georgian Navy after the 2008 conflict with Russia. Consequently, the GCG is primarily developing its military capability and SOPs rather than its role as a maritime constabulary unit.

The AVCG is different from the rest of the CGs examined in the chapter due to its civil non-governmental and volunteer nature. Its supportive roles within the realm of SAR, however, are vital for local regions in Australia. Among the two civil-government CGs, there is a vast difference in how they are structured and how they operate. These differences are fundamentally due to the fact that Canada has a navy and Georgia does not. Furthermore, Canada also has the RCMP, which is an armed unit with MLE authority. The CACG is a passive unarmed CG, while the GCG is being developed as a quasi-navy or as a more assertive military force to face the hostile environment in which it operates. The analysis shows that the AVCG and CACG are both MERAs, while the GCG is an MLEA that leans more towards a naval organization.

THIS PAGE INTENTIONALLY LEFT BLANK

VII. CASE 4: ISLAND MILITARY COAST GUARDS

A. INTRODUCTION

This chapter covers two CGs belonging to island nations and represent as military organizations. These are the Jamaica Defense Force Coast Guard (JDFCG) of Jamaica and the Maldives National Defense Force Coast Guard (MCG) of the Maldives. These two CGs belong to archipelagic states in two different geographical locations with diverse threat matrices. The JDFCG represents the Caribbean, while the MCG represents the Indian Ocean region. Most importantly, these two unique maritime organizations illustrate how much smaller nations arrange their force to counter the maritime threats within their vast maritime borders.

The two agencies are analyzed using the same attributes that were applied in previous cases. Each of these cases is developed after describing the maritime background of the countries, which is expected to provide an understanding of the importance of establishing a maritime security organization such as the CG. The cases are analyzed through their organizational ontology, roles and responsibilities, strategic status within the state, physical characteristics, and their behavior and application with regard to the previously identified attributes.

B. JAMAICA DEFENSE FORCE COAST GUARD

Jamaica is a small archipelagic nation in the Caribbean that consists of a main island and three small landmasses: the Morant Cays, Blower Rock, and Southwest Rock.⁴⁸⁹ Jamaica has maritime borders with Columbia, Cuba, Honduras, Haiti, and the Cayman Islands.⁴⁹⁰ The archipelagic baseline of Jamaica is approximately 838 km (521 mi), where the archipelagic baseline is an additional equivalent to the coastline of a coastal continental

⁴⁸⁹ United States Department of State, *Jamaica's Maritime Claims and Boundaries*, Limits in the Seas (Washington, D.C.: United State Department of State Bureau of Oceans and International Environmental and Scientific Affairs, 2004), 4, <https://www.state.gov/wp-content/uploads/2019/12/LIS-125.pdf>.

⁴⁹⁰ Marine Regions, "Jamaica MRGID 8459," accessed March 21, 2022, <https://www.marinerregions.org/eezdetails.php?mrgid=8459&zone=eez>.

state.⁴⁹¹ The sum of the coastline of its landmasses is 1,022 km (635 mi).⁴⁹² The main island, which is the only inhabited landmass, is approximately 10,990 sq km (4,243 sq mi), and the archipelagic waters include an area of approximately 22,200 sq km (8,571 sq mi).⁴⁹³ Jamaica has an EEZ of 263,284 sq km (101,655 sq mi), which is approximately 25 times the size of its land area (Figure 27).⁴⁹⁴ Its EEZ also includes an area of 52,036 sq km (20,091 sq mi), which is jointly managed by Columbia and Jamaica, under a bilateral agreement signed on November 12, 1994.⁴⁹⁵

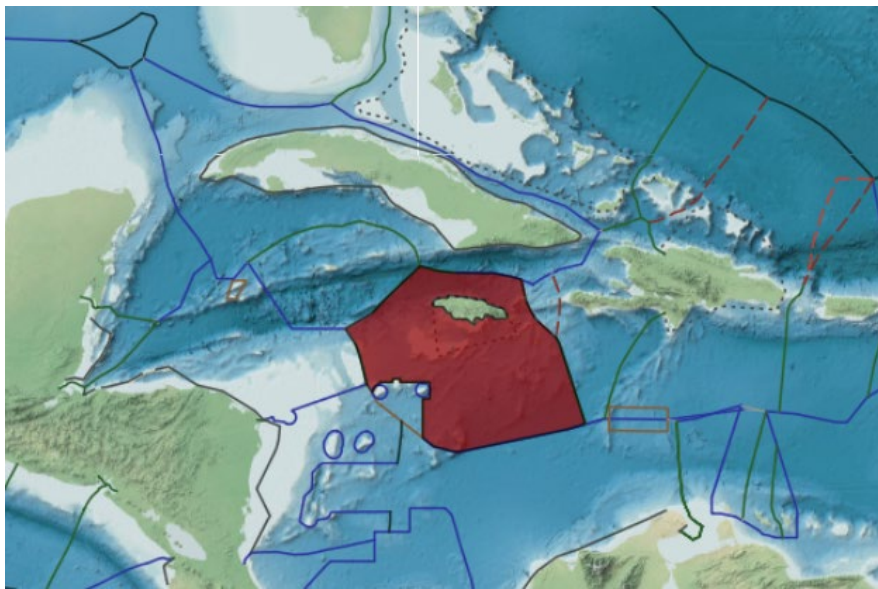


Figure 27. Jamaican maritime domain, with its EEZ highlighted in red.⁴⁹⁶

⁴⁹¹ United States Department of State, *Jamaica Maritime Claims*, 4.

⁴⁹² Caribbean Regional Fisheries Mechanism, *CRFM Statistics and Information Report 2020* (Belize and St. Vincent and the Grenadines, 2021), 3, https://www.crfm.int/images/documents/CRFM%20Statistics%20and%20Information%20Report%202020_Final_Published.pdf.

⁴⁹³ United States Department of State, *Jamaica Maritime Claims*, 4.

⁴⁹⁴ Caribbean Regional Fisheries Mechanism, *CRFM Statistics and Information Report 2020*, 3.

⁴⁹⁵ Maritime Delimitation Treaty Between Jamaica and the Republic of Columbia (United Nations, November 12, 1993), Article 3.

⁴⁹⁶ Source: Marine Regions, “Jamaica · MRGID 8459.”

Jamaica is highly dependent on its maritime domain for its economic development and sustenance, which amounts to 90 percent of the country's total trade.⁴⁹⁷ The tourism industry earns the majority of the country's foreign exchange revenue, in which the passenger cruise service has a major stake.⁴⁹⁸ In addition to tourism, fisheries play a vital role in the socio-economic sector of Jamaica.⁴⁹⁹ These economic activities are not the only activities that have been booming in Jamaican waters. The Jamaican maritime domain is also being used for various nefarious activities such as irregular migration, weapons trafficking, and drug trafficking.⁵⁰⁰

According to U.S. authorities, Jamaica lies on one of the most well-established narco-trafficking trails in the Caribbean,⁵⁰¹ and the growing crimes at sea show no signs of diminishing. In 2019, the JDFCG seized 4,000 pounds of cocaine, which is only a fraction of the amount being trafficked in the area.⁵⁰² The illegal drug market has also fueled gang violence in Jamaica. Among all the Latin American and Caribbean states combined, the homicide rates per population in Jamaica are the second highest.⁵⁰³ Hence, weapons trafficking has also seen a rise in Jamaica. These weapons are mainly trafficked from the sea. There have also been recent reports of Jamaican gangs bartering drugs for

⁴⁹⁷ Okoye Henry, "Gov't Implementing Laws to Support Blue Economy," Jamaica Information Service, February 18, 2019, <https://jis.gov.jm/govt-implementing-laws-to-support-blue-economy/>.

⁴⁹⁸ Damith Wickramanayake, Sharlene Brown, and Zhenqing Zheng, "Maritime Policy Fragmentation and Integration Effects in Jamaica," *The International Journal of Logistics Management* 10, no. 1 (April 25, 2021): 2, <https://doi.org/10.5923/j.logistics.20211001.02>.

⁴⁹⁹ Judy-Ann Icinda Neil, "IUU Fishing: A Gateway to Transnational Crimes in Jamaica" (Sweden, World Maritime University, 2018), 15, https://commons.wmu.se/cgi/viewcontent.cgi?article=1656&context=all_dissertations#:~:text=The%20research%20examined%20whether%20IUU,TOCs%20committed%20by%20maritime%20conveyance.

⁵⁰⁰ Seth Robbins, "Jamaica and Haiti Swap Drugs and Guns," InSight Crime, June 23, 2020, <https://insightcrime.org/news/analysis/jamaica-haiti-drugs-guns/>.

⁵⁰¹ The Economist, "Full Circle; Drugs Trafficking in the Caribbean" (May 24, 2014): 43, <https://www.proquest.com/docview/1528518974/abstract/13EDD3C7057445CPQ/1>.

⁵⁰² The Gleaner, "Fishing for Guns - Old Harbour Bay Boatmen Rake in Profits with Drugs-For-Arms Trafficking to Haiti," February 10, 2020, <https://jamaica-gleaner.com/article/lead-stories/20200210/fishing-guns-old-harbour-bay-boatmen-rake-profits-drugs-arms>.

⁵⁰³ Robbins, "Jamaica and Haiti Swap Drugs and Guns."

illegal weapons at sea—mainly through Haitian criminal elements.⁵⁰⁴ It is estimated that between 150 to 200 illegal weapons are smuggled every month from Haiti into Jamaica by sea.⁵⁰⁵ In response, Jamaica has put a lot of effort into countering these activities as the nation is undertaking ambitious economic development activities at sea.

Recently, Jamaica has focused on developing its blue economy. The contributors to Jamaica’s blue economy include the “cruise industry, tourism, inter-island transportation of passengers and goods, as well as exploited and potential oil and gas reserves.”⁵⁰⁶ The Jamaican government has recognized the need to secure their waters in parallel with these economic ambitions, developing strategies to protect the marine environment.⁵⁰⁷ This includes curbing the IUUF activities the country faces which have affected the country’s fishing and aquaculture industries.⁵⁰⁸ These strategies would also require the government and private agencies to cooperate in order to consolidate economic initiatives and curb criminal interests at the same time. There are a number of maritime agencies within the Jamaican government to address all these activities.

Some of the agencies within the Jamaican maritime system include the Maritime Authority of Jamaica (MAJ), the Ports Authority of Jamaica (PAJ), the Jamaica Customs Department (JCD), the National Environmental Planning Agency (NEPA), the Office of Disaster Prevention and Emergency Management (ODPEM), and the JDFCG.⁵⁰⁹ Among these, the JDFCG has been at the forefront of protecting and facilitating trade in Jamaica’s maritime jurisdiction. In 2020, the National Security Minister stated that the government of Jamaica has spent millions to modernize the JDFCG’s maritime fleet, which includes

⁵⁰⁴ The Gleaner, “Fishing for Guns - Old Harbour Bay Boatmen Rake in Profits with Drugs-For-Arms Trafficking to Haiti.”

⁵⁰⁵ Robbins, “Jamaica and Haiti Swap Drugs and Guns.”

⁵⁰⁶ SAFETY4SEA, “Jamaica Focuses on the Importance of Blue Economy,” March 17, 2019, <https://safety4sea.com/jamaica-focuses-on-the-importance-of-blue-economy/>.

⁵⁰⁷ Henry, “Gov’t Implementing Laws to Support Blue Economy.”

⁵⁰⁸ Neil, “IUU Fishing: A Gateway to Transnational Crimes in Jamaica,” 29.

⁵⁰⁹ Neil, 6, 9–10, 12.

maritime patrol aircraft, vessels, and a well-developed communications network.⁵¹⁰ The JDFCG is an important asset to develop as Jamaica looks to strengthen its blue economy in the coming years.

1. Organizational Ontology

The JDFCG is the naval arm of the Jamaica Defense Force (JDF). The JDFCG was initially formed in 1962 as the Jamaica Sea Squadron, which was renamed the Jamaica Defense Force Coast Guard in 1966.⁵¹¹ The JDFCG is a military sub-organization within the armed forces of Jamaica, as stated in Article 4 of “The Defense Act.”⁵¹² The JDFCG has two units, the First District JDFCG and the Second District JDFCG, where the latter was established in late 2021.⁵¹³ Both of these operational units of the JDFCG are attached to the Maritime, Air and Cyber Command (MACC) of the JDF.⁵¹⁴ This is a brigade-level joint operational formation that has four other units in addition to the two JDFCG units. The MACC delivers a more amplified service of the JDFCG, countering threats within the combined domains of maritime, air, and cyber.⁵¹⁵ The JDFCG has a total of five stations along the archipelago. The main station is in the town of Port Royal on the main island.⁵¹⁶

The JDFCG is a tier III organization that falls under the JDF, which is administratively accountable to the Ministry of National Security of Jamaica.⁵¹⁷ The Minister is accountable to the Prime Minister of Jamaica, who is answerable to the

⁵¹⁰ The Gleaner, “Fishing for Guns - Old Harbour Bay Boatmen Rake in Profits with Drugs-For-Arms Trafficking to Haiti.”

⁵¹¹ Jamaica Defense Force, “1st DIST JDF Coast Guard,” accessed March 21, 2022, <https://www.jdfweb.com/1st-dist-jdf-coast-guard/>.

⁵¹² The Defense Act (1962), Article 4, <https://moj.gov.jm/laws/defence-act>.

⁵¹³ Basil Jarrett, “New Jamaica Defence Force Unit Seizes 1 Ton of Cocaine,” *Diálogo Americas: Digital Military Magazine*, January 11, 2022, <https://dialogo-americas.com/articles/new-jamaica-defence-force-unit-seizes-1-ton-of-cocaine/>.

⁵¹⁴ Jamaica Defense Force, “Maritime, Air and Cyber Command,” accessed March 21, 2022, <https://www.jdfweb.com/maritime-air-and-cyber-command/>.

⁵¹⁵ Jamaica Defense Force.

⁵¹⁶ Jamaica Defense Force, “Coast Guard Bases,” accessed March 21, 2022, <https://www.jdfweb.com/coast-guard-bases/>.

⁵¹⁷ The Ministry of National Security of Jamaica, “Welcome to The Ministry of National Security,” accessed March 21, 2022, <https://mns.gov.jm/>.

Governor-General appointed by the reigning monarch of the United Kingdom. The country's defense portfolio is held by the Prime Minister, who has overall command of the JDF.⁵¹⁸ The JDF is also accountable to a four-member Jamaica Defense Board on all matters related to the organization, except on operational matters.⁵¹⁹ The JDFCG has a reserve force, established as a sub-unit in 1963, which was initially the Jamaican Marine Reserve (Harbor) and the Jamaica Marine Reserve (Coast Guard).⁵²⁰ Considering the organizational structure of the JDF, it can be determined that the JDFCG is a military organization with a naval hierarchical structure.

2. Roles and Responsibilities

The JDFCG is mandated with two main missions—maritime safety and MLE.⁵²¹ Its maritime safety roles include:

- Maritime SAR;
- Pleasure craft inspections; and
- Response to oil spills and other hazardous substances.

The JDFCG's MLE roles include:

- Fisheries protection;
- Drug interdiction; and
- Customs and Immigration missions.

⁵¹⁸ Jamaica Parliament, "Cabinet Ministers," 1, accessed April 27, 2022, http://www.japarliament.gov.jm/attachments/791_CABINET%20MINISTERS.pdf.

⁵¹⁹ The Defense Act, 9–10.

⁵²⁰ Jamaica Defense Force, "1st DIST JDF Coast Guard."

⁵²¹ Jamaica Defense Force, "Coast Guard Duties," accessed March 21, 2022, <https://www.jdfweb.com/coast-guard-duties/>.

Under Article 5 of the “Defense Act of Jamaica,” the JDF, JDFCG’s parent organization, is responsible for “the defense of and maintenance of order in Jamaica.”⁵²² The article further states that the JDF would take up other duties that are passed on by the Defense Board. This indicates that the JDFCG, as a subordinate unit of the JDF, would be expected to conduct military operations, such as combat operations at sea. Much like other maritime states’ agencies, the JDFCG would also take up supporting roles for several other stakeholders in the Jamaican maritime domain. Hence, the roles of the JDFCG range from combat to MER roles at sea.

3. Strategic Status

Jamaica has a considerably large maritime body compared to its landmass, which would require a number of mechanisms to address the surveillance, interdiction, and suppression of maritime crimes. The area for which the JDFCG is accountable, in terms of maritime and aeronautical SAR coordination and legal jurisdiction, amounts to 515,000 sq km (198,843 sq mi).⁵²³ This ratio of maritime area to the operational capability of the JDF and its CG is in itself a major challenge for the JDFCG. One of the key illicit activities the JDFCG is expected to counter in this body of water is the rampant drug smuggling. Jamaica is listed as the largest illegal supplier of marijuana to the United States and to other islands in the Caribbean.⁵²⁴ Hence, this is expected to remain the highest op-tempo of the JDFCG.

To overcome its maritime law enforcement challenges, Jamaica has a “Shiprider Agreement” with the United States, signed in 1997, which is currently being enhanced.⁵²⁵ This agreement helps Jamaica fend off drug traffickers in its territorial waters by utilizing the USCG LEDETs. Another mechanism initiated by the United States is the Caribbean Basin Security Initiative (CBSI), which was launched in 2010 to “support efforts to reduce

⁵²² The Defense Act, Article 5.

⁵²³ Jarrett, “New Jamaica Defence Force Unit Seizes 1 Ton of Cocaine.”

⁵²⁴ News Americas Now, “Five Caribbean Nations Named Major Illicit Drug Transit Countries,” March 21, 2017, <https://www.newsamericasnow.com/five-caribbean-nations-named-major-illicit-drug-transit-countries/>.

⁵²⁵ Alecia Smith, “Jamaica and U.S. Close to Finalizing Improved Protocols Pertaining to Shiprider Agreement,” Jamaica Information Service, February 15, 2021, <https://jis.gov.jm/jamaica-and-us-close-to-finalising-improved-protocols-pertaining-to-shiprider-agreement/>.

illicit trafficking, increase citizen security, and promote crime prevention.”⁵²⁶ Through this mechanism, the United States has assisted the JDFCG in building maritime interdiction capability, training, and technical assistance by providing Technical Assistance Field Teams and assistance in increasing maritime domain awareness.⁵²⁷

An additional mechanism to address the maritime issues in the region is the Caribbean Community (CARICOM), which includes 15 member states of the Caribbean.⁵²⁸ According to the “Strategic Plan for the Caribbean Community 2015–2019,” released by the CARICOM secretariat, enhancing security and justice remains a high-priority area for implementation.⁵²⁹ This strand of the strategy includes integrated training for security and law enforcement personnel, a maritime border surveillance mechanism, and information sharing mechanisms to “manage shared risks and threats.”⁵³⁰ The other engagement within the scope of CARICOM is the Caribbean Regional Fisheries Mechanism (CRFM), established in 2002.⁵³¹ This mechanism was established to manage marine resources in the region.⁵³² It includes cooperation in combating fishery exploitation within CARICOM waters and ways to “promote the protection” of fishing grounds.⁵³³ The JDFCG, on behalf of Jamaica, takes responsibility for these key strategic goals.

Apart from regional capabilities, the government has also strategized to modernize the fleet of the JDFCG to keep pace with the security dynamics of the region. This move

⁵²⁶ United States Department of State, “Caribbean Basin Security Initiative,” accessed March 22, 2022, <https://2017-2021.state.gov/caribbean-basin-security-initiative/>.

⁵²⁷ United States Department of State, “Caribbean Basin Security Initiative: Jamaica,” December 11, 2018, <https://2017-2021.state.gov/caribbean-basin-security-initiative-jamaica/>.

⁵²⁸ Caribbean Community, “Member States and Associate Members-CARICOM,” accessed March 22, 2022, <https://caricom.org/member-states-and-associate-members/>.

⁵²⁹ Caribbean Community, “Strategic Plan - Caribbean Community 2015–2019: Repositioning CARICOM,” July 3, 2014, iv, <https://caricom.org/documents/strategic-plan-caribbean-community-2015-2019/>.

⁵³⁰ Caribbean Community, 23–24.

⁵³¹ Caribbean Regional Fisheries Mechanism, “Agreement Establishing the Caribbean Regional Fisheries Mechanism,” 2002, https://www.crfm.int/index.php?option=com_k2&view=item&layout=item&id=2&Itemid=116.

⁵³² Caribbean Regional Fisheries Mechanism, Article 4.

⁵³³ Caribbean Regional Fisheries Mechanism, Articles 5, 9.

came after the government launched the “Plan Secure Jamaica” for the fiscal years 2016/2017 to 2022/2023, at a cost of \$1.2 billion.⁵³⁴ In addition to maritime security, the “Plan Secure Jamaica” includes “creating a safe, secure, cohesive and just society.”⁵³⁵ The acquisition of security platforms, establishing new formations such as the MACC and the Second District JDFCG within the JDF, and the establishment of the Office of National Security Advisor are some of the reforms of the project.⁵³⁶ It is further expected that the Jamaican government would spend \$346.7 million on the project for the ongoing fiscal year 2022/23.⁵³⁷

The JDF and its subordinate units have achieved some success with the Plan. Since air capability plays an important role in maritime surveillance, under the Plan, the Jamaican government acquired a Beechcraft King Air 350 WR maritime patrol aircraft for the JDF Air Wing in 2018 to boost the JDFCG’s MDA capacity.⁵³⁸ This also includes the acquisition of the state-of-the-art “Coast Watcher 100 long-range surveillance radars” from the French company Thales in 2019.⁵³⁹ These radars are known to be able to detect low-profile targets such as small crafts that are typically involved in smuggling activities.⁵⁴⁰ Furthermore, the government has been acquiring new vessels with better capabilities to counter the threats in the maritime domain. During the commissioning ceremony of one of the newer vessels in 2020, the Prime Minister highlighted the importance of safeguarding the maritime domain to ensure national security and to support its blue economy.⁵⁴¹ These

⁵³⁴ Latonya Linton, “Gov’t Committed to Plan Secure Jamaica – Dr. Chang,” Jamaica Information Service, February 4, 2021, <https://jis.gov.jm/govt-committed-to-plan-secure-jamaica-dr-chang/>.

⁵³⁵ Linton.

⁵³⁶ Andrew Holness, “2017/2018 Budget Presentation: PM Andrew Holness,” 15, https://cabinet.gov.jm/wp-content/uploads/2017/09/Plan-Secure-Jamaica-PM-Presentation-2017_V2.pdf.

⁵³⁷ Henry, “Gov’t Implementing Laws to Support Blue Economy.”

⁵³⁸ Douglas McIntosh, “JDF Acquires New Surveillance Aircraft,” Jamaica Information Service, November 16, 2018, <https://jis.gov.jm/jdf-acquires-new-surveillance-aircraft/>.

⁵³⁹ Naval Technology, “Jamaica Buys Thales’ Maritime Surveillance Technology to Boost Security,” April 10, 2019, <https://www.naval-technology.com/news/jamaica-maritime-surveillance-technology/>.

⁵⁴⁰ Naval Technology.

⁵⁴¹ Tanesha Mundle, “PM Commissions HMJS Nanny Of The Maroons Into Service,” Jamaica Information Service, July 30, 2020, <https://jis.gov.jm/pm-commissions-hmjs-nanny-of-the-maroons-into-service/>.

engagements and efforts to supplement the capabilities of the JDFCG and its roles are imperative to the agency's crucial status within the maritime security system of Jamaica.

4. Physical Characteristics

The JDFCG vessels resemble naval vessels with their naval gray paint scheme. The JDFCG vessels have the English inscription "COAST GUARD" printed in black on the hull of the mid-ship.⁵⁴² Unlike most CG platforms presented in this paper, the JDFCG vessels do not display a racing stripe. One of the latest JDFCG platforms acquired by the government of Jamaica was the HMJS *Nanny of the Maroons*, which is an OPV class platform of 54 meters (177 feet) in length (Figure 28).⁵⁴³ This last addition to the JDFCG fleet has a plumb bow, which is a vertical bow compared to the normal raked bows. This design is rare in CG vessels but has a history in warship designs to improve speed and make them more fuel efficient.⁵⁴⁴ The JDFCG utilizes the .50-caliber (12.7 mm) machine guns as its primary weapon onboard the large ships.⁵⁴⁵

⁵⁴² Jamaica Defense Force, "Coast Guard Gallery," accessed March 22, 2022, <https://www.jdfweb.com/coast-guard-gallery/>.

⁵⁴³ Marine Traffic, "Ship Nanny of the Maroons (Offshore Supply Ship)," March 22, 2022, https://www.marinetraffic.com/en/ais/details/ships/shipid:6160965/mmsi:339122100/imo:9768344/vessel:NANNY_OF_THE_MAROONS.

⁵⁴⁴ Global Security, "New Generation Floreal Frigate (NG2F)," accessed March 22, 2022, <https://www.globalsecurity.org/military/world/europe/stx-ng2f.htm>.

⁵⁴⁵ Edward L. Kobobel III, "Wasp Conducts Anti-Terrorism Force Protection Information Exchange with Jamaican Defense Forces Coast Guard," DVIDS, November 19, 2009, <https://www.dvidshub.net/news/41977/wasp-conducts-anti-terrorism-force-protection-information-exchange-with-jamaican-defense-forces-coast-guard>.



Figure 28. JDFCG ship Nanny of the Maroons.⁵⁴⁶

The JDFCG personnel, being trained as naval officers, display ranks and uniforms similar to those of the Royal Navy.⁵⁴⁷ These include the naval summer whites for enlisted and officer ranks (Figure 29).⁵⁴⁸ The JDFCG personnel in the field use battle dress uniforms with a gray, white, and black digital pattern.⁵⁴⁹ In order to train the JDF officers, the Jamaican government established the Caribbean Military Academy (CMA) on May 1, 2019, as a military university.⁵⁵⁰ Additionally, the JDFCG officers go through further trainings to become naval officers from the Britannia Royal Naval College in Dartmouth, England.⁵⁵¹ The CMA also manages the Caribbean Military Maritime Training Center

⁵⁴⁶ Source: Negril, “HMJS Nanny of the Maroons,” accessed April 3, 2022, <https://negril.com/forum/showthread.php/20752-HMJS-Nanny-of-the-Maroons>.

⁵⁴⁷ Jamaica Defense Force, “1st DIST JDF Coast Guard.”

⁵⁴⁸ Jamaica Defense Force, “Coast Guard Gallery.”

⁵⁴⁹ Jamaica Defense Force.

⁵⁵⁰ Caribbean Military Academy, “About the Caribbean Military Academy,” accessed March 22, 2022, <http://caribbeanmilitaryacademy.edu.jm/academy.php>.

⁵⁵¹ Global Security, “Jamaica - Military Personnel,” accessed April 27, 2022, <https://www.globalsecurity.org/military/world/caribbean/jm-personnel.htm>.

(CMMTC), which is a professional maritime training center for JDFCG and “regional maritime forces in order to effectively control the Caribbean Maritime space.”⁵⁵²



Figure 29. JDFCG sailors in traditional naval white uniforms.⁵⁵³

5. Behavior and Application

The JDFCG is a unit within the JDF, which is the armed forces of Jamaica. As a tier III unit within the armed forces hierarchy, the JDFCG remains a military unit. The ambitious development projects of the Jamaican government are also focused on reducing the rampant crime on land and at sea—spending a substantial amount on upgrading the security services, especially for the JDFCG. Regardless of its military organizational structure and naval traditions, the JDFCG is primarily engaged in countering criminal activities at sea. The JDFCG is being developed not as a naval force, but rather as a constabulary unit, that has the capability to assert deadly force to compel compliance in criminal situations.

⁵⁵² Caribbean Military Academy, “Caribbean Military Maritime Training Center (CMMTC),” Caribbean Military Academy, accessed March 22, 2022, <http://caribbeanmilitaryacademy.edu.jm/cmmtc.php>.

⁵⁵³ Source: Jamaica Defense Force, “Coast Guard Gallery.”

The physical characteristics of the JDFCG resemble those of a military force despite its policing roles. The naval paint scheme and the absence of a racing stripe would reinforce the perception that the platforms are more of a naval military unit rather than a constabulary or policing unit. This is most likely due to the fact that there is no navy in Jamaica. Regardless of the military appearance of JDFCG platforms, they are equipped only with firepower enough to engage criminals at sea rather than the capacity to conduct traditional combat operations.

C. MALDIVES NATIONAL DEFENSE FORCE COAST GUARD

The Maldives is a small archipelagic state located off the southwest coast of India, in the Indian Ocean. In the south of Maldives is the British Indian Ocean Territory (BIOT), or the Chagos Archipelago, which is the subject of dispute between the UK and Mauritius.⁵⁵⁴ The island of Diego Garcia in this archipelago is home to a U.S. military base, which is approximately 575 km (357 mi) from the southernmost point of Maldives. The Maldives' maritime boundaries are governed by the "Maritime Zones Act" of 1996, which claims its maritime jurisdiction.⁵⁵⁵ According to this Act, the country has a total archipelagic baseline amounting to approximately 650 km (404 mi).⁵⁵⁶ The EEZ of the Maldives is 923,322 sq km (356,497 sq mi) (Figure 30).⁵⁵⁷ Maldives submitted its EEZ boundary to the UN in 2010, where Mauritius challenges the claims over its overlapping claims with BIOT.⁵⁵⁸

⁵⁵⁴ Ahmed Mujuthaba and David Brewster, "Maldives Embroiled in Mauritius-UK Tussle Over Chagos," *The Interpreter*: Lowy Institute, December 8, 2021, <https://www.lowyinstitute.org/the-interpreter/maldives-embroiled-mauritius-uk-tussle-over-chagos>.

⁵⁵⁵ Maritime Zones of Maldives Act, 6/96 § (1996), https://www.un.org/Depts/los/LEGISLATIONANDTREATIES/PDFFILES/MDV_1996_Act.pdf.

⁵⁵⁶ Natucate, "Maldives Country Information," accessed March 22, 2022, <https://www.natucate.com/en/destinations/travel-guide-maldives>.

⁵⁵⁷ Ritika V. Kapoor, "Sea Wall in the Maldives and Its Sustainability," National Maritime Foundation, September 4, 2020, <https://maritimeindia.org/sea-wall-in-the-maldives-and-its-sustainability/>.

⁵⁵⁸ Mujuthaba and Brewster, "Maldives Embroiled in Mauritius-UK Tussle Over Chagos."

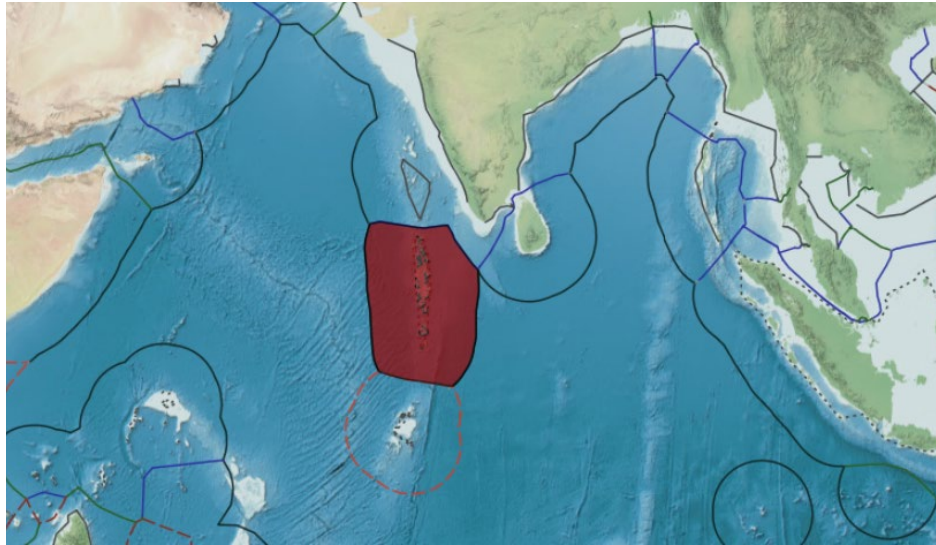


Figure 30. Maldivian maritime domain, with its EEZ highlighted in red.⁵⁵⁹

The country's maritime boundary is 45 times larger than its landmass, which is approximately 20,130 sq km (7,772 sq mi), potentially making it a challenge for the small country to manage.⁵⁶⁰ The Maldives has a total of over a thousand islands, arranged into 25 geographical rings of islands, known as atolls, in which only around 220 islands are inhabited.⁵⁶¹ The country's main foreign revenues come from its high-end tourism industry, which has allocated 87 islands as tourist resorts.⁵⁶² In addition to the tourism industry, Maldives also has a flourishing fisheries sector, where harmful fishing practices such as seining or shark fishing are illegal. The Maldives, as a small archipelagic state, heavily relies on the maritime trade for its sustenance.

The Maldives does not have a maritime strategy or a consolidated plan to jointly manage the large maritime domain it has claimed. Despite this, there are multiple agencies responsible to engage in various sectors of the maritime domain. One of these is the

⁵⁵⁹ Source: Marine Regions, "Maldives MRGID 8345," accessed March 22, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8345>.

⁵⁶⁰ United States Department of State, *Maldives Maritime Claims and Boundaries*, Limits in the Seas (Washington, D.C: Bureau of Oceans and International Environmental and Scientific Affairs, 2005), 3, <https://www.state.gov/wp-content/uploads/2019/12/LIS-126.pdf>.

⁵⁶¹ Natucate, "Maldives Country Information."

⁵⁶² Natucate.

Ministry of Fisheries, Marine Resources and Agriculture (MOFA), which “ensure(s) the development and sustainable management of marine resources.”⁵⁶³ The Ministry of Transport and Civil Aviation (MOT) ensures the safety of transportation across the country.⁵⁶⁴ The Ministry of Home Affairs, with its subsidiary agency the Maldives Police Service (MPS), maintains law and order in the country.⁵⁶⁵

Regarding defense, the Ministry of Defense (MOD) and its subordinate entities are responsible for maintaining territorial integrity, which includes the vast maritime body.⁵⁶⁶ While the Maldives does not have traditional security threats from other nations, the MOD’s entities and the MPS have been tackling the growth of non-traditional security threats such as drug trafficking across the maritime domain. The agency at the forefront of this in the maritime domain is the Maldives National Defense Force’s (MNDF) Coast Guard (MCG).⁵⁶⁷

1. Organizational Ontology

The historical roots of the MCG go back to the 16th century when Maldivians utilized vessels to raid the colonizing Portuguese.⁵⁶⁸ The modern-day MCG was formed on January 1, 1980, with smaller speed boats, mainly to curb illegal fishing in Maldivian waters.⁵⁶⁹ The MCG is the maritime arm of the MNDF. The MNDF is the armed forces of

⁵⁶³ Government of Maldives, “Ministry of Fisheries, Marine Resources and Agriculture,” accessed March 22, 2022, <https://www.gov.mv/en/organisations/ministry-of-fisheries-marine-resources-and-agriculture>.

⁵⁶⁴ Government of Maldives, “About Us - Ministry of Transport and Civil Aviation,” accessed March 22, 2022, <https://www.gov.mv/en/organisations/ministry-of-transport-and-civil-aviation/about>.

⁵⁶⁵ Government of Maldives, “Ministry of Home Affairs,” accessed March 22, 2022, <https://www.gov.mv/en/organisations/ministry-of-home-affairs>.

⁵⁶⁶ Government of Maldives, “About Us - Ministry of Defense,” accessed March 22, 2022, <https://www.gov.mv/en/organisations/ministry-of-defence/about>.

⁵⁶⁷ United Nations: Office on Drugs and Crime, “Drug Trafficking on the Southern Route and Impact on Coastal States” (High Level Meeting of Interior Ministers of the Indian Ocean Region, Colombo: Sri Lanka, 2016), 14, <http://www.southernroute.org/download/Drug%20Trafficking%20on%20the%20Southern%20Route.pdf>.

⁵⁶⁸ Military Wiki, “Maldivian Coast Guard,” accessed March 22, 2022, https://military-history.fandom.com/wiki/Maldivian_Coast_Guard.

⁵⁶⁹ Mariyam Afaaf Adam, “Coast Guard Celebrates 40 Years of Service with a Flag-Hoisting Ceremony,” Raajjemv, January 1, 2020, <https://raajje.mv/68748>.

the Maldives, according to the “Armed Forces Act.”⁵⁷⁰ The MCG is a part of MNDF’s “combat and maneuver forces,” which further include other sub-organizations, such as the Marine Corps and the Fire and Rescue Service.⁵⁷¹ The Chief of Defense Force (CDF) is accountable to the Minister of Defense, who in turn is accountable to the President of Maldives. In view of this hierarchical structure, the MCG can be considered a tier III sub-organization under the MNDF.

The MCG operates as four main operational squadrons: the First, Second, Third, and Fourth Squadrons.⁵⁷² These squadrons are attached to the four MNDF Area Commands to carry out the MCG mission.⁵⁷³ It is the Area Commanders who have operational control over the MCG assets, not the MCG Commandant. The MCG Commandant is only mandated to provide trained personnel and operationally ready units to the Area Commands. In turn, the CDF has complete control over the operational and administrative formations of the MNDF.⁵⁷⁴ The core structure within the MNDF is made up of an Integrated Headquarters, which is manned by personnel from all the combined arms.⁵⁷⁵

2. Roles and Responsibilities

The roles and responsibilities of the MCG are derived from the “Armed Forces Act,” which outlines some key authorities of the organization.⁵⁷⁶ The key roles mandated to the MCG are listed below:⁵⁷⁷

⁵⁷⁰ Maldives National Defense Force, “Organization - MNDF,” accessed March 22, 2022, <https://mndf.gov.mv/mndf/en/organization.php>.

⁵⁷¹ Maldives National Defense Force.

⁵⁷² Maldives National Defense Force, “Coast Guard - Introduction and Mission,” accessed March 22, 2022, <https://mndf.gov.mv/mndf/en/coastguard.php>.

⁵⁷³ Maldives National Defense Force.

⁵⁷⁴ Maldives National Defense Force, “Organization - MNDF.”

⁵⁷⁵ Maldives National Defense Force.

⁵⁷⁶ Armed Forces Act of Maldives, 1/2008 § (2008), Article 41, <https://mndf.gov.mv/mndf/downloads/1-2008.pdf>.

⁵⁷⁷ Maldives National Defense Force, “Coast Guard - Introduction and Mission.”

- Maritime defense;
- Maritime SAR;
- Port security;
- Marine resource protection;
- MLE;
- Maritime disaster response;
- Security of maritime critical infrastructure; and
- Defense of the airspace of Maldives.

Additional roles include:

- Air operations for MNDF;⁵⁷⁸
- Hydrographic surveying;⁵⁷⁹ and
- Ambulance service by air and sea.⁵⁸⁰

The previously listed MCG roles span activities from combat to benign operations such as civil MER.⁵⁸¹

3. Strategic Status

The comparatively large maritime area of the Maldives poses a challenge for the MCG, especially due to the limited resources it possesses to sustainably police the area. Hence, the government of Maldives has sought regional and international assistance to

⁵⁷⁸ Avas, “MNDF Pilots Receive Green Light to Operate Dornier Aircraft,” November 9, 2021, <https://avas.mv/en/109728>.

⁵⁷⁹ One Online, “Discussion Held to Create a Hydrographic Unit in Maldives,” September 27, 2019, <https://oneonline.mv/en/15990>.

⁵⁸⁰ Fathmath Shaahunaz, “China Donates Sea Ambulance to Maldives,” *The Edition*, July 13, 2018, <http://edition.mv/news/6505>.

⁵⁸¹ Maldives National Defense Force, “Coast Guard - Introduction and Mission.”

augment the MCG. The bulk of the assistance received is from the government of India, the largest and closest neighbor of the Maldives. In 2009, the MCG initiated joint surveillance patrolling within its EEZ with the Indian Navy, and the effort has been undertaken every other month since then.⁵⁸² The regional collaboration between the Indian Coast Guard and the MCG is also a noteworthy alliance. The first regional level exercise initiated by an MNDF unit was launched by the MCG with the Indian CG in 1991, the bilateral exercise *Dosti*.⁵⁸³ In 2012, Sri Lanka joined ranks, making the exercise a trilateral engagement that is hosted by the Maldives.

Furthermore, the MCG was at the center of several major projects signed between the government of the Maldives and the government of India in 2019. These include an agreement to conduct a series of joint hydrographic surveys in the Maldives and an exchange of information agreement on civil merchant shipping.⁵⁸⁴ The hydrography agreement also includes the establishment of an MCG Hydrography Unit. During the same ceremony, a joint surveillance radar system that covers the whole archipelago was also jointly launched. In 2021, the two governments agreed to develop a harbor for the MCG, by reclaiming the *Uthuru Thila Falhu* (UTF) reef near the capital island.⁵⁸⁵ Currently, the MCG lacks a berthing facility for its vessels. The opposition in the country has vehemently protested the continuation of most of these Indian initiatives, especially the UTF harbor project, which the opposition claims is a malign scheme to build an Indian military base in the Maldives.⁵⁸⁶

⁵⁸² Anand Kumar, "India-Maldives Relations: Is the Rough Patch Over?," *Indian Foreign Affairs Journal* 11, no. 2 (2016): 161–62, <http://www.jstor.org/stable/45341094>.

⁵⁸³ High Commission of India in Maldives, "Press Release : Joint 'DOSTI' Exercise by Indian Coastguard with Maldives and Sri Lanka," October 27, 2014, <https://hci.gov.in/male/?3628?004>.

⁵⁸⁴ Business Today, "India, Maldives Sign 6 Pacts as PM Modi, Prez Solih Hold Talks," June 8, 2019, <https://www.businesstoday.in/latest/economy-politics/story/india-maldives-sign-6-pacts-pm-modi-prez-solih-hold-talks-202761-2019-06-08>.

⁵⁸⁵ Sidhant Sibal, "India, Maldives Sign Pact on Development of Coast Guard Harbour," DNA India, February 21, 2021, <https://www.dnaindia.com/india/report-india-maldives-sign-pact-on-development-of-coast-guard-harbour-2876803>.

⁵⁸⁶ Maldives Financial Review, "The Uthuru Thilafalhu Fiasco," October 28, 2021, <https://mfr.mv/governance/the-uthuru-thilafalhu-fiasco>.

The MCG also represents the Maldives in a number of regional and international fora. One of these is the 2009 initiative, the DCoC (described previously in Chapter V), established to suppress piracy in the western Indian Ocean.⁵⁸⁷ The MCG is also a member of the Indian Ocean Naval Symposium (IONS), which is a forum comprised of navy chiefs of Indian Ocean littoral states.⁵⁸⁸ Additionally, the MCG is a member of the Heads of Asian Coast Guard Agencies Meeting (HACGAM), which is a forum of CG heads from Asian countries.⁵⁸⁹ In October 2011, a trilateral cooperation mechanism on maritime security cooperation was established between India, Maldives, and Sri Lanka, which includes National Security Advisor level engagements related to maritime security.⁵⁹⁰ This includes consolidated efforts related to maritime domain awareness, SAR, pollution response, training and exercises, and MLE in the EEZs, all of which are led by the MCG on behalf of the Maldives.

The MCG also plays vital roles in a number of other strategic engagements. One of these roles is to keep the maritime environment clean and safe. The MCG is the key agency in the Maldives for responding to marine pollution in the Maldives. In 2020, it was supplemented with \$2.7 million worth of oil spill response equipment from Japan.⁵⁹¹ The MCG is further responsible for leading maritime SAR in the Maldives, and it operates the MRCC, established in 2012. In 2021, the Government of Japan pledged \$3.7 million to

⁵⁸⁷ DefenceWeb, “Maldives Outlines Maritime Threats, Solutions,” April 20, 2012, <https://www.defenceweb.co.za/security/maritime-security/maldives-outlines-maritime-threats-solutions/>.

⁵⁸⁸ DefenceWeb.

⁵⁸⁹ Heads of Asian Coast Guard Agencies Meeting, “Heads of Asian Coast Guard Agencies Meeting (HACGAM),” accessed March 23, 2022, <https://hacgam.org/about>.

⁵⁹⁰ Ministry of External Affairs: Government of India, “NSA Level Meeting on Trilateral Maritime Security Cooperation Between India, Sri Lanka and Maldives,” March 6, 2014, <https://www.mea.gov.in/in-focus-article.htm?23037/NSA+level+meeting+on+trilateral+Maritime+Security+Cooperation+between+India+Sri+Lanka+and+Maldives>.

⁵⁹¹ Ministry of Foreign Affairs of Japan, “The Government of Japan Provides Equipment Worth USD 2.8 Million to Strengthen Marine Pollution Response in the Maldives,” August 17, 2020, https://www.mv.emb-japan.go.jp/itpr_ja/11_000001_00088.html.

establish a new MRCC facility, which is operated by the MCG.⁵⁹² Pursuant to the bilateral agreements made with India in 2019, the MCG launched hydrographic surveying in the Maldives with the Indian Navy, to redraw the outdated navigational charts of the country.⁵⁹³ This is another national-level requirement to enhance the safety of maritime trade in the Maldives and contributes to the MER system by helping to reduce the number of incidents within the maritime domain.

The sea ambulance service has the highest tempo among all of MCG's operations, which it provides with the country's healthcare insurance scheme.⁵⁹⁴ Despite this vital service, recently the Minister of Defense declared that the sea ambulance vessels are aging and the government lacks the funds to replace them, which is expected to cost \$17 million.⁵⁹⁵ These vessels were effective in the transfer of patients to isolation facilities during the COVID-19 pandemic.⁵⁹⁶ In the future, the government may integrate this service with the National Ambulance System, which was unveiled in its "2019–2023 Strategic Action Plan."⁵⁹⁷ The plan, however, lacks any further development details for the MCG sea ambulance mechanism or any other capacity.

The MCG engages with other stakeholders within the Maldives maritime security system to counter IUUF in the Maldivian EEZ.⁵⁹⁸ This includes managing a vessel

⁵⁹² United Nations: Office on Drugs and Crime, "UNODC and Japan Sign US\$ 3.7 Million Agreement for the Construction of New Maritime Rescue Coordination Centre in Maldives," February 23, 2021, [/www.unodc.org/unodc/en/frontpage/2021/February/unodc-and-japan-sign-us-3-7-million-agreement-for-the-construction-of-new-maritime-rescue-coordination-centre-in-maldives.html](https://www.unodc.org/unodc/en/frontpage/2021/February/unodc-and-japan-sign-us-3-7-million-agreement-for-the-construction-of-new-maritime-rescue-coordination-centre-in-maldives.html).

⁵⁹³ PSM News, "MNDF Coast Guard Begins Hydrographic Survey of the Maldives," Public Service Media, January 31, 2021, <https://psmnews.mv/en/81389>.

⁵⁹⁴ Aasandha Company Ltd, "Emergency Evacuation: Aasandha Company Ltd," accessed March 23, 2022, <https://aasandha.mv/en/scheme/emergency-evacuation>.

⁵⁹⁵ Avas, "No Budget to Purchase New Sea Ambulances: Defense Minister," October 19, 2021, <https://avas.mv/en/108680>.

⁵⁹⁶ World Health Organization, "2019 Novel Coronavirus (2019-NCoV) Emergency Readiness/Response: MALDIVES," February 24, 2020, https://www.who.int/docs/default-source/coronaviruse/situation-reports/novel-corona-virus-update-mav-24-feb-20.pdf?sfvrsn=6e57139f_2.

⁵⁹⁷ Government of Maldives, "Strategic Action Plan 2019–2023: The Republic of Maldives," 2019, 118, <https://presidency.gov.mv/SAP/>.

⁵⁹⁸ Ahmed Adham Abdulla and Erika J. Techera, "Environmental Crimes: A Framework for Detection, Monitoring, and Enforcement in The Maldives," *Journal of International Wildlife Law & Policy* 24, no. 2 (April 3, 2021): 162, <https://doi.org/10.1080/13880292.2021.1942249>.

tracking system and exercising their authority to stop, inspect, and arrest suspected vessels engaged in IUUF.⁵⁹⁹ The government has also pledged to tap into the blue economy, which is required to further intensify the MCG operations.⁶⁰⁰ Taking note of the countless security, economic, and societal roles executed by MCG, it may be more pertinent for the government to leverage the MCG by positioning it where the MCG can maneuver autonomously to achieve its development goals and elevate its strategic status.

4. Physical Characteristics

The MCG's multi-role surface platforms are painted gray.⁶⁰¹ On either side of the hull, the vessels have a slanted racing stripe, which includes a wider black stripe followed by a narrower gray and white stripe, and some vessels also have the crest of MNDF printed on the black stripe.⁶⁰² These vessels bear the English inscription "COAST GUARD" on either side of the mid-ship. Unlike these multi-role vessels, the smaller sea-ambulance vessels operated under the national insurance framework have a different color scheme. They are white in color and have the English inscription "SEA - AMBULANCE" printed in red on either side of the hull.⁶⁰³ The largest vessel in the MCG fleet is a former Indian Navy 46-meter fast-attack craft, *Huravee* (Figure 31), which was gifted in 2006 by the Indian government.⁶⁰⁴ The highest caliber weapon used in the MCG is the *Medak* main gun on board this ship, which has a caliber of 30 mm.⁶⁰⁵

⁵⁹⁹ Abdulla and Techera, 165, 174.

⁶⁰⁰ Modern Diplomacy, "Maldives Ventures into the Blue Economy," July 18, 2019, <https://moderndiplomacy.eu/2019/07/18/maldives-ventures-into-the-blue-economy/>.

⁶⁰¹ Van Oossanen Naval Architects, "Fisheries Patrol Vessel," 2020, <https://oossanen.nl/project/fisheries-patrol-vessel/>.

⁶⁰² Van Oossanen Naval Architects.

⁶⁰³ Raajje, "Launch, Sea Ambulance Collide Near Ithaafushi Resort," January 5, 2021, <https://raajje.mv/93200>.

⁶⁰⁴ Lumma Abdul-Hannan, "Maldives to Be Gifted a FIC Vessel by India," Today, October 15, 2019, <https://today.mv/3830/>.

⁶⁰⁵ Global Security, "Maldives - Coast Guard," accessed March 22, 2022, <https://www.globalsecurity.org/military/world/indian-ocean/mv-coast-guard.htm>.



