

# Nationwide Public Safety Broadband Network

## Final Programmatic Environmental Impact Statement

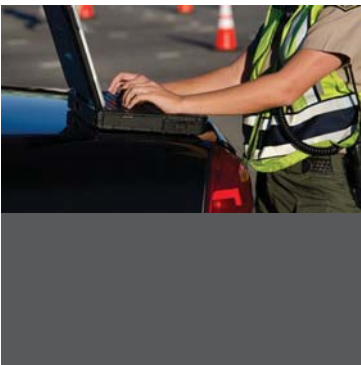
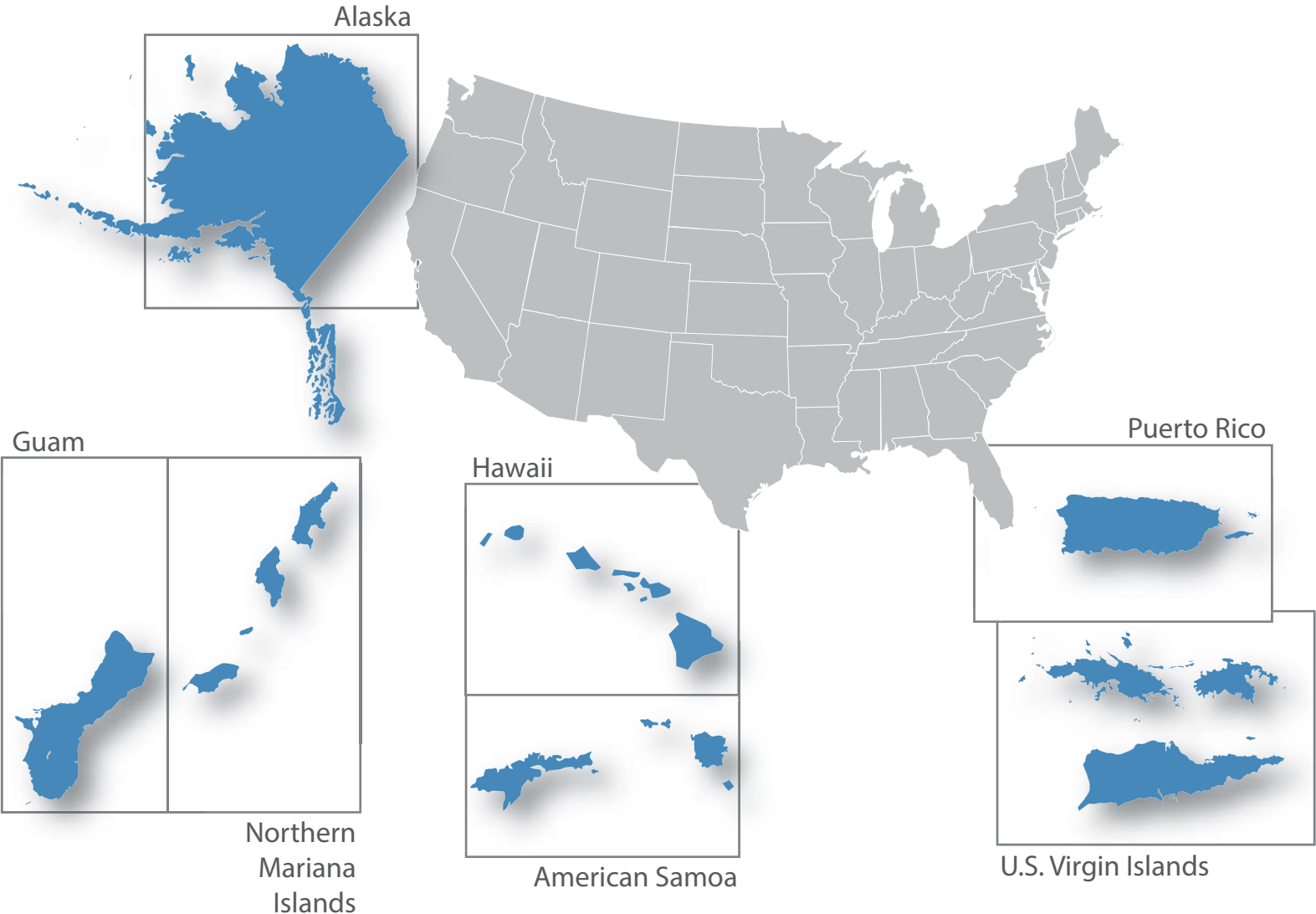
### for the Non-Contiguous United States