Figure 31. MCG ship *Huravee* taking part in a fleet review in India.⁶⁰⁶

The MCG has three air platforms, which are jointly operated and maintained by either Indian Navy or Indian Coast Guard personnel and the MCG Aviation Squadron. The only fixed-wing MPA in the MCG is a *Dornier* aircraft that was stationed in the Maldives in late 2020 with Indian Navy personnel, and which has a gray paint scheme.⁶⁰⁷ The other two aircraft are *Dhruv* class advanced light helicopters (ALH) (Figure 32), which have a blue, gray, and white pattern.⁶⁰⁸ None of the air assets have armaments and are mostly utilized for medical evacuations.⁶⁰⁹

⁶⁰⁶ Source: Ships Hub, “Maldivian Coast Guard,” accessed April 3, 2022, <https://shipshub.com/navy/276-2.html#lg=1&slide=5>.

⁶⁰⁷ Ameera Osmanagic, “Dornier Flight Gifted by India Arrives in Maldives,” *The Times of Addu*, September 29, 2020, <https://timesofaddu.com/2020/09/29/dornier-flight-gifted-by-india-arrives-in-maldives/>.

⁶⁰⁸ S. Anandan, “India Donates Second Naval Advanced Light Helicopter to Maldives,” *The Hindu*, December 14, 2013, sec. National, <https://www.thehindu.com/news/national/india-donates-second-naval-advanced-light-helicopter-to-maldives/article5456867.ece>.

⁶⁰⁹ Ali Faaiq, “MNDF Carries Out First Operation Using Dornier Flight Gifted by India,” *The Times of Addu*, October 26, 2020, <https://timesofaddu.com/2020/10/26/mndf-carries-out-first-operation-using-dornier-flight-gifted-by-india/>.



Figure 32. MCG's *Dhruv* class ALH.⁶¹⁰

In 2013, the Minister of Defense of the Maldives introduced summer white uniforms for MCG personnel.⁶¹¹ Similar to other arms of the MNDF, the MCG uses the army rank structure, which was not revised despite the introduction of a naval uniform.⁶¹² As with the rank structure, the MCG also uses a battle dress uniform with a green digital camouflage pattern for field operations.⁶¹³ Most of the enlisted personnel go through training provided by the Coast Guard Training School, which is under the College of Defense and Strategic Studies, while most officers graduate from either CG or naval officer training academies across the globe.⁶¹⁴

⁶¹⁰ Source: Fathmath Shaahunaz, "Maldives Returns Second Chopper to India," *The Edition*, June 5, 2018, http://edition.mv/defence_ministry/6133.

⁶¹¹ SunOnline International, "New Coast Guard Uniform Introduced," January 1, 2013, <https://www.sun.com.mv/8450>.

⁶¹² Maldives National Defense Force, "Rank Insignia: MNDF," accessed March 23, 2022, <https://mndf.gov.mv/mndf/en/rank-structure.php>.

⁶¹³ Maldives National Defense Force, "Uniforms: MNDF," accessed March 23, 2022, <https://mndf.gov.mv/mndf/en/uniforms.php>.

⁶¹⁴ Maldives National Defense Force, "Training the Force: MNDF," accessed March 23, 2022, <https://mndf.gov.mv/mndf/en/training.php>.



Figure 33. MCG sailors and officers in summer white uniforms at a ceremony.⁶¹⁵

5. Behavior and Application

The MCG is among many agencies within the maritime security system of the Maldives, but it has a wide spectrum of roles, ranging from military to civil MER. The MCG is deeply embedded within a military hierarchical structure, where its operationally limited formations and the command structure are fragmented into four operational commands. This further disperses the already limited resources, isolating available training and services. In the current operational structure, the four MCG Squadrons bypass the Commandant of MCG; hence, the Commandant is not part of their operational chain of command. The Squadron Commanders are directly accountable to the Commanders of their respective Area Commands, who may or may not be an MCG officer. These four decentralized MCG Squadrons may not be the best operational structure for a small CG such as the MCG.

The MCG platforms resemble a mixture of units, consisting of white-hulled sea ambulances and gray-hulled multi-role vessels. Despite the limitations in platforms, the MCG appears to have arranged vessels for its inherent roles. On the other hand, the military

⁶¹⁵ Source: SunOnline International, “Coast Guard Gets New Uniform,” January 1, 2014, <https://en.sun.mv/18950>.

posture and training do not seem to suit the force, especially as most of its engagements are constabulary and civil MER in nature. As with the JDFCG, however, the MCG operates in the absence of a navy. Regardless of these observations, and the fact that the MCG is a military organization, its roles are more indicative of a constabulary unit.

D. CONCLUSION

This chapter has covered the CGs of Jamaica and the Maldives. These two organizations serve archipelagic states with large maritime bodies compared to their landmass. Jamaica has a maritime domain 25 times larger than its landmass, while this area is a staggering 45 times for the Maldives. Both CGs are organized within military structures and hierarchies, which are comprised of multiple units, positioning these as smaller tier-III units. Despite their greatly disparate geographic locations, there are striking similarities between the two CGs. Their training and capacity development approaches are similar. In addition, the two organizations are mandated with operations that range from combat to MER roles.

Among their differences, the JDFCG is operating in a more dynamic region and faces more dangerous operations compared to the area of operations for the MCG. While the MCG's operational units are fragmented into four different commands, the JDFCG's operational units operate with a single combined command structure under the MACC. Furthermore, the Jamaican government is modernizing its operational platforms through a nationally consolidated strategy under the "Plan Secure Jamaica." Although the Government of Maldives has facilitated the development of its CG through international donors, the "2019–2023 Strategic Action Plan of Maldives" lacks a detailed plan to develop or modernize the MCG. Undisputedly, these two organizations are extremely vital to their respective countries, despite being deeply embedded within a military structure with operational challenges.

Given that neither nation has a navy and considering the development trajectories and existing behavior of these two CG organizations, both shares more of a constabulary rather than a military or naval nature.

THIS PAGE INTENTIONALLY LEFT BLANK

VIII. CASE 5: ISLAND PARAMILITARY COAST GUARDS

A. INTRODUCTION

This chapter analyzes two CGs that are generally perceived as paramilitary organizations, as identified in Chapter IV of this paper. They include the Icelandic Coast Guard (*Landhelgisgæsla Íslands*) (ISCG) and the Japan Coast Guard (JCG). These two agencies are also selected since they belong to island nations that are positioned in strategic locations around the globe. While Japan has a “Peace Constitution” that prevents the development and organization of traditional military formations, Iceland has adopted a policy of not maintaining a standing military. Hence, both countries have intrinsic reasons to avoid armed aggression of any form.

As in the preceding chapters, this chapter analyzes the two CGs according to five attributes. Before the analysis, the cases present an overview of the countries’ maritime situation that has led to the formation of a CG in each. The attributes used in the analysis are organizational ontology, roles and responsibilities, the strategic status of the CG, physical characteristics, and the behavior and application of the organizations. The chapter ends with a conclusion.

B. ICELANDIC COAST GUARD (*LANDHELGISGÆSLA ÍSLANDS*)

Iceland, an island state, is located midway between the Norwegian Sea and the North Atlantic Ocean. Iceland has a coastline of 6,542 km (4065 mi) that extends towards a 200 NM EEZ (Figure 34), which makes up the country’s primary maritime domain of approximately 751,345 sq km (290,096 sq mi).⁶¹⁶

⁶¹⁶ Visit Iceland, “Geography of Iceland - The Land of Ice and Fire,” 2020, <https://www.visiticeland.com/article/geography-of-iceland/>.

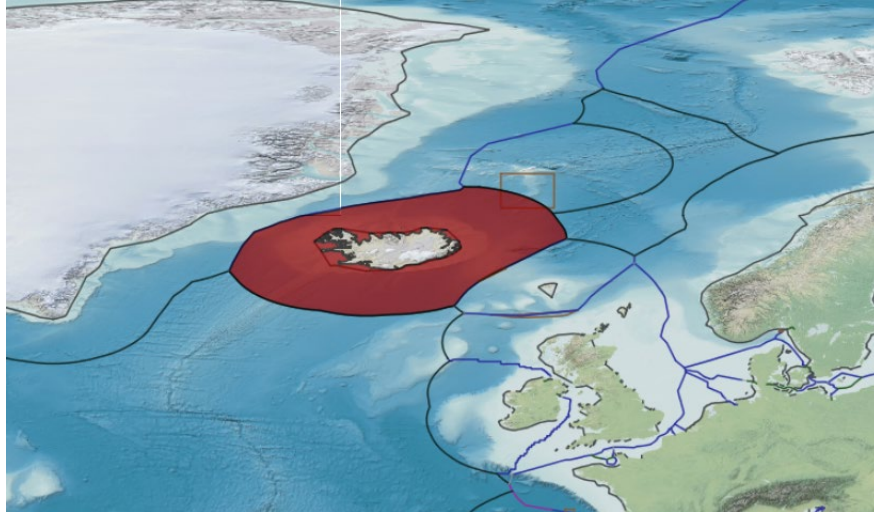


Figure 34. Icelandic maritime domain, with its EEZ highlighted in red.⁶¹⁷

The Island is also situated between the Faroe Islands in the southeast and Greenland in the northwest. This location opens two channels, north and south of the country, paving the way for marine traffic to pass between northern Europe and the Atlantic Ocean. Despite its landmass, which comprises an area of 103,592 sq km (40,000 sq mi), the country has one of the most highly dispersed populations worldwide, with less than 400,000 residents.⁶¹⁸

Iceland faces threats related to “climate change, natural disasters, and food safety and security.”⁶¹⁹ The island state relies on fishing as its main economic activity; hence, since its independence, the country has been asserting its control over its fishing grounds.⁶²⁰ As the country does not have a standing military, it must face its challenges without a traditional military power. Just before the outbreak of the World War II, Iceland

⁶¹⁷ Source: Marine Regions, “Iceland MRGID 5680,” accessed April 3, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=5680&zone=eez>.

⁶¹⁸ Visit Iceland, “Geography of Iceland - The Land of Ice and Fire.”

⁶¹⁹ Anna Benassi, “Parliamentary Resolution on a National Security Policy for Iceland: 145th Legislative Session 2015–2016” (Althingi: Icelandic Parliament, April 13, 2016), 2, <https://www.government.is/media/utanrikisraduneyti-media/media/Varnarmal/National-Security-Policy-ENS.pdf>.

⁶²⁰ Walker Mills, “The Cod Wars and Today: Lessons from an Almost War,” Center for International Maritime Security, July 28, 2020, <https://cimsec.org/the-cod-wars-and-today-lessons-from-an-almost-war/>.

was under the rule of Denmark.⁶²¹ Early in the war, British forces took over the island to control its strategic location.⁶²² During this initial phase of the war, having already lost its neutrality, Iceland chose to take a side. In 1941, the country decided to station the U.S. military on the island as a deterrence against potential adversaries.⁶²³ This alliance was further strengthened with the “Keflavik Agreement” in 1946, which resulted in the permanent deployment of U.S. forces in Iceland.⁶²⁴

For the United States, the stationing of its forces in Iceland was vital, especially since it would provide the United States a platform to monitor the movements of Soviet submarines and aircraft, which could threaten the U.S. east coast. In 1949, Iceland became a founding member of NATO, despite public outcry.⁶²⁵ Having no standing army, on May 5, 1951, Iceland signed another bilateral defense agreement with the United States, replacing the “Keflavik Agreement”.⁶²⁶ Under the new agreement, the U.S. military took over the defense of Iceland, becoming Iceland’s only defense force. The main base for the U.S. military was the Keflavik Airport, although the U.S. operated a number of air defense radars across the island. The “Keflavik Agreement” was suspended by the U.S. government in 2006 and it withdrew all its forces from Iceland on September 30 of the same year.⁶²⁷ The main consideration may have been the declining threat from Russia following the collapse of the Soviet Union.

In order to sustain the air-defense system previously manned by the U.S. military, Iceland’s government decided to hand over the mandates of this system to an inherent air-defense unit. This organization was later transferred to the Ministry of Foreign Affairs in

⁶²¹ North Atlantic Treaty Organization, “Iceland and NATO - 1949,” accessed March 24, 2022, http://www.nato.int/cps/en/natohq/declassified_162083.htm.

⁶²² North Atlantic Treaty Organization.

⁶²³ North Atlantic Treaty Organization.

⁶²⁴ Icelandic Coast Guard, “History of Defense,” accessed March 25, 2022, <https://www.lhg.is/um-okkur/sagan/nr/2134>.

⁶²⁵ North Atlantic Treaty Organization, “Iceland and NATO - 1949.”

⁶²⁶ Icelandic Coast Guard, “History of Defense.”

⁶²⁷ Icelandic Coast Guard.

2008, under a new “Defense Act.”⁶²⁸ This law was later revised. Under the revised law, 98/2010, the air-defense responsibilities were transferred to the ISCG and the Icelandic Police.⁶²⁹ This resulted in a significant turnover in Iceland’s bureaucratic structure. Despite the departure of the U.S. forces from Iceland, and the latter’s continuous military engagements with NATO, the Icelanders decided to remain a demilitarized country. For the ISCG, their role was further enhanced within the country’s overall security and maritime security system. Under the “Maritime Security Act of Iceland,” in addition to the ISCG, the country’s maritime security system is managed by the Icelandic National Police, customs authorities, fisheries companies, and the authorities responsible for ports.⁶³⁰

1. Organizational Ontology

The ISCG was officially established on July 1, 1926, mainly as a measure to curb the English fishing trawlers from overfishing in its maritime jurisdiction.⁶³¹ During this period, the organization used a patrol vessel, armed with two 57 mm cannons, to fend off the illegal fishers.⁶³² Currently, the organization has been given legal authority through the “Law on the Icelandic Coast Guard,” which was enacted in 2006.⁶³³ The ISCG, under Article 2 of the statute, is described as an organization accountable to the Ministry of Justice.⁶³⁴ Iceland does not appear to have a Department of Defense or an equivalent cabinet portfolio. Nonetheless, under the “Defense Act of 2008,” the Ministry of Foreign Affairs is the responsible authority for defense.⁶³⁵

⁶²⁸ Government of Iceland: Ministry of Foreign Affairs, “National Security,” accessed March 25, 2022, <https://www.government.is/topics/foreign-affairs/national-security/>.

⁶²⁹ Icelandic Coast Guard, “History of Defense.”

⁶³⁰ Maritime Security Act, 50/2004 § (2004), Article 4, <https://www.althingi.is/lagas/nuna/2004050.html>.

⁶³¹ Icelandic Coast Guard, “The Icelandic Coast Guard: ‘Always Prepared,’” 2, accessed March 23, 2022, https://www.lhg.is/media/LHG80/Landhelgisgasla_Islands_enska2_.pdf.

⁶³² Icelandic Coast Guard, 2.

⁶³³ Law on the Icelandic Coast Guard, 52/2006 § (2006), <https://www.stjornartidindi.is/Advert.aspx?ID=bdc57108-f865-4651-9c79-8dfa97151684>.

⁶³⁴ Law on the Icelandic Coast Guard, Article 2.

⁶³⁵ Government of Iceland: Ministry of Foreign Affairs, “National Security.”

The “Law on the Icelandic Coast Guard” mandates the ISCG its constabulary status. Article 6 of this Act also gives the ISCG the mandate to operate as an MLEA.⁶³⁶ According to the same Act, the Minister appoints a Chief Executive Officer (CEO), who provides strategic guidance to the ISCG, while the Director-General of ISCG is responsible for conducting day-to-day operations of the organization.⁶³⁷ The article further states that the Director-General is the primary advisor to the Minister on matters related to ISCG.⁶³⁸ The ISCG official website identifies the organization as a civil agency, although the members of the ISCG are permitted to carry and use firearms and explosives for the purposes of law enforcement.⁶³⁹ Hence, this is a tier-II civil constabulary organization, which has the capability to apply deadly force to compel compliance during its operations.

2. Roles and Responsibilities

The ISCG’s roles and responsibilities can be derived from a number of Iceland’s laws. But Article 4 of the “Law on the Icelandic Coast Guard” is the main statute defining the various roles of ISCG, which are briefly laid down as follows:⁶⁴⁰

- Maritime security;
- MLE;
- Maritime SAR;
- Aeronautical SAR;
- Continental SAR;
- Ambulance service;

⁶³⁶ Law on the Icelandic Coast Guard, Article 6.

⁶³⁷ Law on the Icelandic Coast Guard, Article 2.

⁶³⁸ Law on the Icelandic Coast Guard, Article 2.

⁶³⁹ Law on the Icelandic Coast Guard, Article 16.

⁶⁴⁰ Law on the Icelandic Coast Guard, Article 4.

- Civil protection operations;
- Facilitation of marine transport;
- Maritime surveillance;
- Reporting and removal of hazards to navigation, including explosive ordnance disposal (EOD) at sea;
- Hydrographic survey and charting; and
- Enforcement of immigration and customs law at sea.

These roles indicate quite a number of navigational management measures and MER efforts. Unlike most of the CG organizations analyzed in this paper, the ISCG has various other roles, such as SAR on land and explosive ordnance disposal (EOD).

3. Strategic Status

The ISCG had proven itself as a strategically prominent organization within the Icelandic maritime security system, especially in the area of fishery protection. The most popular and significant conflict undertaken by the ISCG was the “Cod Wars” against UK fishermen and the UK’s formidable Royal Navy.⁶⁴¹ Officially, the “Cod Wars” began in September 1958, when an ISCG vessel collided with a Royal Navy vessel as it was accompanying British trawlers fishing in the renewed territorial waters of Iceland, which extended from four to 12 NM.⁶⁴² Two more extensions of its fishery zone followed in the years ahead. This included Iceland’s extension of its fishery zone to 50 NM in September 1972, and then finally 200 NM in October 1975.⁶⁴³ During the Second “Cod War,” the

⁶⁴¹ Mills, “The Cod Wars and Today.”

⁶⁴² Kevin Bruen, “Cooperate Through Coast Guards in the Western Pacific,” *United States Naval Institute Proceedings* 143, no. 9 (September 2017): 58, <http://www.proquest.com/docview/2044302322/abstract/A649E954DD814BC2PQ/1>.

⁶⁴³ Halldór B. Ívarsson, “Implementation of Territorial Waters and Jurisdiction,” *The Icelandic Coast Guard*, accessed March 27, 2022, <https://www.lhg.is/um-okkur/sagan/nr/80>.

ISCG utilized specialized hooks to cut the main cables of British fishing trawlers.⁶⁴⁴ Iceland won these “wars,” as the series of “Law of the Sea” conferences during this period would enact its conventions in parallel with Iceland’s claims.⁶⁴⁵ The “war” ended on June 1, 1976, after over 60 “ramming incidents” between the ISCG and the Royal Navy.⁶⁴⁶

Iceland’s NATO membership also provided important leverage for the country during the “Cod Wars.”⁶⁴⁷ Sustenance of its fisheries sector was more important for Icelanders than maintaining ties with NATO. In this regard, the Icelandic government threatened on several occasions to leave NATO and to remove the U.S. forces from Iceland, unless the UK refrained from violating its fishing grounds.⁶⁴⁸ For NATO, Iceland was a vital ally. Due to its geography, Iceland was crucial for NATO’s surveillance efforts against the Soviet military. Furthermore, in the absence of NATO’s security guarantee, Iceland could seek an alternative security partnership with the Soviet Union.⁶⁴⁹ This was almost the case when, during the “Cod Wars,” Iceland made a trade pact with the Soviet Union, making the Soviet market Iceland’s largest fish importer in 1955.⁶⁵⁰ These trade and diplomatic steps from Iceland were also instrumental in it winning the “Cod Wars.”

Despite its conflict with a powerful NATO ally, the alliance is and has been an important security guarantor for Iceland. This is embedded in the country’s demilitarization status. The underlying principle behind the absence of a military in Iceland is “Iceland’s status as a sparsely populated island nation that has neither the resources nor the desire to maintain an army.”⁶⁵¹ Hence, the country would rely on “active international cooperation”

⁶⁴⁴ North Atlantic Treaty Organization, “Iceland and NATO - 1949.”

⁶⁴⁵ Mills, “The Cod Wars and Today.”

⁶⁴⁶ Bruen, “Cooperate Through Coast Guards in the Western Pacific,” 58.

⁶⁴⁷ Mills, “The Cod Wars and Today.”

⁶⁴⁸ North Atlantic Treaty Organization, “Iceland and NATO - 1949.”

⁶⁴⁹ North Atlantic Treaty Organization.

⁶⁵⁰ Bruce Mitchell, “Politics, Fish, and International Resource Management: The British-Icelandic Cod War,” *Geographical Review* 66, no. 2 (1976): 128, <https://doi.org/10.2307/213576>.

⁶⁵¹ Benassi, “Parliamentary Resolution on a National Security Policy for Iceland: 145th Legislative Session 2015–2016,” 1.

from its partner nations, most notably, its NATO allies.⁶⁵² Currently, Iceland is the only member of NATO without a standing military. Irrespective of this, the country maintains a vital anti-air defense system, which also contributes to NATO's overall air defense system. This system is jointly managed by the ISCG and the Icelandic National Police.⁶⁵³ In this regard, the ISCG plays an important role in securing not only Iceland's security but also that of NATO. This is in exchange for NATO's security guarantee for the island state.

Another indication of the ISCG's strategic importance is found in mechanisms related to the Arctic region. One of the significant cooperation mechanisms the ISCG is part of is the Arctic Coast Guard Forum (ACGF).⁶⁵⁴ This Forum was established to enhance collaboration among the CGs of the Arctic Council member states, which is not a legally bound organization.⁶⁵⁵ The strategic goals of the forum include strengthening multiple cooperation, coordinating maritime safety and security, facilitating marine navigation in the region, and collaborating on scientific research in the Arctic.⁶⁵⁶ In addition to this, the ISCG is also part of the North Atlantic Coast Guard Forum (NACGF), which facilitates cooperation and information sharing among North Atlantic member states.⁶⁵⁷

Iceland served as Chairman of the Arctic Council from 2019 to 2021.⁶⁵⁸ The main focus of Iceland's Chairmanship was to determine the implications of climate change on the social and economic domain of Arctic communities.⁶⁵⁹ Some of the key principles advanced by Iceland in the Arctic Council were to promote a demilitarized Arctic, to

⁶⁵² Benassi, 1.

⁶⁵³ Icelandic Coast Guard, "History of Defense."

⁶⁵⁴ Arctic Coast Guard Forum, "The Arctic Coast Guard Forum (ACGF)."

⁶⁵⁵ Arctic Coast Guard Forum.

⁶⁵⁶ Arctic Coast Guard Forum.

⁶⁵⁷ Edward H. Lunquist, "North Atlantic Coast Guard Forum," Defense Media Network, January 23, 2019, <https://www.defensemedianetwork.com/stories/north-atlantic-coast-guard-forum/>.

⁶⁵⁸ Arctic Council, "Together Towards a Sustainable Arctic: Iceland's Arctic Council Chairmanship 2019–2021," May 2019, https://oaarchive.arctic-council.org/bitstream/handle/11374/2456/Arctic_Council-Iceland_Chairmanship_2019-2021.pdf?sequence=1&isAllowed=y.

⁶⁵⁹ Icelandic Arctic Cooperation Network, "Icelandic Chairmanship at the Arctic Council," accessed March 27, 2022, <https://arcticiceland.is/en/arctic-council/icelandic-chairmanship-at-the-arctic-council>.

enhance the provisions of the Law of the Sea Convention, and to fight climate change in the region.⁶⁶⁰ One of the key aspects of the ISCG is its national SAR authority. Iceland has a Search and Rescue Region (SRR) of 1.8 million sq km (694,984 sq mi), which is approximately 17 times that of its land area.⁶⁶¹ The ISCG is listed as the SAR agency of Iceland, responsible to coordinate SAR on behalf of Iceland in the Arctic SAR Plan which was finalized in 2011.⁶⁶² Under Article 4 of the “Regulation on the Control of the Search and Rescue Region of Iceland for Maritime and Aeronautical Rescue,” the ISCG is listed as the agency responsible to coordinate maritime incidents within Iceland’s SRR.⁶⁶³ In addition to this, the ISCG is also engaged in naval-CG exercises with Denmark and Norway in the region.⁶⁶⁴ These engagements and responsibilities assure a prominent status for the ISCG as a key strategic agency within Iceland.

4. Physical Characteristics

The ISCG ships have a gray paint scheme, similar to that of naval ships. As in most other CG platforms, these vessels also have a racing stripe. The racing stripe on the ISCG platforms has a much wider blue stripe, followed by a narrower white and red stripe.⁶⁶⁵ The Icelandic inscription “LANDHELGISGÆSLAN” is printed on the mid-ship of both sides of the hull, with a white shadow-line.⁶⁶⁶ The English inscription of “COAST GUARD” is printed in a much smaller size on either side of the superstructure. The largest

⁶⁶⁰ Althingi: Icelandic Parliament, “A Parliamentary Resolution on Iceland’s Arctic Policy,” March 28, 2011, 1–2, <https://www.government.is/media/utanrikisraduneyti-media/media/nordurlandaskrifstofa/A-Parliamentary-Resolution-on-ICE-Arctic-Policy-approved-by-Althingi.pdf>.

⁶⁶¹ Icelandic Arctic Cooperation Network, “Icelandic Coast Guard,” accessed March 27, 2022, <https://arcticiceland.is/en/icelandic-coast-guard>.

⁶⁶² Arctic Council, “Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic,” Appendix II.

⁶⁶³ Ministry of Justice and Human Rights, “Regulation on the Control of the Search and Rescue Region of Iceland for Maritime and Aeronautical Rescue,” October 7, 2010, Article 4, https://www.lhg.is/media/leit_og_bjorgun/RESCUE_EN.pdf.

⁶⁶⁴ Valur Ingimundarson, “Framing the National Interest: The Political Uses of the Arctic in Iceland’s Foreign and Domestic Policies,” *The Polar Journal* 5, no. 1 (January 2, 2015): 94–95, <https://doi.org/10.1080/2154896X.2015.1025492>.

⁶⁶⁵ Icelandic Coast Guard, “Ships and Boats: Bull,” accessed March 24, 2022, <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/79>.

⁶⁶⁶ Icelandic Coast Guard.

of the surface platforms in the ISCG fleet is the multi-purpose vessel *Thor* (*Þór*), which is 93.8 meters (307.7 feet) long (Figure 35).⁶⁶⁷



Figure 35. ISCG ship *Thor* (*Þór*).⁶⁶⁸

The vessel is built for maritime SAR, law enforcement, and fisheries protection.⁶⁶⁹ The vessel has inherent oil recovery and containment equipment such as booms and skimmers.⁶⁷⁰ They resemble large Anchor Handling Tug Supply (AHTS) vessels that are powerful ocean-going rescue and support ships.⁶⁷¹ This class of vessel, including the

⁶⁶⁷ Icelandic Coast Guard, “The Icelandic Coastguard Vessel (THOR),” accessed March 24, 2022, https://www.lhg.is/media/skip/thor/VSTHOR_FOLDER_ENS.pdf.

⁶⁶⁸ Source: Icelandic Coast Guard, “Thor (Þór),” accessed March 27, 2022, <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/1125>.

⁶⁶⁹ Icelandic Coast Guard.

⁶⁷⁰ Icelandic Coast Guard, “The Icelandic Coastguard Vessel (THOR).”

⁶⁷¹ Bikram Singh, “Features, Applications, and Limitations of Anchor Handling Tug Supply Vessels (AHTS),” Marine Insight, March 19, 2019, <https://www.marineinsight.com/types-of-ships/features-applications-and-limitations-of-anchor-handling-tug-supply-vessels-ahts/>.

vessel *Freyja*, does not have an installed main gun.⁶⁷² The vessel *Týr* (Bull), however, is equipped with a *Bofors* L/60 Mark 3 40 mm main gun.⁶⁷³

The ISCG also operates aerial platforms, which include Airbus H225 twin-engine helicopters and also a Dash 8 Q300 fixed-wing aircraft equipped for maritime surveillance (Figure 36).⁶⁷⁴ The helicopters are painted white and blue, while the fixed-wing aircraft is white with the ISCG racing stripe.⁶⁷⁵ These aircraft are equipped for maritime surveillance, SAR, or for medical evacuations, and none are equipped with any weapons.



Figure 36. ICG Dash 8 Q300 aircraft.⁶⁷⁶

⁶⁷² Icelandic Coast Guard, “Freyja,” accessed March 27, 2022, <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/65>.

⁶⁷³ Icelandic Coast Guard, “Týr (Bull),” accessed March 27, 2022, <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/79>.

⁶⁷⁴ Icelandic Coast Guard, “Aircraft: TF-GNA,” accessed March 27, 2022, <https://www.lhg.is/um-okkur/taekjakostur/loftfor/nr/970>.

⁶⁷⁵ Icelandic Coast Guard, “Aircraft: TF-SIF,” accessed March 27, 2022, <https://www.lhg.is/um-okkur/taekjakostur/loftfor/nr/969>.

⁶⁷⁶ Source: Icelandic Coast Guard.

The ISCG uses working dress uniforms similar to the ones used by conventional navies, but with black colored pants instead of white pants.⁶⁷⁷ The official uniforms represent black naval winter dress uniforms (Figure 37). The field uniform is a dark blue coverall.⁶⁷⁸



Figure 37. ISCG officers in the traditional navy winter uniform.⁶⁷⁹

The physical characteristics of the ISCG represent the broad spectrum of its operations, but mostly its nature as an armed constabulary and a MERA.

5. Behavior and Application

The ISCG is a crucial part of the security system of Iceland, especially in the absence of a standing conventional military. The main operational tempo of the ISCG's efforts is on constabulary and civil MER operations. These include fishery enforcement,

⁶⁷⁷ Icelandic Arctic Cooperation Network, "Icelandic Coast Guard," 5.

⁶⁷⁸ Icelandic Arctic Cooperation Network, 7.

⁶⁷⁹ Source: Icelandic Coast Guard, "Fishermen's Day 2020," accessed April 3, 2022, <https://www.lhg.is/frettir-og-fjolmidlar/frettasafn/frettayfirlit/sjomannadagurinn-2020>.

maritime SAR, and medical evacuations. The ISCG supports maritime security cooperation efforts, derived from “the management of international relations through the maritime domain.”⁶⁸⁰ This is extremely vital for the ISCG since these relations help to ensure comprehensive security for the country. The ISCG’s role in maritime security cooperation is broad and effective, notwithstanding its limited platforms and personnel. Despite its demilitarized status, the ISCG has been utilized to engage in operations that require coercive maneuvers against foreign naval vessels.

Iceland is unique compared with most other countries analyzed in this research paper, due to the salient feature of its CG as a major player in ensuring the country’s security in the absence of a military. The surface platforms are gray, much like those of traditional navies, possibly to signal the capability or intent to fight when required. In most cases, during this analytical process, it appears that CGs operating in the absence of a navy tend to project as quasi-navies. This is most evident in countries with a relatively smaller population.

C. JAPANESE COAST GUARD

Japan is an archipelagic state in East Asia, opening into the Western Pacific Ocean. Despite its archipelagic geography, Japan has a large landmass, which is approximately 377,800 sq km (145,869 sq mi).⁶⁸¹ It consists of more than 6,852 islands, of which only 421 are inhabited, where the “main” islands include Hokkaido, Honshu, Kyushu, Shikoku, and Okinawa.⁶⁸² A large number of sizable islands provide the country with a vast coastline, approximately 32,779 km (20,368 mi).⁶⁸³ The country has claimed an EEZ, that extends to 200 NM from its coastline, which amounts to around 4,050,000 sq km

⁶⁸⁰ Christian Le Mièrre, *Maritime Diplomacy in the 21st Century*, Cass Series: Naval Policy and History (Abingdon, UK: Routledge, 2014), 7.

⁶⁸¹ Stanford Program on International and Cross-Cultural Education, “Geography of Japan,” accessed March 28, 2022, https://spice.fsi.stanford.edu/docs/geography_of_japan.

⁶⁸² Suelo Kuwahara, “The Development of Small Islands in Japan: An Historical Perspective,” *Journal of Marine and Island Cultures* 1, no. 1 (June 1, 2012): 38, <https://doi.org/10.1016/j.imic.2012.04.004>.

⁶⁸³ Biodiversity Center of Japan, “National Survey on the Natural Environment: Coastline Survey,” accessed March 28, 2022, https://www.biodic.go.jp/english/kiso/33/33_kaiga_e.html.

(2,516,553 sq mi) (Figure 38).⁶⁸⁴ The water body within its EEZ also includes the main maritime jurisdiction of Japan, which is approximately ten times the size of its land area.

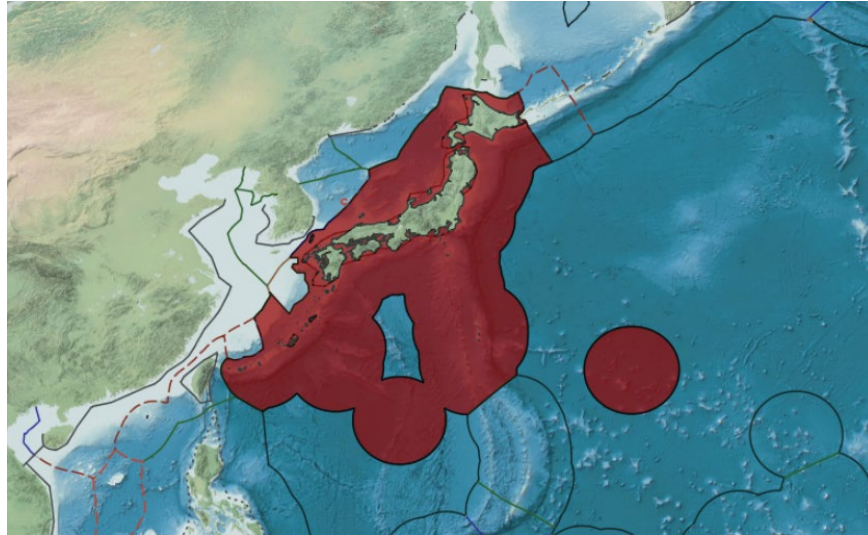


Figure 38. Japanese maritime domain, with its EEZ highlighted in red.⁶⁸⁵

This exclusive maritime geographic nature of Japan would make it dependent on its maritime domain for the economy, security, and transportation, although its proximity to former adversaries has led to overlapping maritime disputes that have hindered its maritime harmony. The contested Northern Territories (referred to as the South Kuril Islands by Russia) are off of the northern island of Hokkaido.⁶⁸⁶ Approximately 217 km (135 mi) east of South Korea is the Takeshima group of islands (Dokdu for South Koreans), which is disputed with both South and North Korea.⁶⁸⁷ The southernmost Senkaku Islands (Diaoyu Islands for China) located in the East China Sea, approximately 330 km (205mi)

⁶⁸⁴ Hydrographic and Oceanographic Department: Japan Coast Guard, “Exploring the Sea,” January 2017, 1, https://www1.kaiho.mlit.go.jp/eng/brochure_Jan2017_E.pdf.

⁶⁸⁵ Source: Marine Regions, “Japan MRGID 8487,” accessed April 3, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8487&zone=eez>.

⁶⁸⁶ Isabel Reynolds, “How Ukraine War Fuels Japan’s Island Feud with Russia,” Bloomberg, March 3, 2022, <https://www.bloomberg.com/news/articles/2022-03-03/how-ukraine-war-fuels-japan-s-island-feud-with-russia-quicktake>.

⁶⁸⁷ Ministry of Foreign Affairs of Japan, “Takeshima,” accessed March 28, 2022, <https://www.mofa.go.jp/region/asia-paci/takeshima/index.html>.

northwest and 170 km (106mi) west of China and Taiwan, respectively, are disputed with China and Taiwan.⁶⁸⁸ These maritime disputes pose a significant challenge to the maritime prosperity of Japan.

Rising tensions with its neighbors, and a much more aggressive stance by China in the SCS and the ECS, have resulted in Japan taking a leading role in promoting a peaceful resolution to these issues. Japan has advocated for a rules-based order in dealing with these disputes. In 2016, Japanese Prime Minister Shinzo Abe called for a “free and open Indo-Pacific strategy,” intent on “achieving a free and open maritime order based on rule of law in the Indo-Pacific region.”⁶⁸⁹ The first pillar, among three, in that strategy was to promote rule of law, freedom of navigation, and free trade.⁶⁹⁰

To counter the challenges of China and other disputes in the region, the Japanese maritime security system utilizes its Japan Maritime Self Defense Force (JMSDF) and the JCG. Currently, these two forces have to face off with the world’s largest navy (the PLA Navy), the largest CG (the CCG), and also the largest maritime militia (the PAFMM), based on the number of each of their platforms and tonnage.⁶⁹¹ The CCG and China’s PAFMM are extensively employed in gray-zone maritime activities in order to assert that country’s claims in the region.⁶⁹² The underlying details of these irregular activities have already been addressed in previous chapters. Due to these activities, which are below the threshold of an armed conflict, it is the JCG that is required to initially confront the challenge.⁶⁹³

⁶⁸⁸ Ministry of Land, Infrastructure, Transport and Tourism - Japan Coast Guard, “Japan Coast Guard,” 9, accessed March 28, 2022, https://www.kaiho.mlit.go.jp/e/pdf/R02_panfu_eng.pdf.

⁶⁸⁹ Ministry of Foreign Affairs of Japan, “Diplomatic Bluebook 2019,” 2019, <https://www.mofa.go.jp/policy/other/bluebook/index.html>.

⁶⁹⁰ Ministry of Foreign Affairs of Japan.

⁶⁹¹ Takuya Shimodaira, “Chapter 3: The JMSDF and JCG: Toward Cooperation and Contribution,” in *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*, ed. Ian Bowers and Swee Lean Collin Koh (Singapore: Springer Nature, 2019), 40–41.

⁶⁹² Shimodaira, 41.

⁶⁹³ Shimodaira, 47.

1. Organizational Ontology

In 1948, to replace its disbanded navy, Japan required the establishment of a maritime security force that would not violate Article 9 of the post-war constitution imposed by the United States.⁶⁹⁴ Eventually, the Maritime Safety Agency (MSA) was formed to undertake this role under the supervision of the U.S. occupation authorities. The JCG identifies the date the MSA was established as May 1, 1948, the inauguration day of the JCG.⁶⁹⁵ The MSA was modeled as a replica of the USCG, where the former would strictly function under a civil hierarchical structure as a constabulary and a MER organization.⁶⁹⁶ An incident in 1999 that involved a confrontation with two North Korean vessels resulted in revisions to the JCG Law.⁶⁹⁷ Due to these security dynamics in the region, the MSA was restructured as the Japan Coast Guard in April 2000.⁶⁹⁸ The revision allowed its platforms to use armed force to stop non-compliant vessels, eventually changing the trajectory of JCG's passive posture.⁶⁹⁹

Under Article 1 of the "JCG Law," the JCG would become an entity under the Ministry of Infrastructure, Transport, and Tourism (MIT) of Japan.⁷⁰⁰ Under the law, mandates of several other agencies, including the Lighthouse Bureau, Bureau of Shipping, Hydrographic Bureau, and the Commissions for Marine Accident Inquiry would fall under

⁶⁹⁴ Samuels, "New Fighting Power! Japan's Growing Maritime Capabilities and East Asian Security," 86, 92.

⁶⁹⁵ Japan Coast Guard, "Organization: Japan Coast Guard," accessed March 29, 2022, <https://www.kaiho.mlit.go.jp/e/organization/>.

⁶⁹⁶ Samuels, "New Fighting Power! Japan's Growing Maritime Capabilities and East Asian Security," 92.

⁶⁹⁷ Céline Pajon, "Japan's Coast Guard and Maritime Self-Defense Force in the East China Sea: Can a Black-and-White System Adapt to a Gray-Zone Reality?," *Asia Policy*, no. 23 (2017): 126, <http://www.jstor.org/stable/24905153>.

⁶⁹⁸ Samuels, "New Fighting Power! Japan's Growing Maritime Capabilities and East Asian Security," 97.

⁶⁹⁹ Pajon, "Japan's Coast Guard and Maritime Self-Defense Force in the East China Sea," 118.

⁷⁰⁰ Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Law No. 28 § (1948), Article 1, <https://nippon.zaidan.info/seikabutsu/2001/00500/contents/00021.htm>.

the JCG.⁷⁰¹ Article 10 of the law states that the Commandant of the JCG shall lead the agencies' day-to-day activities under the direct supervision of the Minister.⁷⁰² Articles 19 and 20 identify the organization as an armed organization, although the law also states that the JCG should not be trained or organized to function "as a military establishment."⁷⁰³ These provisions indicate that the JCG is an armed constabulary organization that would be under a civil bureaucracy.

2. Roles and Responsibilities

The JCG's roles and responsibilities are laid down in Articles 4 and 5 of Law No. 28 of April 27, 1948, which includes amendments to Law No. 102 of 1999, collectively known as the "Japan Coast Guard Law" (JCG Act).⁷⁰⁴ The main roles defined in the provisions are as follows:

- MLE;
- Maritime SAR;
- HADR;
- Marine accident investigation;
- Removal of hazards to navigation;
- Regulation of marine navigation;
- Regulation of port security;
- Vessel traffic management;

⁷⁰¹ Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Article 2.

⁷⁰² Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Article 10.

⁷⁰³ Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Article 19, 20, 25.

⁷⁰⁴ Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Article 4, 5.

- Marine pollution response and prevention;
- Conduct of coastal patrols;
- Maintenance of peace and harmony at sea;
- Pursuit and arrest of criminals at sea;
- Hydrographic survey;
- Publishing notice to mariners;
- Establishment of ATONs, including lighthouses;
- Meteorological forecasting; and
- International cooperation related to JCG mandates.

The broader roles of the JCG within the law add up to 28 functions the organization is required to undertake. Among the CGs studied in this paper, is the JCG has the most specific task list drawn from a CG law. The JCG's roles range from administrative functions to civil MER functions, in addition to constabulary roles. The JCG Law prohibits any type of military responsibilities being adopted by the JCG.⁷⁰⁵

3. Strategic Status

The demilitarization of Japan came after World War II when the Allied Forces disbanded its armed forces.⁷⁰⁶ A new constitution was drafted in 1946, known as the “Peace Constitution,” with the help of the U.S. government.⁷⁰⁷ It is the renowned Article 9 of this constitution that has prevented the militarization of Japan, precluding it from

⁷⁰⁵ Japan Coast Guard Law: Japan Coast Guard Laws and Regulations with Amendments through Law No. 102 of 1999, Article 25.

⁷⁰⁶ Ryusho Kadota, “U.S.-Imposed Article 9 of the Constitution Threatens the Lives of Japanese People,” Japan Forward, May 18, 2021, <https://japan-forward.com/u-s-imposed-article-9-of-the-constitution-threatens-the-lives-of-japanese-people/>.

⁷⁰⁷ David Walton, “Japan: Article 9 Conundrum Rears Its Head Again,” The Interpreter: Lowy Institute, February 24, 2020, <https://www.lowyinstitute.org/the-interpreter/japan-article-9-conundrum-rears-its-head-again>.

regressing to its imperial past.⁷⁰⁸ The origin of the article was the 1928 “Kellogg-Briand Pact,” which “called for the renunciation of war as an instrument of national policy.”⁷⁰⁹ In exchange for the demilitarization, the United States would protect Japan under the 1951 “Security Treaty between Japan and the United States of America.”⁷¹⁰ The JCG was formed (initially as MSA) in 1948 in the absence of a navy.⁷¹¹ It was only after regaining its sovereignty in 1954 that Japan would be able to form the JSDF.⁷¹²

Article 25 of JCG Law supplements Article 9 of its constitution, limiting armed operations. Initially for the JCG, this was not a matter of concern, until the security dynamics started to gradually change over the past two decades. The organization’s focus shifted from its traditional responses to maritime accidents to territorial disputes.⁷¹³ This would further elevate the JCG’s status strategically as a valuable asset to maintain Japan’s claim over its various disputed territories. The first significant demonstration of this occurred in 1999 when two North Korean fishing boats entered Japanese territorial waters.⁷¹⁴ The MSA (later the JCG) dispatched its vessel and fired warning shots to force the vessels to stop and comply. Following these warnings, and after a chase by the MSA that was joined by the JMSDF, the North Korean vessels fled back into their own territory. The most significant outcome of this was to rebrand the MSA as the JCG and to grant it the authority to employ deadly force.⁷¹⁵ This has led to recognition of the JCG as the “fourth branch of the Japanese military.”⁷¹⁶

⁷⁰⁸ Walton.

⁷⁰⁹ The Sasakawa Peace Foundation, “Why a Constitutional Amendment Would Be a Good Idea : An Interview with Former GSDF Lieutenant General Noboru Yamaguchi,” February 2019, https://www.spf.org/iina/en/articles/yamaguchi_01.html.

⁷¹⁰ Yuki Tatsumi, *Japan’s National Security Policy Infrastructure: Can Tokyo Meet Washington’s Expectations?* (Washington, DC: Henry L. Stimson Center, 2008), 12, https://www.stimson.org/wp-content/files/file-attachments/Tatsumi_%20Japan’s_Security_Policy_Infrastructure_Final_Version.pdf.

⁷¹¹ Japan Coast Guard, “Organization: Japan Coast Guard.”

⁷¹² Tatsumi, *Japan’s National Security Policy Infrastructure*, 16.

⁷¹³ Tatsumi, 87.

⁷¹⁴ Shimodaira, “Chapter 3: The JMSDF and JCG: Toward Cooperation and Contribution,” 45.

⁷¹⁵ Shimodaira, 49.

⁷¹⁶ Tatsumi, *Japan’s National Security Policy Infrastructure*, 89.

The second such incident occurred in 2001, when another North Korean ship, believed to be a spy vessel, was intercepted by the JCG.⁷¹⁷ The incident ended with a fire-fight between the North Korean vessel and the JCG, killing 15 people on board the suspected spy vessel.⁷¹⁸ This confrontation was the harbinger of further cooperation between the JMSDF and the JCG.⁷¹⁹ The operation enhanced the JMSDF's role as a supporting agency for the JCG, where the former does not have the same constabulary authority to use force as the JCG.⁷²⁰ The two incidents with the North Korean vessels forced the Japanese government to rethink its pacifist strategy when incursions are made by foreign vessels under the guise of civil or commercial purposes. The next challenge would be expanding the operational scope and complexity of the JCG.

In 2008, China's President Hu Jintao and Japan's Prime Minister Yasuo Fukuda signed an agreement to mutually promote "peace, stability, and development of Asia-Pacific."⁷²¹ This agreement and its assurances were short-lived. Before the end of the year, on December 8, 2008, Chinese government vessels entered the territorial waters of the Senkaku/Diaoyu islands, ignoring JCG warnings to leave.⁷²² In the coming years, things would deteriorate further, with Chinese fishing vessels being accompanied by PLAN or, later, CCG vessels.⁷²³ From this point onwards, the JCG would eventually become overwhelmed by maritime "gray zone" activities or the irregular maritime operations of the Chinese. It was observed by the JCG, that by the end of 2021, a total of ten Chinese vessels had entered Japanese territorial waters illegally, and a total of 94 Chinese vessels

⁷¹⁷ Julian Ryall, "A North Korean Spy Ship in Yokohama: The Japan Coast Guard Museum," Nippon.com, January 19, 2018, <https://www.nippon.com/en/features/c04503/>.

⁷¹⁸ Ryall.

⁷¹⁹ Shimodaira, "Chapter 3: The JMSDF and JCG: Toward Cooperation and Contribution," 48.

⁷²⁰ Samuels, "'New Fighting Power!' Japan's Growing Maritime Capabilities and East Asian Security," 96.

⁷²¹ Ministry of Foreign Affairs of Japan, "Trends in China Coast Guard and Other Vessels in the Waters Surrounding the Senkaku Islands, and Japan's Response," January 18, 2022, https://www.mofa.go.jp/region/page23e_000021.html.

⁷²² Ministry of Foreign Affairs of Japan.

⁷²³ Ministry of Foreign Affairs of Japan.

had entered Japan's contiguous zone illegally.⁷²⁴ These threats have further increased calls to renew and revise Japan's "outdated" Constitution, in order to further empower its armed forces.⁷²⁵ Currently, it is the JCG, with a supporting role from the JMSDF, that face off against the Chinese vessels.

In addition to the challenging missions at sea, the JCG is known for its effective multilateral maritime security cooperation mechanisms. One such initiative is the HACGAM forum, which was described previously in Chapter VII. Japan hosted and established the mechanism in 2004, with 16 Asian CGs or MLEAs with similar roles.⁷²⁶ Currently, there are 20 members that participate in the forum annually to discuss maritime issues.⁷²⁷ The other noteworthy initiative by the JCG is the Global Coast Guard Summit, co-hosted by Japan and the Nippon Foundation in 2017, that collectively addressed the issues related to MLEAs across the globe.⁷²⁸ In 2021, a total of 68 countries participated in the second forum.⁷²⁹ These engagements are a testament to the diplomatic efforts of the JCG to extend its maritime reach. This also underscores the strategic role of the JCG within Japan.

4. Physical Characteristics

The JCG surface platforms are painted white, similar to most of the CGs that have been presented in this paper. In addition to that similarity, the JCG vessels also have racing stripes, with three blue inter-connected stripes on the white background of the hull.⁷³⁰ Next to the racing stripes are the English block-letter inscription, "JAPAN COAST GUARD,"

⁷²⁴ Ministry of Foreign Affairs of Japan, "The Numbers of China Coast Guard and Other Vessels That Entered Japan's Contiguous Zone or Intruded into Territorial Sea Surrounding the Senkaku Islands," 2022, <https://www.mofa.go.jp/files/000465486.pdf>.

⁷²⁵ Kadota, "U.S.-Imposed Article 9 of the Constitution Threatens the Lives of Japanese People."

⁷²⁶ Heads of Asian Coast Guard Agencies Meeting, "History: Heads of Asian Coast Guard Agencies Meeting," accessed April 1, 2022, <https://hacgam.org/about>.

⁷²⁷ Heads of Asian Coast Guard Agencies Meeting.

⁷²⁸ Japan Coast Guard, "Coast Guard Global Summit 2nd Working Level Meeting to Be Held from 16 to 18 November," November 9, 2021, https://www.kaiho.mlit.go.jp/e/topics_archive/article3577.html.

⁷²⁹ Japan Coast Guard.

⁷³⁰ Japan Coast Guard, "Patrol Vessels and Craft," April 1, 2020, https://www.kaiho.mlit.go.jp/e/organization/vessels_craft.html.

printed in blue on either side of the mid-ship of the hull.⁷³¹ The JCG vessels are classed with three-letter abbreviations that are marked as pennant numbers on the forward area of the hull. For example, a reference to its largest class of ships bears the classification, “PLH,” which refers to “Patrol Vessel Large with Helicopter” (Figure 39).⁷³²



Figure 39. PLH class JCG ship *Zao*.⁷³³

The largest of this class of ships is over 6,000 tons and 150 meters (492 feet) in length and carries two helicopters each.⁷³⁴ The ships are also equipped with 35 mm and 25 mm caliber guns as primary weapon systems.⁷³⁵

⁷³¹ Japan Coast Guard.

⁷³² Japan Coast Guard, “Japan Coast Guard Ship,” April 1, 2020, <https://www.kaiho.mlit.go.jp/soubi-yosan/sentei/ship.html>.

⁷³³ Source: Japan Coast Guard, “Patrol Vessels and Craft.”

⁷³⁴ Japan Coast Guard, “Japan Coast Guard Ship.”

⁷³⁵ Academic Dictionaries and Encyclopedias, “Shikishima (PLH 31),” accessed April 1, 2022, <https://en-academic.com/dic.nsf/enwiki/3001563>.

The JCG also utilizes its own fleet of fixed-wing and rotary-wing aircraft. The fixed-wing aircraft include Gulfstream V, Falcon 2000, Bombardier 300, Saab 340, Beach 350, and Cessna 172 aircraft.⁷³⁶ The rotary-wing fleet includes Super Puma 225 and 332, Agusta 139, Sikorsky 76C and 76D, and Bell 412 and 505 helicopters (Figure 40)⁷³⁷ This is possibly an area in which the JCG's platforms outnumber the CCG's. All of these aircraft are white in color with light blue horizontal marking and the inscription "JAPAN COAST GUARD."



Figure 40. JCG Sikorsky 76D helicopter.⁷³⁸

The uniforms of the JCG are shown in Figure 41. The JCG uniforms resemble traditional naval uniforms, including the white summer uniforms and the black winter jacket uniform.⁷³⁹ The field uniform is a dark blue uniform, short-sleeved for summer and

⁷³⁶ Japan Coast Guard, "Aircraft," April 1, 2020, <https://www.kaiho.mlit.go.jp/e/organization/aircraft.html>.

⁷³⁷ Japan Coast Guard.

⁷³⁸ Source: Japan Coast Guard.

⁷³⁹ Japan Coast Guard, "Uniforms," accessed April 1, 2022, <https://www.kaiho.mlit.go.jp/soubi-yosan/uniform/seifuku.html>.

long-sleeved for winter, with a ball cap.⁷⁴⁰ Even though the rank structure is similar to naval insignias, the nomenclature is civilian.⁷⁴¹



Figure 41. The summer white, winter black, and working blue uniforms of the JCG.⁷⁴²

The officers of JCG are graduates of the Japan Coast Guard Academy, which is very similar to the service academies.⁷⁴³ The JCG is seen to adopt naval military culture and traditions to maintain a hierarchical discipline. The formations also utilize a Special Guard Team that receives training from the U.S. Navy Seals, as well as the elite forces of the JSDF.⁷⁴⁴ The JCG's physical characteristics project the organization as a paramilitary force, which has a distinctive alignment more towards a military organization than a civil organization.

⁷⁴⁰ Japan Coast Guard.

⁷⁴¹ Japan Coast Guard.

⁷⁴² Source: Japan Coast Guard.

⁷⁴³ Japan Coast Guard Academy, "News and Topics: Japan Coast Guard Academy," accessed April 1, 2022, <https://www.jcga.ac.jp/english/index.html>.

⁷⁴⁴ Samuels, "'New Fighting Power!' Japan's Growing Maritime Capabilities and East Asian Security," 93.

5. Behavior and Application

The JCG, similar to the other security infrastructure within the country, has been restricted to a demilitarized organization by default. Regardless of this, the changing dynamics of the security situation within the waters around Japan have made politicians and military leaders aware of the fact that the Japanese legal stance needs a change.⁷⁴⁵ The 2001 change in JCG Law was the first major change to the Japanese security stance since it adopted the “Peace Constitution” in 1946.⁷⁴⁶ Future threats may further change the capability and roles of the JCG and also the JSDF. This is evident from the fact that in 2009, for the first time, the JMSDF was deployed to the Western Indian Ocean to conduct counter-piracy operations, eventually establishing a permanent “naval air base in Djibouti.”⁷⁴⁷

Currently, the JCG is being augmented with high tonnage vessels equipped with increased fire-power to counter the Chinese gray-zone threats. This reflects growing competition in the area where China has been expanding its maritime claims. In addition to these operations, Japan is successfully employing its economic and diplomatic power that leverage the JCG as a tool to launch major regional and global maritime security cooperation mechanisms. This has made the JCG one of the leading CGs in the world, similar to the maritime diplomatic power projected by the USCG.

The JCG’s utilization of its functions signifies a higher threshold of constabulary activities that combine its policing role with the maritime irregular forces in order to protect maritime claims in disputed waters. Even though it is a civilian organization by statute, the JCG maintains the posture of a military CG, very similar to that of the USCG.

⁷⁴⁵ The Sasakawa Peace Foundation, “Why a Constitutional Amendment Would Be a Good Idea : An Interview with Former GSDF Lieutenant General Noboru Yamaguchi.”

⁷⁴⁶ Shimodaira, “Chapter 3: The JMSDF and JCG: Toward Cooperation and Contribution,” 48.

⁷⁴⁷ Robert Pekkanen and Saadia M. Pekkanen, eds., *The Oxford Handbook of Japanese Politics* (New York: Oxford University Press, 2021), 754.

D. CONCLUSION

This chapter analyzed two CGs belonging to island states located on different regions of the globe. They both belong to countries that have a demilitarized security infrastructure. Japan was forcibly demilitarized initially, while Iceland voluntarily chose this path due to limited resources. Although Japan utilizes different names for its current armed organizations, the country has a well-equipped self-defense force. The JCG's capabilities are evolving due to the growing threat environment. Its primary rivals, the CCG and the PLAN, are currently the largest CG and navy in the world. In contrast to this, the ISCG has a low threat profile. The ISCG has nonetheless been very successful in countering threats, which was most clearly demonstrated in the series of "Cod Wars" with the UK. The ISCG continues to enforce its fishing grounds while also continuing to undertake traditional military roles such as air-defense and EOD functions. The ICG and the JCG have unique roles not seen in the other CGs presented in this paper.

One of the striking similarities of both the CGs is their ability to develop and maintain maritime security cooperation to foster their nation's strategic security needs. These collaborative or collective security measures are vital for amplifying the maritime interests of these countries. The CGs are at the forefront of these mechanisms in both countries. Unlike the ISCG, in the coming years, the capabilities of the JCG will expand in terms of surface units and armaments. The modernization and development of the JCG fleet will likely synchronize with the Southeast Asian trend to develop larger and more potent CGs. This arms race is unprecedented among CGs or MLEAs, and could culminate either in compromise or conflict in the region. Hence, while this may change the JCG in the future, the ISCG will likely continue on its current course.

IX. CASE 6: ISLAND GOVERNMENT AND NON-GOVERNMENT COAST GUARDS

A. INTRODUCTION

This chapter examines two CGs that are government agencies and one CG that is operated as an NGO. These CGs belong to island nations in different regions of the globe. These are the Mauritius National Coast Guard (MNCG), the Coastguard New Zealand (CGNZ), and Her Majesty's Coastguard (HMCG) of the UK. The MNCG was selected due to its position in one of the busiest sea lanes in the world with a large maritime domain in relation to its landmass. The CGNZ is among the few island countries that operate an NGO bearing the name "coast guard," and it also belongs to one of the most isolated countries in the world. The HMCG was selected due to its civil government structure, but most of all to analyze the first organization ever to call itself a "coast guard."

As in previous chapters, this chapter analyzes these CGs using the same attributes, organizational ontology, roles and responsibilities, strategic status, physical characteristics, and application and behavior. Each analysis follows an overview of their respective maritime domains. The chapter closes with a conclusion of the three cases.

B. NATIONAL COAST GUARD – MAURITIUS

Mauritius is a small archipelagic state in the southwest Indian Ocean, belonging to the African continent. The country is geographically dispersed into separate sub-archipelagos and isolated islands. The two sub-archipelagos include St. Brandon and the Chagos Archipelago.⁷⁴⁸ Together, the two archipelagos have a total baseline of approximately 900 km (559 mi).⁷⁴⁹ The country is comprised of 79 islands in total.⁷⁵⁰

⁷⁴⁸ Government of Mauritius, "Republic of Mauritius- Location," accessed April 7, 2022, <http://www.govmu.org/English/ExploreMauritius/Geography-People/Pages/GeographyPeople/Location.aspx>.

⁷⁴⁹ United States Department of State, *Mauritius: Archipelagic and Other Maritime Claims and Boundaries*, Limits in the Seas (Washington, D.C.: Bureau of Oceans and International Environmental and Scientific Affairs, 2014), 4, <https://www.state.gov/wp-content/uploads/2019/11/LIS-140.pdf>.

⁷⁵⁰ Government of Mauritius, "Republic of Mauritius- Location."

Among the islands, Mauritius is the largest island, at 1,864 sq km (720 sq mi).⁷⁵¹ The total landmass of the country is 2,030 sq km (784 sq mi),⁷⁵² and its EEZ is approximately 1.8 million sq km (694,984 sq mi), which is over 800 times the size of its landmass (Figure 42).⁷⁵³ The islands extend over 2,000 km (1,243 mi) into the Western Indian Ocean region. The Mauritian territories are bordered by Maldives and Seychelles to the north and Madagascar and Réunion to the west.

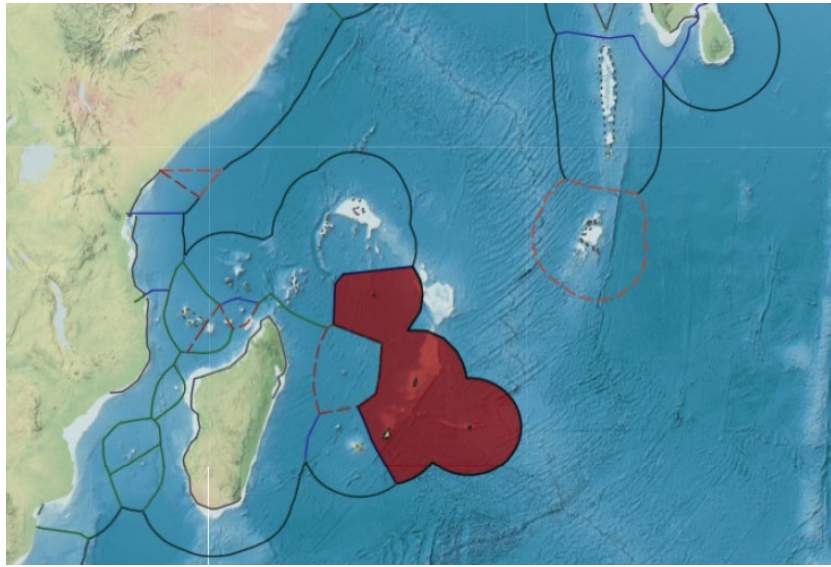


Figure 42. Mauritian maritime domain, with its EEZ highlighted in red, and with the Chagos EEZ in dashed red outline in the North East.⁷⁵⁴

Mauritius has two territories that are contested by other nations. The first is the Chagos Archipelago (or the BIOT), which houses the U.S. military on the island of Diego

⁷⁵¹ Government of Mauritius.

⁷⁵² James A. Malcolm and Lingnaden Murday, “Small Islands’ Understanding of Maritime Security: The Cases of Mauritius and Seychelles,” *Journal of the Indian Ocean Region* 13, no. 2 (May 4, 2017): 235, <https://doi.org/10.1080/19480881.2017.1328018>.

⁷⁵³ Mauritius Police Force, “National Coast Guard,” accessed April 7, 2022, https://police.govmu.org/police/?page_id=4922.

⁷⁵⁴ Source: Marine Regions, “Republic of Mauritius MRGID 8343,” accessed April 10, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8343&zone=eez>.

Garcia, controlled by the UK.⁷⁵⁵ Second is the Tromelin Island controlled by France.⁷⁵⁶ In the matter of the Chagos Archipelago, the International Court of Justice (ICJ) ruled in 2019 that the archipelago in fact belongs to Mauritius.⁷⁵⁷ Again in 2021, the International Tribunal on the Law of the Sea (ITLOS) also supported the ruling in favor of Mauritius and called for the UK to complete decolonization of the archipelago.⁷⁵⁸ Mauritius has also contested its neighboring Maldives, for claiming an overlapping area of respective EEZs with the Chagos Archipelago.⁷⁵⁹

Despite having a large maritime area, scattered islands, and various maritime threats, Mauritius does not have a standing military. The security of the country is maintained by the Mauritius Police Force (MPF), which is managed directly by the Prime Minister's Office.⁷⁶⁰ Under the MPF, there are several sub-units. These units include: the Anti-Drug Smuggling Unit, Passport and Immigration Office, the Special Mobile Force, the Special Support Unit, a Police Helicopter Squadron, the Maritime Air Squadron (MAS), and the MNCG.⁷⁶¹ Among these, the MNCG is responsible for maritime security in Mauritius.

1. Organizational Ontology

The origins of the MNCG go back to 1974 when the Marine Wing of the police was formed, with a single vessel acquired, for the purpose of SAR and coastal patrolling.⁷⁶²

⁷⁵⁵ Patrick Wintour, "UN Court Rejects UK Claim to Chagos Islands in Favour of Mauritius," *The Guardian*, January 28, 2021, sec. World news, <https://www.theguardian.com/world/2021/jan/28/un-court-rejects-uk-claim-to-chagos-islands-in-favour-of-mauritius>.

⁷⁵⁶ United States Department of State, *Mauritius: Archipelagic and Other Maritime Claims and Boundaries*, 9.

⁷⁵⁷ Owen Bowcott, "UN Court Rejects UK's Claim of Sovereignty Over Chagos Islands," *The Guardian*, February 25, 2019, sec. World news, <https://www.theguardian.com/world/2019/feb/25/un-court-rejects-uk-claim-to-sovereignty-over-chagos-islands>.

⁷⁵⁸ Wintour, "UN Court Rejects UK Claim to Chagos Islands in Favour of Mauritius."

⁷⁵⁹ Mujuthaba and Brewster, "Maldives Embroiled in Mauritius-UK Tussle over Chagos."

⁷⁶⁰ Mauritius Police Force, "About – Mauritius Police Force," accessed April 8, 2022, https://police.govmu.org/police/?page_id=96.

⁷⁶¹ Mauritius Police Force.

⁷⁶² Mauritius Police Force, "National Coast Guard."

The Marine Wing was re-established on July 24, 1987, as the MNCG, mainly to counter the growing IUUF and smuggling activities.⁷⁶³ The MNCG's legal mandates were redefined after "The National Coast Guard Act" was enacted on December 22, 1988, defined for the purpose of "exercising surveillance over the maritime water of Mauritius."⁷⁶⁴ The MNCG is considered the naval arm of the MPF. The MNCG is a civil armed organization under Article 12(3) of the MNCG Act.⁷⁶⁵ It is accountable to the Commissioner of MPF, who is in turn responsible to the head of the Home Affairs Division of the Prime Minister's Office.⁷⁶⁶

Mauritius does not have a Department of Defense (or an equivalent cabinet portfolio), most likely due to the absence of a military. Along with a few of its units, the MPF describes the MNCG as a paramilitary unit within the agency.⁷⁶⁷ The training structure of the personnel includes a mixture of both naval and police knowledge and skills.⁷⁶⁸ The MNCG personnel are also policemen, where Article 6 of the MNCG Act gives them the authority to enforce "any law" related to the security of Mauritius and also the authority to conduct general MLE.⁷⁶⁹ With these authorities, the MNCG personnel also patrol the coastal areas on land in addition to the sea.⁷⁷⁰ The MNCG perform their CG and police roles from 19 posts across the country, within which they operate under one of the four main MPF Area Commanders.⁷⁷¹

This organizational hierarchy, which is a constabulary structure, identifies the MNCG as a tier-III organization. This is primarily because the Commandant of the MNCG

⁷⁶³ Mauritius Police Force.

⁷⁶⁴ The National Coast Guard Act, No. 42 of 1988 § (1988), <http://muelex.govmu.org/portal/sites/muelex/files/coast.pdf>.

⁷⁶⁵ The National Coast Guard Act, Article 12(3).

⁷⁶⁶ Mauritius Police Force, "About – Mauritius Police Force."

⁷⁶⁷ Mauritius Police Force.

⁷⁶⁸ Mauritius Police Force, "National Coast Guard."

⁷⁶⁹ The National Coast Guard Act, Article 6.

⁷⁷⁰ Mauritius Police Force, "National Coast Guard."

⁷⁷¹ Mauritius Police Force.

is accountable to two more higher-level commanders up the chain: the Commissioner of Police and the Head of Home Affairs Department at the Prime Minister's Office.

2. Roles and Responsibilities

The roles of the MNCG are laid down under Articles 6(1) and 12(1) of the MNCG Act. The general roles described under 6(1) are as follows:⁷⁷²

- Law enforcement related to the security of the state;
- MLE; and
- Detection, prevention, and suppression of maritime crimes.

The mandates under Article 12(1) are as follows:⁷⁷³

- Protect the territorial integrity;
- Protect the marine environment;
- Perform maritime SAR;
- Carry out salvage operations at sea;
- Perform maritime surveillance;
- Carry out marine pollution response;
- Prevent maritime crimes;
- Perform counter-drug operations;
- Conduct investigations on maritime crime;
- Lay NAVAIDs for safe navigation at sea; and

⁷⁷² The National Coast Guard Act, Article 6(1).

⁷⁷³ The National Coast Guard Act, Article 12(1).

- Prevent collision at sea.

These roles and responsibilities of the MNCG give the organization complete authority over the full spectrum of operations within the maritime jurisdiction of Mauritius. These include mandates spanning security-related operations to maritime administrative roles, such as monitoring navigational safety.

3. Strategic Status

Since the country straddles vital shipping lanes (ISL), especially those moving between Southeast Asia and the Cape of Good Hope, Mauritius is exposed to dense maritime traffic.⁷⁷⁴ It is estimated that over 2,500 vessels pass along the ISLs near Mauritius every month.⁷⁷⁵ One threat Mauritius has to continuously grapple with is marine pollution resulting from maritime accidents. Such incidents occurred in 2011 and in 2016, when MV Angel and MV Benita ran aground, respectively.⁷⁷⁶ The most recent case was in July 2020 when a Japanese cargo vessel, MV *Wakashio*, ran aground on the southern coast of the main island.⁷⁷⁷ The vessel discharged over a thousand tons of oil into the pristine waters and the vulnerable ecosystem of the region.⁷⁷⁸ The *Wakashio* incident was extremely detrimental for Mauritius, resulting in the President declaring a national state of environmental emergency.⁷⁷⁹ This incident resulted in a number of international partners

⁷⁷⁴ gCaptain, “Here’s Why So Much World Trade Passes Mauritius,” August 11, 2020, <https://gcaptain.com/heres-why-so-much-world-trade-passes-mauritius/>.

⁷⁷⁵ Dyani Lewis, “How Mauritius Is Cleaning Up After Major Oil Spill in Biodiversity Hotspot,” *Nature* 585, no. 7824 (August 27, 2020): 172–172, <https://doi.org/10.1038/d41586-020-02446-7>.

⁷⁷⁶ Janav Valgi, “Disaster in Paradise: The Mauritius Oil Spill,” *McGill International Review* (Montreal, Canada: International Relations’ Students Association of McGill (IRSAM), October 6, 2020), 1, <http://www.proquest.com/docview/2460759342/abstract/14F300EE9ED24044PQ/1>.

⁷⁷⁷ Pravesh Raghoo, *Precautionary Policy? The Wakashio Oil Spill in Mauritius: A Hard Lesson About Coastal and Marine Management*, SSRN Scholarly Paper 387088 (Rochester, NY: Social Science Research Network, 2021), 1–2, <https://papers.ssrn.com/abstract=3870818>.

⁷⁷⁸ Raghoo, 1–2.

⁷⁷⁹ Reuters, “France Offers Aid as Mauritius Declares Emergency Over Oil Spill from Stranded Vessel,” August 8, 2020, sec. Energy, <https://www.reuters.com/article/mauritius-environment-idUSL8N2FA0C1>.

rushing to help Mauritius manage the spill and the wreckage.⁷⁸⁰ The MNCG was also strongly criticized for the grounding, largely since the MNCG failed to direct, prevent, or warn the vessel as it was traveling on a collision course.⁷⁸¹

Among other agencies, the MNCG is one of the most legally versatile organizations in the country, especially due to its being a part of the MPF. The MNCG serves the Maritime Zones Act, Fisheries Act, Sand Removal Act, Pleasure Craft Act, Port Act, and the Customs Act—all in addition to the Police Act and the MNCG Act of 1988.⁷⁸² Furthermore, any other law MNCG is authorized to implement will also be within its operational jurisdiction. This makes the MNCG one of the leading agencies for maritime affairs in Mauritius. In executing these functions, the legal instruments necessitate MNCG to partner with other relevant stakeholders. One of its major partners is the Anti-Drug and Smuggling Unit (ADSU) of the MPF.⁷⁸³ It is a sister agency of the MNCG and is responsible for detecting and preventing drug smuggling, a mandate also shared by the MNCG. Illegal drugs are mostly smuggled into Mauritius through the porous and vast sea borders, both for local consumption and as a transit point for South Africa.⁷⁸⁴ Reasonably, the ADSU cannot execute its duties in the maritime domain without the assistance of the MNCG.⁷⁸⁵

Mauritius and its maritime security agencies were tested during the peak period of the western Indian Ocean piracy incidents. The maritime geography of Mauritius and its proximity to the east African coast make it prone to piracy. It is estimated that at the height of this criminal activity, between 2008 and 2010, over 548 incidents were reported and

⁷⁸⁰ Nishan Degnarain, “The Rise and Fall of Japan Over the Deadly Mauritius Oil Spill,” *Forbes*, December 11, 2020, <https://www.forbes.com/sites/nishandegnarain/2020/12/11/the-rise-and-fall-of-japan-over-the-deadly-mauritius-oil-spill/>.

⁷⁸¹ Nishan Degnarain, “Latest Satellite Analysis Reveals New Theory For Deadly Wakashio Oil Spill In Mauritius,” *Forbes*, October 19, 2020, <https://www.forbes.com/sites/nishandegnarain/2020/10/19/latest-satellite-analysis-reveals-new-theory-for-deadly-wakashio-oil-spill-in-mauritius/>.

⁷⁸² Mauritius Police Force, “National Coast Guard.”

⁷⁸³ Malcolm and Murday, “Small Islands’ Understanding of Maritime Security,” 241.

⁷⁸⁴ Malcolm and Murday, 247.

⁷⁸⁵ Malcolm and Murday, 241.

over \$490 million paid in ransom.⁷⁸⁶ Mauritius was one of the few smaller countries in the region that played a key role in suppressing this illicit activity. The country signed an agreement with the EU to agree on the prosecution and detention of Somali pirates.⁷⁸⁷ The MNCG was part of a number of regional maritime security cooperation mechanisms adopted due to the piracy threat, most of which have now evolved to include other maritime crimes. One of these is the EU-sponsored “Critical Maritime Routes Indo-Pacific” or CRIMARIO I program.⁷⁸⁸ This program was also enhanced by a maritime security cooperation agreement between Mauritius, Seychelles, Comoros, Madagascar, and Djibouti in 2018, to increase information sharing.⁷⁸⁹ The other parallel EU-sponsored program is the MASE regional program, described in Chapter V.⁷⁹⁰ Under this program, information sharing centers were established in Madagascar and Seychelles, all of which supplement the MNCG. The other program is the DCoC, and its Jeddah Amendment, which were also discussed in Chapter V.⁷⁹¹

With the assistance of the Indian government, Mauritius has also established a chain of coastal radars that covers some of its coastal areas. Under the project, the Indian government has installed eight radars fitted with AIS capability.⁷⁹² The Indian government has also leased and gifted a large portion of the MNCG’s surface and air platforms.⁷⁹³ In

⁷⁸⁶ Deborah Osiro, “Somali Pirates Have Rights Too,” Institute for Security Studies, no. 224 (July 2011): 2, <https://www.files.ethz.ch/isn/136726/PAPER224.pdf>.

⁷⁸⁷ MENA Report, “Mauritius : Workshop on Handling Somali Pirates, for Prison and Police Officers,” January 9, 2013, 1, <http://www.proquest.com/docview/1269022740/abstract/5452B85A85BC4D3BPQ/1>.

⁷⁸⁸ EU CRIMARIO, “CRIMARIO, Critical Maritime Routes Indo-Pacific: Rationale & Objectives,” accessed April 8, 2022, <https://www.crimario.eu/en/the-project/rationale-objectives/>.

⁷⁸⁹ EU CRIMARIO, “Maritime Security Conference in Mauritius,” June 14, 2018, <https://www.crimario.eu/en/2018/06/14/maritime-security-conference-in-mauritius-2/>.

⁷⁹⁰ Isabelle Gachie Vinson, “CRIMARIO-MASE: A Win-Win Partnership,” EU Crimario, October 4, 2018, <https://www.crimario.eu/en/2018/10/04/crimario-mase-a-win-win-partnership/>.

⁷⁹¹ International Maritime Organization, “Djibouti Code of Conduct.”

⁷⁹² Republic of Mauritius, “Coastal Surveillance Radar System Implemented Across Eight NCG Stations,” August 18, 2020, <http://www.govmu.org/English/News/Pages/Coastal-Surveillance-Radar-System-implemented-across-eight-NCG-Stations.aspx>.

⁷⁹³ Sanjay Badri-Maharaj, “The Mauritius-India Naval Relationship: Naval Diplomacy 2.0,” Manohar Parrikar Institute for Defence Studies and Analyses, June 2016, <https://www.idsa.in/africatrends/the-mauritius-india-naval-relationship-naval-diplomacy>.

addition to the security hardware, a large number of MNCG personnel are trained in Indian Navy facilities.⁷⁹⁴ The Commanding Officer of the MNCG is a deputed Indian Navy officer, who holds the rank of a naval captain (an O-6).⁷⁹⁵ In addition to this leadership role, a number of Indian military officers lead, and also are a part of, the specialized units of the MPF, including the MAS and the Police Helicopter Squadron.⁷⁹⁶ Hence, India remains the closest security partner for Mauritius.

Indian assistance to the MNCG has also been extended to the development of an MNCG base on the distant northern island of Agalega.⁷⁹⁷ An agreement was signed for the development of the base in March 2015, during a visit of the Indian Prime Minister to Mauritius.⁷⁹⁸ There are claims that the project is an ambitious Indian project to develop an Indian military base in the Western Indian Ocean.⁷⁹⁹ Some Indian projects and contributions, especially those related to the development of CG infrastructure in the region, have been met with suspicion. One such was the Maldives' UTF project, which was discussed in Chapter VII. Seychelles, another island state in the Indian Ocean, was forced to suspend a similar infrastructure project in 2020 due to resistance from the opposition.⁸⁰⁰ The project in Mauritius, which began in 2019, is expected to cost \$84 million and includes a berthing facility, logistics infrastructure, and a three-kilometer runway.⁸⁰¹

⁷⁹⁴ Badri-Maharaj.

⁷⁹⁵ Mauritius Police Force, "National Coast Guard: Annual Operational Plan 2021," 2021, 2, <https://police.govmu.org/police/?mdocs-file=6180>.

⁷⁹⁶ Badri-Maharaj, "The Mauritius-India Naval Relationship: Naval Diplomacy 2.0."

⁷⁹⁷ G Padmaja, "India and Mauritius: Cooperating to Ensure Collective Maritime Security," National Maritime Foundation, August 21, 2021, 2.

⁷⁹⁸ Padmaja, 2.

⁷⁹⁹ Suhasini Haidar, "Indian Project in Mauritius Faces Protests," *The Hindu*, October 28, 2018, sec. National, <https://www.thehindu.com/news/national/indian-project-in-mauritius-faces-protests/article25348528.ece>.

⁸⁰⁰ Vinitha Revi, "India's Approach Towards Seychelles in the Indian Ocean Region," ORF, April 26, 2021, <https://www.orfonline.org/expert-speak/indias-approach-towards-seychelles-in-the-indian-ocean-region/>.

⁸⁰¹ Samuel Bashfield, "Agalega: A Glimpse of India's Remote Island Military Base," The Interpreter: Lowy Institute, March 2, 2021, <https://www.lowyinstitute.org/the-interpreter/agalega-glimpse-india-s-remote-island-military-base>.

The responsibilities of the MNCG are highly strategic, considering the important roles the MNCG plays at the national and regional levels. Any limitation or failure of the MNCG would result in detrimental consequences for Mauritius. It is also noteworthy that the MNCG, as well as some units within it, are led by officers of the Indian military. Details of this arrangement are not available to the public. This restriction limits any further discussion or conclusions on this cooperation mechanism. In addition, the organization is also embedded within the MPF, as a branch among eight other branches.⁸⁰²

4. Physical Characteristics

Regardless of the MNCG being under a police force, the MNCG vessels are painted in gray similar to naval vessels (Figure 43). The racing stripes of MNCG vessels are red, white, blue, and white, followed by another red stripe, where the blue stripe is much wider than the others. The English inscription “COAST GUARD” is printed in white against the gray background of the mid-hull on both sides of the ship. The name of each ship is also printed in English aft of the hull on the sides. Since most of these ships are variants of smaller classes of Indian combat vessels, these ships resemble naval vessels. The largest vessel operated by the MNCG is the OPV CGS *Barracuda*, which is a 74 meter (222 feet) ship, built by the Garden Reach Shipbuilders and Engineers Ltd. of India.⁸⁰³ The major armament on board the ship is a 30 mm CRN-91 main gun, supplemented with 12.7 mm and 7.62 mm guns, with which most other ships are also equipped.⁸⁰⁴ The CRN-91 is a licensed Indian version of the Russian 30 mm *Medak* gun.⁸⁰⁵ In addition to this ship, the MNCG has listed four more ships as their surface platforms.⁸⁰⁶

⁸⁰² Mauritius Police Force, “About – Mauritius Police Force.”

⁸⁰³ The Economic Times, “CGS Barracuda: First Indian Warship Exported to Mauritius,” December 21, 2014, <https://economictimes.indiatimes.com/nation-world/cgs-barracuda-first-indian-warship-exported-to-mauritius/slideshow/45590323.cms>.

⁸⁰⁴ Baird Maritime, “Mauritius Receives Second Fast Patrol Boat,” July 13, 2017, <https://www.bairdmaritime.com/work-boat-world/maritime-security-world/non-naval/mauritius-receives-second-fast-patrol-boat-cgs-valiant-jpg/>.

⁸⁰⁵ Combster, “CRN 91 Naval Gun,” 2020, <https://www.combster.tv/t/897609-crn-91-naval-gun>.

⁸⁰⁶ Mauritius Police Force, “Annual Report 2020 – 2021 – Mauritius Police Force,” Annual Report, November 2021, 72, <https://police.govmu.org/police/?mdocs-posts=annual-report-2020-2021&mdocs-cat=>.



Figure 43. MNCG ship, the CGS *Valiant*.⁸⁰⁷

As part of its maritime air support, the MNCG operates fixed-wing *Dornier* MPA aircraft, under the command of the Maritime Air Squadron (Figure 44).⁸⁰⁸ The unit is maintained and led by Indian military personnel. The aircraft are all white in color, with the English inscription “COAST GUARD” printed in the mid-section. It also has the racing stripes of the MNCG printed on either side.⁸⁰⁹ Currently, the MNCG operates five of these aircraft, including a passenger variant handed over in April 2022.⁸¹⁰ The rotary-wing aircraft are operated separately by the Police Helicopter Squadron, which also supplements MNCG operations, especially during SAR operations.⁸¹¹

⁸⁰⁷ Source: Shipshub, “National Coast Guard of Mauritius,” accessed April 10, 2022, <https://shipshub.com/navy/126-1.html>.

⁸⁰⁸ This Week News, “Maritime Air Squadron: The Unsung Heroes,” June 22, 2020, <https://thisweeknews.info/index.php/2020/06/22/maritime-air-squadron-the-unsung-heroes/>.

⁸⁰⁹ This Week News.

⁸¹⁰ Indian Defense Research Wing, “India Hands Over a New Passenger Variant of DO 228 to Mauritius,” April 8, 2022, <https://idrw.org/india-hands-over-a-new-passenger-variant-of-do-228-to-mauritius/>.

⁸¹¹ Mauritius Police Force, “Annual Report 2020 – 2021 – Mauritius Police Force,” 38.



Figure 44. MNCG Dornier 228 MPA on patrol.⁸¹²

In relation to uniforms, the MNCG personnel do not utilize the naval full-white summer uniform. The MNCG's working dress uniforms are a white shirt with black trousers (Figure 45), although the official uniforms resemble the traditional service dress white uniforms worn by most navies.⁸¹³ The MNCG uniforms are distinct from other units of the MPF. The majority of the MNCG personnel are trained in Coast Guard Training School at Le Chaland.⁸¹⁴ A majority additionally undergo training from different countries, namely India, France, and the United States. The MNCG appears to follow traditional naval customs in addition to military traditions.

⁸¹² Source: This Week News, "Maritime Air Squadron."

⁸¹³ Mauritius Police Force, "34th Anniversary of the National Coast Guard," accessed April 10, 2022, https://police.govmu.org/police/?page_id=6983.

⁸¹⁴ Mauritius Police Force, "National Coast Guard."



Figure 45. MNCG personnel in their working uniform at a closing ceremony with USN personnel.⁸¹⁵

5. Behavior and Application

The MNCG is a civil organization within the police bureaucratic hierarchy of Mauritius. The MPF is the core security provider in the country, especially in the absence of a standing military or a conventional armed force. The MNCG is listed as a paramilitary force within the MPF, which is also evident from its training, operations, and behavior. The highest tempo operations conducted by MNCG from July 2020 to June 2021 were maritime surveillance operations, mainly aerial surveillance.⁸¹⁶

On the matter of foreign military deputations, it is unclear why an Indian Coast Guard officer was not favored to lead the MNCG—especially since the Indian Coast Guard possesses more experience and knowledge in countering non-traditional threats like those faced by the MNCG. The Indian Navy, which appoints the Commander of the MNCG, does not retain primary mandates related to MLE or MER operations.⁸¹⁷ The reason for

⁸¹⁵ Source: Tracey L. Whitley, “APS East Completes Training in Mauritius,” DVIDS: Defense Visual Information Distribution Service, February 25, 2010, <https://www.dvidshub.net/news/45843/aps-east-completes-training-mauritius>.

⁸¹⁶ Mauritius Police Force, “Annual Report 2020 – 2021 – Mauritius Police Force,” 37.

⁸¹⁷ Indian Navy, “Role of Navy,” accessed April 10, 2022, <https://indiannavy.nic.in/content/role-navy>.

assigning an Indian Navy officer may have been due to the large number of Indian Naval personnel undertaking various roles within the MNCG. This is the first CG case in this study where a CG's leadership appointment is filled by an officer from a foreign organization and, interestingly, from a conventional navy.

The MNCG has the features of a constabulary force, where the unit is trained in both policing and military roles. It is also a hybrid organization with personnel from the MNCG, the Indian Navy, and the Indian Air Force. Therefore, it is a mixture of foreign military and local civil personnel. This arrangement may have been necessary to overcome the absence of a standing military, although the underlying reason is not available in open sources.

C. COASTGUARD NEW ZEALAND

1. Overview

New Zealand is an island state located in the South Pacific. The mainland is geographically comprised of two main islands: the North Island and the South Island, which are separated by the Cook Strait. The country has a coastline of approximately 20,500 km (12,738 mi).⁸¹⁸ This also includes 600 other islands located within a 50 km (31 mi) proximity of the two main islands.⁸¹⁹ The landmass of the country is around 265,846 sq km (102,644 sq mi),⁸²⁰ and its EEZ, which is 4 million sq km (1.5 million sq mi), is among the world's largest (Figure 46).⁸²¹ This is approximately 15 times the size of its

⁸¹⁸ Environment Guide, "Areas," February 6, 2018, <https://www.environmentguide.org.nz/issues/marine/new-zealands-marine-environment/areas/>.

⁸¹⁹ Eileen McSaveney, "Nearshore Islands," Te Ara: The Encyclopedia of New Zealand (Ministry for Culture and Heritage Te Manatu Taonga, September 24, 2007), <https://teara.govt.nz/en/nearshore-islands>.

⁸²⁰ Carl Walrond, "Geography and Geology," Te Ara: The Encyclopedia of New Zealand (Ministry for Culture and Heritage Te Manatu Taonga, February 8, 2005), <https://teara.govt.nz/en/natural-environment/page-1>.

⁸²¹ Russell Cole and Conrad Pilditch, "New Zealand, Coastal Ecology," in *Encyclopedia of Coastal Science*, ed. Maurice L. Schwartz (Dordrecht: Springer Netherlands, 2005), 705–9, https://doi.org/10.1007/1-4020-3880-1_227.

landmass. It is also worth mentioning that New Zealand is responsible for coordinating maritime SAR covering 30 million sq km (11.6 million sq mi) of maritime SRR.⁸²²

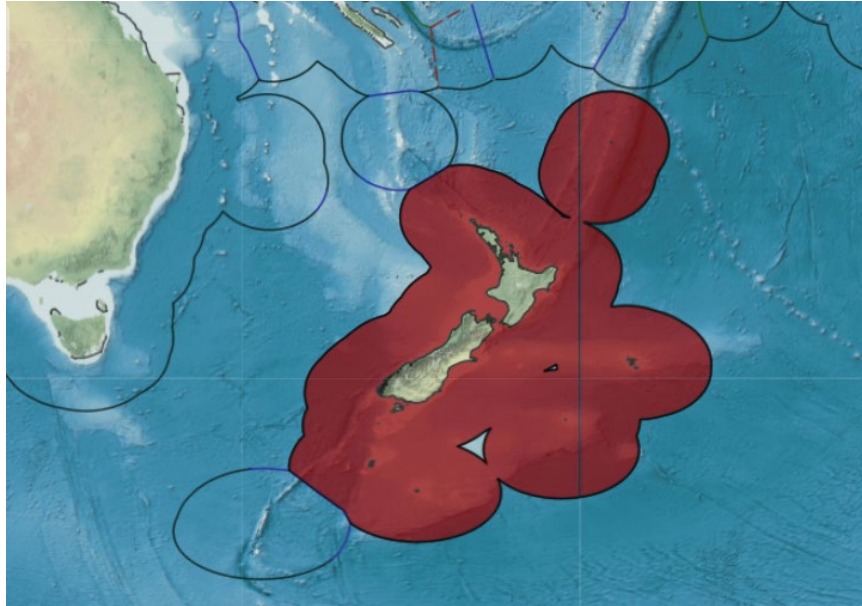


Figure 46. New Zealand's maritime domain, with its EEZ highlighted in red.⁸²³

In 2020, the Government of New Zealand released its Maritime Security Strategy.⁸²⁴ The strategy states that “New Zealand relies on the rules-based order to promote and pursue” its interests, mainly indicating the order governed by UNCLOS.⁸²⁵ The strategy is based on four main pillars, which include understanding the maritime domain, engaging with partners, preventing maritime threats, and responding with the right intervention.⁸²⁶ This strategy is driven by a 12-member stakeholder committee known as

⁸²² Government of New Zealand, *Maritime Security Strategy 2020: Guardianship of Aotearoa - New Zealand's Maritime Waters* (Wellington, New Zealand, 2020), 9, <https://www.transport.govt.nz/assets/Uploads/Report/MaritimeSecurityStrategy.pdf>.

⁸²³ Source: Marine Regions, “New Zealand MRGID 8455,” accessed April 10, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=8455&zone=eez>.

⁸²⁴ Government of New Zealand, *Maritime Security Strategy 2020*.

⁸²⁵ Government of New Zealand, 10.

⁸²⁶ Government of New Zealand, 17.

the Maritime Security Oversight Committee (MSOC), supported by its working group, the Joint Maritime Advisory Group (JMAG).⁸²⁷ The MSOC was formed in 2013, in order to consolidate the country's maritime security efforts, as recommended by the country's Auditor-General.⁸²⁸

In order to counter maritime threats, New Zealand utilizes the New Zealand Defense Force (NZDF), Customs, and the New Zealand Police; employing the latter two agencies in coastal waters.⁸²⁹ In addition to these agencies, the Ministry of Fisheries, Department of Conservation, Ministry of Foreign Affairs and Trade, and Maritime New Zealand also contribute to maritime security in the country.⁸³⁰ The consolidated efforts for maritime security are transformed and operationalized by the inter-agency National Maritime Coordination Center (NMCC).⁸³¹ This center was established in 2002 after the country's cabinet decided that New Zealand needed to better coordinate the maritime surveillance requirements of civil agencies.⁸³² The NMCC was placed within the NZDF, with manning requirements fulfilled by both military and civilian staff.⁸³³ Among these civil agencies is Maritime New Zealand, which utilizes the NMCC to coordinate and conduct "marine environmental protection, maritime safety, maritime security, and search and rescue" operations.⁸³⁴

In addition to Maritime New Zealand, there are a number of stakeholders that provide MER services throughout the vast maritime SRR. This is especially the case for

⁸²⁷ Government of New Zealand, 26, 31.

⁸²⁸ Office of the Auditor-General New Zealand, "Effectiveness of Arrangements for Co-Ordinating Civilian Maritime Patrols," 2014, <https://oag.parliament.nz/2014/maritime-patrols>.

⁸²⁹ Government of New Zealand, *Maritime Security Strategy 2020*, 22.

⁸³⁰ Office of the Auditor-General, *Effectiveness of Arrangements for Co-Ordinating Civilian Maritime Patrols* (Wellington, New Zealand, 2010), 55–56, <https://oag.parliament.nz/2010/maritime-patrols/docs/maritime-patrols.pdf>.

⁸³¹ Government of New Zealand, *Maritime Security Strategy 2020*, 29.

⁸³² Office of the Auditor-General, *Effectiveness of Arrangements for Co-Ordinating Civilian Maritime Patrols*, 57.

⁸³³ Office of the Auditor-General, 58.

⁸³⁴ Office of the Auditor-General, 14.

SAR operations governed by the New Zealand SAR (NZSAR) Council.⁸³⁵ The NZSAR is composed of the Ministry of Transport, Police, NZDF, Civil Aviation Authority, Fire and Emergency New Zealand, and the Conservation Department, in addition to Maritime New Zealand.⁸³⁶ Moreover, several other agencies and volunteers participate in these operations.⁸³⁷ Among these is the “Coastguard New Zealand” (CGNZ), which is part of the NZSAR Consultative Committee and an important partner within the maritime security system of the country.⁸³⁸ Volunteers make up 95 percent of the people who contribute to SAR in New Zealand.

2. Organizational Ontology

The CGNZ was established in 1976 under the umbrella of the Royal New Zealand Coastguard Inc.⁸³⁹ The roots of this organization go back to the late 19th century. This was when the Sumner Lifeboat Institute was established in June 1898, as the first permanent volunteer rescue service on the coast of Christchurch.⁸⁴⁰ According to the CGNZ, this unit is still operational as Coastguard Sumner Lifeboat. After this, the volunteer-run rescue organizations grew and spread throughout the country. Eventually, in 1976, the volunteers decided to organize structurally and operate under the aegis of a single body, the Royal New Zealand Coastguard.⁸⁴¹ The main reason for fusing these decentralized rescue services was to consolidate their efforts to manage maritime incidents and disasters by effectively sharing resources, experience, and labor.⁸⁴²

⁸³⁵ New Zealand Search and Rescue, *New Zealand Search and Rescue Council: Annual Report 2020–2021*, Annual Report (New Zealand, 2021), <https://nzsar.govt.nz/assets/Downloadable-Files/NZSAR-AR-2021-For-Website-6.10.21.pdf>.

⁸³⁶ New Zealand Search and Rescue, “Who We Are,” January 7, 2021, <https://nzsar.govt.nz/about-us-2/about-us/>.

⁸³⁷ New Zealand Search and Rescue, *New Zealand Search and Rescue Council: Annual Report 2020–2021*, 38.

⁸³⁸ New Zealand Search and Rescue, 38.

⁸³⁹ Coastguard New Zealand, “Our History,” accessed April 12, 2022, <https://www.coastguard.nz/about-us/our-history/>.

⁸⁴⁰ Coastguard New Zealand.

⁸⁴¹ Coastguard New Zealand.

⁸⁴² Coastguard New Zealand.

The CGNZ is subordinate to the Coastguard New Zealand Board, which is the governing board that strategically directs the CGNZ.⁸⁴³ The board is chaired by a president, four elected members, and four appointed members. All of these members, excluding the four appointed members, are “nominated and elected” by CGNZ units.⁸⁴⁴ The CGNZ was registered in June 2008 as a charity service under the New Zealand government as the Royal New Zealand Coastguard Incorporated.⁸⁴⁵ As per the Charities Services of the New Zealand Government, the purpose of this charitable service is “to provide marine safety, education and search and rescue services to the New Zealand public.”⁸⁴⁶ The CGNZ is managed through a trust fund, where the secretariat of this trust is located in the Auckland Marine Rescue Center.⁸⁴⁷ In total, the CGNZ operates 64 units, including 59 rescue units, two air units, and two communication centers.⁸⁴⁸

Considering the nature of the organization, the CGNZ is similar to the AVCG of Australia. Both are volunteer charity organizations. The CGNZ is a tier I volunteer NGO accountable to the CGNZ Board.

3. Roles and Responsibilities

The CGNZ roles and responsibilities are succinct and clear. The following are the roles of the CGNZ:⁸⁴⁹

- Marine safety;

⁸⁴³ Coastguard New Zealand, “Coastguard New Zealand Board,” accessed April 12, 2022, <https://www.coastguard.nz/about-us/our-board/>.

⁸⁴⁴ Coastguard New Zealand.

⁸⁴⁵ Charities Services, “Charities Services: Royal New Zealand Coastguard Incorporated - CC36138,” accessed April 12, 2022, <https://register.charities.govt.nz/Charity/CC36138>.

⁸⁴⁶ Charities Services.

⁸⁴⁷ Coastguard New Zealand, “Auckland Marine Rescue Centre - Secretary,” December 2020, <https://www.coastguard.nz/about-us/our-history/auckland-marine-rescue-centre-secretary/>.

⁸⁴⁸ Coastguard New Zealand, “Coastguard - The Charity Saving Lives at Sea,” accessed April 12, 2022, <https://www.coastguard.nz/about-us/>.

⁸⁴⁹ Coastguard New Zealand, “Coastguard New Zealand: Our Vision, Our Mission, Our Focus, Our Success Factors, and Current Projects,” accessed April 12, 2022, https://www.coastguard.nz/media/417480/final_cnz_strategic-plan.pdf.

- Education of seafarers;
- Maritime SAR;
- Conduct of charity events for fundraising; and
- Monitoring of the marine VHF communications network.

The CGNZ is an important partner of New Zealand's maritime safety sector, especially in relation to maritime SAR and other related activities. The CGNZ also undertakes a number of maritime community outreach awareness programs to enhance the safety of boaters and swimmers.⁸⁵⁰ Furthermore, the CGNZ helps the New Zealand Police to maintain safety during large-scale sporting events.⁸⁵¹ Rather than enforcement measures, these fall under protective measures to support maritime security operations. These roles are evidence that CGNZ is a charity organization that supports SAR and related civil MER operations as requested by NZSAR or other SAR coordinating authorities. Similar to its neighbor across the Tasman Sea, the CGNZ is also highly reliant on the availability of volunteers and funds raised from charities. Hence, the roles of fund-raising and volunteer recruitment are vital.

4. Strategic Status

New Zealand is a large maritime island nation with one of the longest coastlines in the world, falling between China and the United States.⁸⁵² The country's maritime zones are actively used for economic and recreational purposes. It is estimated that New Zealand hosts 3 million beachgoers, 1.5 million boaters, over 1.1 million swimmers, and 630,000 fishers annually.⁸⁵³ The country's maritime domain is always bustling with economic and

⁸⁵⁰ Coastguard New Zealand, "Caring for Our Customers and Communities," 2022, <https://performancereport2021.coastguard.nz/caring-for-our-customers-and-communities/>.

⁸⁵¹ Coastguard New Zealand.

⁸⁵² WorldAtlas, "Countries with the Longest Coastline," October 1, 2020, <https://www.worldatlas.com/articles/countries-with-the-most-coastline.html>.

⁸⁵³ Jonathon Webber et al., "Fatal Coastal Drowning Incidents: A 10-Year Review of Body Recovery Times in New Zealand," *Forensic Science International* 317 (December 1, 2020): 2, <https://doi.org/10.1016/j.forsciint.2020.110573>.

recreational activities. The CGNZ helps to alleviate the issues that arise from these activities by partnering with other government and non-government agencies across New Zealand. According to CGNZ CEO Callum Gillespie, in 2021, the CGNZ had “conducted 3,500 operations and assisted more than 8,000 people.”⁸⁵⁴ He also stated that in 2020, there were 1,978 volunteers that contributed 291,402 hours of volunteer work to achieve these “remarkable statistics.”⁸⁵⁵

In order to provide its support to New Zealand’s SAR system, the CGNZ has signed a partnership agreement with SAR authorities in New Zealand. This is the “Joint Service Level Agreement with Coastguard New Zealand for Search and Rescue Services,” effective from July 1, 2020, for a period of three years.⁸⁵⁶ Under this agreement, the CGNZ would operate as a supportive agency to the SAR coordinating authorities of New Zealand, which includes the New Zealand Police and the Rescue Coordination Center New Zealand (RCCNZ).⁸⁵⁷ It is estimated that the CGNZ will, and had received, an amount of NZ\$ 60,698,000 (\$41,393,570) for fiscal years 2020/21 to 2022/23 from NZSAR.⁸⁵⁸ In addition, the CGNZ also receives annual grants amounting to NZ\$ 50,000 (approximately \$34,000) from the New Zealand Police.⁸⁵⁹

In the 2020 to June 2021 fiscal year, the CGNZ spent NZ\$21.6 million (\$14.7 million), while receiving NZ\$25 million (\$17 million).⁸⁶⁰ Among these funds, 46 percent were received from grants, 16 percent from membership, 13 percent from lottery ticket

⁸⁵⁴ Coastguard New Zealand, *Performance Report 2021* (Auckland, New Zealand, 2021), <https://performancereport2021.coastguard.nz/>.