## First Responder Network Authority

Volume 8 - Chapters 10-18 & Appendices

- Alaska
- Hawaii
- American Samoa
- Guam
- Northern Mariana Islands
- Puerto Rico
- U.S. Virgin Islands



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# First Responder Network Authority



## Nationwide Public Safety Broadband Network Final Programmatic Environmental Impact Statement for the Non-Contiguous United States

### Volume 8

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#### **Cooperating Agencies**

Federal Communications Commission  
General Services Administration  
U.S. Department of Agriculture—Natural Resource Conservation Service  
U.S. Department of Agriculture—Rural Utilities Service  
U.S. Department of Agriculture—U.S. Forest Service  
U.S. Department of Commerce—National Telecommunications and  
Information Administration  
U.S. Department of Defense—Department of the Air Force  
U.S. Department of Energy  
U.S. Department of Homeland Security

May 2017

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## TABLE OF CONTENTS

<b>1. Introduction.....</b>	<b>1-1</b>
1.1. Overview and Background .....	1-1
1.2. Programmatic Approach and Tiering.....	1-3
1.3. Project Regions and Description of the Proposed Action Area .....	1-5
1.4. Purpose and Need for the Proposed Action .....	1-6
1.5. Federal Agency Participation.....	1-8
1.5.1. Lead Agency .....	1-8
1.5.2. Cooperating Agencies .....	1-8
1.5.3. Consulting Parties .....	1-8
1.6. Cultural Resources Consultation.....	1-9
1.7. The NEPA Process and Public Involvement .....	1-9
1.7.1. Public Involvement .....	1-9
1.7.2. Scoping .....	1-9
1.7.3. Public Comment on the Draft PEIS .....	1-10
1.8. Overview of Relevant Federal Laws and Executive Orders .....	1-11
1.8.1. National Environmental Policy Act .....	1-11
1.8.2. National Historic Preservation Act .....	1-12
1.8.3. Endangered Species Act .....	1-13
1.8.4. Magnuson-Stevens Fishery Conservation and Management Act .....	1-13
1.8.5. Marine Mammal Protection Act .....	1-14
1.8.6. Migratory Bird Treaty Act .....	1-14
1.8.7. Clean Water Act.....	1-14
1.8.8. Coastal Zone Management Act.....	1-15
1.8.9. Occupational Safety and Health Act.....	1-15
1.8.10. Executive Order 11988 (as Amended by EO 13690) – Floodplain Management.....	1-16
1.8.11. Executive Order 11990 – Protection of Wetlands .....	1-16
1.8.12. Executive Order 12898 – Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations .....	1-17
1.8.13. Executive Order 13186 – Responsibilities of Federal Agencies to Protect Migratory Birds .....	1-17
1.8.14. Executive Order 13693 – Planning for Federal Sustainability in the Next Decade.....	1-18
1.9. PEIS Organization .....	1-18
1.10. References.....	1-19