⁸⁵⁵ Coastguard New Zealand.

⁸⁵⁶ New Zealand Search and Rescue, “Joint Service Level Agreement with Coastguard New Zealand for Search and Rescue Services,” 2020, 7, <https://nzsar.govt.nz/assets/Downloadable-Files/2020-23-SLA-Coastguard-NZ-FINAL-SIGNED.pdf>.

⁸⁵⁷ New Zealand Search and Rescue, “Joint Service Level Agreement with Coastguard New Zealand for Search and Rescue Services.”

⁸⁵⁸ New Zealand Search and Rescue, 35.

⁸⁵⁹ New Zealand Search and Rescue, 36.

⁸⁶⁰ Coastguard New Zealand, “Our Finances,” accessed April 12, 2022, <https://performancereport2021.coastguard.nz/our-finances/>.

sales, and 9 percent through donations.⁸⁶¹ Most of the expenditure was utilized to support CGNZ units, which was 43 percent of the budget. These figures indicate that the CGNZ effectively maintains and operates a competent fleet of surface units, air units, volunteers, and stations, to achieve its objective. Moreover, in return, it is estimated that the CGNZ saves around NZ\$120 million (approximately \$82 million) of New Zealand taxpayers' money by supporting lifesaving operations across New Zealand.⁸⁶²

In addition to providing MER services and raising funds to operate, the CGNZ also certifies boaters in New Zealand. This complements their effort to contribute to the maritime safety system of the country and is also a revenue source for the organization. Hence, the training programs are mutually beneficial for CGNZ and the country. The training and certification programs are conducted by Coastguard Boating Education (CBE), which is the training branch of CGNZ.⁸⁶³ The CBE was formed in 1979 and is currently operated as a private training establishment under the New Zealand Qualification Authority.⁸⁶⁴ The CBE website lists over 30 types of boating certification and training courses that are conducted by the institute for the public.⁸⁶⁵ With its vast certification, educational, and awareness training, the CBE is an institute that further accentuates the essential role played by CGNZ in the New Zealand maritime safety system.

The CGNZ also appears to be one of the leading maritime volunteer organizations in New Zealand, providing a high standard of service to its public. Another charity organization throughout the country, Surf Life Saving New Zealand, is also governed in a similar manner, although its focus is largely on beach safety and drowning prevention in

⁸⁶¹ Coastguard New Zealand.

⁸⁶² Teresa Cowie, "Left to Perish: Lack of Support for Coastguard a 'National Disgrace,'" RNZ, July 5, 2019, <https://www.rnz.co.nz/news/national/393680/left-to-perish-lack-of-support-for-coastguard-a-national-disgrace>.

⁸⁶³ Coastguard Boating Education, "About Us," accessed April 13, 2022, <https://www.boatingeducation.org.nz/about/>.

⁸⁶⁴ Coastguard Boating Education.

⁸⁶⁵ Coastguard Boating Education, "Boating Education Courses," accessed April 13, 2022, <https://www.boatingeducation.org.nz/courses/>.

coastal areas.⁸⁶⁶ Hence, related government entities make agreements to harmonize the SAR operations, recognizing the importance of these organizations in such operations. Therefore, it is an important supplement to the state's efforts to maintain and manage maritime activities despite little indication that the CGNZ has much leverage in the strategic maritime environment. This is especially true since the country has a number of government authorities; namely, the NZDF, the New Zealand Police, the NZSAR, Maritime New Zealand, and the RCCNZ. These agencies have decision-making powers related to the maritime domain and the conduct of operations within it. This does not, however, suggest that CGNZ holds no strategic value in New Zealand.

In relation to this study, due to the standing of the CGNZ within New Zealand's decision-making process within the maritime system, its strategic status will be considered as medium. Compared to the AVCG, which was evaluated to hold a low strategic status, the CGNZ fares better in the strategic aspect because the AVCG does not cover the entire country and is among several other similar volunteer NGOs in Australia. Despite these variations, the two volunteer NGOs are named CGs, and they both provide exceptional volunteer services that are vital to maritime safety.

5. Physical Characteristics

Unlike most other CG platforms, the CGNZ vessels are neither white nor gray. The CGNZ crafts are small coastal rescue vessels (CRV) that represent the USCG's Response Boat class vessels.⁸⁶⁷ The CGNZ vessels also have bright orange hulls or bright red hulls for distinction, as they operate in traffic-dense coastal waters.⁸⁶⁸ The 12.4 meter (41-foot) CRVs have a cabin area painted in white and bear the English inscription "COAST

⁸⁶⁶ Surf Lifesaving NZ, "What We Do," accessed April 13, 2022, <https://www.surflifesaving.org.nz/about-us/what-we-do>.

⁸⁶⁷ United States Coast Guard, "Response Boat-Small II," accessed April 13, 2022, <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Surface-Programs/Response-Boat-Small-II/>.

⁸⁶⁸ Protector Boats, "Coastguard Great Barrier First Unit to Receive New 4UNZ Vessel," November 11, 2021, <http://www.protectorboats.com/logbook/2021/november/coastguard-great-barrier-first-unit-to-receive-new-4unz-vessel/>.

GUARD” printed in white on a stripe of an orange background.⁸⁶⁹ These vessels appear to run on 250–300 HP outboard engines. The CGNZ also utilizes other makes of vessels with similar designs operating at various locations.⁸⁷⁰ The paint scheme of the vessels is consistent regardless of their location. The latest batch of CGNZ CRVs was delivered in 2021 by Rayglass in New Zealand (Figure 47), after a NZ\$9.8 million (\$6.7 million) partnership between Lotto New Zealand and the Emirates Team New Zealand was brokered, in exchange for support provided by the CGNZ during the America’s Cup yacht race.⁸⁷¹ After the race, the 26 new boats were distributed as CGNZ vessels across the country.⁸⁷²



Figure 47. CGNZ Rayglass Protector support boat.⁸⁷³

⁸⁶⁹ Protector Boats.

⁸⁷⁰ Coastguard New Zealand, “Vessel Information,” accessed April 13, 2022, <https://www.coastguard.nz/areas/central-area/units/wellington/about-us/vessel-information/>.

⁸⁷¹ Stuff, “\$9.8m America’s Cup Deal Sees Coastguard Getting 26 Support Boats After Auckland 2021,” January 15, 2019, <https://www.stuff.co.nz/sport/other-sports/109939191/98m-americas-cup-deal-sees-coastguard-getting-26-support-boats-after-auckland-2021>.

⁸⁷² Protector Boats, “Coastguard Great Barrier First Unit to Receive New 4UNZ Vessel.”

⁸⁷³ Source: Protector Boats.

The CGNZ also operates one air unit: the Coastguard Auckland Air Patrol.⁸⁷⁴ The unit operates two single-engine Cessna 182 aircraft (Figure 48).⁸⁷⁵ These platforms are painted in white, with the English inscription “COAST GUARD” written in block letters on and under the wingspan, as well as on either side of the planes. These aircraft are mainly used to provide aerial coverage in support of CGNZ surface MER operations in the greater Auckland area, which is the most populous city in the country.⁸⁷⁶



Figure 48. CGNZ Auckland Air Patrol Cessna 182 in flight.⁸⁷⁷

The CGNZ most commonly uses two uniforms in the field. They include a bright red jacket, likely for foul weather or cold weather situations (Figure 49).⁸⁷⁸ They also use

⁸⁷⁴ Coastguard New Zealand, “Coastguard Auckland Air Patrol,” accessed April 13, 2022, <https://www.coastguard.nz/areas/northern-area/units/auckland-air-patrol/>.

⁸⁷⁵ Coastguard New Zealand, “Aircraft Information,” accessed April 13, 2022, <https://www.coastguard.nz/areas/northern-area/units/auckland-air-patrol/about-us/aircraft-information/>.

⁸⁷⁶ Coastguard New Zealand, “Coastguard Auckland Air Patrol.”

⁸⁷⁷ Source: Bravo Zulu by D4H, ““Saving Lives at Sea’ with Coastguard New Zealand,” accessed April 13, 2022, <https://d4h.com/blog/saving-lives-at-sea-with-coastguard-new-zealand>.

⁸⁷⁸ Coastguard New Zealand, “Volunteering for Coastguard,” accessed April 13, 2022, <https://www.coastguard.nz/about-us/our-volunteers/>.

a dark blue overall for fieldwork.⁸⁷⁹ The CGNZ is a civil volunteer agency and hence does not follow policing or military-oriented cultures. Rather, they appear to follow a professional civil organizational hierarchy. The staff includes operators, boat masters, emergency response crew, and support staff.⁸⁸⁰ The characteristics of the CGNZ represent a professional civil organization with distinctive signature logos, paint schemes, and uniforms.



Figure 49. CGNZ crew of volunteers in CG red jackets.⁸⁸¹

6. Behavior and Application

The CGNZ appears to operate as a civil organization in a supporting role to the SAR system of New Zealand. Most of the operations it has conducted have been maritime assistance to the public in distress. In this regard, the CGNZ assisted more than 8,000 people from June 2020 to 2021, among those 456 were life-threatening risks involved in

⁸⁷⁹ Waihi Beach Volunteer Coastguard, “The Team,” accessed April 13, 2022, <https://www.waihibeachcoastguard.co.nz/the-team.html>.

⁸⁸⁰ Bravo Zulu by D4H, “‘Saving Lives at Sea’ with Coastguard New Zealand.”

⁸⁸¹ Source: Coastguard New Zealand, “Volunteering for Coastguard.”

operations.⁸⁸² This is a display of the CGNZ's tempo of operations, especially in achieving its objectives of saving lives at sea. The CGNZ appears to receive funding from the government, local companies, and the public. Hence, the organization does not have major challenges in raising funds for its operations. As of June 2021, the total net assets/equity of the CGNZ was NZ\$58 million (\$40 million).⁸⁸³ This is an indication that the CGNZ is financially a healthy organization effective in providing support to New Zealand's maritime security system.

Being a civil volunteer agency, the CGNZ does not exercise any MLE functions, but it does provide rigorous support in educating and raising safety awareness for boaters. The CGNZ's main areas of contribution remain civil MER and maritime safety operations, as demonstrated during the America's Cup event in 2021. Taking into account the roles and characteristics of the CGNZ, it can be considered a non-profit charitable MER NGO.

D. HER MAJESTY'S COASTGUARD – UNITED KINGDOM

The United Kingdom (UK) is a union of countries located in the Great Britain and Northern Ireland. It is comprised of a group of islands, where the largest is the landmass of Great Britain, which includes England and Wales in the south, and Scotland in the north.⁸⁸⁴ Northern Ireland is located in the northeastern portion of the Irish main island, which is separated by the Irish Sea from Great Britain.⁸⁸⁵ The UK is separated from mainland Europe by the English Channel in the south and the North Sea in the north. The country has a total coastline of approximately 12,400 km (7,705 mi).⁸⁸⁶ The area of the landmass is 243,305 sq km (93,941 sq km).⁸⁸⁷ The EEZ of the UK (in the region of Great Britain and Northern Island) is approximately 756,639 sq km (292,140 sq mi) (Figure

⁸⁸² Coastguard New Zealand, *Performance Report 2021*.

⁸⁸³ Royal New Zealand Coastguard Incorporated, "Consolidated Financial Statements 2021: For the Year Ended 30 June 2021," December 22, 2021, 7, <https://www.coastguard.nz/media/419215/cnz-consolidated-financial-statements-2021-v3.pdf>.

⁸⁸⁴ Commonwealth Governance, "Geography of United Kingdom," accessed April 14, 2022, <https://www.commonwealthgovernance.org/countries/>.

⁸⁸⁵ Commonwealth Governance.

⁸⁸⁶ Commonwealth Governance.

⁸⁸⁷ Commonwealth Governance.

50).⁸⁸⁸ The UK is among the few independent countries detached from the European mainland, the others being Cyprus, Iceland, the Republic of Ireland, and Malta.⁸⁸⁹

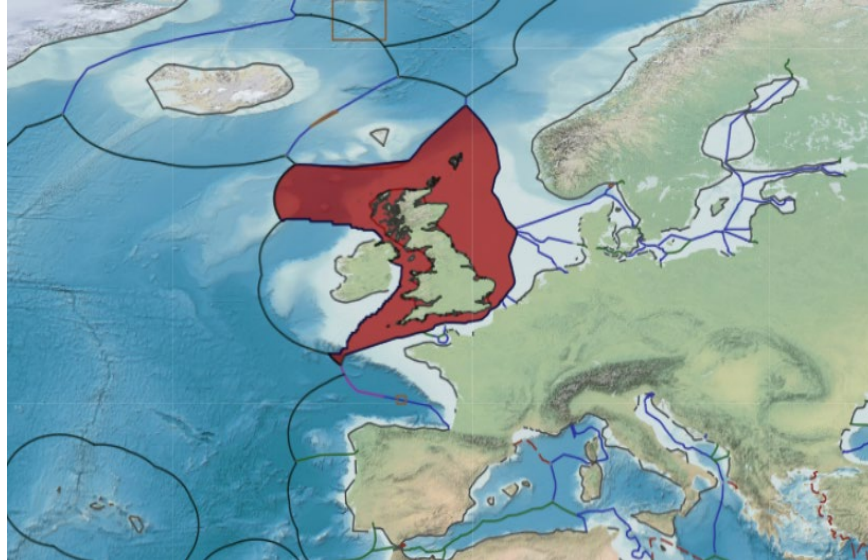


Figure 50. Maritime domain of Great Britain and Northern Ireland, with the EEZ highlighted in red.⁸⁹⁰

The UK, or more generally the British Empire, has a heritage of maritime and naval power. The British Empire was historically the leading maritime power since the 18th century, when the country became a naval superpower.⁸⁹¹ For centuries, the Empire's naval power prevented foreign invasion attempts against the island.⁸⁹² It also went on to wage several successful naval campaigns, such as the Battle of Santa Cruz in 1657, the

⁸⁸⁸ Sea Around Us, "Catches by Taxon in the Waters of United Kingdom (UK)," 2016, <http://www.seaaroundus.org/data/#/eez/826?chart=catch-chart&dimension=taxon&measure=tonnage&limit=10>.

⁸⁸⁹ WorldAtlas, "Which European Countries Are Islands?," March 10, 2021, <https://www.worldatlas.com/articles/island-countries-of-europe.html>.

⁸⁹⁰ Source: Marine Regions, "United Kingdom MRGID 5696," accessed April 16, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=5696&zone=eez>.

⁸⁹¹ Allison C. Meier, "Colonialism Created Navy Blue," JSTOR Daily, May 25, 2019, <https://daily.jstor.org/colonialism-created-navy-blue/>.

⁸⁹² Jeremy Black, "A Post-Imperial Power? Britain and the Royal Navy," *Orbis* 49, no. 2 (March 2005): 355, <https://doi.org/10.1016/j.orbis.2005.01.009>.

Battle of Quiberon Bay in 1759, the Battle of Trafalgar in 1805, and the Battle of Jutland in 1916, among many others.⁸⁹³ At the height of World War II, the UK had over 2,000 warships, supplemented by its colonies.⁸⁹⁴ The Royal Navy was one of the most successful and largest navies during the two World Wars. Years later, a much smaller Royal Navy was tested in the Falklands, when it was called upon to defend the interests of the nation in the southern Atlantic Ocean. The Royal Navy and its sister forces were successful in pulling out of the operation with victory, demonstrating the Royal Navy's prominence in the 20th century.⁸⁹⁵

Even in the 21st century, the UK's naval and maritime power is extremely important for the country. Especially since 95 percent of trade, 25 percent of energy, and 48 percent of the country's food supplies transit the maritime domain.⁸⁹⁶ Furthermore, UK ports are popular for passenger cruises, hosting approximately two million passengers travel each year.⁸⁹⁷ The leading authority to regulate and harmonize most of the maritime activities in the UK is the Department of Transport (DOT). In January 2019, the DOT released the country's maritime strategy for the second half of the 21st century: "Maritime 2050."⁸⁹⁸ Among many of its objectives, the strategy seeks to modernize the UK's maritime regulations that govern the maritime sector, enforcement, and management of maritime safety in this domain.⁸⁹⁹ The DOT has different agencies assigned to undertake these duties; namely, the Maritime and Coastguard Agency (MCA), Marine Accident

⁸⁹³ Royal Navy, "History," accessed April 16, 2022, <https://www.royalnavy.mod.uk/news-and-latest-activity/features/history-timeline>.

⁸⁹⁴ Historic UK, "The Royal Navy - Size and Strength Over Time in Visuals," July 20, 2017, <https://www.historic-uk.com/Blog/British-Navy-Size-Over-Time/>.

⁸⁹⁵ Royal Navy, "History."

⁸⁹⁶ Nusrat Ghani et al., *A Global Maritime Power: Building a Better Future for Post-Brexit Britain* (UK: Policy Exchange, 2020), 5, <https://policyexchange.org.uk/wp-content/uploads/A-Global-Maritime-Power.pdf>.

⁸⁹⁷ Department of Transport, "Maritime 2050: Navigating the Future," January 2019, 44, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/872194/Maritime_2050_Report.pdf.

⁸⁹⁸ Department of Transport, 11.

⁸⁹⁹ Department of Transport, 81, 87.

Investigation Branch (MAIB), and the General Lighthouse Authorities (GLAs).⁹⁰⁰ Among them, the MCA is the leading authority for maintaining and managing maritime safety in the UK.⁹⁰¹

The MCA is an executive organization of the DOT, where the former does civil MER operations at sea, enforces maritime safety standards, and administers the UK's ship registry.⁹⁰² It is also the authority that attends to round-the-clock SAR in the UK's maritime SRR, which consists of approximately 4.3 million sq km (165,537 sq mi).⁹⁰³ This role is executed by Her Majesty's Coastguard (HMCG), which is a functional arm of the MCA.

1. Organizational Ontology.

It is understood that the first CG was developed by the UK in the 17th century.⁹⁰⁴ Some CGs that claim a lineage that antedates the HMCG did not adopt the name "coast guard." This includes the USCG, which celebrates its creation in 1790, although it was re-branded as a "coast guard" only in 1915.⁹⁰⁵ The HMCG was the first organization to adopt the name "coast guard" in 1822 as a maritime agency to counter smugglers.⁹⁰⁶ The roots of this organization go back to 1809, when a ship-based law enforcement agency was formed: the Preventative Water Guard.⁹⁰⁷ In 1822, the HMCG was formed under the Treasury by merging the Preventative Water Guard, the Riding Officers, and the Revenue

⁹⁰⁰ Department of Transport, 61.

⁹⁰¹ Department of Transport, 84.

⁹⁰² Maritime and Coastguard Agency, "About Us: Maritime and Coastguard Agency," Government of the United Kingdom, accessed April 16, 2022, <https://www.gov.uk/government/organisations/maritime-and-coastguard-agency/about>.

⁹⁰³ Maritime and Coastguard Agency, "Director of HM Coastguard: Claire Hughes," Government of the United Kingdom, accessed April 14, 2022, <https://www.gov.uk/government/people/claire-hughes>.

⁹⁰⁴ Abdul Sein, Maizatun Mustafa, and Su Wai Mon, "Entrusting Coast Guards with Maritime Law Enforcement Powers: Lessons for Malaysia," *IJUM Law Journal* 24 (June 23, 2016), <https://doi.org/10.31436/ijumlj.v24i1.248>.

⁹⁰⁵ United States Coast Guard, "Doctrine for the U.S. Coast Guard," 38.

⁹⁰⁶ Joanna Smith, "Coastguard Stations: Introductions to Heritage Assets," Historic England, June 2016, 3, <https://historicengland.org.uk/images-books/publications/iha-coastguard-stations/heag130-coastguard-stations-iha/>.

⁹⁰⁷ Smith, 3.

Cruisers.⁹⁰⁸ After the “Coastguard Service Act” was enacted in 1856, the organization was transferred under the Admiralty, as a Royal Navy auxiliary, although retaining its traditional MLE and life-saving roles.⁹⁰⁹

During the period under the Admiralty, CG personnel were trained in warfare, which also came to good use at the outbreak of World War I. It was during this period of the CG’s role in warfighting that the UK government realized it was also vital for the CG to continue its traditional functions during wartime.⁹¹⁰ Hence, it was transferred back to the Board of Transport in 1925, under a new CG law that stated the CG would be transferred to the Admiralty in “case of emergency.”⁹¹¹ The next “emergency” that shifted HMCG’s control back to the Admiralty was World War II. After the war, HMCG again transferred back to the Ministry of War Transport in 1945.⁹¹²

As an entity under the DOT, the HMCG is managed by the MCA. The HMCG is a uniformed civil organization, comprised of both volunteers and full-time personnel. It is estimated that the HMCG is supplemented by a 3,500-strong volunteer force, which forms the organization’s Coastguard Rescue Service.⁹¹³ Other volunteer organizations also supplement SAR operations, chief among them the Royal National Lifeboat Institution (RNLI).⁹¹⁴ Although the HMCG relies heavily on volunteers, the organization is managed by the government. The UK government provides equipment, training, funding, and other incentives to the volunteer rescue organizations that meet the standards.⁹¹⁵ In total, the HMCG’s Coastguard Rescue Service operates 27 bases with multiple Coastguard Rescue

⁹⁰⁸ Maritime and Coastguard Agency, “Keeping You Safe at the Coast for 200 Years: HM Coastguard Celebrates Landmark Birthday,” Government of the United Kingdom, January 15, 2022, <https://www.gov.uk/government/news/keeping-you-safe-at-the-coast-for-200-years-hm-coastguard-celebrates-landmark-birthday>.

⁹⁰⁹ Smith, “Coastguard Stations: Introductions to Heritage Assets,” 3.

⁹¹⁰ Smith, 4.

⁹¹¹ Coastguard Act 1925, 1925 Chapter 88 15 and 16 Geo 5 § (1925), F42, <https://www.legislation.gov.uk/ukpga/Geo5/15-16/88>.

⁹¹² Smith, “Coastguard Stations: Introductions to Heritage Assets,” 5.

⁹¹³ Maritime and Coastguard Agency, “Director of HM Coastguard: Claire Hughes.”

⁹¹⁴ Department of Transport, “Maritime 2050: Navigating the Future,” 86.

⁹¹⁵ Department of Transport, 87.

Teams, which are divided into 18 areas.⁹¹⁶ These also include nine MRCCs, one Joint Rescue Coordination Center, and a Rescue Sub-Center.⁹¹⁷

This indicates that the HMCG is a hybrid organization with a mix of volunteers and employed government officials. The organization is a tier-III hierarchical structure, where the Director of HMCG passes policies over to the Chief Executive of MCA and DOT.⁹¹⁸

2. Roles and Responsibilities

The HMCG's overall objective is to conduct search, save, and rescue operations on behalf of the MCA.⁹¹⁹ The main responsibilities of HMCG are derived from the UK's official SAR document, *Strategic Overview of Search and Rescue in the United Kingdom of Great Britain and Northern Island*.⁹²⁰ Responsibilities under this document are as follows:⁹²¹

- Maritime SAR;
- Aeronautical SAR;
- Rescue of personnel around sea cliffs and shoreline of UK; and
- SAR of inland maritime areas delegated by Police Services.

Mandates of HMCG as identified through other sources include:

⁹¹⁶ Her Majesty's Coastguard, *Coastguard Rescue Teams*, April 17, 2019, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/814500/A3_Map_of_Coastguard_Rescue_Teams_Locations_v17042019.pdf.

⁹¹⁷ Maritime and Coastguard Agency, "Office Access and Opening Times: Maritime and Coastguard Agency," Government of the United Kingdom, accessed April 16, 2022, <https://www.gov.uk/government/organisations/maritime-and-coastguard-agency/about/access-and-opening>.

⁹¹⁸ Department of Transport, "Maritime 2050: Navigating the Future."

⁹¹⁹ Maritime and Coastguard Agency, "To Search. To Rescue. To Save," Government of the United Kingdom, May 10, 2016, <https://www.gov.uk/government/news/to-search-to-rescue-to-save--2>.

⁹²⁰ Government of the United Kingdom, "Strategic Overview of Search and Rescue in the United Kingdom of Great Britain and Northern Ireland," January 2017, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/593127/mca_uksar.pdf.

⁹²¹ Government of the United Kingdom, 6.

- Supplement Air Ambulance and Helicopter Emergency Medical Services;⁹²²
- Conduct coastal surveillance in response to pollution response at sea;⁹²³ and
- Support other emergency response services.⁹²⁴

In addition to these roles, the “Maritime 2050” strategy also identifies a number of specialized SAR services that are provided by the HMCG.⁹²⁵ These include Rope Rescue capability for rescue around cliffs and similar inland areas, and also Mud Rescue operations.⁹²⁶ Further to this, the UK’s SAR Helicopter (SARH) program is also operated by HMCG through the Aeronautical Rescue Coordination Center (ARCC).⁹²⁷ These responsibilities relate to all aspects of SAR: maritime, air, and also on land. It should be noted that in the UK, it is the Border Force that conducts most coastal MLE operations, similar to most of the CGs analyzed in this study.⁹²⁸ Meanwhile, the HMCG in the UK is focused on civil MER, specifically SAR.

3. Strategic Status

The analysis of historical events that led to the development of the HMCG and its evolution gives a better understanding of the challenges and thought processes that go into

⁹²² QinetIQ, “UK Search and Rescue Helicopters: Post-Implementation Review,” Capping Report No. 19/00408 (Hampshire, UK) March 2019, 9, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/820125/S_39_-_ANNEX_B_UK_SARH_PIR_FINAL.pdf.

⁹²³ Maritime and Coastguard Agency, *Maritime & Coastguard Agency: Annual Report and Accounts 2020–2021*, Annual Report and Accounts, 2021, 7, https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/1034996/MCA_annual_report_and_accounts_2020_to_2021.pdf.

⁹²⁴ Maritime and Coastguard Agency, UKSAR2G Industry Day Presentation Updated December 5, 2020. Video, 1:03:56. <https://www.youtube.com/watch?v=KkCk-CaMJnk>.

⁹²⁵ Department of Transport, “Maritime 2050: Navigating the Future.”

⁹²⁶ Department of Transport, 87.

⁹²⁷ QinetIQ, “UK Search and Rescue Helicopters: Post-Implementation Review,” 5.

⁹²⁸ Border Force, “About Us: Border Force,” Government of the United Kingdom, accessed April 17, 2022, <https://www.gov.uk/government/organisations/border-force/about>.

the formation of a CG, especially since the HMCG is the first such organization to be named a “coast guard.” An important turning point was the decision to transfer it to civil authority. The issue was raised in the early 1900s when the Admiralty proposed for the HMCG to be “drastically curtailed.”⁹²⁹ This is possibly because there was a lesser requirement for the HMCG in the Admiralty. But civil authorities, such as the Board of Customs and the Board of Trade, rejected the move. The second event that led to the decision to place the HMCG under civil control came after the end of World War I when the British government realized that the civil roles performed by HMCG were vital for the country even during wartime.⁹³⁰ Hence, the need to sustain the traditional CG duties was decided, eventually transferring the peace-time management of the organization from the Admiralty to a civil administration.

These turning points provide important lessons and insight into the strategic importance of HMCG to the British Empire during the earlier years. With the celebration of its 200 years as a CG on January 15, 2022, the strategic value of HMCG has not waned.⁹³¹ It is estimated that the organization responded to over 33,580 incidents and scrambled rescue helicopters over 1,975 times to assist people in distress across the UK in the 2020–2021 fiscal year.⁹³² The Annual Report 2020–2021 determines that HMCG has achieved its goal of reviewing 90 percent of distress calls within 30 minutes of being reported.⁹³³ The HMCG is also supplemented by volunteer services such as the RNLI, assets of the Police, and those of the Royal Navy, Army, and Air Force of the UK.⁹³⁴ In collaboration with these various agencies, the HMCG’s performance statistics are indicative of its strategic role in SAR operations across the UK SRR.

⁹²⁹ Smith, “Coastguard Stations: Introductions to Heritage Assets,” 4.

⁹³⁰ Smith, 4.

⁹³¹ Maritime and Coastguard Agency, “Keeping You Safe at the Coast for 200 Years.”

⁹³² Maritime and Coastguard Agency, *Maritime & Coastguard Agency: Annual Report and Accounts 2020–2021*, 6, 17.

⁹³³ Maritime and Coastguard Agency, 10.

⁹³⁴ Government of the United Kingdom, “Strategic Overview of Search and Rescue in the United Kingdom of Great Britain and Northern Ireland,” 7, 10.

The SAR capabilities of the UK are being further enhanced by renewing existing programs and integrating innovative technologies such as unmanned capabilities.⁹³⁵ One such ambitious program is the “UK Second Generation Search and Rescue Aviation Program” (UKSAR2G) led by HMCG’s governing agency, the MCA.⁹³⁶ The program was adopted mainly to revamp HMCG’s aviation service with new assets when the existing contracts with private companies expire in 2024.⁹³⁷ Currently, the aviation services are outsourced to two leading companies in the UK: Bristow Helicopters Ltd and 2Excel Aviation.⁹³⁸ This includes replacing the existing rotary- and fixed-wing aircraft with new, more modern, and high endurance platforms⁹³⁹ and exploring the employment of high-endurance unmanned aircraft for future HMCG operations.⁹⁴⁰ One such recommendation is to induct the Hermes 900 Maritime Patrol UAV into HMCG’s air fleet.⁹⁴¹ In short, the UKSAR2G is a promising program to prepare HMCG for the upcoming expiration of its aviation contracts. This is extremely important for the HMCG and also its stakeholders.

It is estimated that over half of the HMCG aviation SAR operations were in support of other emergency services, mainly the police services in different regions across the UK.⁹⁴² The fixed-wing aircraft are also utilized in support of the UK’s Border Force, for fisheries protection through the Marine Management Organization.⁹⁴³ The demand for the HMCG’s SARH service persists because due to the winching capability often required

⁹³⁵ Maritime and Coastguard Agency, “UK Second-Generation Search and Rescue Aviation Programme (UKSAR2G),” Government of the United Kingdom, February 17, 2022, <https://www.gov.uk/government/collections/uk-second-generation-search-and-rescue-aviation-programme-uksar2g>.

⁹³⁶ Maritime and Coastguard Agency.

⁹³⁷ Maritime and Coastguard Agency.

⁹³⁸ Maritime and Coastguard Agency.

⁹³⁹ Maritime and Coastguard Agency.

⁹⁴⁰ Maritime and Coastguard Agency.

⁹⁴¹ Steven McKenzie, “Coastguard Plans to Add Drones to Air Fleet,” BBC News, May 28, 2020, sec. Highlands & Islands, <https://www.bbc.com/news/uk-scotland-highlands-islands-52821363>.

⁹⁴² Maritime and Coastguard Agency, UKSAR2G Industry Presentation Update 12/05/2020, 05:54.

⁹⁴³ Maritime and Coastguard Agency, 06:00.

during water rescues.⁹⁴⁴ It is widely recognized that HMCG has met UK goals and also international obligations in attending to incidents using its aerial platforms.⁹⁴⁵ Much of this coordination and collaboration between the emergency services are guided by UK's "Joint Emergency Services Interoperability Principles (JESIP)," designed to enhance interoperability among the services, normally referred to in the UK as the blue light services.⁹⁴⁶ This collaboration was recently tested in response to a different maritime crisis.

The UK was mostly spared during the migrant crisis that overwhelmed countries such as Italy, Greece, and Spain in the south of Europe over the past decade, which was discussed in the analysis of the ICG in Chapter V. Much like the ICG, in late 2021, the HMCG was faced with mass rescue operations of migrants in distress while attempting to cross the English Channel from France.⁹⁴⁷ The number of migrants attempting the crossing from France was estimated to be over 28,000 in 2021.⁹⁴⁸ It was further estimated that the HMCG had to respond to over a thousand such incidents in the English Channel, where 80 people were rescued in one incident in July of 2021.⁹⁴⁹ Such operations are conducted in support of or in collaboration with the UK's Border Force and also the French CG. One of the worst tragedies in the Channel occurred in November of 2021, when 27 migrants,

⁹⁴⁴ QinetIQ, "UK Search and Rescue Helicopters: Post-Implementation Review," 5.

⁹⁴⁵ QinetIQ, 8.

⁹⁴⁶ Her Majesty's Inspectorate of Constabulary and Fire & Rescue Services, "Joint Emergency Services Interoperability Principles," HMICFRS, May 18, 2018, <https://www.justiceinspectorates.gov.uk/hmicfrs/our-work/article/joint-emergency-services-interoperability-principles/>.

⁹⁴⁷ Josh Layton, "80 Migrants Saved from Channel in UK's Biggest Rescue for Three Years," Metro, November 19, 2021, <https://metro.co.uk/2021/11/19/80-migrants-saved-from-channel-in-uks-biggest-rescue-for-three-years-15632983/>.

⁹⁴⁸ Sebastian Klovig Skelton, "English Channel Surveillance Used 'To Deter and Punish Migrants,'" Computer Weekly, May 3, 2022, <https://www.computerweekly.com/feature/English-Channel-surveillance-used-to-deter-and-punish-migrants>.

⁹⁴⁹ Layton, "80 Migrants Saved from Channel in UK's Biggest Rescue for Three Years."

including women and children drowned shortly after the French CG had sent out a distress alert for assistance.⁹⁵⁰

The HMCG encountered many challenges during the height of the migrant crossings and was accused of redirecting refugees crossing the English Channel to the French emergency services without attending rescues.⁹⁵¹ The HMCG, understandably, strongly objected. That said, in an attempt to thwart these migrant crossings, the UK government introduced plans to increase surveillance capabilities in the region, mainly for the MCA and the UK Border Force.⁹⁵² More recently, the UK government has unveiled a controversial plan to send asylum seekers crossing the English Channel to Rwanda for processing, a deal worth £120 million (\$157 million).⁹⁵³ Even though this move attracted a large number of critics, the UK government is adamant that this would curb human smuggling and trafficking operations.⁹⁵⁴ These are geopolitical issues that impact the HMCG operations despite its benign role within the UK.

The operational intensity of leading SAR efforts while also contributing to other maritime enforcement activities mandated by government agencies, especially in relation to inter-agency cooperation, define the HMCG as a strategically important agency within the maritime domain of the UK.

4. Physical Characteristics

The HMCG has a variety of surface platforms that do not appear to follow a uniform paint scheme, although there are some features that are common to other CG agencies, such as the racing stripe and the CG inscription (Figure 51). The racing stripe displayed by

⁹⁵⁰ Diane Taylor, “UK Coastguard ‘Telling Refugees in British Waters to Contact the French,’” *The Guardian*, December 13, 2021, sec. UK news, <https://www.theguardian.com/uk-news/2021/dec/13/uk-coastguard-telling-refugees-in-british-waters-to-contact-the-french>.

⁹⁵¹ Taylor.

⁹⁵² Skelton, “English Channel Surveillance Used ‘To Deter and Punish Migrants.’”

⁹⁵³ Cristina Gallardo, “UK Seals Deal with Rwanda to Offshore Asylum Seekers,” *POLITICO*, April 14, 2022, <https://www.politico.eu/article/uk-seals-deal-with-rwanda-to-offshore-asylum-migrant-seekers/>.

⁹⁵⁴ Geraldine Scott, “Archbishop Has Misunderstood Aims of Rwanda Migrants Policy – Rees-Mogg,” *Evening Standard*, April 17, 2022, sec. News, <https://www.standard.co.uk/news/uk/jacob-rees-mogg-rwanda-priti-patel-god-justin-welby-b994773.html>.

HMCG vessels consists of a wide red stripe followed by a narrower blue stripe, with a narrow space between the two stripes.⁹⁵⁵ The vessels also have the English inscription “COASTGUARD” printed in blue on either side of the hull or superstructure. Unlike CGs analyzed previously in this study, the HMCG uses the merged term “coastguard” instead of the separated term “coast guard,” which is also apparent on the platforms.



Figure 51. HMCG vessel conducting an operation with an HMCG helicopter.⁹⁵⁶

Meanwhile, in the UK, the primary MLE agency, the Border Force, operates gray-hulled vessels that resemble some of the CG platforms presented in this study.⁹⁵⁷ The Border Force vessels that appear similar to those of a navy are larger than the HMCG platforms and their racing stripes are different. The MLE and MER roles have been split into two different agencies in the UK. Hence, the platforms are also distinct from each

⁹⁵⁵ Her Majesty's Coastguard Annan, "HM Coastguard Annan Facebook," Facebook, August 21, 2020, <https://www.facebook.com/279868088961/photos/a.10151094034768962/10158070375908962/>.

⁹⁵⁶ Source: Her Majesty's Coastguard Annan.

⁹⁵⁷ VesselFinder, "VALIANT, Patrol Vessel - Details and Current Position - IMO 9293698," April 17, 2022, <https://www.vesselfinder.com/vessels/VALIANT-IMO-9293698-MMSI-235745000>.

other in size as well as in characteristics. This may indicate that CGs undertaking primarily MLE functions are more likely resemble naval vessels.

The HMCG's rotary-wing SARH service has been outsourced under contract to Bristow Helicopters since April 2015.⁹⁵⁸ The company operates Sikorsky S-92A and Leonardo AW189 helicopters from ten different locations in the UK (Figure 52).⁹⁵⁹ In 2021, a drone was also inducted by Bristow Helicopters into the HMCG fleet to assist in SAR.⁹⁶⁰ The fixed-wing aircraft service, which is also outsourced, is operated by 2Excel Aviation under a five-year agreement, utilizing two customized Beechcraft King Air 200s since 2019.⁹⁶¹ All aircraft have a white and red paint scheme. The inscription "HM COASTGUARD" is printed on either side of the aircraft.

⁹⁵⁸ Bristow Group Inc., "UK Search and Rescue," accessed April 17, 2022, <https://www.bristowgroup.com/services/uk-search-and-rescue>.

⁹⁵⁹ Bristow Group Inc.

⁹⁶⁰ Bristow Group Inc., "Drone Joins HM Coastguard Air, Land and Sea Rescue Teams," July 22, 2022, <https://www.bristowgroup.com/news-media/press-releases/detail/484/drone-joins-hm-coastguard-air-land-and-sea-rescue-teams>.

⁹⁶¹ Royal Aeronautical Society, "King Airs to the Rescue," accessed April 17, 2022, <https://www.aerosociety.com/news/king-air-to-the-rescue/>.



Figure 52. HMCg S-29A helicopter, a King Surveillance aircraft, and the newly inducted drone.⁹⁶²

The HMCg utilizes a number of uniforms that include an official dress uniform in black and the working uniform in blue (Figure 53). In addition to these, the CG also uses a blue overall during rescue operations.⁹⁶³ The rescue suits bear reflective tape for high visibility. Furthermore, a short-sleeved white shirt and black trousers (possibly for summer) are worn in operation centers, bearing rank insignias similar to the Royal Navy's.⁹⁶⁴

⁹⁶² Source: Bristow Group Inc., “Drone Joins HM Coastguard Air, Land and Sea Rescue Teams.”

⁹⁶³ Darren Toogood, “HM Coastguard Celebrates 200th Anniversary as Volunteers Continue to Save Lives,” *IslandEcho* (blog), January 15, 2022, <https://www.islandecho.co.uk/hm-coastguard-celebrates-200th-anniversary-as-volunteers-continue-to-save-lives/>.

⁹⁶⁴ Kent Online, “Coastguards Back Where They Belong,” August 17, 2008, <https://www.kentononline.co.uk/kent/news/coastguards-back-where-they-belo-a42560/>.



Figure 53. HMCG personnel in official dress uniform and blue working uniform.⁹⁶⁵

The physical characteristics of the HMCG are similar to a civil agency, operating unarmed rescue platforms, mainly for MER operations. Despite being a civil agency, the HMCG appears as a uniformed service with discipline and a well-defined hierarchical rank structure.

5. Behavior and Application

The HMCG responds to over 30,000 SAR incidents each year.⁹⁶⁶ These are the highest tempo operations that are conducted by the volunteers. The HMCG operates as a MERA within the UK, or as a blue light emergency service. The roles presented in this case provide an insight into the specialized SAR capabilities of the organization. The HMCG contributes these specialties and capabilities as needed by other partner agencies within the UK, especially in the area of SARH assistance. There are no conflicts between

⁹⁶⁵ Source: Swanage Coastguard, “Swanage Coastguard Updated Their Cover Photo.,” Facebook, March 16, 2020, <https://www.facebook.com/149446781784256/photos/a.309354839126782/3221993527862884/>.

⁹⁶⁶ Maritime and Coastguard Agency, *Maritime & Coastguard Agency: Annual Report and Accounts 2020–2021*, 6.

its roles and its behavior or with its characteristics and the application of its mandate. All types of SAR are under the purview of the HMCG, and they execute this with near perfection.

E. CONCLUSION

This chapter has analyzed three island-CGs belonging to three geographically diverse locations. The MNCG of Mauritius, the CGNZ of New Zealand, and the HMCG of the UK. Among these CGs, the MNCG is distinct from the other two CGs in many ways. The CGNZ and the HMCG are civil NGO and government organizations, respectively. These two CGs are unarmed and are only engaged in providing civil MER, primarily SAR, service to the public. While the CGNZ is completely volunteer based, the HMCG is primarily composed of volunteers, but also includes a small number of government employees. The New Zealand maritime structure has separate agencies within the government to conduct MER and MLE. Hence, the role of the CGNZ is to provide support to these services. In the case of the HMCG, the parent agency, the MCA, is the lead authority for SAR, which is conducted by the HMCG. This analysis provides an overview of how a country can effectively utilize volunteers to achieve a government's policy for maritime safety.

The MNCG is strikingly distinct from the other two CGs. It belongs to a police organization, the MPF, which has both armed and unarmed units. Furthermore, the MNCG is declared as a paramilitary organization. Despite its military nature, it is a civil organization under a civil organizational hierarchy, mainly as a constabulary force. It is an extremely vital asset for the country and holds a high strategic value, especially in the absence of a conventional navy. Another even more striking distinction of the MNCG is that its leadership appointment is held by an officer from a foreign navy. Despite these differences, however, the three CGs are important assets in their respective nations and operate as efficient organizations in relation to their mandates.

THIS PAGE INTENTIONALLY LEFT BLANK

X. CASE 7: LANDLOCKED COAST GUARD

A. INTRODUCTION

The final case study analyzes the Azerbaijani Coast Guard (AZCG). The AZCG belongs to a unique maritime nation that is landlocked. Azerbaijan has a coastline in the Caspian Sea, which is governed by a unique doctrine that is detailed in this chapter. In addition to other landlocked countries bordering the Caspian Sea, there are very few maritime agencies that fall within this category. This is the reason behind the analysis of a single sample in this cohort. This specific case illustrates that organizations with the name “coast guard” do not necessarily border oceans. It is understood that the case of AZCG would also yield an interesting insight, especially as it is the only landlocked CG analyzed in this paper. Nonetheless, the AZCG is analyzed according to the same attributes used in previous chapters.

B. AZERBAIJANI COAST GUARD

Azerbaijan is a landlocked country that does not have a maritime coastline that opens into any major oceans. The country, however, does have 816 km (507 mi) of coastline bordering the Caspian Sea (Figure 54).⁹⁶⁷

⁹⁶⁷ Mushvig Mehdiyev, “Azerbaijan’s State Border Service Celebrates 100 Years, Demonstrates Cutting-Edge Patrol Vessel,” *Caspian News*, August 15, 2019, <https://caspiannews.com/news-detail/azerbaijans-state-border-service-celebrates-100-years-demonstrates-cutting-edge-patrol-vessel-2019-8-16-32/>.

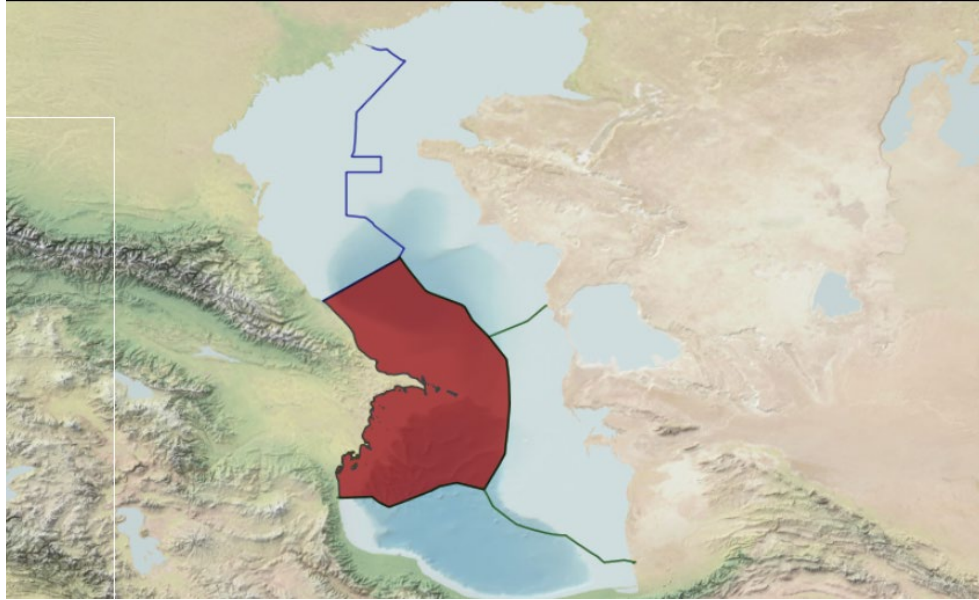


Figure 54. Azerbaijan's maritime domain, highlighted in red, within the Caspian Sea.⁹⁶⁸

The Caspian Sea, the world's largest inland water body, is a littoral of Iran, Kazakhstan, Russia, and Turkmenistan in addition to Azerbaijan. Azerbaijan claims a maritime area of 3,971 sq km (1,533 sq mi) in the western zone of the Caspian Sea.⁹⁶⁹ This is approximately 15.2 percent of the Caspian Sea, where Turkmenistan claims the largest portion at 30.8 percent.⁹⁷⁰ The oil and gas-rich Caspian Sea, with its 370,000 sq km (142,857 sq mi), has a special status adopted by the five states bordering it, denying any claims over it as being a lake or a sea.⁹⁷¹

Almost the size of the U.S. state of California, the Caspian Sea borders four countries in addition to Azerbaijan, as already mentioned: Iran, Kazakhstan, Russia, and

⁹⁶⁸ Source: Marine Regions, "Azerbaijan · MRGID 26524," accessed April 3, 2022, <https://www.marineregions.org/eezdetails.php?mrgid=26524&zone=eez>.

⁹⁶⁹ Central Intelligence Agency, "Azerbaijan," in *The World Factbook* (Central Intelligence Agency, November 3, 2021), <https://www.cia.gov/the-world-factbook/countries/azerbaijan/>.

⁹⁷⁰ Faraz Sanei, "The Caspian Sea Legal Regime, Pipeline Diplomacy, and the Prospects for Iran's Isolation from the Oil and Gas Frenzy," *Vanderbilt Journal of Transnational Law* 34, no. 3 (January 1, 2001): 694, <https://scholarship.law.vanderbilt.edu/vjtl/vol34/iss3/5>.

⁹⁷¹ BBC News, "Caspian Sea: Five Countries Sign Deal to End Dispute," August 12, 2018, sec. World, <https://www.bbc.com/news/world-45162282>.

Turkmenistan.⁹⁷² From north to south, the length of the lake is 1,390 km (864 mi) longer than the adjacent Black Sea.⁹⁷³ It is the largest enclosed body of water in the world.⁹⁷⁴ Unlike most maritime areas, the Caspian Sea is not administered by the provisions of UNCLOS. The legal regime that governs the Caspian Sea was signed by the five littoral states on August 12, 2018, dubbed the “Convention on the Legal Status of the Caspian Sea.”⁹⁷⁵ One of the main reasons to adopt a unique legal regime for the Caspian Sea was to provide equal opportunities for the countries to tap into its resources. The oil and gas-rich “seabed” is known to hold approximately 48 billion barrels of oil and 8.7 trillion cubic meters of gas.⁹⁷⁶

Historically, only Iran and the Soviet Union shared borders in the Caspian Sea. Iran and the Soviet Union split their resources on an equitable basis under two treaties signed in 1921 and 1940.⁹⁷⁷ The efforts on a new legal construct for the Caspian Sea date back to the collapse of the Soviet Union and the birth of new sovereign states bordering the sea.⁹⁷⁸ At that turning point, the number of nations bordering the sea increased from two to five. Under the new circumstances, Iran would be at a disadvantage if the provisions of UNCLOS were to be applied since it has the shortest coastline.⁹⁷⁹ Specifically, it would lose substantial amounts of its gas and oil investments in the Caspian Sea to Azerbaijan and Turkmenistan.

⁹⁷² Elaine Sciolino, “The World; It’s a Sea! It’s a Lake! No. It’s a Pool of Oil.,” *The New York Times*, June 21, 1998, sec. Week in Review, <https://www.nytimes.com/1998/06/21/weekinreview/the-world-it-s-a-sea-it-s-a-lake-no-it-s-a-pool-of-oil.html>.

⁹⁷³ Rizal Abdul Kadir, “Convention on the Legal Status of the Caspian Sea,” *International Legal Materials* 58, no. 2 (April 2019): 400, <http://dx.doi.org/10.1017/ilm.2019.5>.

⁹⁷⁴ Sanei, “The Caspian Sea Legal Regime, Pipeline Diplomacy, and the Prospects for Iran’s Isolation from the Oil and Gas Frenzy,” 688.

⁹⁷⁵ BBC News, “Caspian Sea.”

⁹⁷⁶ Tehran Times, “Caspian Sea Legal Regime: What It Means for Iran’s Oil and Gas,” August 15, 2018, <https://www.tehrantimes.com/news/426562/Caspian-Sea-legal-regime-what-it-means-for-Iran-s-oil-and-gas>.

⁹⁷⁷ Kadir, “Convention on the Legal Status of the Caspian Sea,” 400.

⁹⁷⁸ Sciolino, “The World; It’s a Sea! It’s a Lake! No. It’s a Pool of Oil.”

⁹⁷⁹ Hanna Zimnitskaya and James von Geldern, “Is the Caspian Sea a Sea; and Why Does It Matter?,” *Journal of Eurasian Studies* 2, no. 1 (January 1, 2011): 3, <https://doi.org/10.1016/j.euras.2010.10.009>.

Hence, due to these complexities, the bordering states agreed not to classify the Caspian Sea as either a sea or a lake. The 2018 Convention granted these states unique maritime jurisdictions and legal authorities.⁹⁸⁰ The states each get to claim a 15 NM territorial water and an additional 10 NM fishery zone.⁹⁸¹ The Convention also assures freedom of navigation and adherence to the safety of navigation within the waters of the Caspian Sea.⁹⁸² Under the Convention, the subsoil and seabed would be divided according to bilateral or multilateral agreements among the states, which remains an ongoing process.⁹⁸³ Finally, for the benefit of Russia and Iran, the Caspian Sea is closed-off to warships from external countries.⁹⁸⁴

As a littoral state of the Caspian Sea, Azerbaijan has established offshore oil and gas platforms in the sea. These resources are vital for the country's economy, as it is a major oil and gas exporter.⁹⁸⁵ This vital infrastructure requires continuous protection, mainly from the threat of terrorism.⁹⁸⁶ According to a 2019 U.S. State Department report, Azerbaijan's security forces have enough capacity to "detect, deter and prevent acts of terrorism in Azerbaijani territory."⁹⁸⁷ The report identifies organizations such as the Ministry of Internal Affairs, the State Security Service, Special State Protection Service, State Customs Committee, and the State Border Service (SBS) as having the authority to

⁹⁸⁰ Kadir, "Convention on the Legal Status of the Caspian Sea."

⁹⁸¹ Kadir, 406.

⁹⁸² Kadir, 405.

⁹⁸³ Kadir, 399.

⁹⁸⁴ Kadir, 405.

⁹⁸⁵ United States Department of State, *U.S. Relations with Azerbaijan*, Bilateral Relations Fact Sheet (Washington, D.C., Department of State, 2021), <https://www.state.gov/u-s-relations-with-azerbaijan/>.

⁹⁸⁶ United States Department of State, *Country Reports on Terrorism 2019: Azerbaijan* (Washington, D.C.: Department of State), accessed November 4, 2021, <https://www.state.gov/reports/country-reports-on-terrorism-2019/azerbaijan/>.

⁹⁸⁷ United States Department of State.

counter terrorism.⁹⁸⁸ Among these agencies, the AZCG falls under the SBS, which is the maritime element of the SBS.⁹⁸⁹

1. Organizational Ontology

On November 27, 1992, under an agreement signed between Russia and the newly independent Azerbaijan, a Special Border Guard Ships Brigade, which was assigned to protect the Caspian Sea interests, was officially transferred under the Azerbaijan Border Guards.⁹⁹⁰ The Azerbaijan Border Guards evolved into the SBS on July 31, 2002, under the presidential decree number 740.⁹⁹¹ The SBS Coast Guard, or the AZCG, was established on February 18, 2005, through a presidential decree, with an emphasis on protecting maritime borders and protecting the country's maritime interests in the Caspian Sea.⁹⁹²

Under Article IV of the “Regulation of the State Border Service of Azerbaijan,” the SBS is an active military service, which is accountable directly to the President of Azerbaijan.⁹⁹³ Hence, the AZCG, which is an entity of the SBS, is an armed military service accountable to the Chief of the SBS. Under the same regulation, the SBS is bound by the “Disciplinary Charter of the Armed Forces of the Republic of Azerbaijan.”⁹⁹⁴ In light of this, it can be determined that this organization is a tier-II military agency.

⁹⁸⁸ United States Department of State.

⁹⁸⁹ Official website of the State Border Service of the Republic of Azerbaijan, “Establishment and Development of the Country's Border Protection System After the Restoration of Azerbaijan's State Independence (January 1992-January 2012).,” accessed November 4, 2021, https://dsx.gov.az/1992-ci_ilden_sonra#.

⁹⁹⁰ Official website of the State Border Service of the Republic of Azerbaijan.

⁹⁹¹ Official website of the State Border Service of the Republic of Azerbaijan.

⁹⁹² Official website of the State Border Service of the Republic of Azerbaijan.

⁹⁹³ Regulations on the State Border Service of the Republic of Azerbaijan, 823 § (2002), Article IV, https://dsx.gov.az/fermanlar/doc_58.

⁹⁹⁴ Regulations on the State Border Service of the Republic of Azerbaijan.

2. Roles and Responsibilities

The duties assigned to the SBS (and thus to its subordinate the AZCG), stated under Article II (9) of the “Regulation of the State Border Service of Azerbaijan” are as follows:⁹⁹⁵

- Protection from, actual and potential, threats from the border;
- Protection of population and property;
- Counterterrorism;
- Illegal migration;
- Narcotics trafficking;
- Smuggling of weapons, explosives, WMDs, and other prohibited materials;
- Protection of living and natural resources;
- HADR); and
- Intelligence and reconnaissance missions.

These legally authorized roles reflect on those of the AZCG and indicate that it is a border force with military mandates. The only MER function allotted to the SBS is HADR, which is performed by most militaries as “military operations other than war” (MOOTW). It is noteworthy that the SBS or AZCG does not have any SAR, pollution response, or marine safety-related activities assigned to it.

3. Strategic Status

Azerbaijan is the only country that sits on a maritime boundary between Iran and Russia, making its position strategic, especially to the West. Furthermore, the country has

⁹⁹⁵ Regulations on the State Border Service of the Republic of Azerbaijan, Article II (9).

fostered a close relationship with NATO and especially the United States.⁹⁹⁶ The latter has provided the AZCG with hardware and training in the past.⁹⁹⁷ Azerbaijan's close relationship with both Israel and the United States has left the country's neighbor, Iran in a precarious position.⁹⁹⁸ It has long evaluated the relations between Washington and Baku as a threat. For Azerbaijan, its partnership with the United States is a vital move to distance itself from the traditional Russian influence.⁹⁹⁹ Azerbaijan also appears to be maintaining strategic security partnerships with other countries. One such country is Turkey, which has come out as the most influential ally of Azerbaijan, as demonstrated in the latter's recent war with Armenia in 2020.¹⁰⁰⁰ This strategic location and its alliance with the West make Azerbaijan's Caspian Sea forces a strategic asset.

In addition to the AZCG, Azerbaijan also has an efficient navy. Most of the country's security and defense operations are conducted and led by the Azerbaijan Navy. The navy conducts a wide range of combat readiness exercises with the AZCG as well as the Azerbaijani Air Force.¹⁰⁰¹ These joint maritime exercises are important for interoperability since under Article IV (17.27) of the "Regulation of the State Border Service of Azerbaijan" the SBS is also considered a reserve force of Azerbaijan's Armed Forces.¹⁰⁰² This would put the AZCG units under the Azerbaijani Navy's command in time of war. In peacetime, the AZCG undertakes the primary role of protecting offshore

⁹⁹⁶ United States Department of State, *Country Reports on Terrorism 2019: Azerbaijan*.

⁹⁹⁷ United States Department of State, "Foreign Operations Assistance: Azerbaijan," August 31, 2016, <https://2009-2017.state.gov/p/eur/rls/fs/2016/261437.htm>.

⁹⁹⁸ Sanei, "The Caspian Sea Legal Regime, Pipeline Diplomacy, and the Prospects for Iran's Isolation from the Oil and Gas Frenzy," 703.

⁹⁹⁹ Sanei, 710.

¹⁰⁰⁰ Andrew E. Kramer, "Armenia and Azerbaijan: What Sparked War and Will Peace Prevail?" *The New York Times*, January 29, 2021, sec. World, <https://www.nytimes.com/article/armenian-azerbaijan-conflict.html>.

¹⁰⁰¹ Ministry of Defense of the Republic of Azerbaijan, "Navy Forces," accessed November 4, 2021, <https://mod.gov.az/en/navy-forces-755/>.

¹⁰⁰² Regulations on the State Border Service of the Republic of Azerbaijan, Article IV (17.27).

oil and gas installations that are vital to national interests.¹⁰⁰³ This is also a role that overlaps with Azerbaijan's Navy, where both undertake frequent joint operations.

Although the country has a navy, the AZCG plays an important role, especially since Azerbaijan's Navy, like other states on the Caspian Sea, is limited in its armament capability. Taking this into account, the AZCG can be considered a highly strategic asset of Azerbaijan.

4. Physical Characteristics

The AZCG ships are painted in a dark shade of gray like naval vessels (Figure 55).¹⁰⁰⁴ The forward of the hull has a tri-colored racing stripe of blue, red, and green in equal widths, similar to CG vessels. In some categories of ships, the aft area of the hull has the English inscription "COAST GUARD," while the mid-ship area of the hull has the Azerbaijani inscription "SAHIL MUHAFAZESI" painted in white.¹⁰⁰⁵

¹⁰⁰³ AzerNews, "Azerbaijan State Border Service Wraps Up Tactical Exercise in Caspian Sea," October 11, 2016, <https://www.azernews.az/nation/103514.html>.

¹⁰⁰⁴ Ships Hub, "Azerbaijani Coast Guard," June 6, 2021, <https://shipshub.com/navy/83-1.html>.

¹⁰⁰⁵ Ships Hub.



Figure 55. AZCG ship underway in the Caspian Sea.¹⁰⁰⁶

The largest class of OPVs, known as the *Tufan* class ships, are equipped with “cutting-edge weaponry, navigation and communication systems.”¹⁰⁰⁷ They are equipped with a 23 mm 2A14 Typhoon cannon, two 12.7 mm mini-Typhoon machine guns, and the Spike-NLOS “fire-and-forget” guided missile system.¹⁰⁰⁸ It is worth noting that none of the CGs in this study has missiles as weaponry onboard.

The AZCG equips these platforms with such armaments mainly for any potential counterterrorism operation. If the tri-color stripes and the distinguishing inscriptions of a coast guard are removed from the ships, they bear a strong resemblance to a navy platform. The AZCG does not possess inherent air capabilities but is supplemented by the air assets of the SBS.

¹⁰⁰⁶ Source: Ships Hub.

¹⁰⁰⁷ Mehdiyev, “Azerbaijan’s State Border Service Celebrates 100 Years, Demonstrates Cutting-Edge Patrol Vessel.”

¹⁰⁰⁸ Ordu, “SBS Storms Are Stronger Than Typhoons.”

The uniforms of AZCG personnel include green camouflage style combat fatigues, white summer uniforms, and winter uniforms similar to navy winter uniforms (Figure 56).¹⁰⁰⁹



Figure 56. Senior AZCG personnel in combat fatigues during an exercise.¹⁰¹⁰

Since the AZCG is an active military service under the SBS, it is bound to follow military traditions, cultures, and regulations as part of the “legislative acts, intended for servicemen of the armed forces.”¹⁰¹¹ Hence, their fundamental training, organizational hierarchies, ceremonies, ranks, and uniforms are in alignment with Azerbaijan’s armed forces.

The AZCG has the physical characteristics of a conventional navy, rather than a traditional MLEA, despite engaging in MLE. These characteristics may be a vital addition to the critical mission that is undertaken by the AZCG in Azerbaijan’s maritime domain.

¹⁰⁰⁹ State Border Service of the Republic of Azerbaijan, “Photo Gallery,” Official website of the State Border Service of the Republic of Azerbaijan, accessed November 4, 2021, <https://dsx.gov.az/fotoqalereya>.

¹⁰¹⁰ Source: News.az, “Azerbaijan’s State Border Service Conducts Tactical Exercises in Caspian Sea,” September 16, 2021, <https://www.news.az/news/azerbaijans-state-border-service-conducts-tactical-exercises-in-caspian-sea-photo>.

¹⁰¹¹ Regulations on the State Border Service of the Republic of Azerbaijan.

5. Behavior and Application

The AZCG is an organization bound by strict military discipline, military order, and customs. This is a highly militarized maritime force, which can be considered as a naval force and thus is equipped with conventional fighting arsenals such as missiles, anti-missile systems, and hydroacoustic systems.¹⁰¹² These capabilities confirm that the AZCG is a competent force-multiplier for Azerbaijan's Navy. Traditional duties aligned to CGs, such as maritime SAR and pollution response, are not included as part of the AZCG's legal mandates.¹⁰¹³ These duties are conducted under the mandate of the Caspian Basin Accident-Rescue Service, which is a civil defense entity under the Ministry of Emergency Situations of Azerbaijan.¹⁰¹⁴ The presence of this unit confirms that the AZCG does not have any primary functions related to civil maritime emergency response operations. Nonetheless, the AZCG plays a supportive role in SAR operations when requested by the Caspian Basin Accident-Rescue Service.¹⁰¹⁵

The AZCG primarily engages in MLE operations, such as anti-smuggling operations, illegal migrant interdictions, and protecting natural and living resources in Azerbaijan's water body.¹⁰¹⁶ Despite having the physical characteristics of a combat-oriented organization, the AZCG is an MLEA.

C. CONCLUSION

This analysis has looked at the AZCG, which belongs to the landlocked country, Azerbaijan. That said, the country has a coastline opening up onto the largest body of enclosed water in the world, the Caspian Sea. Due to the special legal regime that governs

¹⁰¹² News.az, "Azerbaijan's Border Guard Ship Set Afloat in Caspian Sea," January 24, 2019, <https://www.news.az/news/azerbaijans-border-guard-ship-set-afloat-in-caspian-sea>.

¹⁰¹³ Ministry of Emergency Situations, "Caspian Basin Accident Rescue Service," accessed November 4, 2021, <https://www.xhqx.fhn.gov.az/organizations.php?aze-13>.

¹⁰¹⁴ Ministry of Emergency Situations.

¹⁰¹⁵ News.az, "Azerbaijan's Helicopter, Two Ships Involved in Search for Iranian Sailor Missing in Caspian Sea," February 26, 2018, <https://www.news.az/news/azerbaijans-helicopter-two-ships-involved-in-search-for-iranian-sailor-missing-in-caspian-sea>.

¹⁰¹⁶ Vestnik, "Azerbaijan Prevents Contraband of Narcotic Drugs from Iran," October 16, 2021, <https://vestnikkavkaza.net/news/Azerbaijan-prevents-contraband-of-narcotic-drugs-from-Iran.html>.

the region and the complexities surrounding the sea, Azerbaijan operates multiple maritime agencies that safeguard the activities in the region. Among these agencies, the AZCG is an MLEA within a military organization that operates under a tier-II command structure. The most distinct aspect of the AZCG, in comparison to the other cases studied, was the presence of anti-ship missiles onboard its OPVs. This may indicate that the other CGs or MLEAs within the realm of the Caspian Sea are also armed with similar capabilities.

Regardless of the type or characteristics of the AZCG ships, the organization appears to be an efficient border management MLE tool for the government of Azerbaijan. It is a very robust and formidable maritime organization in the Caspian Sea area.

XI. FINDINGS AND COLLATION

A. FINDINGS

This study has analyzed 15 CGs belonging to different maritime states, landlocked and coastal. These organizations were selected for analysis based on their geographic/maritime configuration and the type of organization they represent (Figure 57). Case studies were provided for continental military CGs, continental paramilitary CGs, island nation paramilitary CGs, island nation military CGs, island nation governmental and non-governmental CGs, and a landlocked CG. The analysis provided in-depth descriptions of a variety of CG organizations around the world, and most importantly, their operational features.

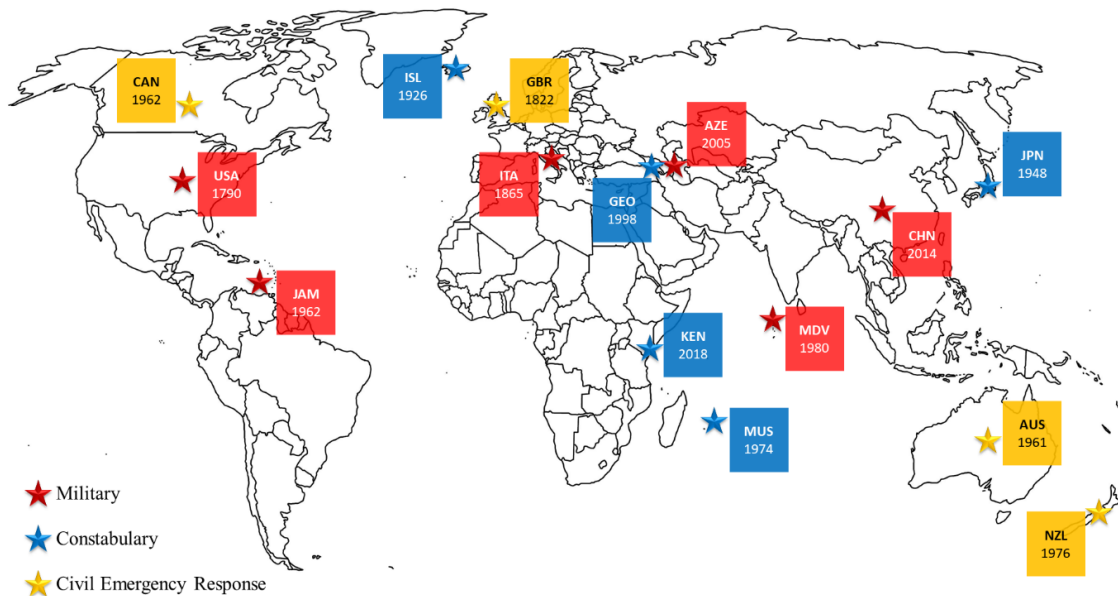


Figure 57. The geographical composition of the analyzed CGs, the date of their inception, and their organizational structure.

The analysis was based on five main attributes: organizational ontology, roles and responsibilities, strategic status, physical characteristics, and behavior and application. Figure 58 shows the positioning of the CGs as presented in the study. The following

sections offer a general overview of the CGs' attributes and a summary of the results from the individual analyses.

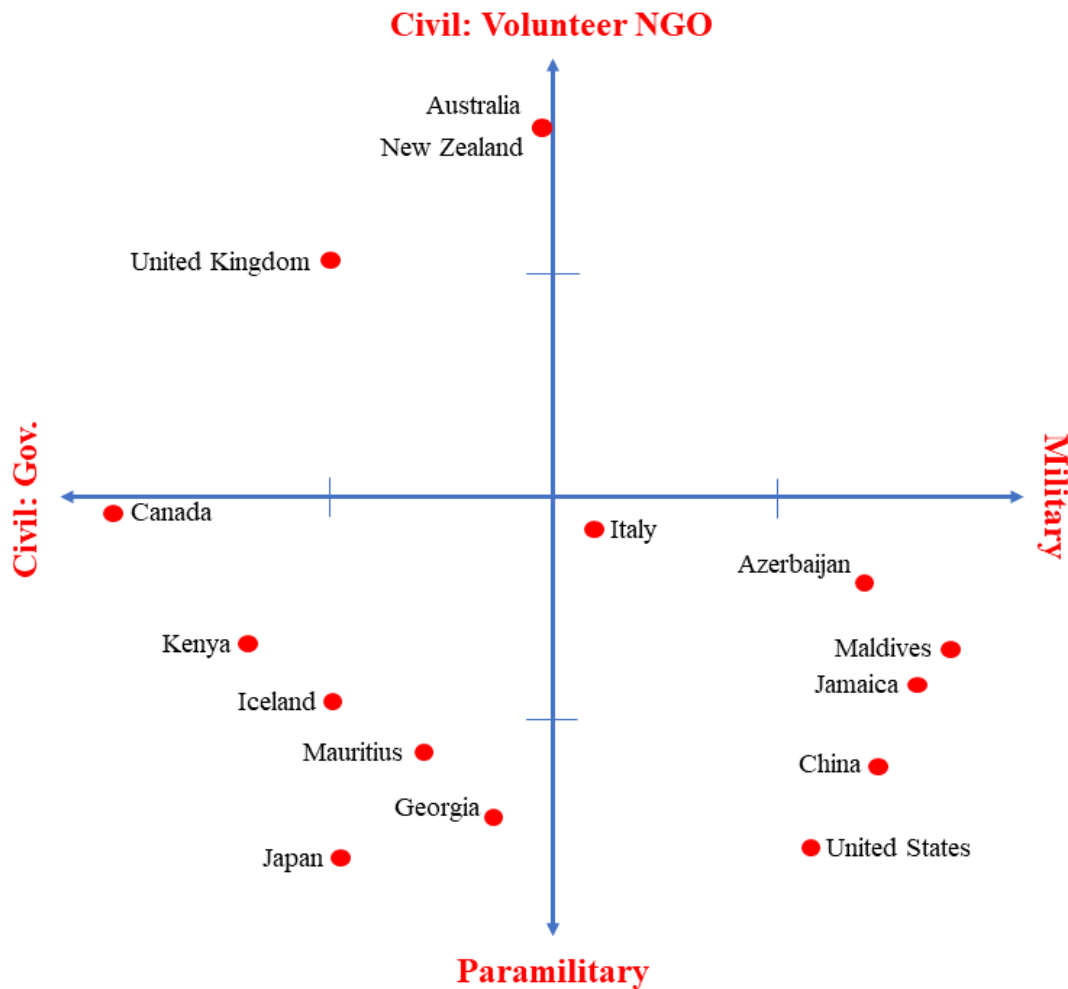


Figure 58. The positioning of 15 CGs studied, according to their structural parameters.

1. Maritime Environment

The study analyzed 15 CGs responsible for varying maritime jurisdictions. The EEZ, which was the primary extent of maritime jurisdictions, and the coastlines they originate from are shown in descending order based on size in Table-2. The operational areas of the AVCG, CGNZ, HMCG, and the KCGS did not cover the extent of their

respective EEZs (marked red in Table 2). Among these, all except the KCGS operate near the coastline in conducting SAR operations. The KCGS is mandated by Kenyan law to conduct MLE in addition to SAR, but only within the limits of the 12 NM territorial waters. The AZCG does not operate in an EEZ, although it has similar claims under a unique legal regime in the Caspian Sea that extend to 25 NM. The rest of the ten CGs were legally mandated to operate within large EEZs.

Table 2. The maritime domain in terms of EEZs and coastlines of the analyzed CGs.

	EEZ (200 NM from the coastline)			Coastline	
	Sq Km	Sq Mi		km	mi
United States	11.4 million	4.4 million	Canada	243,000	150,993
Australia	8.15 million	3.15 million	United States	153,652	95,475
Japan	4.1 million	2.5 million	Australia	34,000	21,127
New Zealand	4 million	1.5 million	Japan	32,779	20,368
China	3 million	1.2 million	China	32,000	19,884
Canada	2.9 million	1.1 million	New Zealand	20,500	12,738
Mauritius	1.8 million	694,984	Great Britain	12,400	7,705
Maldives	923,322	356,497	Italy	7,600	4,600
Great Britain	756,639	292,140	Iceland	6,542	4,065
Iceland	751,345	290,096	Jamaica	1,022	635
Italy	315,943	121,986	Mauritius	900	559
Jamaica	263,284	101,655	Azerbaijan	816	507
Kenya	142,000	54,827	Maldives	650	404
Georgia	22,944	8,859	Kenya	536	333
Azerbaijan	3,971	1,533	Georgia	330	205

The study also demonstrated that most of the countries operate a number of other maritime agencies such as a navy, MLEAs, and MERAs. The MLEAs include fisheries enforcement agencies, border forces, customs enforcement agencies, drug enforcement agencies, and marine safety administrative agencies. Among the CGs analyzed in the study,

ten countries operate navies (Figure 59). In such cases, predominantly it is the navy that has influenced maritime security operations due to their capacity and influence. In some countries like the United States, China, and Japan, the navies do not undertake MLE without the presence of CGs. These countries have efficient CGs capable of operating within their area of operation with little assistance from the navies. Despite this, the navies still play a vital role in each of the cases analyzed.

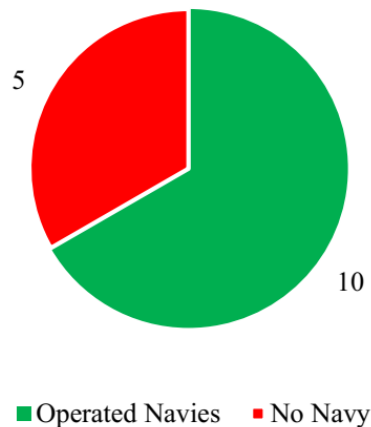


Figure 59. Status of naval forces in the countries analyzed.

Among the five countries that do not have a navy, most are either too small to operate dual maritime forces or have been forced to abolish their navy due to exogenous reasons. The countries that limited in terms of both size and resources to operate a navy include Iceland, Jamaica, Maldives, and Mauritius. The nation of Georgia merged the surviving units of its navy with the GCG after its 2008 war with Russia. In these countries, the CGs appear to dominate the maritime environment.

2. Organizational Ontology

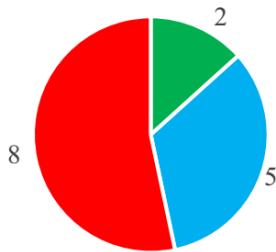
The CGs were analyzed according to the attribute of organizational structure, the origin, its evolution in time, and the level or tier of each CG organization within the maritime security hierarchy of their specific nation. The outcomes are presented in Figure 60. Thirteen out of the 15 CGs were either tier III or tier II organizations. The only two outliers were the two NGO CGs: the AVCG and the CGNZ. This indicates that most of the

CGs operate under two or three hierarchical levels. A reason for this organizational placement may be to increase the level of accountability within the bureaucratic system due to the strategic role of CGs. Among the higher-level agencies that manage CGs, some operate multiple entities, while others operate only the CG organization. The organizations that manage only a CG include the two NGOs that manage the AVCG and the CGNZ, the Council of KCGS that operates the KCGS, and the MCA that manages the HMCG as its operational entity. The remaining 11 CGs are managed by a higher-level agency that operates multiple organizations in addition to the CGs. Nonetheless, the analysis showed that most CGs enjoy relative autonomy under their inherent leadership.

Among the analyzed CGs, there were nine civil organizations and six military organizations. Military forces are generally managed by the DOD or an equivalent body. In this case, the JDFCG, MNCG, CCG, AZCG, and the ICG are included in this type of bureaucracy. The USCG is included in this cohort as a military CG since it is legally regarded as an armed force of the United States. In addition to the military CG organizations, five out of the nine civil CG organizations carry firearms to conduct their operations. Only four CGs in this study were identified to operate without firearms. Arming of CGs appeared to be a fundamental requirement among the CGs that undertake primarily MLE rather than MER roles. The only civil-governmental organizations that do not carry firearms are the CACG of Canada and the HMCG of the UK. Hence, the study found that 11 CGs carry firearms and operate armed platforms to carry out CG operations.

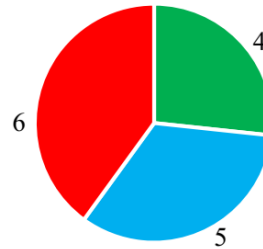
The overall outcome from the analyses of organizational structure was that CGs are generally armed and are embedded in a higher-level organization that manages multiple other entities. Against this backdrop, the findings in the following sections of this chapter may contribute to a broader understanding of organizational ontologies applicable to a CG.

Tier of Organization



■ Tier I ■ Tier II ■ Tier III

Organization Structure



■ Civil - Unarmed ■ Civil - Armed ■ Military

Figure 60. Combined results of analyses of organizational ontology from CG case studies.

3. Roles and Responsibilities

The roles and responsibilities attribute was analyzed based upon the legal mandates described within each CG's respective laws. The analyses identified an estimated 70 different roles and responsibilities. These mandates were collectively arranged into 17 main groups for convenience in presenting the findings.

The number of CGs mandated to undertake each of the identified roles is summarized in the matrix in Table 3. The matrix shows the grouped roles and responsibilities of a CG as legally mandated by their respective laws and regulations. Among the CGs, the USCG are mandated with the most roles, while the CCG follows. Those mandated with the fewest functions are the two NGO CGs. The higher number of roles and mandates also reflect the capacity of the CGs and the strategic importance of the CGs within their respective maritime infrastructure. The specific number of roles may not be reflected accurately by this matrix since a number of roles were combined into 17 groups for easy referral.

Table 3. Matrix showing the grouped roles and responsibilities of CGs.

	SAR (Maritime)	MLE	Navigation Safety	Marine Pollution Response	Border Protection	Combat	Counter Smuggling and Trafficking	Marine Resource Protection	Port Security	Disaster Response	Administration	Ambulance Service	Critical Infrastructure	Counter Terrorism	Ice Operations	Investigation	SAR (Aeronautical and Land)
Australia	1	0	1	0	0	0	0	0	0	0	1	0	0	0	0	0	0
Azerbaijan	0	1	0	0	1	1	1	1	0	1	0	0	1	1	0	0	0
Canada	1	0	1	1	0	0	0	0	0	0	0	0	0	0	1	0	0
China	1	1	0	1	1	1	1	1	0	0	0	0	1	1	0	0	0
Georgia	1	1	1	1	1	1	1	0	1	0	0	0	0	0	0	0	0
Iceland	1	1	1	0	1	0	1	0	0	1	0	1	0	0	0	0	1
Italy	1	1	1	1	0	1	0	1	0	0	1	0	0	0	0	0	0
Jamaica	1	1	0	1	1	1	0	1	0	0	0	0	0	0	0	0	0
Japan	1	1	1	1	1	0	0	0	1	1	0	0	0	0	0	1	0
Kenya	1	1	0	1	0	1	1	1	1	0	0	0	0	0	0	0	0
Maldives	1	1	1	0	0	1	0	1	1	0	0	1	1	0	0	0	0
Mauritius	1	1	1	1	1	0	1	0	0	0	0	0	0	0	0	1	0
New Zealand	1	0	1	0	0	0	0	0	0	0	1	0	0	0	0	0	0
Great Britain	1	0	1	1	0	0	0	0	0	1	0	1	0	0	0	0	1
United States	1	1	1	1	1	1	1	1	1	0	0	0	0	0	1	0	0
	14	11	11	10	8	8	7	7	5	4	3	3	3	2	2	2	2

Figure 61 provides a graphical representation, by order of frequency, of the CGs' assigned roles as identified the matrix in Table 3. These two references are helpful to understand the findings of the roles and responsibilities attribute. Among the 15 CGs, except the AZCG, all have the primary legal mandate to conduct SAR at sea. Despite SAR not being part of the AZCG's legal mandate, the study found that the AZCG supports SAR efforts in the Caspian Sea. The second most common roles for CGs include MLE and navigational safety. The navigational safety grouping includes responsibilities such as marine communication, vessel traffic management, ATON management, hydrographic surveying and charting, public awareness, and EOD, among others. Among the groupings

presented, SAR, navigational safety, marine pollution response, marine resource protection, ice operations, disaster response, and ambulance service contribute to MER operations.

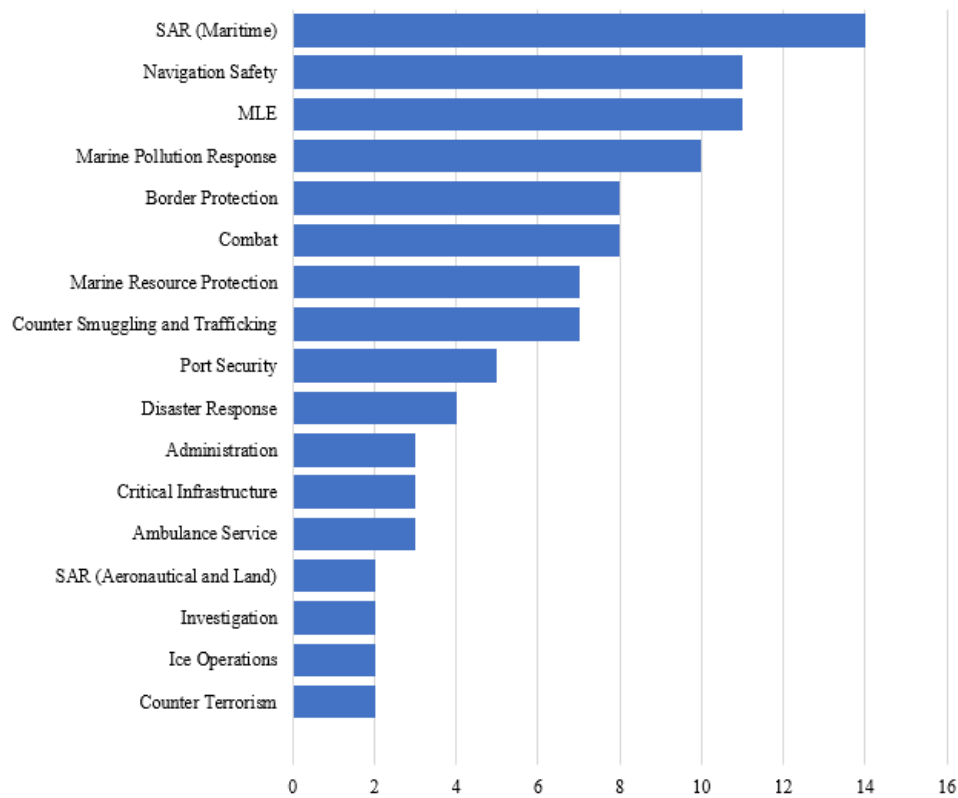


Figure 61. Summary of roles and responsibilities results from the CG analyses.

MLE is the other major element in the findings. Among the civil-government CGs, the CACG and the HMCG did not operate as MLE CGs. This also explains their unarmed status. They are more inclined towards a MERA. However, in the case of the CACG, they do provide their platforms to the RCMP to conduct MLE in Canadian coastal and inland waterways. The horizon of MLE can also be broadened with the inclusion of border protection, counter-smuggling and trafficking, port security, critical infrastructure protection, and investigation groups. In most cases, these roles serve the purpose of MLE.

The wide range of roles and responsibilities identified in this study can be related to the diverse set of samples analyzed. The roles and responsibilities analysis of the 15 different CGs indicate that they are legally bound to conduct MER operations at sea along with MLE. In addition to those two roles, the six military CGs identified in the previous section, along with the GCG and the KCGS, are also assigned to conduct combat roles in different capacities. Among these, the GCG, JDFCG, and the MCG are mandated with combat roles as a primary role, largely due to the absence of a navy in these countries.

4. Strategic Status

The study analyzed the strategic status of CGs to understand the significance of the role they play in their respective maritime environments. The analysis showed that CGs were considered a strategically vital maritime security organization. The results of the analyses from the case studies are shown in Figure 62. Only one CG was rated low in strategic status, the AVCG of Australia. Despite having to overcome bureaucratic difficulties associated with many-layered hierarchical organizational structures, the CGs remain one of the most strategically important assets for a nation's maritime economy, as demonstrated in the analyzed cases. In support of this, the study found that the CGs also demonstrated their efficiency in initiating and establishing maritime security cooperation mechanisms with other local and international MLEAs and MERAs. The CGs utilized these mechanisms largely to enhance their capabilities in terms of aid and joint training and operations.

Several countries also depend on their CGs to secure and foster their blue economy through the protection of marine resources and EEZs. This requirement has also fast-tracked the development of resources and capacity in various countries. This analysis revealed that CGs are a vital part of a country's maritime security system, and the countries that have CGs utilize them as strategic assets.

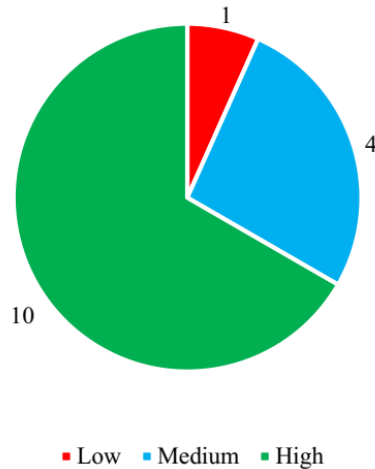


Figure 62. Combined results of analyses of strategic status from CG case studies.

5. Physical Characteristics

The physical characteristics analysis examined the physical features and appearances of CG platforms, as well as the uniforms worn by CG personnel. The combined results of the analyses from the case studies are shown in Figure 63. In some cases, such as in the case of the ICG of Italy, the personnel undergo naval training and follow naval customs, although the ICG platforms display the characteristics of MLE vessels. In this study, such CGs are categorized as constabulary organizations. The hull colors themselves are an important feature, because most CG vessels are typically white-hulled. Perhaps of note, in the analysis of the 15 CGs, the number of CGs with gray versus white hulls is the same, five each. The mix of colors among the other five CGs analyzed included red, yellow, and orange hulls. This by no means represents the ratio of hull colors among all existing CGs across the world, but it acknowledges the existence of variety.

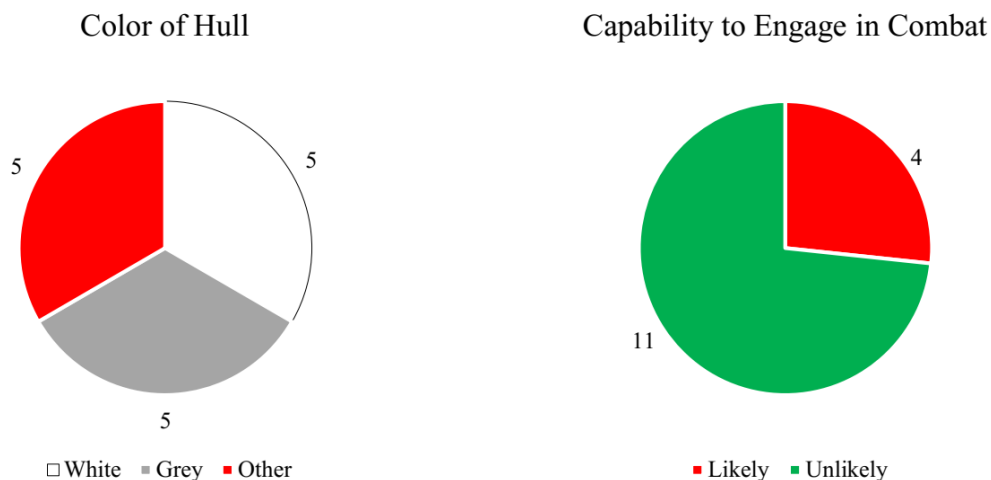


Figure 63. Combined results of analyses of physical characteristics from CG case studies.

The combat capability was determined by the weaponry and the capability of the CGs in their operational environments. These include the size and type of vessels, the number of weapons on board, and the caliber of the weapons. The calibers of the main guns are summarized in Table 4. This shows that six CGs operate weapons, mounted on platforms, with a caliber of over 30 mm. In addition to those listed in Table 4, the AZCG operates non-line of sight (NLOS) Spike missiles on their platforms. The physical features can also indicate the physical similarities between CG platforms and personnel to those of conventional navies. The analysis showed many CGs mimicked naval organizations. Despite this, most of the CGs analyzed here did not possess the capability to sustain combat operations. It is important to note that this study did not venture to identify the material or the thickness of the plates used to build CG platforms. This analysis indicates that most CGs, despite their naval traits, are not capable of naval warfare. Rather, they may have the capacity to engage with state or non-state actors that operate below the threshold of armed conflict.

Table 4. Maximum caliber of main guns installed onboard CG platforms studied.

Countries	Caliber
China	76 mm
United States	76 mm
Iceland	40 mm
Japan	35 mm
Maldives	30 mm
Mauritius	30 mm
Azerbaijan	23 mm
Kenya	20 mm
Georgia	12.7 mm
Jamaica	12.7 mm
Australia	None
Canada	None
Great Britain	None
New Zealand	None
Italy	NA

6. Behavior and Application

The behavior and application analysis identified the current and practical employment of CGs in their maritime environments. The behavior relates to whether the CG operates as a combat, constabulary, or emergency response organization. Application distinguishes the major operations the CG appears to undertake. The purpose of this variable is to determine whether the “roles and mandates” attribute of CGs aligns with their practical application. The combined results of the analyses are shown in Figure 64. The analyses showed that a majority of CGs behave as constabulary units, which is also evident from the op-tempo derived from their application. The application of most of the CGs includes counter smuggling and trafficking operations. In this case, the trafficking and smuggling include the trafficking and smuggling of humans, weapons, drugs, explosives, WMDs, and other illicit commodities. Constabulary actions are also required to counter

these. Furthermore, border protection, the third-highest op-tempo, requires constabulary actions as well. The second most frequent application of CGs studied was their engagements in maritime SAR, which is an MER service, as shown in Figure 64.

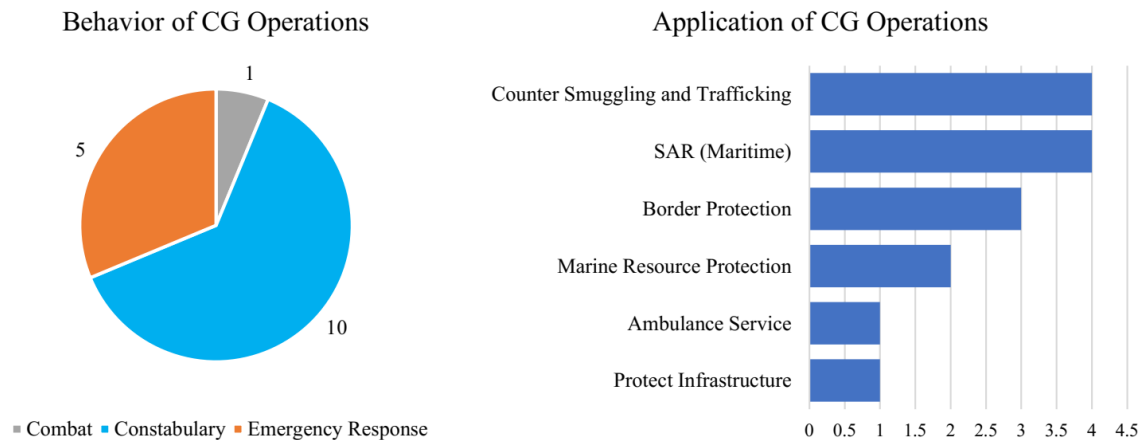


Figure 64. Combined results from analyses of behavior and application of CGs studied.

These findings can be compared with the previous section which provided the findings related to roles and responsibilities. Unlike the results in this section, the roles and responsibilities attribute analyzed the functions of CGs based on their legal mandates. The results of this section were gleaned from the analyses of the op-tempo of the CGs in their respective environments. In terms of the application of CGs, the results in this section show SAR as the second most frequent among CG operations, while in section 3, SAR scored the highest. Counter smuggling and trafficking appear to be the most popular operation for the CGs, although it was mandated to just seven CGs according to section 3. This shows that the CGs are highly active in maritime crime prevention operations, which would normally be enforced by the customs, immigration, and police services on land. This analysis implies that despite their legally mandated priority to serve as MERAs, CGs are also successful MLEAs to fight growing threats of maritime smuggling and trafficking.

The purpose of analyzing the CGs according to the attributes specified was to identify the underlying features of these agencies. Although only a small sample was analyzed, the results indicate that several CGs have non-white hulls, which traditionally

might have been associated with naval or paramilitary platforms. It is also interesting to note that most of the CG platforms and personnel studied are influenced by the navy. Finally, these findings also confirm that CGs are not only operated as MLEAs but also as MERAs.

B. FURTHER DISCUSSION

The results from the analyses of the 15 CGs has revealed several implications and raised a few questions. The number and variety of roles and responsibilities discussed in these 15 cases underscore the complexities behind defining a coast guard. This would seem to be central to the development of commonly accepted nomenclature. First, let's take the two words separately, coast and guard. According to the Cambridge Dictionary, to "guard" is to protect or defend something or someone valuable against harm.¹⁰¹⁷ In the case of the CGs analyzed in the study, the coast, in most cases, is an area that extends to 350 NM from the coastline or an archipelagic baseline, which is the maximum limit of the CS, or a designated SRR, which differs in size among countries. A CG then guards the coast against threats emanating from land into the sea (a country's maritime area of responsibility) and threats coming from the open ocean towards the land. Hence, the coast, patrolled by the CG, would be the buffer between the open sea and the coastline of a nation. This would make a CG the last line of defense from threats coming towards land from the open sea, as well as the first line of defense from threats that are originating from land and moving towards the open sea.

The nomenclature process is often complicated by inter-agency or stakeholder competition within a state. After a CG is established with specific legal mandates, it may have overlapping responsibilities with other stakeholders. China managed this by merging several agencies to form the CCG. The Kenyan government is dealing with the issue by governing the KCGS through two levels of stakeholder councils, whose members have contributed mandates to the KCGS. Furthermore, CGs are expected to continuously liaise and coordinate with a number of local stakeholders in executing their functions. Every CG

¹⁰¹⁷ *Cambridge Dictionary*, s.v. "guarding," accessed May 10, 2022, <https://dictionary.cambridge.org/dictionary/english/guarding>.

analyzed in this study was seeking guidance, authority, resources, training, manpower, and support from various stakeholders. Hence, CGs clearly need to embrace a highly receptive stance toward other stakeholders within their national maritime security system, which may well include international partners. As evidenced by the analysis, CGs are expected to be more far-reaching and densely connected than most other security agencies within a state. This cooperative connectivity should be reflected within a nation's maritime security structures.

Conversely, CGs can easily be overwhelmed by mission creep or bureaucratic overreach when conducting their operations. The CG should be able to conduct its operations without offending or having to appease other stakeholders. It should be able to function as an independent entity in an effective and timely fashion—especially when this involves operations related to life and death at sea, such as SAR operations. This can be addressed through the provision of clear legal authority, legally binding agreements, and memorandums of understanding, as shown by several, if not most, of the CGs discussed in the study. In these cases, such agreements and authorities facilitate smoother coordination during operations and missions among national stakeholders and international partners by enhancing multi-lateral training, operations, and exercises.

A question raised by this analysis is whether the general use of the name “coast guard” matters for other MLEAs. And if so, why does it? Many refer to organizations they perceive as having the *traits* of a CG as a “coast guard.” Paleri did this for agencies such as Pakistan's Maritime Security Agency.¹⁰¹⁸ Forcier did it for the *Gendarmes*.¹⁰¹⁹ Is it wrong to focus primarily on the organization's mandate, behavior, and operations rather than its name? Is the term “coast guard,” any less distinctive in identifying an organization's mandate than the terms “navy” or “police” within security structures? According to the *Merriam-Webster Dictionary*, a name is “a word or phrase that constitutes the distinctive designation of a person or thing.”¹⁰²⁰ An organization's name is expected

¹⁰¹⁸ Paleri, “Coast Guards of the World and Emerging Maritime Threats,” 87.

¹⁰¹⁹ Forcier, *Cooperating Sea Services or Co-Existing Federal Fleets*, 7.

¹⁰²⁰ *Merriam-Webster Dictionary*, s.v. “name,” accessed May 10, 2022, <https://www.merriam-webster.com/dictionary/name>.

to represent a unique characteristic or norm that distinguishes it from others. Countries name their maritime agencies “coast guard” in one form or another since they see an association with other CGs. Those that go against this norm (i.e., not naming a maritime agency a CG) must be assumed to have done this for a particular underlying reason. As a result, referring to the agencies that do not bear the name “coast guard” can further create ambiguities in CG roles and characteristics.

Another question raised by this analysis is about where a CG should be positioned within a nation’s maritime security structure. From the analysis of just 15 CG organizations, it is evident that the CG organizational structures are embedded within a variety of ministries, departments, agencies, and services. Surprisingly, of the countries with CGs that were analyzed, none had a Department of the Coast Guard or even a Department of Maritime Security. Again, we can always assume that it is all relative to a country’s maritime or rational interest. Among the cases that were analyzed, five CGs were under a civil bureaucratic structure that housed traditional militaries (Department of Defense or equivalent): Azerbaijan, China, Italy, Jamaica, and the Maldives. This was based upon the unique maritime security interests of each country. The CCG has been used to assert China’s increasing maritime claims; the ICG is used to augment the Italian navy; and both the JCG of Jamaica and the MCG of the Maldives are military CGs utilized in the absence of navies.

There is also ambiguity when referring to CG personnel. Are they referred to as sailors, similar to those in the merchant or conventional navies? Or are they called “coast guardsmen” or “coast guardswomen?”¹⁰²¹ Some nations have referred to individual coast guard personnel simply as “a coast guard,” implying that the “guard” in “coast guard” refers to an individual. The most sensible way to refer to them would seem to be as sailors, mariners, or officers, but again, there is no consensus on this. During the analysis of these cases, there was little data to draw a conclusion on what to call a person belonging to the CG. Since most of the physical characteristics, including those of the appearance,

¹⁰²¹ WWAYTV3, “Off-Duty Coast Guardswoman Saves Three From Drowning,” May 25, 2021, <https://www.wwaytv3.com/off-duty-coast-guardswoman-saves-three-from-drowning/>.

discipline, and culture demonstrated similarities with traditional navies, there is a tendency to refer to CG personnel as sailors. This can also relate to the classification of CG vessels in the same manner the navy has classified its surface combatants.

In this section, the study’s findings have paved the way to construct a definition for “coast guard” that can facilitate a CG classification model. The findings from the 15 different types of CG have shown a strong alignment of CG organizations with the MER at sea and constabulary roles, in both behavior and legal mandates. Table 5 summarizes most of the findings described in this chapter.

Table 5. Summary of the analyses of 15 CGs studied.

COUNTRY	ACCOUNTABLE AGENCY	TIER	STRATEGIC STATUS	ORG.	BEHAVIOR	HULL COLOR	COMBAT ROLE	COMBAT CAPABLE	MAJOR OPS
Australia	AVCG Board	I	Low	Civil	Emergency Response		N	N	SAR
Azerbaijan	Azerbaijan Border Guard	II	High	Military	Law Enforcement		Y	Y	Infrastructure Protection
Canada	Department of Fisheries and Oceans	II	High	Civil	Emergency Response		N	N	SAR
China	People’s Armed Police	III	High	Military	Law Enforcement		Y	Y	Assert Maritime Claims
Georgia	Georgian Border Police	III	High	Civil	Military		Y	N	Assert Maritime Claims
Iceland	Ministry of Justice	II	High	Civil	Law Enforcement		N	N	Counter IUU Fishing
Italy	Italy Navy	III	Medium	Military	Law Enforcement		Y	N	Migrant Interdict.
Jamaica	Jamaica Defense Force	III	High	Military	Law Enforcement		Y	N	Drug Enforce.
Japan	Ministry of Infrastructure, Transport, and Tourism	II	High	Civil	Law Enforcement		N	Y	Assert Maritime Claims
Kenya	Council of KCGS	III	Medium	Civil	Law Enforcement		Y	N	Counter IUU Fishing
Maldives	Maldives National Defense Force	III	Medium	Military	Emergency Response		Y	N	Ambulance Service
Mauritius	Mauritius Police Force	III	High	Civil	Law Enforcement		N	N	Drug Enforce.
New Zealand	Coastguard New Zealand Inc.	I	Medium	Civil	Emergency Response		N	N	SAR
UK	UK Maritime and Coastguard Agency	III	High	Civil	Emergency Response		N	N	SAR
United States	Department of Homeland Security	II	High	Military	Law Enforcement		Y	Y	Drug Enforce.

THIS PAGE INTENTIONALLY LEFT BLANK

XII. THE CG NOMENCLATURE MODEL

A. INTRODUCTION

This study has analyzed 15 CGs belonging to different maritime states. The organizations were selected for analysis mainly based on their geographic profile and the type of organization they are perceived to be. The analysis has provided in-depth descriptions of a variety of CG organizations from across the globe, and most importantly, their physical and operational contexts. The findings have identified key distinctions among the varying types of CG structures sufficient to derive a generally applicable nomenclature model for CGs.

The objective of this chapter is to develop a nomenclature model for CGs. To construct a CG nomenclature, the chapter provides a definition of “coast guard” and a structural illustration of the CG hierarchy. In addition, each CG component derived from the nomenclature is discussed in detail. This chapter concludes the thesis with a brief discussion about the opportunities and advantages of utilizing the model.

B. DEFINING THE “COAST GUARD”

The findings have identified the main elements of a CG organization, especially through its roles and traits. Based on this, a CG can be defined as a maritime organization, assigned with the primary authority to undertake constabulary and emergency response operations within the maritime jurisdiction of a state.

Of note, this definition does not address combat operations, a salient wartime aspect of most CGs studied in this paper. Except for the GCG, JDFCG, and the MCG, combat at sea was either absent or an auxiliary role for the CGs analyzed here. Thus, if combat operations are the defining role of a specific CG, it should be considered a navy. The fact that a CG can be transferred to or used to augment a navy during times of war does not determine that combat is an inherent CG task. In most wars, it would be normal for a nation’s uniformed services to be called upon to assist in war efforts. Although neglected from the definition, combat operation is an important aspect to address in nomenclature development. Considering this definition and viewing it through a structural lens of a

country's security system, a CG can be considered as the juncture or a transitional organization between the traditional law-enforcement forces on land (police) and the more expeditionary naval forces on the high seas, as shown in Figure 65. A CG can also be adapted as a civil defense force during a conflict or a MERA during peacetime. If this is the case, then a CG's combat role may be controversial. CGs engaged in maritime warfare cannot provide sea ambulance or MER services without endangering non-combatants in an armed conflict. In this regard, a CG's role should remain precise, more distinct, and less fluid. This is the reason for limiting the definition to constabulary and civil MER operations.



Figure 65. CG as a transitional organization between the navy and the police.

The other major feature specified in the definition is the jurisdiction of a CG or its area of operation: a state's maritime jurisdiction. This CG jurisdiction identified in the definition includes the legally claimed maritime zones, where nations exercise their sovereignty and sovereign rights. Despite the increasing size and capabilities of CGs to undertake operations further out to the sea, CGs historically were not meant to operate far from land. The maritime jurisdiction of countries multiplied from 3 to 12 NM (territorial waters), and then to 200 NM (EEZ) and 350 NM (CS) with the introduction of

UNCLOS.¹⁰²² As an outcome of this, the CG's area of operation also grew. As identified during the analysis, these newly claimed maritime zones delineate the jurisdiction of CGs. Associated with this, the analysis also found that many of the countries were developing and acquiring larger CG vessels. This may be a result of an increase in perceived threat or in response to the greater maritime patrol area and traffic related to the extended maritime boundaries defined under UNCLOS.

C. HIERARCHICAL MATRIX OF A CG

The 15 CGs analyzed in this paper have varying organizational hierarchies determined by their different organizational structures. Some had civil structures, while others had military structures. Some were tier-II level hierarchies, while others had longer chain-of-command hierarchical structures. Among the civil structures were government agencies and NGOs or civil volunteer organizations, all bearing the name "coast guard," in one form or another. To better illustrate the 15 CGs in a hierarchical form, the tier structures analyzed in the study are presented in a matrix in Figure 66.

¹⁰²² Christian Bueger, "A Glue That Withstands Heat? The Promise and Perils of Maritime Domain Awareness," in *Maritime Security: Counter-Terrorism Lessons from Maritime Piracy and Narcotics Interdiction*, ed. Edward R. Lucas et al., Nato Science for Peace and Security Series - e: Human and Societal Dynamics, volume 150 (Washington, DC: IOS Press, 2020), 236.

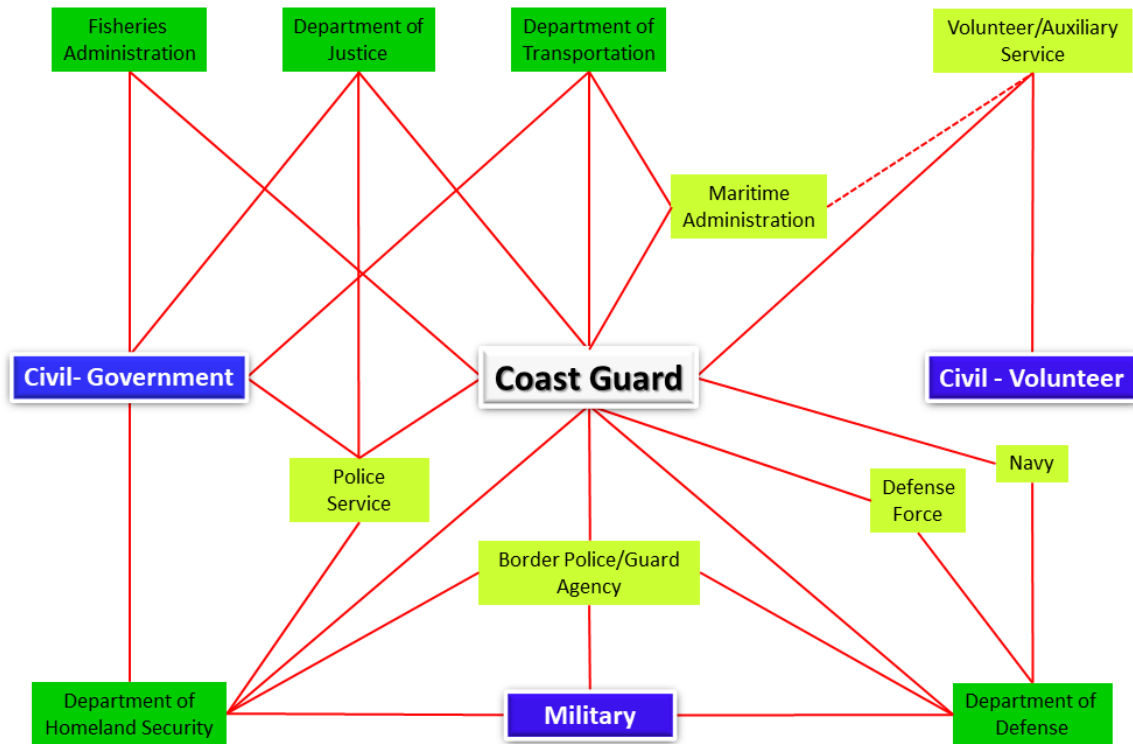


Figure 66. Matrix of organizational hierarchies identified in 15 CGs analyzed.

In the matrix, the blue boxes denote the origin of the structures: military, civil-government, or civil-volunteer. The green boxes illustrate the tier I agencies responsible for the CG organizations. The names of the tier I agencies mostly represent U.S. terminologies, which for other countries would be the equivalent portfolios. The light green boxes denote the tier II agencies responsible for CGs, in turn making CGs a tier III organization. The red lines symbolize the command link between each agency. The sequence goes from the origin of the structure to the tier I agencies, tier II agencies, and lastly to the CG in the white box. For example, the JCG originates from the “Civil-Government” box, which links to the “Department of Transportation,” and finally to the “Coast Guard” box. The HMCG also originates at the “Civil-Government” box and links to the “Department of Transportation,” which links with the “Maritime Administration” box, and finally with the “Coast Guard” box. The HMCG’s tier II box would also have a dashed line to the “Volunteer Service” box since it utilizes many volunteers. As another example, the USCG originates from the “Military” structure, which links to the

“Department of Homeland Security” agency box, and then to the “Coast Guard” box. This model may not apply to every CG in the world; the validation of the model’s applicability was not tested in this study.

Although the paramilitary category was applied during the analytical process, the analysis showed that a country rarely declared its CG as a paramilitary organization. In this study, the MNCG was the only CG declared a paramilitary force on its official website. Furthermore, one of the purposes of deriving a CG nomenclature is to determine whether the CG operates as a combatant or not. It is worth noting that almost all the CGs identified in this study as being armed would fall within the paramilitary definition explored in the literature review of this study. In relation to this, almost all the armed CGs can be expected to operate as a combatant if the need were to arise in their respective countries. Therefore, it seems more logical to merge the CGs having any CG traits of a paramilitary force under the “Military” structure.

D. NOMENCLATURE MODEL

Due to the varieties of CG organizational ontologies and traits (i.e., their roles and behaviors), the process ends up with a set of typologies for CGs and these are derived from a hierarchical taxonomy. The taxonomy is “a specific classification scheme that expresses the overall similarity between organisms [in this case, organizations] in a hierarchical fashion.”¹⁰²³ This term is used interchangeably with typology but builds a detailed hierarchy of an organization.¹⁰²⁴ In this case, typologies would be an outcome of the taxonomy of the organization, both of which contribute to the overall nomenclature model for CGs. This section develops a nomenclature model from a hierarchical taxonomy through three main stages: identifying the taxa, developing the hierarchical taxonomy, and finally, obtaining the nomenclature of CG.

¹⁰²³ Rich, “The Organizational Taxonomy,” 761.

¹⁰²⁴ Rich, 761.

1. Identifying the Taxa

This study builds the nomenclature model from the bottom up, through a hierarchical taxonomy, where each level is known as a “taxa.”¹⁰²⁵ This hierarchical structure is influenced by the model illustrated in the paper, “The Organizational Anatomy: Definition and Design,” by Philip Rich.¹⁰²⁶ In the paper, Rich identifies seven taxa of an organization as described within the U.S. government, each parallel to the hierarchical taxonomy used within the biological classification of species.¹⁰²⁷ The levels are “all-industry” (“Kingdom”), “division” (“Phylum”), “major group” (“Family”), “industry group” (“Genus”) “industry” (“Species/Population”), “subindustry” (“Sub-species, Sub-population or Demes”), and “business” (“Variety/Form”).¹⁰²⁸ Thus, the salient aspect of this hierarchy is that each of the higher taxa influences the eventual characteristic of the lowest taxon and its typologies.

The hierarchical taxonomy is constructed with the matrix in Figure 66 as a foundation, starting with the CG at the bottom. The next level up is the tier I or tier II agency responsible for the CG. These agencies fall under a military, a civil government, or NGO (or civil-volunteer) structure. They are then responsible to regulate and manage CGs in the maritime security system within the maritime domain of a country. While countries reside in different regions, they eventually join to form the global order. According to Bill McKelvey, these different elements surrounding a hierarchical taxonomy are referred to as typologies.¹⁰²⁹ In each of the taxa, there are many typologies. The definition is discussed in the next section.

In a country, agencies operate in multiple “domains.” These “domain” typologies include air, cyber, maritime, land, and also space. Since CGs operate in the maritime domain, this is applied to the hierarchy. The maritime domain would branch into several

¹⁰²⁵ Rich, 765.

¹⁰²⁶ Rich, “The Organizational Taxonomy.”

¹⁰²⁷ Rich, 774.

¹⁰²⁸ Rich, 774.

¹⁰²⁹ Bill McKelvey, *Organizational Systematics: Taxonomy, Evolution, Classification* (Berkeley: University of California Press, 1982), 38.

other typologies, such as security, governance, commerce, and many more. In this case, the hierarchy would include a “maritime security” typology in the next taxon. A nation molds its CG based on these taxa. As stated earlier, each of the taxa identified in the process will influence the traits and structure of a CG. The diagram in Figure 67 shows the higher-order typologies for a CG taxonomy.

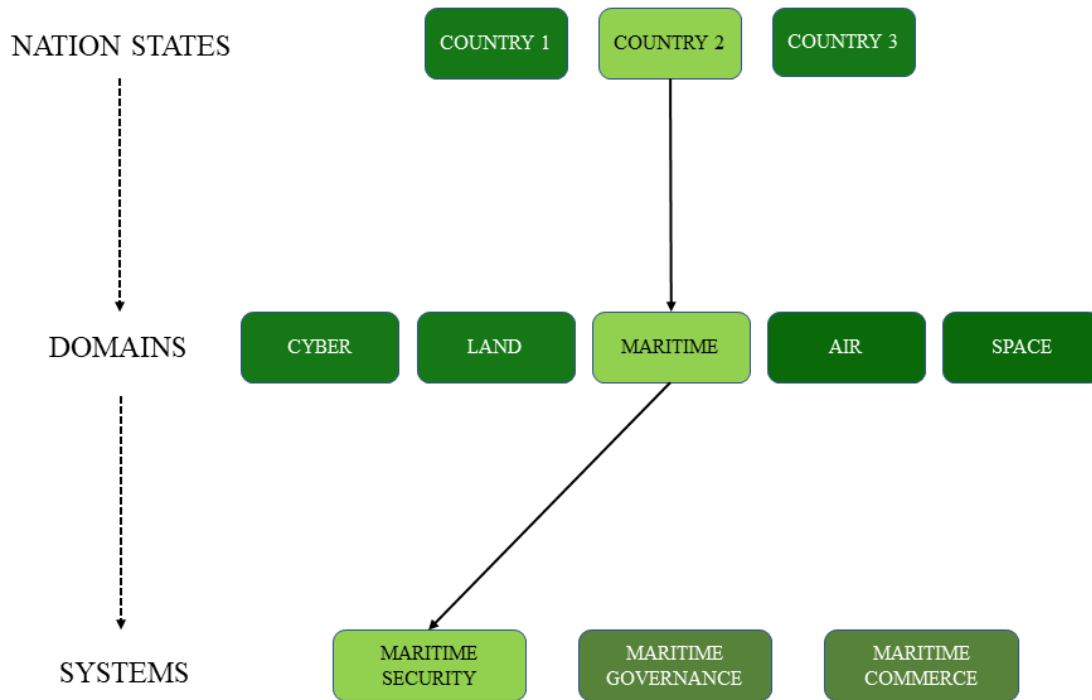


Figure 67. Higher-order typologies and taxa for a CG taxonomy featured in light green.¹⁰³⁰

These higher-order taxa further expand into the “structure” taxon that determines the typology of organizational structures. This includes government or non-government structural typologies. This is the level, or taxon, in which the ambiguity for CGs begins to arise. There is a strong consensus that CGs are operated within a maritime security system, similar to other MLEAs, MERAs, and the navies. This would eventually put all the preceding levels within the same consensus view. Hence, the level below the “structure”

¹⁰³⁰ Adapted from: Rich, “The Organizational Taxonomy,” 774.

taxon is more relevant to this study, since this is where the vagueness begins. In order to clear this up, the next step is to elaborate on the “structure” taxon and the “agency” taxon in detail in order to develop functional typologies for the CG.

2. The Hierarchical Taxonomy

In the organizational context, typology is used to determine the classification primarily based on “the theoretically derived, and more or less intuitively categorized, qualities of observed phenomena.”¹⁰³¹ In his 1982 book, *Organizational Systematics: Taxonomy, Evolution, Classification*, McKelvey presented typology as “essentialism,” which he states is based on identifying the “essence” of things.¹⁰³² According to McKelvey, these typologies are applied at every taxonomical level or taxa during the classification process.¹⁰³³ As described in the previous section, the ambiguity related to the CG nomenclature begins at the “structure” taxon, which basically determines whether a CG is operated under a government or an NGO. The next level determines the responsible agencies: military or civil for government CGs, and non-profit or for-profit volunteer agencies for NGOs. In addition to identifying these taxa, it is also imperative to apply the definition of a CG to determine the functional typologies of a CG, which was addressed earlier.¹⁰³⁴ Taking all of these into account, the typology of CG is further developed in this section.

The definition of CG laid out two fundamental traits of a CG: the constabulary role and the civil MER role. These were the defining elements of the CG as identified from the analysis. All of the other roles were either secondary or a subsidiary of these two roles. The justifications for this were explained in a previous section. Hence, the final taxon added to the hierarchical taxonomy structure would be the “type” of CG. This taxon includes two typologies, “constabulary” and “emergency response.” The hierarchical taxonomy model derived from these for the CG is shown in Figure 68.

¹⁰³¹ Rich, 761.

¹⁰³² McKelvey, *Organizational Systematics: Taxonomy, Evolution, Classification*, 37.

¹⁰³³ McKelvey, 38.

¹⁰³⁴ McKelvey, 37.

Hierarchical Taxonomy

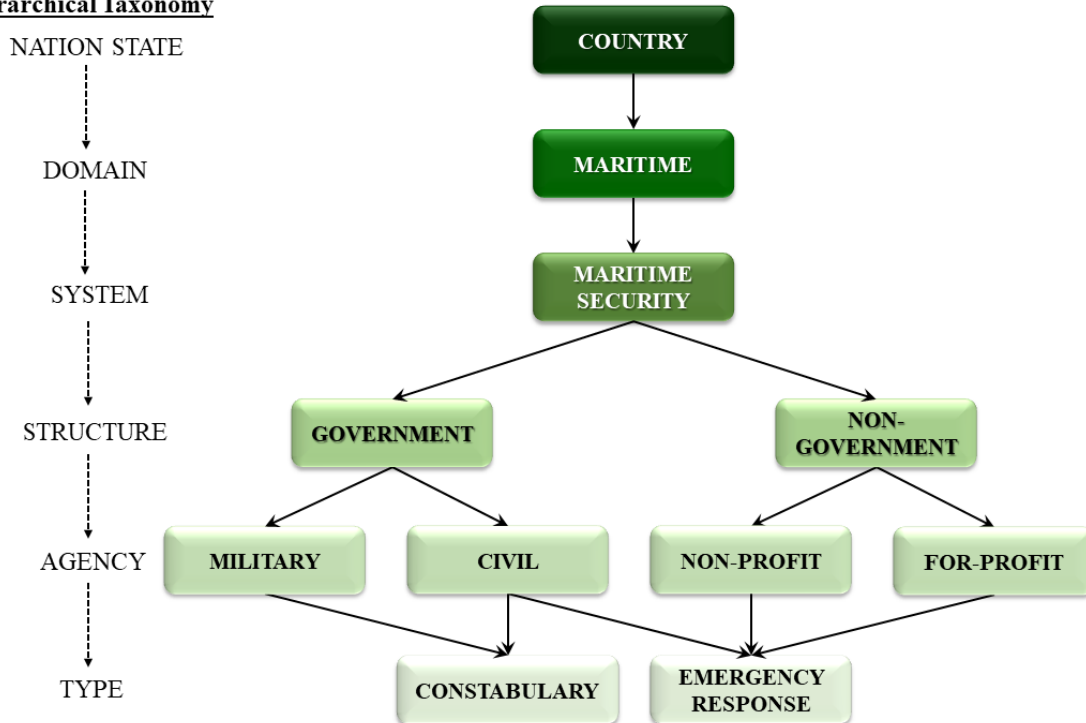


Figure 68. Hierarchical taxonomy of a CG.¹⁰³⁵

These two typologies (constabulary and emergency response) by themselves do not complete the objective of this study. The process requires the final step, which is obtaining the nomenclature from the two typologies.

3. Obtaining the CG Nomenclature

The objective of this process is to develop a nomenclature of CGs in order to minimize the ambiguities surrounding the CG organization. This can be resolved by connecting the “type” taxon with the “agency” taxon, deriving the five initial nomenclatures of CG. These are as follows:

¹⁰³⁵ Adapted from: Rich, “The Organizational Taxonomy,” 774.

- (1) Military – constabulary CGs.
- (2) Civil – constabulary CGs.
- (3) Civil – emergency response CGs.
- (4) Non-profit – emergency response NGO CGs.
- (5) For-profit – emergency response NGO CGs.

To develop a final nomenclature model for CGs, these five initial types can be further refined by combining the three “emergency response” types of CGs, since they all fall within the same type outside of a military organization. Hence, the two NGO CGs can be merged with the “Civil – emergency response CGs.” With reference to this, the study has developed three main models of CG nomenclature, which are presented in detail in the next section.

E. THREE CG NOMENCLATURE MODELS

In the previous section, three main CG types were derived. They include civil-constabulary CGs, military-constabulary CGs, and civil-emergency response CGs. The two latter nomenclatures can be alternatively referred to as military CGs and emergency response CGs, respectively. This section briefly outlines the three models in detail.

1. The Military CG (Gray Model)

a. Objective:

To develop a CG as a tool for deterrence and as an alternative or reserve for a navy.

b. Organization:

Primarily a military organization under the DOD. Alternate agencies, ministries, and departments may also replace the DOD structure. This CG model is transferred under the command of the navy (if present) during an armed conflict.

c. Primary Roles:

- Maritime Readiness / Maritime combat operations.
- MLE (Illicit trafficking and IUUF).
- Counterterrorism.
- Border protection.
- Port security and coastal security operations.

d. Secondary Roles:

- Maritime SAR.
- HADR.

e. Capability:

- High caliber main guns (above 30 mm caliber).
- Anti-ship missiles.
- High-to-medium endurance platforms.

f. Physical Characteristics:

- Has platforms that are gray with the CG markings or racing stripe.
- Follows military traditions, hierarchy, and culture.
- Follows both Rules of Engagement (ROE) and Rules of Use of Force (UOF).

g. Cons:

- Secondary roles during an armed conflict will likely violate the provisions of the LOAC.
- Contribute to a regional or global arms race among CGs.

- A confrontation will likely escalate rather than deconflict.
- An expensive model to sustain and develop.

A military CG tends to resemble a navy that undertakes MOOTW. These are highly disciplined organizations that operate large platforms that can operate further out to sea for longer periods of time. Some smaller countries utilize this model since their capacity limits the establishment of a separate CG and a navy. Despite adopting this model, such countries do not acquire the absolute capabilities outlined in this model. The Gray CGs can be considered combatants during an armed conflict. Countries adopting this model may dedicate and allocate separate units that will undertake MER or civil defense roles during an armed conflict under chapters (III) to (V) of the Second Geneva Convention.¹⁰³⁶ This convention also requires only hospital ships and coastal rescue vessels to be painted white, which is the reason behind the platforms in this model being painted gray with distinctive CG markings.¹⁰³⁷ Among the CGs analyzed in this study, the AZCG, CCG, GCG, JDFCG, MCG, MNCG, and USCG fall within this model.

2. The Civil Constabulary CG (Blue Model)

a. Objective:

To develop a CG primarily for MLE, and as a tool for de-escalating maritime confrontations.

b. Organization:

A civil government organization, primarily under an agency, ministry, or department other than the DOD.

c. Primary Roles:

- MLE (Illicit trafficking and IUUF).

¹⁰³⁶ The Geneva Conventions, GCII, Ch III–V.

¹⁰³⁷ The Geneva Conventions, GCII, Art 43.

- Counterterrorism.
 - Border protection.
 - Port security and coastal security operations.
 - Navigation safety and management.
- d. Secondary Roles:
- Maritime SAR.
 - HADR.
 - Ambulance service.
- e. Capability:
- Light caliber main guns (less than 30 mm caliber).
 - Ability to operate within the coastal maritime jurisdiction.
 - Medium-to-low endurance platforms.
- f. Physical Characteristics:
- Has platforms that are white with the CG marking and racing stripe.
 - Follows policing traditions, hierarchy, and culture.
 - Follows the Rules of UOF.
- g. Cons:
- Likely to have overlapping MLE authority with other local MLEAs.
 - Heavily depends on effective inter-agency cooperation.
 - Dependent on larger and more effective platforms intended for high-threat and high endurance MLE operations.

The Blue model of CGs is equipped with platforms that have weaponry sufficient for self-defense or to compel compliance up to deadly force in a UOF continuum. This CG model generally operates as a police force at sea. In most of the cases analyzed in this study, this model appears to operate alongside other local MLEAs, which requires continuous information sharing, coordination, and capacity sharing to achieve a COP and to reduce the duplication of effort. Unlike the other two models, this model is also likely to encounter high competition with other MLEAs for state funds and resources. As with the Gray CGs, the Blue CGs are likely to be called up during an armed conflict, especially if their platforms are armed. In such cases, the Blue CG may also allocate a separate unit for MER or civil defense roles to conform with the provisions of the Second Geneva Convention. These assigned units must be protected and must not be considered combatants. The Blue CGs painted white must not be engaged in direct combat. Among the 15 CGs analyzed, the ICG, ISCG, and KCGS fall within this model. Even though the ISCG and KCGS platforms are painted gray, their traits strongly align with this category.

3. The Emergency Response CG (White Model)

a. Objective:

To develop a CG primarily for civil MER or civil defense to assist persons and property in danger at sea, promote and maintain safety at sea, and protect the marine environment.

b. Organization:

A civil organization primarily under an agency, ministry, or department other than the DOD; or belonging to a non-profit or a for-profit NGO.

c. Primary Roles:

- Maritime SAR.
- Navigation safety and management.
- Marine pollution response.

- HADR.
 - Ambulance service.
 - Maritime administrative functions.
- d. Secondary Roles:
- Maritime safety awareness.
 - Conducting civil boating certifications.
- e. Capability:
- Unarmed platforms or personal-carry small arms sufficient for individual self-defense.
 - Surface and aerial platforms for specialized MER operations (pollution response, SAR, salvage, icebreaking, medical evacuation, etc.).
 - Ability to conduct and coordinate MER within designated SRR, or locally allocated rescue sub-region.
 - High-to-low endurance response platforms.
 - Highly specialized, experienced, and skilled personnel in life-saving operations and marine protection operations.
- f. Physical Characteristics:
- Has platforms that are white with the CG marking or racing stripe.
 - Follows policing traditions, hierarchy, and culture; or a civil bureaucratic structure.

g. Cons:

- Most countries lack the efficiency and capacity outlined by the model; hence, dividing the labor among multiple agencies may be necessary.
- This is an expensive model for the state if operated as a stand-alone agency without the contribution from other maritime agencies.

Most of the MER CGs, or White CGs, operate platforms that fall under chapters (III) to (V) of the Second Geneva Convention in an armed conflict.¹⁰³⁸ Ideally, these types of CG organizations will not be allocated to a combatant organization during an armed conflict. Hence, the personnel or platforms under this model will not be legal targets and cannot be considered combatants unless the LOAC provisions are violated. They may carry arms for self-defense as permitted by Article 35 of the Second Geneva Convention.¹⁰³⁹ Within this model, there are governmental and non-governmental organizations. It is important that the NGO platforms also conform with the physical characteristics of painting the platforms white with a distinctive CG marking and racing stripe befitting the organization, but separate from the federal CG (if one exists). An example of this is the USCGAUX with their associated platforms. This type is a beneficial one to develop and operate separately if the country has a capable navy and MLEAs. Among the CGs analyzed, the AVCG, CACG, HMCG, and CGNZ fall within this model.

These three models are collectively shown in the diagram in Figure 69.

¹⁰³⁸ The Geneva Conventions, GCII, Ch III–V.

¹⁰³⁹ The Geneva Conventions, GCII, Art 35.

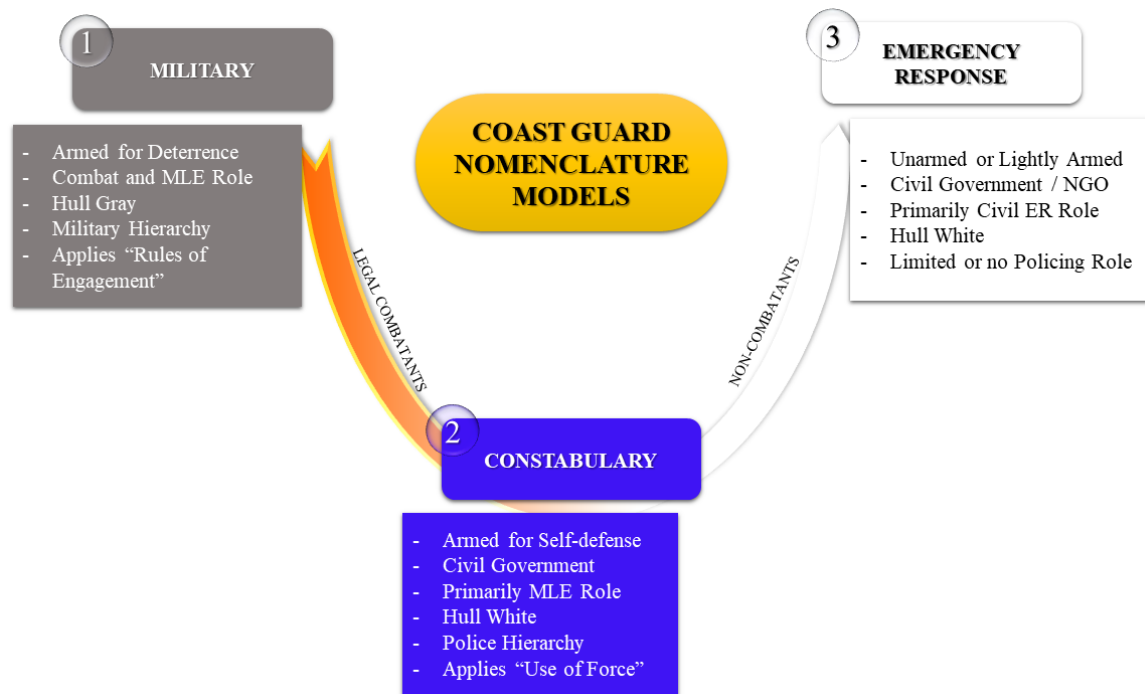


Figure 69. The three nomenclature models for CGs with their primary traits.

The Gray, Blue, and White CG nomenclatures also depend on the maritime infrastructure and the capacity of specific states, as stated in the model descriptions. Hence, countries may use combinations of the types to develop hybrid models. Despite this, the three types of CG will be dominant in defining the nomenclature of any hybrids, as long as most of the primary roles and the objectives presented in each model remain unchanged.

F. KEY TAKEAWAYS

In the introduction of this thesis, a number of rationales were provided to justify the need to develop a CG nomenclature. They included implications for maritime security cooperation, separating CG classification from naval classifications; fostering distinctive, functional, and legal norms for a CG; and minimizing ambiguities in an armed conflict. The types of CGs identified in this paper aim to address these rationales and focus on building a norm for what should be identified as a "coast guard." Maritime security cooperation requires a number of attributes among partners, and one of them is corresponding mandates. The three models outlined two main roles (MER and MLE) and three different organizational

structures (military, civil government, and civil NGO). These attributes can be used to classify partners for effective maritime security cooperation mechanisms.

A primary reason to classify “coast guard” organizations with a unique nomenclature is to understand what distinguishes them from navies. This requires a specific classification structure for CGs, based on the traits and organizational ontology relevant to CGs. This study has achieved that objective. Fostering CGs’ distinctive, functional, and legal norms based on these three types of CGs requires their pervasive acceptance, the general adoption of the nomenclature, and favorable outcomes from their real-world application. This eventually requires mapping all the CG organizations within these nomenclatures, to assess the reliability and validity of the developed models. The first step in this process is to widely disseminate the proposed nomenclature and models and thereby expose them to professional and academic scrutiny for validation or refinement that may result in more robust norms in the future. The models herein describe physical characteristics, weaponry, behavior, and roles that are intended to foster the practical application of such norms.

The most important purpose of this study is to overcome the ambiguities related to CGs being misidentified as combatants. Among the three types of CG models identified in the study, only one type of CG was not determined conclusively to be either a combatant or a non-combatant: the Blue CG. Some among this category may be called upon for service to supplement the navy in an armed conflict. This does not mean, however, that these are military units in peacetime. Splitting the Blue CG model into a paramilitary-constabulary typology and a civil-constabulary typology is also unlikely to resolve this issue, mainly due to countries not declaring their own CG agencies as paramilitary forces and the conflicting definitions of the term “paramilitary” in scholarly literature, which creates more ambiguity. Countries that operate Blue CGs will likely declare their status (combatant/non-combatant) to prevent being targeted during an armed conflict. As a solution to this, the study strongly proposes that both Blue and White CG platforms be painted white and not be applied for combat. The “white-hulls” must be non-combatants, and they shall not be a naval reserve or a quasi-navy. If one of the fundamental objectives for the CG is to partake in combat operations, and the CG is developed to achieve this objective, then the CG must operate within the Gray model.

In addition to addressing the rationales of this study, there are some relevant takeaways to consider. First, any organization, be it a CG or another agency within a nation tasked to undertake a strategic maritime function, should be given enough authority to operate autonomously with an efficient unity of command.¹⁰⁴⁰ Some CGs in this research were too deeply embedded within another organization for this to be the case. This may hinder the development and decision-making process of those organizations. The second is the fact that Blue CGs with their constabulary roles require a strong relationship with the state's criminal justice system—the Justice Department, the Attorney General, Prosecutor General, or even the investigative authorities—to function with sufficient alacrity and flexibility. Putting Blue CGs in tandem with these organizations, especially within the same organizational structures, might help speed up the succeeding legal processes. If a Blue CG is put under a DOD or under a navy, then the strategic guidance and prioritized development can be distorted and hindered. This also applies to the White CGs that engage in MER.

The third takeaway is that the legal protocols for engaging with a suspected person or vessel at sea need to be codified and clearly understood. This is mostly relevant to the Gray CGs. A military organization's routine engagement policy is guided by the specific rules of engagement. This requires neutralizing an enemy using armed force. During a constabulary operation, the CG must follow the procedures to effect detention, arrest, or search as described by respective criminal procedure codes. Hence, military organizations that undertake these policing roles must follow a strict UOF continuum to compel compliance. The Gray CGs should shape their doctrines and train their units and personnel to be fluent in the legal procedures related to stopping, detaining, searching, and arresting personnel or vessels.

The construction of three types of CG models yields an important contribution to the academic literature on maritime security. In spite of this, the study does have its limitations. They include the challenge of utilizing accurate data and information, challenges in verifying the most recent information, analyzing only a limited number of samples that may not

¹⁰⁴⁰ Stephen P. Robbins and Timothy A. Judge, *Essentials of Organizational Behavior*, 14th Ed. (Uttar Pradesh, India: Pearson Education Limited, 2019), 279.

accurately and fully represent all CGs, and as indicated earlier, the lacking validation of the three CG model types in relation to all the existing CG organizations. Despite these limitations, this study reached its main objective of developing a reliable nomenclature for the varieties of CGs analyzed in this study.

G. CONCLUSION

This research sought to answer the question: Can the CGs of each nation be classified into a model to derive a nomenclature for the agency by thoroughly analyzing representative CGs in its unique maritime environment and respective maritime security system? This study identified the lack of a definitive nomenclature for “coast guard” and undertook an analysis process to develop a nomenclature model for CGs. The rationales behind this study were to facilitate maritime security cooperation; develop a CG-specific classification; foster distinctive, functional, and legal norms for a CG; and minimize ambiguities related to CGs in an armed conflict. The study was completed through two main processes: the analytical process and the nomenclature modeling process. The analytical process examined 15 different CGs selected from different organizational structures (military, paramilitary, civil government, and civil non-government) belonging to three geographical categories (continental, island, and landlocked). The CGs were analyzed using five attributes: organizational ontology, roles and responsibilities, physical characteristics, strategic status, and behavior and application. The nomenclature modeling process went through three main phases, which included identifying CG taxa, constructing a hierarchical taxonomy for CG, and obtaining the CG nomenclature.

This study achieved its objective and developed three CG nomenclature models: the military-constabulary CG (the “Gray Model”), the civil-constabulary CG (the “Blue Model”), and the emergency response CG (the “White Model”). These models also fulfill the requirement for the classification of CGs. The validity of applying these models to all the organizations bearing the name “coast guard” remains untested as this was outside the scope of this study.

LIST OF REFERENCES

- Aasandha Company Ltd. “Emergency Evacuation: Aasandha Company Ltd.” Accessed March 23, 2022. <https://aasandha.mv/en/scheme/emergency-evacuation>.
- Abdul-Hannan, Lumma. “Maldives to Be Gifted a FIC Vessel by India.” Today, October 15, 2019. <https://today.mv/3830/>.
- Abdulla, Ahmed Adham, and Erika J. Techera. “Environmental Crimes: A Framework for Detection, Monitoring, and Enforcement in The Maldives.” *Journal of International Wildlife Law & Policy* 24, no. 2 (April 3, 2021): 131–77. <https://doi.org/10.1080/13880292.2021.1942249>.
- Abrams, Jolien. “UNODC Resuming In-Person Maritime Law Enforcement Capacity Building with Kenya Coast Guard.” UNODC, September 18, 2020. <https://www.unodc.org/easternafrika/en/Stories/unodc-resuming-capacity-building-in-mombasa.html>.
- Academic Dictionaries and Encyclopedias. “Shikishima (PLH 31).” Accessed April 1, 2022. <https://en-academic.com/dic.nsf/enwiki/3001563>.
- Adam, Mariyam Afaaf. “Coast Guard Celebrates 40 Years of Service with a Flag-Hoisting Ceremony.” Raajjemv, January 1, 2020. <https://raajje.mv/68748>.
- Africa Intelligence. “Nairobi Urgently Seeks New Ships for Navy and Coast Guard,” July 12, 2021. https://www.africaintelligence.com/eastern-and-southern-africa_business/2021/07/12/nairobi-urgently-seeks-new-ships-for-navy-and-coast-guard,109678999-art.
- Agenda. “US Gives Two Patrol Boats to Georgia on 20th Anniversary of Georgian Coast Guard,” October 18, 2018. <https://agenda.ge/en/news/2018/2161>.
- Ahmed, Mohamed. “Maritime Agency Steps up Security to Curb Indian Ocean Crimes.” *Business Daily*, September 20, 2020. <https://www.businessdailyafrica.com/bd/corporate/shipping-logistics/maritime-agency-steps-up-security-to-curb-indian-ocean-crimes-2282430>.
- Althingi: Icelandic Parliament. “A Parliamentary Resolution on Iceland’s Arctic Policy,” March 28, 2011. <https://www.government.is/media/utanrikisraduneyti-media/media/nordurlandaskrifstofa/A-Parliamentary-Resolution-on-ICE-Arctic-Policy-approved-by-Althingi.pdf>.

- Anandan, S. "India Donates Second Naval Advanced Light Helicopter to Maldives." *The Hindu*. December 14, 2013, sec. National. <https://www.thehindu.com/news/national/india-donates-second-naval-advanced-light-helicopter-to-maldives/article5456867.ece>.
- ANSAMed. "Italy: Coast Guard Seizes 170 Tons of Fish Ahead of Christmas," December 21, 2021. http://www.ansamed.info/ansamed/en/news/nations/italy/2021/12/21/italycoast-guard-seizes-170-tons-of-fish-ahead-of-christmas_1dee79bb-5b97-4969-a26e-30fe10368ea3.html.
- Arctic Coast Guard Forum. "The Arctic Coast Guard Forum (ACGF)." Accessed February 27, 2022. <https://www.arcticcoastguardforum.com/about-acgf>.
- . "The Arctic Coast Guard Forum: Canada." Accessed February 27, 2022. <https://www.arcticcoastguardforum.com/member-country/canada>.
- Arctic Council. "Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic." Arctic Council Secretariat, 2011. <https://oaarchive.arctic-council.org/handle/11374/531>.
- . "Agreement on Cooperation on Marine Oil Pollution Preparedness and Response in the Arctic," March 15, 2013. https://oaarchive.arctic-council.org/bitstream/handle/11374/529/EDOCS-2068-v1-ACMMSE08_KIRUNA_2013_agreement_on_oil_pollution_preparedness_and_response_signedAppendices_Original_130510.PDF?sequence=6&isAllowed=y.
- . "Arctic Council Strategic Plan 2021 to 2030," May 20, 2021. https://oaarchive.arctic-council.org/bitstream/handle/11374/2601/MMIS12_2021_REYKJAVIK_Strategic-Plan_2021-2030.pdf?sequence=1&isAllowed=y.
- . "Declaration on the Establishment of the Arctic Council: Joint Communiqué of the Governments of the Arctic Countries on the Establishment of the Arctic Council," September 19, 1996. https://oaarchive.arctic-council.org/bitstream/handle/11374/85/EDOCS-1752-v2-ACMMCA00_Ottawa_1996_Founding_Declaration.PDF?sequence=5&isAllowed=y.
- . "Together Towards a Sustainable Arctic: Iceland's Arctic Council Chairmanship 2019–2021," May 2019. https://oaarchive.arctic-council.org/bitstream/handle/11374/2456/Arctic_Council-Iceland_Chairmanship_2019-2021.pdf?sequence=1&isAllowed=y.
- Armada Nacional. "Comando de Guardacostas." [Coast Guard Command] Accessed September 7, 2021. <https://www.armada.mil.co/es/content/comando-de-guardacostas>.

- Ashford, Emma. "Great-Power Competition Is a Recipe for Disaster." *Foreign Policy*, April 1, 2021. <https://foreignpolicy.com/2021/04/01/china-usa-great-power-competition-recipe-for-disaster/>.
- Australian Border Force. "Maritime Border Command." Accessed February 13, 2022. <https://www.abf.gov.au/about-us/what-we-do/border-protection/maritime>.
- . "Who We Are." Accessed February 13, 2022. <https://www.abf.gov.au/about-us/who-we-are>.
- Australian Coast Guard Maritime Academy. "The Australian Coast Guard Maritime Academy – ACGMA." Accessed February 21, 2022. <https://www.acgma.edu.au/>
- . "Courses – The Australian Coast Guard Maritime Academy." Accessed February 21, 2022. <https://www.acgma.edu.au/courses/>.
- Australian Maritime Safety Authority. "Search and Rescue Arrangements in Australia." Accessed February 20, 2022. <https://www.amsa.gov.au/safety-navigation/search-and-rescue/search-and-rescue-arrangements-australia>.
- . "Who We Are." Accessed February 13, 2022. <https://www.amsa.gov.au/about/who-we-are>.
- Australian Volunteer Coast Guard. "About Us." Accessed February 13, 2022. <https://coastguard.com.au/about-us/>.
- . "Full Flotilla List." Accessed February 20, 2022. <https://coastguard.com.au/locations/full-flotilla-list/>.
- . "Marine Assist." Accessed February 20, 2022. <https://coastguard.com.au/marine-assist/>.
- . "Our History." Accessed February 13, 2022. <https://coastguard.com.au/about-us/history/>.
- . "SafeTrx." Accessed February 20, 2022. <https://coastguard.com.au/safetrx/>.
- . "Volunteer." Accessed February 21, 2022. <https://coastguard.com.au/volunteer/>.
- Avas. "MNDF Pilots Receive Green Light to Operate Dornier Aircraft," November 9, 2021. <https://avas.mv/en/109728>.
- . "No Budget to Purchase New Sea Ambulances: Defense Minister," October 19, 2021. <https://avas.mv/en/108680>.

- Axe, David. "China's Maritime Militia Is a Problem—The U.S. Coast Guard Could Be the Solution." *Forbes*, December 18, 2020. <https://www.forbes.com/sites/davidaxe/2020/12/18/americas-sea-chiefs-just-made-a-compelling-argument-for-a-bigger-more-powerful-us-coast-guard/>.
- Azer News. "Azerbaijan State Border Service Wraps Up Tactical Exercise in Caspian Sea," October 11, 2016. <https://www.azernews.az/nation/103514.html>.
- Badri-Maharaj, Sanjay. "The Mauritius-India Naval Relationship: Naval Diplomacy 2.0." Manohar Parrikar Institute for Defence Studies and Analyses, June 2016. <https://www.idsa.in/africatrends/the-mauritius-india-naval-relationship:-naval-diplomacy>.
- Baird Maritime. "Mauritius Receives Second Fast Patrol Boat," July 13, 2017. <https://www.bairdmaritime.com/work-boat-world/maritime-security-world/non-naval/mauritius-receives-second-fast-patrol-boat-cgs-valiant-jpg/>.
- Bashfield, Samuel. "Agalega: A Glimpse of India's Remote Island Military Base." *The Interpreter*: Lowy Institute, March 2, 2021. <https://www.lowyinstitute.org/the-interpreter/agalega-glimpse-india-s-remote-island-military-base>.
- BBC News. "Caspian Sea: Five Countries Sign Deal to End Dispute," August 12, 2018, sec. World. <https://www.bbc.com/news/world-45162282>.
- Beja, Patrick, and Philip Mwakio. "New Twist in Seizure of Fishing Vessels." *The Standard*, May 22, 2019. <https://www.standardmedia.co.ke/business/news/article/2001326581/new-twist-in-seizure-of-fishing-vessels>.
- Benassi, Anna. "Parliamentary Resolution on a National Security Policy for Iceland: 145th Legislative Session 2015–2016." Althingi: Icelandic Parliament, April 13, 2016. <https://www.government.is/media/utanrikisraduneyti-media/media/Varnarmal/National-Security-Policy-ENS.pdf>.
- Bendigo Advertiser. "Support for Our Critical Services," February 20, 2017. <https://www.bendigoadvertiser.com.au/story/4480165/support-for-our-critical-services/>.
- Benkenstein, Alex. "Prospects for the Kenyan Blue Economy." *Policy Insights* 62. South African Institute of International Affairs, 2018. <https://saiia.org.za/research/prospects-for-the-kenyan-blue-economy/>.
- Biodiversity Center of Japan. "National Survey on the Natural Environment: Coastline Survey." Accessed March 28, 2022. https://www.biodic.go.jp/english/kiso/33/33_kaiga_e.html.
- Black, Jeremy. "A Post-Imperial Power? Britain and the Royal Navy." *Orbis* 49, no. 2 (March 2005): 353–65. <https://doi.org/10.1016/j.orbis.2005.01.009>.

- Blanchard, Jean-Marc F. "The U. S. Role in the Sino-Japanese Dispute Over the Diaoyu (Senkaku) Islands, 1945–1971." *The China Quarterly*, no. 161 (2000): 95–123. <http://www.jstor.org/stable/655982>.
- Boat Watch. "SV Activates Epirb, Australia," December 30, 2020. <https://boatwatch.org/resolved/sv-activates-epirb-australia/>.
- Border Force. "About Us: Border Force." Government of the United Kingdom. Accessed April 17, 2022. <https://www.gov.uk/government/organisations/border-force/about>.
- Border Police of the Ministry of Internal Affairs of Georgia. "Coast Guard - Border Police of the Ministry of Internal Affairs of Georgia," July 2, 2016. <https://web.archive.org/web/20160702062111/http://bpg.gov.ge/ge/coast-guard>.
- . "Main Division of Special Purpose Aviation," August 27, 2016. <https://web.archive.org/web/20160827171452/http://bpg.gov.ge/ge/special-aviation>.
- Bosphorus Naval News. "Russian – Georgian War at Sea," September 21, 2008. <https://turkishnavy.net/2008/09/21/russian-georgian-war-at-sea/>.
- Bowcott, Owen. "UN Court Rejects UK's Claim of Sovereignty over Chagos Islands." *The Guardian*, February 25, 2019, sec. World news. <https://www.theguardian.com/world/2019/feb/25/un-court-rejects-uk-claim-to-sovereignty-over-chagos-islands>.
- Bowers, Ian, and Swee Lean Collin Koh, eds. *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*. London: Palgrave Macmillan, 2019.
- Bravo Zulu by D4H. "'Saving Lives at Sea' with Coastguard New Zealand." Accessed April 13, 2022. <https://d4h.com/blog/saving-lives-at-sea-with-coastguard-new-zealand>.
- Brew, Nigel. "A Quick Guide to the History of Proposals for an Australian Department of Homeland Security." Text. Parliament of Australia, July 14, 2014. Australia. https://www.aph.gov.au/About_Parliament/Parliamentary_Departments/Parliamentary_Library/pubs/rp/rp1718/Quick_Guides/HomelandSecurity.
- Brewster, David. "It's Time for a 'Quad' of Coast Guards," August 12, 2019. <https://www.lowyinstitute.org/the-interpreter/time-quad-coast-guards>.
- Bristow Group Inc. "Drone Joins HM Coastguard Air, Land and Sea Rescue Teams," July 22, 2022. <https://www.bristowgroup.com/news-media/press-releases/detail/484/drone-joins-hm-coastguard-air-land-and-sea-rescue-teams>.
- . "UK Search and Rescue." Accessed April 17, 2022. <https://www.bristowgroup.com/services/uk-search-and-rescue>.

- Bruen, Kevin. "Cooperate through Coast Guards in the Western Pacific." *United States Naval Institute Proceedings* 143, no. 9 (September 2017): 58–62.
<http://www.proquest.com/docview/2044302322/abstract/A649E954DD814BC2PQ/1>.
- Bueger, Christian. "A Glue That Withstands Heat? The Promise and Perils of Maritime Domain Awareness." In *Maritime Security: Counter-Terrorism Lessons from Maritime Piracy and Narcotics Interdiction*, edited by Edward R. Lucas, Samuel Rivera-Paez, Thomas Crosbie, and Felix Falck Jensen. NATO Science for Peace and Security Series - e: Human and Societal Dynamics, volume 150. Washington, DC: IOS Press, 2020.
- . "What Is Maritime Security?" *Marine Policy* 53 (March 2015): 159–64.
<https://doi.org/10.1016/j.marpol.2014.12.005>.
- Business Daily. "How Kenya Coast Guards Are Confronting Illegal Fishing on Lake Naivasha." *Business Daily*, October 12, 2021.
<https://www.businessdailyafrica.com/bd/data-hub/kenya-guards-confronting-illegal-fishing-lake-naivasha-3581220>.
- Business Today. "India, Maldives Sign 6 Pacts as PM Modi, Prez Solih Hold Talks," June 8, 2019. <https://www.businesstoday.in/latest/economy-politics/story/india-maldives-sign-6-pacts-pm-modi-prez-solih-hold-talks-202761-2019-06-08>.
- Canada Transport. "Marine Transportation." AEAD, March 19, 2020.
<https://tc.canada.ca/en/marine-transportation>.
- Canadian Coast Guard. "Maritime Security Contributions," 2011. <https://www.ccg-gcc.gc.ca/publications/maritime-security-surete-maritime/contributions/index-eng.html>.
- . "Maritime Security Framework," 2010. <https://www.ccg-gcc.gc.ca/publications/maritime-security-surete-maritime/framework-cadre/index-eng.html>.
- Canadian Coast Guard [@CoastGuardCAN]. "Tweet: Canadian Coast Guard." *Tweet. Twitter*, December 14, 2017. <https://twitter.com/CoastGuardCAN/status/941314448496758789>.
- Canney, Donald L. "Icebreakers and the U.S. Coast Guard." U.S. Coast Guard Historian's Office. Accessed January 4, 2022. https://media.defense.gov/2019/Jul/25/2002162249/-1/-1/0/ICEBREAKERS_D.%20CANNEY_1999.PDF.
- Caribbean Community. "Member States and Associate Members-CARICOM." Accessed March 22, 2022. <https://caricom.org/member-states-and-associate-members/>.

- . “Strategic Plan - Caribbean Community 2015–2019: Repositioning CARICOM,” July 3, 2014. <https://caricom.org/documents/strategic-plan-caribbean-community-2015-2019/>.
- Caribbean Military Academy. “About the Caribbean Military Academy.” Accessed March 22, 2022. <http://caribbeanmilitaryacademy.edu.jm/academy.php>.
- . “Caribbean Military Maritime Training Center (CMMTC).” Caribbean Military Academy. Accessed March 22, 2022. <http://caribbeanmilitaryacademy.edu.jm/cmmtc.php>.
- Caribbean Regional Fisheries Mechanism. “Agreement Establishing the Caribbean Regional Fisheries Mechanism,” 2002. https://www.crfm.int/index.php?option=com_k2&view=item&layout=item&id=2&Itemid=116.
- . *CRFM Statistics and Information Report 2020*. Belize and St. Vincent and the Grenadines, 2021. https://www.crfm.int/images/documents/CRFM%20Statistics%20and%20Information%20Report%202020_Final_Published.pdf.
- Castilla-Espino, D., J.J. García-del-Hoyo, M. Metreveli, and K. Bilashvili. “Fishing Capacity of the Southeastern Black Sea Anchovy Fishery.” *Journal of Marine Systems* 135 (July 2014): 160–69. <https://doi.org/10.1016/j.jmarsys.2013.04.013>.
- CBC News. “Government to Consider Arming Coast Guard Vessels,” November 14, 2012. <https://www.cbc.ca/news/canada/nova-scotia/government-to-consider-arming-coast-guard-vessels-1.1199547>.
- Cech, Grace, and Tom Cech. “Between Two Seas.” *ArcGIS StoryMaps* (blog). January 31, 2020. <https://storymaps.arcgis.com/stories/2a36015d065247aabb2f107c2eec9690>.
- Cechet, Bob, Paul Taylor, Christina Griffin, and Martyn Hazelwood. “Australia’s Coastline: Adapting to Climate Change: Assessing Infrastructure Vulnerability to Rising Sea-Levels.” AUSGEO News. Geoscience Australia: Australian Government, March 2011. <https://www.ga.gov.au/ausgeonews/ausgeonews201103/climate.jsp>.
- Central Intelligence Agency. “Azerbaijan.” In *The World Factbook*. Central Intelligence Agency, November 3, 2021. <https://www.cia.gov/the-world-factbook/countries/azerbaijan/>.
- . “Canada.” In *The World Factbook*. Central Intelligence Agency, February 16, 2022. <https://www.cia.gov/the-world-factbook/countries/canada/>.
- . “Kenya.” In *The World Factbook*. Central Intelligence Agency, January 25, 2022. <https://www.cia.gov/the-world-factbook/countries/kenya/#geography>.

- Charities Services. "Charities Services: Royal New Zealand Coastguard Incorporated - CC36138." Accessed April 12, 2022. <https://register.charities.govt.nz/Charity/CC36138>.
- Cheong, So-Min. "From Frequent Hurricanes to the Deepwater Horizon Oil Spill in Coastal Louisiana: The Impact of Regulatory Change." *Ecology and Society* 19, no. 2 (2014). <http://www.jstor.org/stable/26269541>.
- China Power. "Are Maritime Law Enforcement Forces Destabilizing Asia?." Center for Strategic and International Studies. August 18, 2016. <https://chinapower.csis.org/maritime-forces-destabilizing-asia/>.
- China.org. "China Coast Guard Vessels Patrol Diaoyu Islands," September 16, 2013. http://www.china.org.cn/photos/2013-09/16/content_30044828.htm.
- Choi, Timothy. "Ready to Secure: A Sea Control Perspective on Canadian Fisheries Enforcement." In *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*, edited by Ian Bowers and Swee Lean Collin Koh, 223–244 London: Palgrave Macmillan, 2019.
- Civil. "U.S. Gifts Two Patrol Boats to Georgia." United Nations Association of Georgia. October 18, 2018. <https://civil.ge/archives/259562>.
- Coastguard Boating Education. "About Us." Accessed April 13, 2022. <https://www.boatingeducation.org.nz/about/>.
- . "Boating Education Courses." Accessed April 13, 2022. <https://www.boatingeducation.org.nz/courses/>.
- Coastguard New Zealand. "Aircraft Information." Accessed April 13, 2022. <https://www.coastguard.nz/areas/northern-area/units/auckland-air-patrol/about-us/aircraft-information/>.
- . "Auckland Marine Rescue Centre - Secretary," December 2020. <https://www.coastguard.nz/about-us/our-history/auckland-marine-rescue-centre-secretary/>.
- . "Caring for Our Customers and Communities," 2022. <https://performancereport2021.coastguard.nz/caring-for-our-customers-and-communities/>.
- . "Coastguard - The Charity Saving Lives at Sea." Accessed April 12, 2022. <https://www.coastguard.nz/about-us/>.
- . "Coastguard Auckland Air Patrol." Accessed April 13, 2022. <https://www.coastguard.nz/areas/northern-area/units/auckland-air-patrol/>.

- . “Coastguard New Zealand Board.” Accessed April 12, 2022. <https://www.coastguard.nz/about-us/our-board/>.
- . “Coastguard New Zealand: Our Vision, Our Mission, Our Focus, Our Success Factors, and Current Projects.” Accessed April 12, 2022. https://www.coastguard.nz/media/417480/final_cnz_strategic-plan.pdf.
- . “Our Finances.” Accessed April 12, 2022. <https://performancereport2021.coastguard.nz/our-finances/>.
- . “Our History.” Accessed April 12, 2022. <https://www.coastguard.nz/about-us/our-history/>.
- . *Performance Report 2021*. Auckland: New Zealand, 2021. <https://performancereport2021.coastguard.nz/>.
- . “Vessel Information.” Accessed April 13, 2022. <https://www.coastguard.nz/areas/central-area/units/wellington/about-us/vessel-information/>.
- . “Volunteering for Coastguard.” Accessed April 13, 2022. <https://www.coastguard.nz/about-us/our-volunteers/>.
- Cole, Bernard D. *China’s Quest for Great Power: Ships, Oil, and Foreign Policy*. Annapolis, Maryland: Naval Institute Press, 2016.
- Cole, Russell, and Conrad Pilditch. “New Zealand, Coastal Ecology.” In *Encyclopedia of Coastal Science*, edited by Maurice L. Schwartz, 705–709. Dordrecht: Springer Netherlands, 2005. https://doi.org/10.1007/1-4020-3880-1_227.
- Combster. “CRN 91 Naval Gun,” 2020. <https://www.combster.tv/t/897609-crn-91-naval-gun>.
- Commonwealth Governance. “Geography of United Kingdom.” Accessed April 14, 2022. <https://www.commonwealthgovernance.org/countries/>.
- COMRED. “The Role of Coastal Kenya Communities in Maritime Security.” Coastal and Marine Resources Development. May 31, 2021. <https://comred.or.ke/the-role-of-coastal-kenya-communities-in-maritime-security/>.
- Council on Foreign Relations. “Timeline: China’s Maritime Disputes.” Accessed August 18, 2021. <https://www.cfr.org/timeline/chinas-maritime-disputes>.
- Cowie, Teresa. “Left to Perish: Lack of Support for Coastguard a ‘National Disgrace.’” RNZ, July 5, 2019. <https://www.rnz.co.nz/news/national/393680/left-to-perish-lack-of-support-for-coastguard-a-national-disgrace>.

- Cusumano, Eugenio, and Matteo Villa. *Sea Rescue NGOs: A Pull Factor of Irregular Migration?* Luxembourg: Publications Office of the European Union, 2019. <https://data.europa.eu/doi/10.2870/644458>.
- Daily Telegraph. “Coast Guard Keeps Watch for 30 Years,” March 4, 2009, sec. Ballina. <https://www.ballinaadvocate.com.au/news/coast-guard-keeps-watch-30-years/180456/>.
- Darby, Campbell. *Review into Volunteer Marine Rescue Organizations in Queensland*. Blue Water Review. Queensland: Government of Queensland, 2018. <https://www.qfes.qld.gov.au/sites/default/files/2021-03/Review-into-VMR-Organisations-in-QLD.pdf>.
- Defence Forum & Military Photos - DefenceTalk. “Georgian MRTP-33,” November 1, 2010. <https://www.defencetalk.com/military/photos/georgian-mrtp-33.41784/>.
- DefenceWeb. “Maldives Outlines Maritime Threats, Solutions,” April 20, 2012. <https://www.defencweb.co.za/security/maritime-security/maldives-outlines-maritime-threats-solutions/>.
- Degnarain, Nishan. “Latest Satellite Analysis Reveals New Theory For Deadly Wakashio Oil Spill In Mauritius.” *Forbes*, October 19, 2020. <https://www.forbes.com/sites/nishandegnarain/2020/10/19/latest-satellite-analysis-reveals-new-theory-for-deadly-wakashio-oil-spill-in-mauritius/>.
- . “The Rise and Fall of Japan Over the Deadly Mauritius Oil Spill.” *Forbes*, December 11, 2020. <https://www.forbes.com/sites/nishandegnarain/2020/12/11/the-rise-and-fall-of-japan-over-the-deadly-mauritius-oil-spill/>.
- DeKraker, Adam, Christopher Hinen, Bernard Iatauro, and Patrick Barensse. “The Russo-Georgian War: Russian Influence.” *Small Wars Journal*, February 14, 2021. <https://smallwarsjournal.com/jrnl/art/russo-georgian-war-russian-influence>.
- Department of Transport. *Maritime 2050: Navigating the Future*. London: Government of the United Kingdom, January 2019. https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/872194/Maritime_2050_Report.pdf.
- Dibenedetto, Alessandra Giada. “Ensuring Security in the Mediterranean Sea: The Italian Navy and Coast Guard.” In *Grey and White Hulls*, edited by Ian Bowers and Swee Lean Collin Koh, 159–80. Singapore: Springer Singapore, 2019. https://doi.org/10.1007/978-981-13-9242-9_9.
- Djibouti Code of Conduct. “Jeddah Amendment – DCoC.” Accessed February 6, 2022. <https://dcoc.org/about-us/jeddah-amendment/>.

- Dun & Bradstreet. “Australian Coast Guard Maritime Academy Pty Ltd.” Competitors, Financials & Contacts. Accessed February 21, 2022. https://www.dnb.com/business-directory/company-profiles.australian_coast_guard_maritime_academy_pty_ltd.5b6a489985e696cc366e5d0880a6f3fc.html.
- . “The Australian Volunteer Coast Guard Association Incorporated.” Competitors, Financials & Contacts. Accessed February 21, 2022. https://www.dnb.com/business-directory/company-profiles.the_australian_volunteer_coast_guard_association_incorporated.3c3c3cf658bc1f1b202a3344a447e425.html.
- The Economic Times. “CGS Barracuda: First Indian Warship Exported to Mauritius,” December 21, 2014. <https://economictimes.indiatimes.com/nation-world/cgs-barracuda-first-indian-warship-exported-to-mauritius/slideshow/45590323.cms>.
- The Economist. “Full Circle; Drugs Trafficking in the Caribbean.” *The Economist*, May 24, 2014. <https://www.proquest.com/docview/1528518974/abstract/13EDD3C7057445CPQ/1>.
- Elsea, Jennifer K. *The Posse Comitatus Act and Related Matters: The Use of the Military to Execute Civilian Law*. Report No. R42659. Washington, D. C.: Congressional Research Service, November 6, 2018.
- Environment Foundation. “Areas.” Environment Guide. February 6, 2018. <https://www.environmentguide.org.nz/issues/marine/new-zealands-marine-environment/areas/>.
- Erickson, Andrew S., and Ryan D. Martinson, eds. *China’s Maritime Gray Zone Operations*. Studies in Chinese Maritime Development. Annapolis, Maryland: Naval Institute Press, 2019.
- EU CRIMARIO. “CRIMARIO, Critical Maritime Routes Indo-Pacific: Rationale & Objectives.” Accessed April 8, 2022. <https://www.crimario.eu/en/the-project/rationale-objectives/>.
- . “Maritime Security Conference in Mauritius,” June 14, 2018. <https://www.crimario.eu/en/2018/06/14/maritime-security-conference-in-mauritius-2/>.
- European Coast Guard Functions Forum. “Coast Guard Functions.” Accessed April 2, 2022. <https://ecgf.efca.europa.eu/coast-guard-functions>.
- . “Network.” Accessed April 2, 2022. <https://ecgf.efca.europa.eu/institutions>.
- . “What Is ECGF Training Network?” Accessed April 2, 2022. <https://ecgf.efca.europa.eu/about>.

- European Coast Guard Functions Training Network. "Italian Coast Guard." Accessed February 3, 2022. <https://ecgf.efca.europa.eu/institution/italian-coast-guard>.
- Experimental Air Association. "Aircraft Announced to Celebrate USCG Aviation Centennial at Oshkosh." EAA. June 2, 2016. <https://www.eaa.org/airventure/eaairventure-news-and-multimedia/eaairventure-news/eaairventure-oshkosh/06-02-2016-aircraft-announced-to-celebrate-uscg-aviation-centennial-at-oshkosh>.
- Faaig, Ali. "MNDF Carries Out First Operation Using Dornier Flight Gifted by India." *The Times of Addu*, October 26, 2020. <https://timesofaddu.com/2020/10/26/mndf-carries-out-first-operation-using-dornier-flight-gifted-by-india/>.
- Finnemore, Martha, and Duncan B. Hollis. "Constructing Norms for Global Cybersecurity." *The American Journal of International Law* 110, no. 3 (2016): 425–79.
- Fiore, Teresa, and Ernest Ialongo. "Introduction: Italy and the Euro–Mediterranean 'Migrant Crisis': National Reception, Lived Experiences, E.U. Pressures." *Journal of Modern Italian Studies* 23, no. 4 (August 8, 2018): 481–89. <https://doi.org/10.1080/1354571X.2018.1500787>.
- Fisheries and Oceans Canada. "Canada's Ocean Estate: A Description of Canada's Maritime Zones," 2007. <https://waves-vagues.dfo-mpo.gc.ca/Library/40622952.pdf>.
- Fisheries and Oceans Canada and Canadian Coast Guard. "The Canadian Coast Guard College: Officer Training Program." Accessed February 27, 2022. <https://www.ccg-gcc.gc.ca/publications/college/docs/officer-prospectus-officier-eng.pdf>.
- FISH-i. "Kenya Hosts Sustainable Blue Economy Conference," December 19, 2018. <https://fish-i-network.org/kenya-hosts-sustainable-blue-economy-conference/>.
- Forcier, J.Y. *The Canadian Navy and the Canadian Coast Guard: Cooperating Sea Services or Co-Existing Federal Fleets*. Strategic Studies Working Group Papers. Ottawa: Canadian Defense and Foreign Affairs Institute & Canadian International Council, 2011. <https://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.637.3978&rep=rep1&type=pdf>.
- Frontex. "European Cooperation on Coast Guard Functions." Accessed April 2, 2022. <https://frontex.europa.eu/we-support/european-cooperation-on-coast-guard-functions/>.
- . "Frontex: Who We Are." Accessed February 4, 2022. <https://frontex.europa.eu/about-frontex/who-we-are/structure/>.

- . “Tripartite Working Arrangement Between the European Border and Coast Guard Agency (Frontex) and the European Fisheries Control Agency (EFCA) and the European Maritime Safety Agency (EMSA),” March 18, 2021. https://frontex.europa.eu/assets/Key_Documents/Working_Arrangements/WA_between_Frontex_EFCA_EMSA.pdf.
- Gallardo, Cristina. “UK Seals Deal with Rwanda to Offshore Asylum Seekers.” POLITICO, April 14, 2022. <https://www.politico.eu/article/uk-seals-deal-with-rwanda-to-offshore-asylum-migrant-seekers/>.
- gCaptain. “Here’s Why So Much World Trade Passes Mauritius,” August 11, 2020. <https://gcaptain.com/heres-why-so-much-world-trade-passes-mauritius/>.
- GeoNames. “Administrative Division of Australia.” Accessed February 13, 2022. <https://www.geonames.org/AU/administrative-division-australia.html>.
- Georgia About. “About Law Enforcement – Border Police of Georgia,” April 26, 2014. <https://georgiaabout.com/2014/04/26/border-police-of-georgia/>.
- Geoscience Australia. “Area of Australia - States and Territories.” Government of Australia. May 15, 2014. <https://www.ga.gov.au/scientific-topics/national-location-information/dimensions/area-of-australia-states-and-territories#heading-3>.
- . “Australia’s Coasts and Estuaries.” Government of Australia. May 15, 2014. <https://www.ga.gov.au/scientific-topics/marine/coasts-estuaries>.
- . “Maritime Boundary Definitions.” Government of Australia. May 15, 2014. <https://www.ga.gov.au/scientific-topics/marine/jurisdiction/maritime-boundary-definitions#heading-3>.
- . “Oceans and Seas.” Government of Australia. May 15, 2014. <http://www.ga.gov.au/scientific-topics/national-location-information/dimensions/oceans-and-seas>.
- Ghani, Nusrat, Benjamin Barnard, Dominic Walsh, and William Nicoll. *A Global Maritime Power: Building a Better Future for Post-Brexit Britain*. UK: Policy Exchange, 2020. <https://policyexchange.org.uk/wp-content/uploads/A-Global-Maritime-Power.pdf>.
- Ghermandi, David. “Asian and European Middle Powers: A Comparative Analysis on Energy Security and Naval Forces.” Paper presented at International Studies Association’s International Conference, Hong Kong, June 2017.

- The Gleaner. "Fishing for Guns - Old Harbour Bay Boatmen Rake in Profits with Drugs-For-Arms Trafficking to Haiti," February 10, 2020. <https://jamaica-gleaner.com/article/lead-stories/20200210/fishing-guns-old-harbour-bay-boatmen-rake-profits-drugs-arms>.
- Global Security. "China Coast Guard - Uniforms." Accessed January 8, 2022. <https://www.globalsecurity.org/intell/world/china/ccg-uniforms.htm>.
- . "Jamaica - Military Personnel." Accessed April 27, 2022. <https://www.globalsecurity.org/military/world/caribbean/jm-personnel.htm>.
- . "Maldives - Coast Guard." Accessed March 22, 2022. <https://www.globalsecurity.org/military/world/indian-ocean/mv-coast-guard.htm>.
- . "New Generation Floreal Frigate (NG2F)." Accessed March 22, 2022. <https://www.globalsecurity.org/military/world/europe/stx-ng2f.htm>.
- Go Blue. "Go Blue Security." EU and Government of Kenya. 2021. <http://www.goblue.co.ke/programme-components/security>.
- Godwin, Michael. "Anchors Away for a New Georgian Navy." *Georgia Today*, July 8, 2021, sec. Newspaper. <https://georgiatoday.ge/anchors-away-for-a-new-georgian-navy/>.
- Goldberg. "Kenya Navy; Inception, Roles and Achievements." Strategic Intelligence Service, April 10, 2015. <https://intelligencebriefs.com/kenya-navy-inception-roles-and-achievements/>.
- Goldstein, Lyle. *Five Dragons Stirring Up the Sea: Challenges and Opportunities in China's Improving Maritime Enforcement Capabilities*. China Maritime Study, no. 5. Newport. RI: China Maritime Studies Institute, U.S. Naval War College, 2010.
- Goulding, Ian C., Kim A. Stobberup, and Tim O'Higgins. "Potential Economic Impacts of Achieving Good Environmental Status in Black Sea Fisheries." *Ecology and Society* 19, no. 3 (2014): art32. <https://doi.org/10.5751/ES-06817-190332>.
- Government of Canada. "Canadian Coast Guard," May 16, 2019. <https://www.ccg-gcc.gc.ca/index-eng.html>.
- . "Commissioner of the Canadian Coast Guard," May 16, 2019. <https://www.ccg-gcc.gc.ca/corporation-information-organisation/commisioner-commissionaire-eng.html>.
- Government of Canada – Canadian Coast Guard. "Helicopter Service Information," May 16, 2019. <https://www.ccg-gcc.gc.ca/fleet-flotte/helicopters/services-info-services-eng.html>.

- . “The Canadian Coast Guard at 60,” December 23, 2021. <https://www.ccg-gcc.gc.ca/ccg60gcc-eng.html>. [Ignore “The” when alphabetizing entries.]
- . “Helicopters,” May 16, 2019. <https://www.ccg-gcc.gc.ca/fleet-flotte/helicopters/index-eng.html>.
- . “History of the Canadian Coast Guard,” November 29, 2019. <https://www.ccg-gcc.gc.ca/corporation-information-organisation/history-eng.html>.
- . “History of Icebreaking in Canada,” May 16, 2019. <https://www.ccg-gcc.gc.ca/icebreaking-deglacage/history-historique-eng.html>.
- . “Maritime Search and Rescue (SAR) in Canada,” May 16, 2019. <https://www.ccg-gcc.gc.ca/publications/search-rescue-recherche-sauvetage/sar-canada-res-eng.html>.
- . “Organizational Structure,” January 12, 2013. <https://www.dfo-mpo.gc.ca/about-notre-sujet/organisation-eng.htm>.
- . “Vessel - CCG Fleet: CCGS Helen Irene Battle.” Accessed February 28, 2022. <https://inter-j01.dfo-mpo.gc.ca/fdat/vessels/2283>.
- . “Vessel - CCG Fleet: CCGS Henry Larsen.” Accessed February 27, 2022. <https://inter-j01.dfo-mpo.gc.ca/fdat/vessels/70>.
- . “Who We Are and What We Do,” May 16, 2019. <https://www.ccg-gcc.gc.ca/corporation-information-organisation/who-we-are-qui-nous-sommes-eng.html>.
- Government of Canada – Treasury Board of Canada. “Becoming a Special Operating Agency,” May 13, 1998. https://www.tbs-sct.gc.ca/pubs_pol/oepubs/tb_b4/bsoa-doss01-eng.asp#02.
- Government of Iceland – Ministry of Foreign Affairs. “National Security.” Accessed March 25, 2022. <https://www.government.is/topics/foreign-affairs/national-security/>.
- Government of Maldives. “About Us - Ministry of Defense.” Accessed March 22, 2022. <https://www.gov.mv/en/organisations/ministry-of-defence/about>.
- . “About Us - Ministry of Transport and Civil Aviation.” Accessed March 22, 2022. <https://www.gov.mv/en/organisations/ministry-of-transport-and-civil-aviation/about>.
- . “Ministry of Fisheries, Marine Resources and Agriculture.” Accessed March 22, 2022. <https://www.gov.mv/en/organisations/ministry-of-fisheries-marine-resources-and-agriculture>.

- . “Ministry of Home Affairs.” Accessed March 22, 2022. <https://www.gov.mv/en/organisations/ministry-of-home-affairs>.
- . “Strategic Action Plan 2019–2023: The Republic of Maldives,” 2019. <https://presidency.gov.mv/SAP/>.
- Government of Mauritius. “Republic of Mauritius - Location.” Accessed April 7, 2022. <http://www.govmu.org/English/ExploreMauritius/Geography-People/Pages/GeographyPeople/Location.aspx>.
- Government of New Zealand. *Maritime Security Strategy 2020: Guardianship of Aotearoa - New Zealand’s Maritime Waters*. Wellington, New Zealand, 2020. <https://www.transport.govt.nz/assets/Uploads/Report/MaritimeSecurityStrategy.pdf>.
- Government of the United Kingdom. “Maritime and Coastguard Agency.” Accessed September 7, 2021. <https://www.gov.uk/government/organisations/maritime-and-coastguard-agency>.
- . “Strategic Overview of Search and Rescue in the United Kingdom of Great Britain and Northern Ireland,” January 2017. https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/593127/mca_uksar.pdf.
- . “UK Maritime Power (JDP 0–10),” October 4, 2017. <https://www.gov.uk/government/publications/uk-maritime-power-jdp-0-10>.
- Guangming Daily. “The Maritime Police Law of the People’s Republic of China,” January 29, 2021. https://m.gmw.cn/2021-01/29/content_1302079361.htm.
- Guardia Costiera. “Agusta Westland 139.” Accessed February 4, 2022. <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/aeromobile-piaggio-p166.aspx>.
- . “Aircraft.” Accessed February 4, 2022. <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-aerei.aspx?CategoriaArchivio=Aerei&CategoriaArchivioID=19>.
- . “ATR42 MP.” Accessed April 1, 2022. <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/atr42-mp.aspx>.
- . “Data Sheet DATTILO - CP 940 Ship.” Accessed February 4, 2022. <https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/Scheda-dati-Nave-DATTILO---CP-940.aspx>.

- . “DATTILO Class.” Accessed February 4, 2022.
<https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/Classe-DATTILO---940.aspx>.
- . “Guardia Costiera: Our History.” Accessed February 4, 2022.
<https://www.guardiacostiera.gov.it/en/Pages/organization-s-history.aspx>.
- . “Guardia Costiera: Our Missions.” Accessed February 4, 2022.
<https://www.guardiacostiera.gov.it/en/activities>.
- . “Guardia Costiera: Our People.” Accessed February 4, 2022.
<https://www.guardiacostiera.gov.it/en/Pages/staff.aspx>.
- . “Maritime Vessels.” Accessed February 4, 2022.
[https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-navali.aspx?CategoriaArchivio=Componente%20ricerca%20e%20soccorso%20in%20mare%20\(SAR\)&CategoriaArchivioID=12](https://www.guardiacostiera.gov.it/mezzi-e-tecnologie/Pages/mezzi-navali.aspx?CategoriaArchivio=Componente%20ricerca%20e%20soccorso%20in%20mare%20(SAR)&CategoriaArchivioID=12).
- . “Protection of The Marine and Coastal Environment.” Accessed February 4, 2022. <https://www.guardiacostiera.gov.it/en/Pages/protection-of-the-marine-and-coastal-environment.aspx>.
- . “Search and Rescue.” Accessed February 4, 2022.
<https://www.guardiacostiera.gov.it/en/Pages/search-and-rescue.aspx>.
- Haidar, Suhasini. “Indian Project in Mauritius Faces Protests.” *The Hindu*, October 28, 2018, sec. National. <https://www.thehindu.com/news/national/indian-project-in-mauritius-faces-protests/article25348528.ece>.
- Haines, Steven. “War at Sea: Nineteenth-Century Laws for Twenty-First Century Wars?” *International Review of the Red Cross* 98, no. 2 (August 2016): 419–47.
- Head, Elan. “Saving Lives in the Mediterranean.” *Vertical Mag*, June 6, 2017.
<https://verticalmag.com/features/saving-lives-mediterranean/>.
- Heads of Asian Coast Guard Agencies Meeting. “Heads of Asian Coast Guard Agencies Meeting (HACGAM).” Accessed March 23, 2022. <https://hacgam.org/about>.
- . “History: Heads of Asian Coast Guard Agencies Meeting.” Accessed April 1, 2022. <https://hacgam.org/about>.
- Heinegg, Wolff Heintschel von. “The Difficulties of Conflict Classification at Sea: Distinguishing Incidents at Sea from Hostilities.” *International Review of the Red Cross* 98, no. 902 (August 2016): 449–64. <https://doi.org/10.1017/S1816383117000327>.

- HeliHub. "Canadian Coast Guard Accepts Last of 15 Bell 429s," March 15, 2016. <https://helihub.com/2016/03/15/canadian-coast-guard-accepts-last-of-15-bell-429s/>.
- Hendrix, Jerry. "Sea Power Makes Great Powers." *Foreign Policy*, October 10, 2021. <https://foreignpolicy.com/2021/10/10/us-navy-sea-power-china-decline-military-strategy/>.
- Henry, Okoye. "Gov't Implementing Laws to Support Blue Economy." Jamaica Information Service, February 18, 2019. <https://jis.gov.jm/govt-implementing-laws-to-support-blue-economy/>.
- Her Majesty's Coastguard. "Coastguard Rescue Teams." Government of the United Kingdom, April 17, 2019. https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/814500/A3_Map_of_Coastguard_Rescue_Teams_Locations_v17042019.pdf.
- Her Majesty's Inspectorate of Constabulary and Fire & Rescue Services. "Joint Emergency Services Interoperability Principles." HMICFRS, May 18, 2018. <https://www.justiceinspectors.gov.uk/hmicfrs/our-work/article/joint-emergency-services-interoperability-principles/>.
- Herman, Herb. "The 15th Anniversary of the U.S. Coast Guard Auxiliary in Port Jefferson." TBR News Media, December 9, 2018. <https://tbrnewsmedia.com/the-15th-anniversary-of-the-u-s-coast-guard-auxiliary-in-port-jefferson/>.
- High Commission of India in Maldives. "Press Release: Joint 'DOSTI' Exercise by Indian Coastguard with Maldives and Sri Lanka," October 27, 2014. <https://hci.gov.in/male/?3628?004>.
- Historic UK. "The Royal Navy - Size and Strength Over Time in Visuals." *Historic UK* (blog). July 20, 2017. <https://www.historic-uk.com/Blog/British-Navy-Size-Over-Time/>.
- Holness, Andrew. "2017/2018 Budget Presentation: PM Andrew Holness." Presentation to Parliament of Jamaica presented at the Budget Presentation to Parliament, 2017. https://cabinet.gov.jm/wp-content/uploads/2017/09/Plan-Secure-Jamaica-PM-Presentation-2017_V2.pdf.
- Honings, Diana. "How the Coast Guard Earned Its Orange and Blue Stripes." gCaptain, April 20, 2017. <https://gcaptain.com/coast-guard-earned-iconic-orange-blue-stripe/>.
- Huebert, Rob. "Climate Change and Canadian Sovereignty in the Northwest Passage." *The Calgary Papers in Military and Strategic Studies*, no. 4 (2011). <https://journalhosting.ucalgary.ca/index.php/cpmss/article/view/36337>.

- Hydrographic and Oceanographic Department: Japan Coast Guard. “Exploring the Sea,” January 2017. https://www1.kaiho.mlit.go.jp/eng/brochure_Jan2017_E.pdf.
- Icelandic Arctic Cooperation Network. “Icelandic Chairmanship at the Arctic Council.” Accessed March 27, 2022. <https://arcticiceland.is/en/arctic-council/icelandic-chairmanship-at-the-arctic-council>.
- . “Icelandic Coast Guard.” Accessed March 27, 2022. <https://arcticiceland.is/en/icelandic-coast-guard>.
- Icelandic Coast Guard. “Aircraft: TF-GNA.” Accessed March 27, 2022. <https://www.lhg.is/um-okkur/taekjakostur/loftfor/nr/970>.
- . “Aircraft: TF-SIF.” Accessed March 27, 2022. <https://www.lhg.is/um-okkur/taekjakostur/loftfor/nr/969>.
- . “Fishermen’s Day 2020.” Accessed April 3, 2022. <https://www.lhg.is/frettir-og-fjolmidlar/frettasafn/frettayfirlit/sjomannadagurinn-2020>.
- . “Freyja.” Accessed March 27, 2022. <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/65>.
- . “History of Defense.” Accessed March 25, 2022. <https://www.lhg.is/um-okkur/sagan/nr/2134>.
- . “The Icelandic Coast Guard: ‘Always Prepared.’” Accessed March 23, 2022. https://www.lhg.is/media/LHG80/Landhelgisgasla_Islands_enska2_.pdf.
- . “The Icelandic Coastguard Vessel (THOR).” Accessed March 24, 2022. https://www.lhg.is/media/skip/thor/VSTHOR_FOLDER_ENS.pdf.
- . “Ships and Boats: Bull.” Accessed March 24, 2022. <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/79>.
- . “Thor (Þór).” Accessed March 27, 2022. <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/1125>.
- . “Týr (Bull).” Accessed March 27, 2022. <https://www.lhg.is/um-okkur/taekjakostur/skip-og-batar/nr/79>.
- Indian Defense Research Wing. “India Hands Over a New Passenger Variant of DO 228 to Mauritius,” April 8, 2022. <https://idrw.org/india-hands-over-a-new-passenger-variant-of-do-228-to-mauritius/>.
- Indian Navy. *Indian Maritime Doctrine*. Sivakasi: Integrated Headquarters, Ministry of Defence; Standard Press, 2015.

- . “Role of Navy.” Accessed April 10, 2022. <https://indiannavy.nic.in/content/role-navy>.
- Informazioni Marittime. “Guardia Costiera, Online Numero Doppio Del Notiziario.” [Coast Guard, Online Double Issue of the Newsletter] Accessed April 1, 2022. <https://www.informazionimarittime.com/post/guardia-costiera-online-numero-doppio-del-notiziario>.
- Ingimundarson, Valur. “Framing the National Interest: The Political Uses of the Arctic in Iceland’s Foreign and Domestic Policies.” *The Polar Journal* 5, no. 1 (January 2, 2015): 82–100. <https://doi.org/10.1080/2154896X.2015.1025492>.
- International Committee of the Red Cross. *The Geneva Convention relative to Protection of Civilian Persons in Time of War*. August 19, 1949. <https://www.refworld.org/docid/3ae6b36d2.html>.
- International Crisis Group. *Russia vs Georgia: The Fallout*. Report No. 195. Brussels: International Crisis Group, August 22, 2008. <https://www.crisisgroup.org/europe-central-asia/caucasus/georgia/russia-vs-georgia-fallout>.
- International Hydrography Organization. *Kenya: Capacity Building Assessment*. Monaco: IHO 2010. <https://iho.int/uploads/user/Capacity%20Building/Reports%20Assessments/2010/5-Report%20KenyaCM.pdf>.
- International Institute for Law of the Sea Studies. “1936 Convention Regarding the Regime of the Straits,” July 20, 1936. <http://iilss.net/wp-content/uploads/2021/08/1936-Convention-Regarding-the-Regime-of-the-Straits-Montreux-iilss-2.pdf>.
- . “Navigational Regimes of Particular Straits, Bosphorus and Dardanelles Case Study,” April 24, 2021. <http://iilss.net/tag/sea-of-marmara/>.
- International Maritime Organization. “Djibouti Code of Conduct.” Maritime Safety Division, 2015. <https://www.marseccoe.org/wp-content/uploads/2021/08/IMO-Newsletter-about-Djibuti-CoC.pdf>.
- INTERPOL. “The Maritime Security Programme.” Accessed February 6, 2022. <https://www.interpol.int/en/Crimes/Maritime-crime/The-Maritime-Security-Programme>.
- Işık, Yörük. “A Storm Brews Over the Black Sea: Turkey’s Contradictory Maritime Policy.” Middle East Institute, October 29, 2021. <https://www.mei.edu/publications/storm-brews-over-black-sea-turkeys-contradictory-maritime-policy>.
- Ívarsson, Halldór B. “Implementation of Territorial Waters and Jurisdiction.” The Icelandic Coast Guard. Accessed March 27, 2022. <https://www.lhg.is/um-okkur/sagan/nr/80>.

- Jacobs, Andrew, and Jane Perlez. "U.S. Wary of Its New Neighbor in Djibouti: A Chinese Naval Base." *The New York Times*, February 25, 2017, sec. World. <https://www.nytimes.com/2017/02/25/world/africa/us-djibouti-chinese-naval-base.html>.
- Jakobson, Linda. *China's Unpredictable Maritime Security Actors*. Sydney, Australia: Lowy Institute for International Policy, 2014. https://www.lowyinstitute.org/sites/default/files/chinas-unpredictable-maritime-security-actors_3.pdf.
- Jamaica Defense Force. "1st DIST JDF Coast Guard." Accessed March 21, 2022. <https://www.jdfweb.com/1st-dist-jdf-coast-guard/>.
- . "Coast Guard Bases." Accessed March 21, 2022. <https://www.jdfweb.com/coast-guard-bases/>.
- . "Coast Guard Duties." Accessed March 21, 2022. <https://www.jdfweb.com/coast-guard-duties/>.
- . "Coast Guard Gallery." Accessed March 22, 2022. <https://www.jdfweb.com/coast-guard-gallery/>.
- . "Maritime, Air and Cyber Command." Accessed March 21, 2022. <https://www.jdfweb.com/maritime-air-and-cyber-command/>.
- Jamaica Parliament. "Cabinet Ministers." Accessed April 27, 2022. http://www.japarlament.gov.jm/attachments/791_CABINET%20MINISTERS.pdf.
- Japan Coast Guard. "Aircraft," April 1, 2020. <https://www.kaiho.mlit.go.jp/e/organization/aircraft.html>.
- . "Coast Guard Global Summit 2nd Working Level Meeting to Be Held from 16 to 18 November," November 9, 2021. https://www.kaiho.mlit.go.jp/e/topics_archive/article3577.html.
- . "Japan Coast Guard Ship," April 1, 2020. <https://www.kaiho.mlit.go.jp/soubi-yosan/sentei/ship.html>.
- . "Organization: Japan Coast Guard." Accessed March 29, 2022. <https://www.kaiho.mlit.go.jp/e/organization/>.
- . "Patrol Vessels and Craft," April 1, 2020. https://www.kaiho.mlit.go.jp/e/organization/vessels_craft.html.
- . "Uniforms." Accessed April 1, 2022. <https://www.kaiho.mlit.go.jp/soubi-yosan/uniform/seifuku.html>.

- Japan Coast Guard Academy. “News and Topics: Japan Coast Guard Academy.” Accessed April 1, 2022. <https://www.jcga.ac.jp/english/index.html>.
- Japan International Cooperation Agency. *Data Collection Survey on Blue Economy in the Republic of Kenya: Final Report*. Tokyo, Japan: Japan International Cooperation Agency, 2018. <https://openjicareport.jica.go.jp/pdf/12320339.pdf>.
- Japan Ministry of Defense. “The Coast Guard Law of the People’s Republic of China.” Accessed July 30, 2021. <https://www.mod.go.jp/en/>.
- Jarrett, Basil. “New Jamaica Defence Force Unit Seizes 1 Ton of Cocaine.” *Diálogo Americas: Digital Military Magazine*, January 11, 2022. <https://dialogo-americas.com/articles/new-jamaica-defence-force-unit-seizes-1-ton-of-cocaine/>.
- JetPhotos. “China Coast Guard Aviation Photos.” Accessed April 1, 2022. <https://www.jetphotos.com/>.
- Kadir, Rizal Abdul. “Convention on the Legal Status of the Caspian Sea.” *International Legal Materials* 58, no. 2 (April 1919): 399–413. <http://dx.doi.org/10.1017/ilm.2019.5>.
- Kadota, Ryusho. “U.S.-Imposed Article 9 of the Constitution Threatens the Lives of Japanese People.” *Japan Forward*, May 18, 2021. <https://japan-forward.com/u-s-imposed-article-9-of-the-constitution-threatens-the-lives-of-japanese-people/>.
- Kaplan, Robert D. “The South China Sea Is the Future of Conflict.” *Foreign Policy*, August 15, 2011. <https://foreignpolicy.com/2011/08/15/the-south-china-sea-is-the-future-of-conflict/>.
- Kapoor, Ritika V. “Sea Wall in the Maldives and Its Sustainability.” National Maritime Foundation, September 4, 2020. <https://maritimeindia.org/sea-wall-in-the-maldives-and-its-sustainability/>.
- Kent Online. “Coastguards Back Where They Belong,” August 17, 2008. <https://www.kentonline.co.uk/kent/news/coastguards-back-where-they-belo-a42560/>.
- Kenya Coast Guard Service. “Home.” Accessed February 6, 2022. <https://kcgs.go.ke/>.
- . “President Launches Kenya Coast Guard Service,” 2019. <https://kcgs.go.ke/president-launches-kenya-coast-guard-service/>.
- Kenya Marine and Fisheries Research Institute. “About Us - Kenya Marine and Fisheries Research Institute.” Accessed February 5, 2022. <https://www.kmfri.co.ke/index.php/contact-us/images/6-ps-visit-to-kisumu-centre/detail/19-dsc05745?tmpl=component>.

- Keupp, Marcus Matthias, ed. *The Northern Sea Route: A Comprehensive Analysis*. 1st ed. Wiesbaden: Springer Gabler, 2015. <https://doi.org/10.1007/978-3-658-04081-9>.
- Kim, Suk Kyoan. *Coast Guards and International Maritime Law Enforcement*. UK: Cambridge Scholars Publishing, 2020.
- . “The Expansion of and Changes to the National Coast Guards in East Asia.” *Ocean Development & International Law* 49, no. 4 (October 2, 2018): 313–34.
- Kobobel, Edward L. “Wasp Conducts Anti-Terrorism Force Protection Information Exchange with Jamaican Defense Forces Coast Guard.” DVIDS, November 19, 2009. <https://www.dvidshub.net/news/41977/wasp-conducts-anti-terrorism-force-protection-information-exchange-with-jamaican-defense-forces-coast-guard>.
- Kramer, Andrew E. “Armenia and Azerbaijan: What Sparked War and Will Peace Prevail?” *The New York Times*, January 29, 2021, sec. World. <https://www.nytimes.com/article/armenian-azerbaijan-conflict.html>.
- Krasnoff, Phillip. “Marine: Volunteer Marine Rescue (VMR).” South Australian State Emergency Service. Accessed February 20, 2022. <http://www.ses.sa.gov.au/marine.jsp>.
- Kumar, Anand. “India-Maldives Relations: Is the Rough Patch Over?” *Indian Foreign Affairs Journal* 11, no. 2 (2016): 153–67. <http://www.jstor.org/stable/45341094>.
- Kuwahara, Sueo. “The Development of Small Islands in Japan: An Historical Perspective.” *Journal of Marine and Island Cultures* 1, no. 1 (June 1, 2012): 38–45. <https://doi.org/10.1016/j.imic.2012.04.004>.
- Lakshmi, Shailaja A. “Coast Guard Training in Kenya.” MarineLink, June 26, 2019. <https://www.marinelink.com/news/coast-guard-training-kenya-467778>.
- Lansing, Shawn. “A White Hull Approach to Taming the Dragon: Using the Coast Guard to Counter China.” War on the Rocks, February 22, 2018. <https://warontherocks.com/2018/02/white-hull-approach-taming-dragon-using-coast-guard-counter-china/>.
- Layton, Josh. “80 Migrants Saved from Channel in UK’s Biggest Rescue for Three Years.” Metro, November 19, 2021. <https://metro.co.uk/2021/11/19/80-migrants-saved-from-channel-in-uks-biggest-rescue-for-three-years-15632983/>.
- Le Mière, Christian. *Maritime Diplomacy in the 21st Century*. Cass Series: Naval Policy and History. Abingdon, UK: Routledge, 2014.

- Legislative Herald of Georgia. “Sub-Department of the Ministry of Internal Affairs of Georgia - On Approval of Uniforms and Attributes of Military Servicemen of the State Border Guard Department,” February 12, 2010. <https://matsne.gov.ge/ka/document/view/106906>.
- Lewis, Dyani. “How Mauritius Is Cleaning Up after Major Oil Spill in Biodiversity Hotspot.” *Nature* 585, no. 7824 (August 27, 2020): 172–172. <https://doi.org/10.1038/d41586-020-02446-7>.
- Lindberg, Michael, and Daniel Todd. *Brown-, Green- and Blue-Water Fleets: The Influence of Geography on Naval Warfare, 1861 to the Present*. Westport, Connecticut: Praeger Greenwood, 2002.
- Linton, Latonya. “Gov’t Committed to Plan Secure Jamaica – Dr. Chang.” Jamaica Information Service, February 4, 2021. <https://jis.gov.jm/govt-committed-to-plan-secure-jamaica-dr-chang/>.
- Lundquist, Edward. “Exercise Sea Breeze 2021 Comes to a Close in Black Sea.” *Seapower*, July 13, 2021. <https://seapowermagazine.org/exercise-sea-breeze-2021-comes-to-a-close-in-black-sea/>.
- . “White, Black or Red, Coast Guard Needs New Hulls.” *Professional Mariner*, March 1, 2021. <https://professionalmariner.com/white-black-or-red-coast-guard-needs-new-hulls/>.
- Lunquist, Edward H. “North Atlantic Coast Guard Forum.” Defense Media Network, January 23, 2019. <https://www.defensemmedianetwork.com/stories/north-atlantic-coast-guard-forum/>.
- Mainardi, Benjamin. “Yes, China Has the World’s Largest Navy. That Matters Less Than You Might Think.” *The Diplomat*, April 7, 2021. <https://thediplomat.com/2021/04/yes-china-has-the-worlds-largest-navy-that-matters-less-than-you-might-think/>.
- Malcolm, James A., and Lingnaden Murday. “Small Islands’ Understanding of Maritime Security: The Cases of Mauritius and Seychelles.” *Journal of the Indian Ocean Region* 13, no. 2 (May 4, 2017): 234–56. <https://doi.org/10.1080/19480881.2017.1328018>.
- Maldives Financial Review. “The Uthuru Thilafalhu Fiasco,” October 28, 2021. <https://mfr.mv/governance/the-uthuru-thilafalhu-fiasco>.
- Maldives National Defense Force. “Coast Guard - Introduction and Mission.” Accessed March 22, 2022. <https://mndf.gov.mv/mndf/en/coastguard.php>.
- . “Organization - MNDF.” Accessed March 22, 2022. <https://mndf.gov.mv/mndf/en/organization.php>.

- . “Rank Insignia: MNDF.” Accessed March 23, 2022. <https://mndf.gov.mv/mndf/en/rank-structure.php>.
- . “Training the Force: MNDF.” Accessed March 23, 2022. <https://mndf.gov.mv/mndf/en/training.php>.
- . “Uniforms: MNDF.” Accessed March 23, 2022. <https://mndf.gov.mv/mndf/en/uniforms.php>.
- Malta Movements - Transportation. “Law Enforcement – Guardia Di Finanza Fire 400 Shots after Tunisian Fishing Trawler Ram the Patrol Craft – 29.09.2020,” October 6, 2020. <https://maltashipnews.com/2020/10/06/law-enforcement-guardia-di-finanza-fire-400-shots-after-tunisian-fishing-trawler-ram-the-patrol-craft-29-09-2020/>.
- Marina Militare. “Coast Guard - Port Authorities.” Italian Ministry of Defense. Accessed February 4, 2022. <https://www.marina.difesa.it/EN/thefleet/coastguard/Pagine/default.aspx>.
- Marine Regions. “Australia: MRGID 8323.” Accessed April 2, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=8323&zone=eez>.
- . “Azerbaijan: MRGID 26524.” Accessed April 3, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=26524&zone=eez>.
- . “Canada: MRGID 8493.” Accessed April 2, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=8493&zone=eez>.
- . “China: MRGID 8486.” Accessed April 2, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=8486&zone=eez>.
- . “Georgia: MRGID 5678.” Accessed April 3, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=5678&zone=eez>.
- . “Iceland: MRGID 5680.” Accessed April 3, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=5680&zone=eez>.
- . “Italy: MRGID 5682.” Accessed April 2, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=5682&zone=eez>.
- . “Jamaica: MRGID 8459.” Accessed March 21, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=8459&zone=eez>.
- . “Japan: MRGID 8487.” Accessed April 3, 2022. <https://www.marineregions.org/eezdetails.php?mrgid=8487&zone=eez>.

- . “Kenya: MRGID 8349.” Accessed April 2, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=8349&zone=eez>.
- . “Maldives: MRGID 8345.” Accessed March 22, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=8345>.
- . “New Zealand: MRGID 8455.” Accessed April 10, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=8455&zone=eez>.
- . “Republic of Mauritius: MRGID 8343.” Accessed April 10, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=8343&zone=eez>.
- . “United Kingdom: MRGID 5696.” Accessed April 16, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=5696&zone=eez>.
- . “United States: MRGID 8456.” Accessed April 2, 2022.
<https://www.marineregions.org/eezdetails.php?mrgid=8456&zone=eez>.
- Marine Traffic. “Ship Nanny of the Maroons (Offshore Supply Ship),” March 22, 2022.
https://www.marinetraffic.com/en/ais/details/ships/shipid:6160965/mmsi:339122100/imo:9768344/vessel:NANNY_OF_THE_MAROONS.
- . “Ship UBALDO DICIOTTI (Patrol Vessel).” Accessed April 1, 2022.
https://www.marinetraffic.com/en/ais/details/ships/shipid:281868/mmsi:247330700/imo:9690420/vessel:UBALDO_DICIOTTI.
- Maritime and Coastguard Agency. “About Us: Maritime and Coastguard Agency.” Government of the United Kingdom. Accessed April 16, 2022.
<https://www.gov.uk/government/organisations/maritime-and-coastguard-agency/about>.
- . “Director of HM Coastguard: Claire Hughes.” Government of the United Kingdom. Accessed April 14, 2022. <https://www.gov.uk/government/people/claire-hughes>.
- . “Keeping You Safe at the Coast for 200 Years: HM Coastguard Celebrates Landmark Birthday.” Government of the United Kingdom. January 15, 2022.
<https://www.gov.uk/government/news/keeping-you-safe-at-the-coast-for-200-years-hm-coastguard-celebrates-landmark-birthday>.
- . *Maritime & Coastguard Agency: Annual Report and Accounts 2020–2021*. London: Government of the United Kingdom, 2021.
https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/1034996/MCA_annual_report_and_accounts_2020_to_2021.pdf.

- . “Office Access and Opening Times: Maritime and Coastguard Agency.” Government of the United Kingdom. Accessed April 16, 2022. <https://www.gov.uk/government/organisations/maritime-and-coastguard-agency/about/access-and-opening>.
- . “To Search. To Rescue. To Save.” Government of the United Kingdom, May 10, 2016. <https://www.gov.uk/government/news/to-search-to-rescue-to-save--2>.
- . “UK Second-Generation Search and Rescue Aviation Programme (UKSAR2G).” Government of the United Kingdom, February 17, 2022. <https://www.gov.uk/government/collections/uk-second-generation-search-and-rescue-aviation-programme-uksar2g>.
- . “UKSAR2G Industry Day Presentation.” Updated December 5, 2020. Video, 1:03:56. <https://www.youtube.com/watch?v=KkCk-CaMJnk>.
- Maritime Transport Agency of Georgia. “Functions and Structure.” Accessed March 20, 2022. https://mta.gov.ge/index.php?m=149&parent_id=135.
- . “Maritime Transport Agency of Georgia - Response to Oil Spill.” Accessed March 20, 2022. https://mta.gov.ge/index.php?m=152&parent_id=150.
- Martinson, Ryan D. “China’s Second Navy.” *Proceedings: U.S. Naval Institute*, April 26, 2015. <https://www.usni.org/magazines/proceedings/2015/april/chinas-second-navy>.
- Mauritius Police Force. “34th Anniversary of the National Coast Guard.” Accessed April 10, 2022. https://police.govmu.org/police/?page_id=6983.
- . “About – Mauritius Police Force.” Accessed April 8, 2022. https://police.govmu.org/police/?page_id=96.
- . *Annual Report 2020 – 2021 – Mauritius Police Force*. Port Louis: Police Research and Development Unit, November 2021. <https://police.govmu.org/police/?mdocs-posts=annual-report-2020-2021&mdocs-cat=>.
- . “National Coast Guard.” Accessed April 7, 2022. https://police.govmu.org/police/?page_id=4922.
- . “National Coast Guard: Annual Operational Plan 2021.” Accessed April 8, 2022. <https://police.govmu.org/police/?mdocs-file=6180>.
- McGill School of Computer Science. “Great Lakes.” Accessed February 2, 2022. https://www.cs.mcgill.ca/~rwest/wikispeedia/wpcd/wp/g/Great_Lakes.htm.

- McIntosh, Douglas. "JDF Acquires New Surveillance Aircraft." Jamaica Information Service, November 16, 2018. <https://jis.gov.jm/jdf-acquires-new-surveillance-aircraft/>.
- McKelvey, Bill. *Organizational Systematics: Taxonomy, Evolution, Classification*. Berkeley: University of California Press, 1982.
- McKenzie, Steven. "Coastguard Plans to Add Drones to Air Fleet." *BBC News*, May 28, 2020, sec. Highlands & Islands. <https://www.bbc.com/news/uk-scotland-highlands-islands-52821363>.
- McLaughlin, Rob. "Authorizations for Maritime Law Enforcement Operations." *International Review of the Red Cross*, War and Security at Sea, 98, no. 2 (2016): 465–90.
- McSaveney, Eileen. "Nearshore Islands." Te Ara: The Encyclopedia of New Zealand. Ministry for Culture and Heritage Te Manatu Taonga, September 24, 2007. <https://teara.govt.nz/en/nearshore-islands>.
- Mehdiyev, Mushvig. "Azerbaijan's State Border Service Celebrates 100 Years, Demonstrates Cutting-Edge Patrol Vessel." *Caspian News*, August 15, 2019. <https://caspiannews.com/news-detail/azerbaijans-state-border-service-celebrates-100-years-demonstrates-cutting-edge-patrol-vessel-2019-8-16-32/>.
- Meier, Allison C. "Colonialism Created Navy Blue." JSTOR Daily, May 25, 2019. <https://daily.jstor.org/colonialism-created-navy-blue/>.
- Meighen, Michael. "Canada's Coast Guard Should Be Guardians of Canada's Arctic Sovereignty." *The Hill Times*, no. 859 (October 16, 2006): 25. <https://www.proquest.com/docview/208545914/abstract/3D54A33B5F484790PQ/1>.
- MENA Report. "Mauritius: Workshop on Handling Somali Pirates, for Prison and Police Officers," January 9, 2013. <http://www.proquest.com/docview/1269022740/abstract/5452B85A85BC4D3BPQ/1>.
- Military Wiki. S.v. "Maldivian Coast Guard." Accessed March 22, 2022. https://military-history.fandom.com/wiki/Maldivian_Coast_Guard.
- Mills, Walker. "The Cod Wars and Today: Lessons from an Almost War." Center for International Maritime Security, July 28, 2020. <https://cimsec.org/the-cod-wars-and-today-lessons-from-an-almost-war/>.
- Ministry of Defense of the Republic of Azerbaijan. "Navy Forces." Accessed November 4, 2021. <https://mod.gov.az/en/navy-forces-755/>.

- Ministry of Emergency Situations. “Caspian Basin Accident Rescue Service.” Republic of Azerbaijan. Accessed November 4, 2021. <https://www.xhqx.fhn.gov.az/organizations.php?aze-13>.
- Ministry of External Affairs – Government of India. “NSA Level Meeting on Trilateral Maritime Security Cooperation Between India, Sri Lanka and Maldives,” March 6, 2014. <https://www.mea.gov.in/in-focus-article.htm?23037/NSA+level+meeting+on+trilateral+Maritime+Security+Cooperation+between+India+Sri+Lanka+and+Maldives>.
- Ministry of Foreign Affairs of Japan. “Diplomatic Bluebook 2019,” 2019. <https://www.mofa.go.jp/policy/other/bluebook/index.html>.
- . “Takeshima.” Accessed March 28, 2022. <https://www.mofa.go.jp/region/asia-paci/takeshima/index.html>.
- . “The Government of Japan Provides Equipment Worth USD 2.8 Million to Strengthen Marine Pollution Response in the Maldives,” August 17, 2020. https://www.mv.emb-japan.go.jp/itpr_ja/11_000001_00088.html.
- . “The Numbers of China Coast Guard and Other Vessels That Entered Japan’s Contiguous Zone or Intruded into Territorial Sea Surrounding the Senkaku Islands,” 2022. <https://www.mofa.go.jp/files/000465486.pdf>.
- . “Trends in China Coast Guard and Other Vessels in the Waters Surrounding the Senkaku Islands, and Japan’s Response,” January 18, 2022. https://www.mofa.go.jp/region/page23e_000021.html.
- Ministry of Internal Affairs of Georgia. “Border Police: Coast Guard.” 2013. <https://police.ge/en/ministry/structure-and-offices/border-police>.
- . “Coast Guard.” Accessed March 20, 2022. <https://police.ge/ge/ministry/structure-and-offices/saqartvelos-sasazghvro-politsia/sanapiro-datsva>.
- . “Strategy 2014: Ministry of Internal Affairs.” 2014. <https://police.ge/en/ministry/mission>.
- Ministry of Justice and Human Rights of Iceland. “Regulation on the Control of the Search and Rescue Region of Iceland for Maritime and Aeronautical Rescue,” October 7, 2010. https://www.lhg.is/media/leit_og_bjorgun/RESCUE_EN.pdf.
- Ministry of Land, Infrastructure, Transport and Tourism. “Japan Coast Guard.” Accessed March 28, 2022. https://www.kaiho.mlit.go.jp/e/pdf/R02_panfu_eng.pdf.
- Ministry of National Security. “Welcome to The Ministry of National Security.” Government of Jamaica. Accessed March 21, 2022. <https://mns.gov.jm/>.

- Ministry of Transport of Italy. "Decree 27 December 2006." Guardia Costiera. December 27, 2006. <https://www.guardiacostiera.gov.it/stampa/Documents/decreto27122006.pdf>.
- Mitchell, Bruce. "Politics, Fish, and International Resource Management: The British-Icelandic Cod War." *Geographical Review* 66, no. 2 (1976): 127–38. <https://doi.org/10.2307/213576>.
- Modern Diplomacy. "Maldives Ventures into the Blue Economy," July 18, 2019. <https://moderndiplomacy.eu/2019/07/18/maldives-ventures-into-the-blue-economy/>.
- Morris, Lyle. "China Welcomes Its Newest Armed Force: The Coast Guard." War on the Rocks, April 4, 2018. <https://warontherocks.com/2018/04/china-welcomes-its-newest-armed-force-the-coast-guard/>.
- Morris, Lyle J. "Gray Zone Challenges in the East and South China Sea." *Maritime Issues*, January 7, 2019.
- Mtisambebi. "The Border Police Has a New Head," February 9, 2018. <https://mtisambebi.ge/news/people/item/687-sasazgvro-polizias-axali-xelmwgvaneli-bybavs>.
- Mujuthaba, Ahmed. "China Coast Guard: On a Trajectory for Peace or Conflict?" Center for International Maritime Security, February 16, 2022. <https://cimsec.org/china-coast-guard-on-a-trajectory-for-peace-or-conflict/>.
- Mujuthaba, Ahmed, and David Brewster. "Maldives Embroiled in Mauritius-UK Tussle over Chagos." The Interpreter: Lowy Institute, December 8, 2021. <https://www.lowyinstitute.org/the-interpreter/maldives-embroiled-mauritius-uk-tussle-over-chagos>.
- Mundle, Tanesha. "PM Commissions HMJS Nanny of the Maroons into Service." Jamaica Information Service, July 30, 2020. <https://jis.gov.jm/pm-commissions-hmjs-nanny-of-the-maroons-into-service/>.
- Mwakio, Philip. "Kenyans to Establish Coast Guard after Law Passed." *The Standard*. Accessed February 6, 2022. <https://www.standardmedia.co.ke/coast/article/2001296454/kenyans-to-establish-coast-guard-after-law-passed>.
- . "Uhuru Unveils Kenya Coast Guard Service." *The Standard*, November 20, 2018. <https://www.standardmedia.co.ke/coast/article/2001303305/uhuru-unveils-kenya-coast-guard-service>.
- National People's Congress of China. "Coast Guard Law of the People's Republic of China." Xinhua News Agency, January 22, 2021. https://m.gmw.cn/2021-01/29/content_1302079361.htm.

- Natucate. "Maldives Country Information." Accessed March 22, 2022. <https://www.natucate.com/en/destinations/travel-guide-maldives>.
- Naval Technology. "Jamaica Buys Thales' Maritime Surveillance Technology to Boost Security," April 10, 2019. <https://www.naval-technology.com/news/jamaica-maritime-surveillance-technology/>.
- . "Legend Class National Security Cutter," March 5, 2021. <https://www.naval-technology.com/projects/legendclassnsc/>.
- Negril. "HMJS Nanny of the Maroons." Accessed April 3, 2022. <https://negril.com/forum/showthread.php/20752-HMJS-Nanny-of-the-Maroons>.
- Neil, Judy-Ann Icinda. "IUU Fishing: A Gateway to Transnational Crimes in Jamaica." World Maritime University, 2018. https://commons.wmu.se/cgi/viewcontent.cgi?article=1656&context=all_dissertations#:~:text=The%20research%20examined%20whether%20IUU,TOCs%20committed%20by%20maritime%20conveyance.
- New Zealand Search and Rescue. "Joint Service Level Agreement with Coastguard New Zealand for Search and Rescue Services," 2020. <https://nzsar.govt.nz/assets/Downloadable-Files/2020-23-SLA-Coastguard-NZ-FINAL-SIGNED.pdf>.
- . *New Zealand Search and Rescue Council: Annual Report 2020–2021*. Annual Report. New Zealand, 2021. <https://nzsar.govt.nz/assets/Downloadable-Files/NZSAR-AR-2021-For-Website-6.10.21.pdf>.
- . "Who We Are," January 7, 2021. <https://nzsar.govt.nz/about-us-2/about-us/>.
- News Americas Now. "Five Caribbean Nations Named Major Illicit Drug Transit Countries," March 21, 2017. <https://www.newsamericasnow.com/five-caribbean-nations-named-major-illicit-drug-transit-countries/>.
- News.az. "Azerbaijan's Border Guard Ship Set Afloat in Caspian Sea," January 24, 2019. <https://www.news.az/news/azerbaijans-border-guard-ship-set-afloat-in-caspian-sea>.
- . "Azerbaijan's Helicopter, Two Ships Involved in Search for Iranian Sailor Missing in Caspian Sea," February 26, 2018. <https://www.news.az/news/azerbaijans-helicopter-two-ships-involved-in-search-for-iranian-sailor-missing-in-caspian-sea>.
- . "Azerbaijan's State Border Service Conducts Tactical Exercises in Caspian Sea," September 16, 2021. <https://www.news.az/news/azerbaijans-state-border-service-conducts-tactical-exercises-in-caspian-sea-photo>.

- Ng, Jr. "Coast Guard with Muscles." *Asian Military Review* (blog), September 9, 2019. <https://www.asianmilitaryreview.com/2019/09/coast-guard-with-muscles/>.
- North Atlantic Treaty Organization. "Iceland and NATO - 1949." Accessed March 24, 2022. http://www.nato.int/cps/en/natohq/declassified_162083.htm.
- NTV Kenya. "President Uhuru's Speech as He Commissions the Kenya Coast Guard Service." November 19, 2018. Video, 19:54. <https://www.youtube.com/watch?v=FhuEmzsyCfs>.
- Nyongesa Sande. "Kenya Coast Guard Service," May 16, 2021. <https://www.nyongesasande.com/kenya-coast-guard-service/>.
- Obura, David O. *Reviving the Western Indian Ocean Economy: Actions for a Sustainable Future*. Gland, Switzerland: World Wildlife Fund, 2017.
- Odom, Jonathan G. "The United States." In *Grey and White Hulls*, edited by Ian Bowers and Swee Lean Collin Koh, 203–22. Singapore: Springer Singapore, 2019. https://doi.org/10.1007/978-981-13-9242-9_11.
- Office of the Auditor-General New Zealand. *Effectiveness of Arrangements for Co-Ordinating Civilian Maritime Patrols*. Wellington: Government of New Zealand, 2010. <https://oag.parliament.nz/2010/maritime-patrols/docs/maritime-patrols.pdf>.
- . "Effectiveness of Arrangements for Co-Ordinating Civilian Maritime Patrols," 2014. <https://oag.parliament.nz/2014/maritime-patrols>.
- Office of the President of Kenya. "Blue Economy Key to the Attainment of Kenya's Vision 2030, President Kenyatta Says," December 3, 2020. <https://www.president.go.ke/2020/12/03/blue-economy-key-to-the-attainment-of-kenyas-vision-2030-president-kenyatta-says/>.
- Omoro, James. "New Station to Improve Security in Lake Victoria." *The Standard*, December 24, 2021. <https://www.standardmedia.co.ke/nyanza/article/2001432643/new-station-to-improve-security-in-lake-victoria>.
- One Online. "Discussion Held to Create a Hydrographic Unit in Maldives," September 27, 2019. <https://oneonline.mv/en/15990>.
- Ordu. "SBS Storms Are Stronger Than Typhoons," June 11, 2020. <https://ordu.az/az/news/162490/dsx-nin-tufanlari-typhoon-larla-daha-gucludur-herbi-ekspert-arasdirma>.
- O'Rourke, Ronald. *Coast Guard Polar Icebreaker Modernization: Background, Issues, and Options for Congress*. CRS Report No. RL34391. Washington, D.C.: Congressional Research Service, 2009. <https://apps.dtic.mil/sti/pdfs/ADA513331.pdf>.

- Osiro, Deborah. "Somali Pirates Have Rights Too." *Institute for Security Studies*, no. 224 (July 2011): 28. <https://www.files.ethz.ch/isn/136726/PAPER224.pdf>.
- Osmanagic, Ameera. "Dornier Flight Gifted by India Arrives in Maldives." *The Times of Addu*, September 29, 2020. <https://timesofaddu.com/2020/09/29/dornier-flight-gifted-by-india-arrives-in-maldives/>.
- Otieno, Bonface. "Kenya, Canada to Undertake Fish Projects in Coast." *Business Daily*, December 19, 2020. <https://www.businessdailyafrica.com/bd/corporate/shipping-logistics/kenya-canada-to-undertake-fish-projects-in-coast-2260946>.
- Padmaja, G. "India and Mauritius: Cooperating to Ensure Collective Maritime Security." *National Maritime Foundation*, August 21, 2021, 8.
- Pajon, Céline. "Japan's Coast Guard and Maritime Self-Defense Force in the East China Sea: Can a Black-and-White System Adapt to a Gray-Zone Reality?" *Asia Policy*, no. 23 (2017): 111–30. <http://www.jstor.org/stable/24905153>.
- Pakistan Defence. "Kenyan Coast Guard Service (KCGS) Commissions Bangladesh Made Ship," December 10, 2018. <https://defence.pk/pdf/threads/kenyan-coast-guard-service-kcgs-commissions-bangladesh-made-ship.591113/>.
- Pakistan Maritime Security Agency. "Pakistan Maritime Security Agency." Accessed September 7, 2021. <http://pmsa.gov.pk/>.
- Paleri, Prabhakaran. "Coast Guards of the World and Emerging Maritime Threats." *Ocean Policy Research Foundation*, 2009. https://www.spf.org/_opri_media/publication/pdf/200903_ISSN1880-0017.pdf.
- Parliament of Australia. "ParlInfo - An Australian Coastguard.," 2002. <https://parlinfo.aph.gov.au/parlInfo/search/display/display.w3p;query=Id:%22media/pressrel/EWZ76%22>.
- Parliament of Georgia. Constitution of Georgia, 1995. https://adsdatabase.ohchr.org/IssueLibrary/GEORGIA_Constitution.pdf.
- Parsons, Dan. "South China Sea Dispute Shaping Up as Coast Guard Showdown." *National Defense*, June 2, 2014. <https://www.nationaldefensemagazine.org/articles/2014/6/1/2014june-south-china-sea-dispute-shaping-up-as-coast-guard-showdown>.
- PeakVisor. "Autonomous Republic of Abkhazia Mountains." Accessed March 18, 2022. <https://peakvisor.com/adm/autonomous-republic-of-abkhazia.html>.
- Pekkanen, Robert, and Saadia M. Pekkanen, eds. *The Oxford Handbook of Japanese Politics*. New York: Oxford University Press, 2021.

- Pessa, Gaitano. "Coast Guard Joins Fight against Illegal Fishing in Lake Victoria," January 15, 2020. <https://newszetu.com/coast-guard-joins-fight-against-illegal-fishing-in-lake-victoria/>.
- Pessa, Gaitano, and Ian Byron. "Kenya: Coast Guard Service Deployed on Lake Victoria." *The Nation*. December 18, 2019, sec. News. <https://allafrica.com/stories/201912180845.html>.
- Pic, Pauline, Julie Babin, Frédéric Lasserre, Linyan Huang, and Kristin Bartenstein. "The Polar Code and Canada's Regulations on Arctic Navigation: Shipping Companies' Perceptions of the New Legal Environment." *The Polar Journal*, March 16, 2021. <https://doi.org/10.1080/2154896X.2021.1889838>.
- Pijnenburg, Annick. "From Italian Pushbacks to Libyan Pullbacks: Is Hirsi 2.0 in the Making in Strasbourg?" *European Journal of Migration and Law* 20, no. 4 (November 29, 2018): 396–426. <https://doi.org/10.1163/15718166-12340036>.
- Poling, Gregory, Harrison Pretat, and Tabitha G. Mallory. *Pulling Back the Curtain on China's Maritime Militia*. Washington, D.C.: Center for Strategic and International Studies, 2021. <https://www.csis.org/analysis/pulling-back-curtain-chinas-maritime-militia>.
- Protector Boats. "Coastguard Great Barrier First Unit to Receive New 4UNZ Vessel," November 11, 2021. <http://www.protectorboats.com/logbook/2021/november/coastguard-great-barrier-first-unit-to-receive-new-4unz-vessel/>.
- PSM News. "MNDF Coast Guard Begins Hydrographic Survey of the Maldives." Public Service Media, January 31, 2021. <https://psmnews.mv/en/81389>.
- QinetIQ. *UK Search and Rescue Helicopters: Post-Implementation Review*. Capping Report No. 19/00408. Hampshire, UK: March 2019. https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/820125/S_39_-_ANNEX_B_UK_SARH_PIR_FINAL.pdf.
- Raajje. "Launch, Sea Ambulance Collide Near Ithaafushi Resort," January 5, 2021. <https://raajje.mv/93200>.
- Radio Free Europe Radio Liberty. "Tensions Rise Over Georgia's Sea Blockade of Abkhazia," September 2, 2009. https://www.rferl.org/a/Tensions_Rise_Over_Georgias_Sea_Blockade_Of_Abkhazia/1813300.html.
- Raghoo, Pravesh. *Precautionary Policy? The Wakashio Oil Spill in Mauritius: A Hard Lesson About Coastal and Marine Management*. SSRN Scholarly Paper 387088. Rochester, New York: Social Science Research Network, 2021. <https://papers.ssrn.com/abstract=3870818>.

- Ratnapala, Rusri, Fiona Ferrari, and David Lim. "The Beazley Vision." *The Sydney Morning Herald*, September 6, 2001, sec. National. <https://www.smh.com.au/national/the-beazley-vision-20010906-gdhuyh.html>.
- Reilly, Patrick. "Coast Guard Seizes \$1.4B in Illegal Cocaine, Marijuana on Way to US." *New York Post*, August 5, 2021. <https://nypost.com/2021/08/05/us-coast-guard-seizes-1-4b-in-illegal-cocaine-marijuana/>.
- Republic of Italy. "Ministry of the Merchant Navy: Decree 8 June 1989 - Constitution of the 'Coast Guard'. (GU General Series n. 146 of 24-06-1989)." *Official Gazette*. Accessed February 4, 2022. https://www.gazzettaufficiale.it/atto/serie_generale/caricaDettaglioAtto/originario?atto.dataPubblicazioneGazzetta=1989-06-24&atto.codiceRedazionale=089A2774.
- Republic of Mauritius. "Coastal Surveillance Radar System Implemented Across Eight NCG Stations," August 18, 2020. <http://www.govmu.org/English/News/Pages/Coastal-Surveillance-Radar-System-implemented-across-eight-NCG-Stations.aspx>.
- Reuters. "France Offers Aid as Mauritius Declares Emergency over Oil Spill from Stranded Vessel," August 8, 2020, sec. Energy. <https://www.reuters.com/article/mauritius-environment-idUSL8N2FA0C1>.
- Revi, Vinitha. "India's Approach Towards Seychelles in the Indian Ocean Region." ORF, April 26, 2021. <https://www.orfonline.org/expert-speak/indias-approach-towards-seychelles-in-the-indian-ocean-region/>.
- Reynolds, Isabel. "How Ukraine War Fuels Japan's Island Feud with Russia." *Bloomberg*, March 3, 2022. <https://www.bloomberg.com/news/articles/2022-03-03/how-ukraine-war-fuels-japan-s-island-feud-with-russia-quicktake>.
- Rich, Philip. "The Organizational Taxonomy: Definition and Design." *Academy of Management Review* 17, no. 4 (October 1992): 758–81. <https://doi.org/10.5465/AMR.1992.4279068>.
- Robbins, Seth. "Jamaica and Haiti Swap Drugs and Guns." *InSight Crime*, June 23, 2020. <https://insightcrime.org/news/analysis/jamaica-haiti-drugs-guns/>.
- Robbins, Stephen P., and Timothy A. Judge. *Essentials of Organizational Behavior*. 14th Ed. Uttar Pradesh: India: Pearson Education Limited, 2019.
- Royal Aeronautical Society. "King Airs to the Rescue." Accessed April 17, 2022. <https://www.aerosociety.com/news/king-air-to-the-rescue/>.
- Royal Navy. "History." Accessed April 16, 2022. <https://www.royalnavy.mod.uk/news-and-latest-activity/features/history-timeline>.

- Royal New Zealand Coastguard Incorporated. "Consolidated Financial Statements 2021: For the Year Ended 30 June 2021," December 22, 2021. <https://www.coastguard.nz/media/419215/cnz-consolidated-financial-statements-2021-v3.pdf>.
- Ryall, Julian. "A North Korean Spy Ship in Yokohama: The Japan Coast Guard Museum." Nippon.com, January 19, 2018. <https://www.nippon.com/en/features/c04503/>.
- SAFETY4SEA. "Jamaica Focuses on the Importance of Blue Economy," March 17, 2019. <https://safety4sea.com/jamaica-focuses-on-the-importance-of-blue-economy/>.
- Samuels, Richard J. "'New Fighting Power!' Japan's Growing Maritime Capabilities and East Asian Security." *International Security* 32, no. 3 (January 2008): 84–112. <https://doi.org/10.1162/isec.2008.32.3.84>.
- Sanei, Faraz. "The Caspian Sea Legal Regime, Pipeline Diplomacy, and the Prospects for Iran's Isolation from the Oil and Gas Frenzy." *Vanderbilt Journal of Transnational Law* 34, no. 3 (January 1, 2001): 681. <https://scholarship.law.vanderbilt.edu/vjtl/vol34/iss3/5>.
- The Sasakawa Peace Foundation. "Why a Constitutional Amendment Would Be a Good Idea : An Interview with Former GSDF Lieutenant General Noboru Yamaguchi." International Information Network Analysis, February 2019. https://www.spf.org/iina/en/articles/yamaguchi_01.html.
- Sciolino, Elaine. "The World; It's a Sea! It's a Lake! No. It's a Pool of Oil." *The New York Times*, June 21, 1998, sec. Week in Review. <https://www.nytimes.com/1998/06/21/weekinreview/the-world-it-s-a-sea-it-s-a-lake-no-it-s-a-pool-of-oil.html>.
- Scott, Geraldine. "Archbishop Has Misunderstood Aims of Rwanda Migrants Policy – Rees-Mogg." *Evening Standard*, April 17, 2022, sec. News. <https://www.standard.co.uk/news/uk/jacob-reesmogg-rwanda-priti-patel-god-justin-welby-b994773.html>.
- Sea Around Us. "Catches by Taxon in the Waters of Italy (Mainland)." Accessed February 4, 2022. <http://www.seaaroundus.org/data/#/eez/380?chart=catch-chart&dimension=taxon&measure=tonnage&limit=10>.
- . "Catches by Taxon in the Waters of United Kingdom (UK)," 2016. <http://www.seaaroundus.org/data/#/eez/826?chart=catch-chart&dimension=taxon&measure=tonnage&limit=10>.
- Sea Power Centre. *Australian Maritime Doctrine (RAN Doctrine 1)*. Jervis Bay, Australia: Sea Power Centre, 2010.

- Searight, Amy E. ““U.S. Coast Guard Cooperation with Southeast Asia: Maritime Challenges and Strategic Opportunities.”” *The International Role of the U.S. Coast Guard*. Center for Strategic and International Studies (CSIS), March 10, 2020. <http://www.jstor.org/stable/resrep37583>.
- Sein, Abdul, Maizatun Mustafa, and Su Wai Mon. “Entrusting Coast Guards with Maritime Law Enforcement Powers: Lessons for Malaysia.” *IIUM Law Journal* 24 (June 23, 2016). <https://doi.org/10.31436/iiumlj.v24i1.248>.
- Shaahunaz, Fathmath. “China Donates Sea Ambulance to Maldives.” *The Edition*, July 13, 2018. <http://edition.mv/news/6505>.
- . “Maldives Returns Second Chopper to India.” *The Edition*, June 5, 2018. http://edition.mv/defence_ministry/6133.
- Shen, Jianming. “China’s Sovereignty over the South China Sea Islands: A Historical Perspective.” *Chinese Journal of International Law* 1, no. 1 (January 1, 2002): 94–157. <https://academic.oup.com/chinesejil/article-lookup/doi/10.1093/oxfordjournals.cjilaw.a000432>.
- Sheng, Yang, and Leng Shumei. “China’s Coast Guard Continues Patrolling Waters Surrounding Diaoyu, Defying U.S. Reaffirming Security Commitment to Japan.” *Global Times*, April 25, 2021. <https://www.globaltimes.cn/page/202104/1222054.shtml>.
- Shimodaira, Takuya. “Chapter 3: The JMSDF and JCG: Toward Cooperation and Contribution.” In *Grey and White Hulls: An International Analysis of the Navy-Coastguard Nexus*, edited by Ian Bowers and Swee Lean Collin Koh, 37–54. Singapore: Springer Nature, 2019.
- Ships Hub. “Azerbaijani Coast Guard,” June 6, 2021. <https://shipshub.com/navy/83-1.html>.
- . “Georgian Coast Guard.” Accessed April 3, 2022. <https://shipshub.com/navy/55-1.html>.
- . “Maldivian Coast Guard.” Accessed April 3, 2022. <https://shipshub.com/navy/276-2.html#lg=1&slide=5>.
- . “National Coast Guard of Mauritius.” Accessed April 10, 2022. <https://shipshub.com/navy/126-1.html>.
- Ships Monthly. “Canadian Coast Guard Awards Contracts,” November 14, 2015. <https://shipsmonthly.com/news/canadian-coast-guard-awards-contracts/>.

- Sibal, Sidhant. "India, Maldives Sign Pact on Development of Coast Guard Harbour." DNA India, February 21, 2021. <https://www.dnaindia.com/india/report-india-maldives-sign-pact-on-development-of-coast-guard-harbour-2876803>.
- Simmons, Beth A, and Richard H Steinberg, eds. *International Law and International Relations*. Cambridge, England; New York: Cambridge University Press, 2007.
- Singh, Bikram. "Features, Applications, and Limitations of Anchor Handling Tug Supply Vessels (AHTS)." Marine Insight, March 19, 2019. <https://www.marineinsight.com/types-of-ships/features-applications-and-limitations-of-anchor-handling-tug-supply-vessels-ahts/>.
- Skelton, Sebastian Klovig. "English Channel Surveillance Used 'To Deter and Punish Migrants.'" Computer Weekly, May 3, 2022. <https://www.computerweekly.com/feature/English-Channel-surveillance-used-to-deter-and-punish-migrants>.
- Smith, Alecia. "Jamaica and U.S. Close to Finalizing Improved Protocols Pertaining to Shiprider Agreement." Jamaica Information Service, February 15, 2021. <https://jis.gov.jm/jamaica-and-us-close-to-finalising-improved-protocols-pertaining-to-shiprider-agreement/>.
- Smith, Joanna. "Coastguard Stations: Introductions to Heritage Assets." Historic England, June 2016. <https://historicengland.org.uk/images-books/publications/iha-coastguard-stations/heag130-coastguard-stations-ih/>.
- Smolnik, Franziska. "The Strategic Partnership Between Georgia and the United States: Vision Wanted." *Stiftung Wissenschaft Und Politik Research Paper 15* (December 2020). <https://doi.org/10.18449/2020RP15>.
- Stanford Program on International and Cross-Cultural Education. "Geography of Japan." Accessed March 28, 2022. https://spice.fsi.stanford.edu/docs/geography_of_japan.
- State Border Service of the Republic of Azerbaijan. "Establishment and Development of the Country's Border Protection System after the Restoration of Azerbaijan's State Independence (January 1992-January 2012)." Official website. Accessed November 4, 2021. https://dsx.gov.az/1992-ci_ilden_sonra#.
- . "Photo Gallery." Official website of the State Border Service of the Republic of Azerbaijan. Accessed November 4, 2021. <https://dsx.gov.az/fotoqalereya>.
- Stuff. "\$9.8m America's Cup Deal Sees Coastguard Getting 26 Support Boats after Auckland 2021," January 15, 2019. <https://www.stuff.co.nz/sport/other-sports/109939191/98m-americas-cup-deal-sees-coastguard-getting-26-support-boats-after-auckland-2021>.

- Sun Online International. "Coast Guard Gets New Uniform," January 1, 2014. <https://en.sun.mv/18950>.
- . "New Coast Guard Uniform Introduced," January 1, 2013. <https://www.sun.com.mv/8450>.
- Surf Lifesaving NZ. "What We Do." Accessed April 13, 2022. <https://www.surflifesaving.org.nz/about-us/what-we-do>.
- Tatsumi, Yuki. *Japan's National Security Policy Infrastructure: Can Tokyo Meet Washington's Expectations?* Washington, D.C.: Henry L. Stimson Center, 2008. https://www.stimson.org/wp-content/files/file-attachments/Tatsumi_%20Japan's_Security_Policy_Infrastructure_Final_Version.pdf.
- Taylor, Diane. "UK Coastguard 'Telling Refugees in British Waters to Contact the French.'" *The Guardian*, December 13, 2021, sec. UK news. <https://www.theguardian.com/uk-news/2021/dec/13/uk-coastguard-telling-refugees-in-british-waters-to-contact-the-french>.
- The Tbilisi Times. "Alexander Jikaidze and Richard Norland Open Joint Maritime Operations Management Center," June 24, 2014. <https://ttimes.ge/archives/22071>.
- Tehran Times. "Caspian Sea Legal Regime: What It Means for Iran's Oil and Gas," August 15, 2018. <https://www.tehrantimes.com/news/426562/Caspian-Sea-legal-regime-what-it-means-for-Iran-s-oil-and-gas>.
- This Week News. "Maritime Air Squadron: The Unsung Heroes," June 22, 2020. <https://thisweeknews.info/index.php/2020/06/22/maritime-air-squadron-the-unsung-heroes/>.
- Toogood, Darren. "HM Coastguard Celebrates 200th Anniversary as Volunteers Continue to Save Lives." *IslandEcho* (blog), January 15, 2022. <https://www.islandecho.co.uk/hm-coastguard-celebrates-200th-anniversary-as-volunteers-continue-to-save-lives/>.
- United Nations. *Convention on the Law of the Seas* (1982). https://www.un.org/Depts/los/convention_agreements/texts/unclos/unclos_e.pdf.
- . "Kenya: Promoting the Blue Economy at Home and Abroad - Nairobi Convention." UNEP. Accessed February 5, 2022. <https://www.unep.org/nairobiconvention/kenya-promoting-blue-economy-home-and-abroad>.
- . "Maritime Delimitation Treaty Between Jamaica and the Republic of Columbia," November 12, 1993. <https://www.un.org/Depts/los/LEGISLATIONANDTREATIES/PDFFILES/TREATIES/JAM-COL1993MD.PDF>.

- United Nations Environment Programme. “New Programme to Support Kenya’s Coast and Blue Economy,” March 30, 2021. <http://www.unep.org/news-and-stories/story/new-programme-support-kenyas-coast-and-blue-economy>.
- United Nations General Assembly. *A/63/63 General Assembly - Security Council Report. Oceans and the Law of the Sea, A/63/63*. New York: UN General Assembly, 2008. https://www.securitycouncilreport.org/atf/cf/%7B65BFCF9B-6D27-4E9C-8CD3-CF6E4FF96FF9%7D/a_63_63.pdf.
- United Nations Office on Drugs and Crime. *Annual Report 2019: Global Maritime Crime Programme*. Annual Report. Vienna: UNODC, 2020. https://www.unodc.org/documents/Maritime_crime/Annual_Report_2019-Web.pdf.
- . *Drug Trafficking on the Southern Route and Impact on Coastal States*. Colombo, Sri Lanka: UNODC, 2016. <http://www.southernroute.org/download/Drug%20Trafficking%20on%20the%20Southern%20Route.pdf>.
- . “Indian Ocean West: Global Maritime Crime Programme.” Accessed February 6, 2022. <http://www.unodc.org/unodc/en/piracy/Indian-Ocean.html>.
- . “UNODC and Japan Sign US\$ 3.7 Million Agreement for the Construction of New Maritime Rescue Coordination Centre in Maldives,” February 23, 2021. <http://www.unodc.org/unodc/en/frontpage/2021/February/unodc-and-japan-sign-us-3-7-million-agreement-for-the-construction-of-new-maritime-rescue-coordination-centre-in-maldives.html>.
- United States Coast Guard. “Assistant Commandant for Capability (CG-7): Office of Aviation Force CG-711.” Accessed January 16, 2022. <https://www.dco.uscg.mil/Our-Organization/Assistant-Commandant-for-Capability-CG-7/Office-of-Aviation-Force-CG-711/Fixed-Wing-Sensors-Division-CG-7113/>.
- . “Aviation Programs.” Accessed January 16, 2022. <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Air-Programs/>.
- . “C-27J Medium Range Surveillance Aircraft,” December 2020. <https://www.dcms.uscg.mil/Portals/10/CG-9/Acquisition%20PDFs/Factsheets/C27J.pdf>.
- . “Coast Guard Accepts 14th C-130J Aircraft.” Accessed January 16, 2022. <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Newsroom/Latest-Acquisition-News/Article/2178811/coast-guard-accepts-14th-c-130j-aircraft/>.
- . “The Coast Guard: America’s Oldest Maritime Defenders.” Go Coast Guard. Accessed April 1, 2022. <https://www.gocoastguard.com/about-the-coast-guard/learn-the-history>.

- . “Deployable Specialized Forces (DSF) Safety Program.” Accessed January 16, 2022. <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Human-Resources-CG-1/Health-Safety-and-Work-Life-CG-11/Safety-and-Environmental-Health/Safety/DSF/>.
- . “Doctrine for the U.S. Coast Guard,” February 2014. https://media.defense.gov/2018/Oct/05/2002049081/-1/-1/1/CGPUB_1-0_DOCTRINE.PDF
- . “High Endurance Cutter - Coast Guard Assets,” April 17, 2019. <https://www.uscg.mil/Assets/Article/1816440/high-endurance-cutter/>.
- . “MH-65 Short Range Recovery Helicopter,” September 12, 2021. <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Air-Programs/SRR-MH-65/>.
- . “National Security Cutter - Coast Guard Assets,” April 17, 2019. <https://www.uscg.mil/Assets/Article/1816423/national-security-cutter/>.
- . “Response Boat-Small II.” Accessed April 13, 2022. <https://www.dcms.uscg.mil/Our-Organization/Assistant-Commandant-for-Acquisitions-CG-9/Programs/Surface-Programs/Response-Boat-Small-II/>.
- . “SUAS for NSC,” December 2020. <https://www.dcms.uscg.mil/Portals/10/CG-9/Acquisition%20PDFs/Factsheets/sUAS%20for%20NSC.pdf>.
- . “Uniform Regulations - COMDISNT M1020.6J,” April 2020. https://www.forcecom.uscg.mil/Portals/3/Documents/SMTC/PDT/Wear%20of%20the%20NWU%20Type%20III%20-%20Uniform%20Regulations%20COMDTINST%20M1020_6J%20CH%205_D_20.pdf?ver=2020-04-16-160541-717.
- . “Uniform Regulations - COMDISNT M1020.6K,” July 7, 2020. https://media.defense.gov/2020/Jul/09/2002451108/-1/-1/0/CIM_1020_6K.PDF.
- . “United States Coast Guard.” Accessed September 7, 2021. <https://www.uscg.mil/>.
- . “United States Coast Guard Assets.” Accessed January 16, 2022. <https://www.uscg.mil/Assets/Category/16546/>.
- . “USCG Missions.” Accessed January 15, 2022. <https://www.history.uscg.mil/home/Missions/>.
- United States Coast Guard Auxiliary. “USCGAUX: About The Auxiliary.” Accessed February 13, 2022. <http://cgaux.org/about.php>.

- United States Department of Defense. *Military and Security Developments Involving the People's Republic of China 2020*. Annual Report to Congress. Washington, D.C.: Office of the Secretary of Defense, 2020. <https://media.defense.gov/2020/Sep/01/2002488689/-1/-1/1/2020-DOD-CHINA-MILITARY-POWER-REPORT-FINAL.PDF>.
- United States Department of the Navy. "Advantage at Sea: Prevailing with Integrated All-Domain Naval Power," December 2020. <https://media.defense.gov/2020/Dec/16/2002553074/-1/-1/0/TRISERVICESTRATEGY.PDF>.
- United States Department of State. "Caribbean Basin Security Initiative." Accessed March 22, 2022. <https://2017-2021.state.gov/caribbean-basin-security-initiative/>.
- . "Caribbean Basin Security Initiative: Jamaica," December 11, 2018. <https://2017-2021.state.gov/caribbean-basin-security-initiative-jamaica/>.
- . "Country Reports on Terrorism 2019: Azerbaijan." Accessed November 4, 2021. <https://www.state.gov/reports/country-reports-on-terrorism-2019/azerbaijan/>.
- . "Foreign Operations Assistance: Azerbaijan," August 31, 2016. <https://2009-2017.state.gov/p/eur/rls/fs/2016/261437.htm>.
- . *Jamaica's Maritime Claims and Boundaries*. Limits in the Seas. Washington, D.C.: United States Department of State Bureau of Oceans and International Environmental and Scientific Affairs, 2004. <https://www.state.gov/wp-content/uploads/2019/12/LIS-125.pdf>.
- . *Maldives Maritime Claims and Boundaries*. Limits in the Seas. Washington, D.C.: Bureau of Oceans and International Environmental and Scientific Affairs, 2005. <https://www.state.gov/wp-content/uploads/2019/12/LIS-126.pdf>.
- . *Mauritius: Archipelagic and Other Maritime Claims and Boundaries*. Limits in the Seas. Washington, D.C.: Bureau of Oceans and International Environmental and Scientific Affairs, 2014. <https://www.state.gov/wp-content/uploads/2019/11/LIS-140.pdf>.
- . *U.S. Relations with Azerbaijan*. Bilateral Relations Fact Sheet. Washington, D.C.: Department of State, 2021. <https://www.state.gov/u-s-relations-with-azerbaijan/>.
- United States Embassy in Guatemala. "Visit of Rear Admiral Peter Gautier of the U.S. Coast Guard," March 12, 2019. <https://gt.usembassy.gov/visit-of-rear-admiral-peter-gautier-of-the-u-s-coast-guard/>.
- United States Geological Survey. "Lake Naivasha, Kenya." Accessed February 5, 2022. <https://eros.usgs.gov/image-gallery/earthshot/lake-naivasha-kenya>.

- United States Navy. "U.S. Navy Seizes 1,400 Assault Rifles During Illicit Weapons Interdiction," December 22, 2021. <https://www.navy.mil/Press-Office/News-Stories/Article/2882679/us-navy-seizes-1400-assault-rifles-during-illicit-weapons-interdiction/>.
- United States Southern Command. "Coast Guard Offloads More than \$148 Million of Illegal Narcotics in Miami," December 9, 2021. <https://www.southcom.mil/MEDIA/NEWS-ARTICLES/Article/2868400/coast-guard-offloads-more-than-148-million-of-illegal-narcotics-in-miami/>.
- Upadhyaya, Shishir. "Maritime Security Cooperation in the Indian Ocean Region: Assessment of India's Maritime Strategy to Be the Regional 'Net Security Provider.'" University of Wollongong, 2018. <https://ro.uow.edu.au/cgi/viewcontent.cgi?article=1299&context=theses1>.
- Valenciaport. "Valenciaport Receives the Visit of a Representation of the Italian Coast Guard," September 23, 2021. <https://www.valenciaport.com/en/valenciaport-receives-the-visit-of-a-representation-of-the-italian-coast-guard/>.
- Valgi, Janav. "Disaster in Paradise: The Mauritius Oil Spill." *McGill International Review*. Montreal, Canada: International Relations' Students Association of McGill (IRSAM), October 6, 2020. <http://www.proquest.com/docview/2460759342/abstract/14F300EE9ED24044PQ/1>.
- Van Oossanen Naval Architects. "Fisheries Patrol Vessel," 2020. <https://oossanen.nl/project/fisheries-patrol-vessel/>.
- Vavasseur, Xavier. "Fincantieri to Design and Build New Multirole OPV for Italian Coast Guard." *Naval News*, November 15, 2021. <https://www.navalnews.com/naval-news/2021/11/fincantieri-to-design-and-build-new-multirole-opv-for-italian-coast-guard/>.
- Vendil Pallin, Carolina, and Fredrik Westerlund. "Russia's War in Georgia: Lessons and Consequences." *Small Wars & Insurgencies* 20, no. 2 (June 2009): 400–424. <https://doi.org/10.1080/09592310902975539>.
- VesselFinder. "VALIANT, Patrol Vessel - Details and Current Position - IMO 9293698," April 17, 2022. <https://www.vesselfinder.com/vessels/VALIANT-IMO-9293698-MMSI-235745000>.
- Vestnik. "Azerbaijan Prevents Contraband of Narcotic Drugs from Iran," October 16, 2021. <https://vestnikkavkaza.net/news/Azerbaijan-prevents-contraband-of-narcotic-drugs-from-Iran.html>.
- Vinson, Isabelle Gachie. "CRIMARIO-MASE: A Win-Win Partnership." *EU Crimario*, October 4, 2018. <https://www.crimario.eu/en/2018/10/04/crimario-mase-a-win-win-partnership/>.

- Visit Iceland. "Geography of Iceland - The Land of Ice and Fire," 2020.
<https://www.visiticeland.com/article/geography-of-iceland/>.
- Waihi Beach Volunteer Coastguard. "The Team." Accessed April 13, 2022.
<https://www.waihibeachcoastguard.co.nz/the-team.html>.
- Walker, Neil. *Georgian Coast Guard Assessment Teams Pass Level 2 Assessment of NATO Certification Program*. Border Security Report, 2020. <https://border-security-report.com/georgian-coast-guard-assessment-teams-pass-level-2-assessment-of-nato-certification-program/>.
- Walrond, Carl. "Geography and Geology." Te Ara: The Encyclopedia of New Zealand. Ministry for Culture and Heritage Te Manatu Taonga, February 8, 2005.
<https://teara.govt.nz/en/natural-environment/page-1>.
- Walton, David. "Japan: Article 9 Conundrum Rears Its Head Again." The Interpreter: Lowy Institute, February 24, 2020. <https://www.lowyinstitute.org/the-interpreter/japan-article-9-conundrum-rears-its-head-again>.
- Wanambisi, Laban. "Military Boss to Chair Blue Economy Implementation Committee." Capital News, January 14, 2017. <https://www.capitalfm.co.ke/news/2017/01/military-boss-chair-blue-economy-implementation-committee/>.
- Wang, Ying, and David G Aubrey. "The Characteristics of the China Coastline." *Continental Shelf Research* 7, no. 4 (April 1987): 329–49.
<https://seagrant.whoi.edu/wp-content/uploads/2015/01/WHOI-R-87-011-Ying-Wang-and-David-Au.pdf>
- Webber, Jonathon, Kevin Moran, Claire French, Felicity Fozard, and Olivia Pearless. "Fatal Coastal Drowning Incidents: A 10-Year Review of Body Recovery Times in New Zealand." *Forensic Science International* 317 (December 1, 2020): 110573. <https://doi.org/10.1016/j.forsciint.2020.110573>.
- Weil, Prosper. "Towards Relative Normativity in International Law?" *The American Journal of International Law* 77, no. 3 (July 1983): 413–42.
- Whitehead, Jim. *National Search and Rescue Manual*. Canberra: Australian Maritime Safety Authority, February 2022. <https://www.amsa.gov.au/national-search-and-rescue-council/national-search-and-rescue-manual>.
- Whitley, Tracey L. "APS East Completes Training in Mauritius." DVIDS: Defense Visual Information Distribution Service, February 25, 2010.
<https://www.dvidshub.net/news/45843/aps-east-completes-training-mauritius>.

- Wickramanayake, Damith, Sharlene Brown, and Zhenqing Zheng. "Maritime Policy Fragmentation and Integration Effects in Jamaica." *The International Journal of Logistics Management* 10, no. 1 (April 25, 2021): 11–23. <https://doi.org/10.5923/j.logistics.20211001.02>.
- Wintour, Patrick. "UN Court Rejects UK Claim to Chagos Islands in Favour of Mauritius." *The Guardian*, January 28, 2021, sec. World news. <https://www.theguardian.com/world/2021/jan/28/un-court-rejects-uk-claim-to-chagos-islands-in-favour-of-mauritius>.
- World Health Organization. "2019 Novel Coronavirus (2019-NCoV) Emergency Readiness/ Response: MALDIVES," February 24, 2020. https://www.who.int/docs/default-source/coronaviruse/situation-reports/novel-corona-virus-update-mav-24-feb-20.pdf?sfvrsn=6e57139f_2.
- WorldAtlas. "Countries with the Largest Exclusive Economic Zones," June 29, 2018. <https://www.worldatlas.com/articles/countries-with-the-largest-exclusive-economic-zones.html>.
- . "Countries with the Longest Coastline," October 1, 2020. <https://www.worldatlas.com/articles/countries-with-the-most-coastline.html>.
- . "US States with The Longest Coastlines," September 8, 2020. <https://www.worldatlas.com/articles/us-states-by-length-of-coastline.html>.
- . "Which European Countries Are Islands?," March 10, 2021. <https://www.worldatlas.com/articles/island-countries-of-europe.html>.
- WWAYTV3. "Off-Duty Coast Guardswoman Saves Three from Drowning," May 25, 2021. <https://www.wwaytv3.com/off-duty-coast-guardswoman-saves-three-from-drowning/>.
- Yoon, Sukjoon. "Establishing a Maritime Security Joint-Force Partnership Between the Republic of Korea Navy and the Korea Coast Guard." In *Grey and White Hulls*, edited by Ian Bowers and Swee Lean Collin Koh, 55–69. Singapore: Springer Singapore, 2019. https://doi.org/10.1007/978-981-13-9242-9_4.
- Zimnitskaya, Hanna, and James von Geldern. "Is the Caspian Sea a Sea; and Why Does It Matter?" *Journal of Eurasian Studies* 2, no. 1 (January 1, 2011): 1–14. <https://doi.org/10.1016/j.euras.2010.10.009>.

THIS PAGE INTENTIONALLY LEFT BLANK

INITIAL DISTRIBUTION LIST

1. Defense Technical Information Center
Ft. Belvoir, Virginia
2. Dudley Knox Library
Naval Postgraduate School
Monterey, California