<b>2.</b>	<b>Description of the Proposed Action and Alternatives .....</b>	<b>2-1</b>
2.1.	Proposed Action.....	2-1
2.1.1.	Characteristics of the NPSBN.....	2-2
2.1.2.	Proposed Action Infrastructure .....	2-2
2.2.	Description of Alternatives .....	2-5
2.2.1.	Preferred Alternative.....	2-6
2.2.2.	Deployable Technologies Alternative.....	2-6
2.2.3.	No Action Alternative.....	2-6
2.3.	Alternatives Considered but not Carried Forward .....	2-7
2.3.1.	New Construction Only Alternative .....	2-7
2.3.2.	New Satellite Alternative.....	2-7
2.3.3.	Collocation-Only Alternative.....	2-7
2.4.	Radio Frequency Emissions.....	2-7
2.4.1.	Introduction.....	2-7
2.4.2.	RF Emissions and Humans .....	2-10
2.4.3.	RF Emissions and Non-Human Species .....	2-18
2.4.4.	Summary .....	2-21
2.5.	References.....	2-22
<b>3.</b>	<b>Alaska.....</b>	<b>3-1</b>
3.1.	Affected Environment.....	3.1-1
3.1.1.	Infrastructure.....	3.1.1-1
3.1.2.	Soils.....	3.1.2-1
3.1.3.	Geology.....	3.1.3-1
3.1.4.	Water Resources .....	3.1.4-1
3.1.5.	Wetlands .....	3.1.5-1
3.1.6.	Biological Resources .....	3.1.6-1
3.1.6.1.	Introduction.....	3.1.6-1
3.1.6.2.	Specific Regulatory Considerations.....	3.1.6-1
3.1.6.3.	Terrestrial Vegetation .....	3.1.6-2
3.1.6.4.	Wildlife .....	3.1.6-11
3.1.6.5.	Fisheries and Aquatic Habitats .....	3.1.6-38
3.1.6.6.	Threatened and Endangered Species and Species of Conservation Concern.....	3.1.6-48
3.1.7.	Land Use, Airspace, and Recreation.....	3.1.7-1
3.1.8.	Visual Resources.....	3.1.8-1
3.1.9.	Socioeconomics .....	3.1.9-1
3.1.10.	Environmental Justice.....	3.1.10-1
3.1.11.	Cultural Resources .....	3.1.11-1
3.1.12.	Air Quality .....	3.1.12-1
3.1.13.	Noise and Vibrations.....	3.1.13-1
3.1.14.	Climate Change.....	3.1.14-1
3.1.15.	Human Health and Safety .....	3.1.15-1

3.2.	Environmental Consequences .....	3.2-1
3.2.1.	Infrastructure .....	3.2.1-1
3.2.2.	Soils .....	3.2.2-1
3.2.3.	Geology .....	3.2.3-1
3.2.4.	Water Resources .....	3.2.4-1
3.2.5.	Wetlands .....	3.2.5-1
3.2.6.	Biological Resources .....	3.2.6-1
3.2.6.1.	Introduction .....	3.2.6-1
3.2.6.2.	Impact Assessment Methodology and Significance Criteria .....	3.2.6-1
3.2.6.3.	Terrestrial Vegetation .....	3.2.6-9
3.2.6.4.	Wildlife .....	3.2.6-18
3.2.6.5.	Fisheries and Aquatic Habitats .....	3.2.6-44
3.2.6.6.	Threatened and Endangered Species and Species of Conservation Concern .....	3.2.6-58
3.2.7.	Land Use, Airspace, and Recreation .....	3.2.7-1
3.2.8.	Visual Resources .....	3.2.8-1
3.2.9.	Socioeconomics .....	3.2.9-1
3.2.10.	Environmental Justice .....	3.2.10-1
3.2.11.	Cultural Resources .....	3.2.11-1
3.2.12.	Air Quality .....	3.2.12-1
3.2.13.	Noise and Vibrations .....	3.2.13-1
3.2.14.	Climate Change .....	3.2.14-1
3.2.15.	Human Health and Safety .....	3.2.15-1
3.3.	References .....	3.3-1
3.3.1.	Introduction .....	3.3-1
3.3.2.	Affected Environment .....	3.3-2
3.3.3.	Environmental Consequences .....	3.3-34
<b>4.</b>	<b>Hawaii .....</b>	<b>4-1</b>
4.1.	Affected Environment .....	4.1-1
4.1.1.	Infrastructure .....	4.1.1-1
4.1.2.	Soils .....	4.1.2-1
4.1.3.	Geology .....	4.1.3-1
4.1.4.	Water Resources .....	4.1.4-1
4.1.5.	Wetlands .....	4.1.5-1
4.1.6.	Biological Resources .....	4.1.6-1
4.1.6.1.	Introduction .....	4.1.6-1
4.1.6.2.	Specific Regulatory Considerations .....	4.1.6-1
4.1.6.3.	Terrestrial Vegetation .....	4.1.6-2
4.1.6.4.	Wildlife .....	4.1.6-8
4.1.6.5.	Fisheries and Aquatic Habitats .....	4.1.6-19

	4.1.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	4.1.6-27
4.1.7.	Land Use, Airspace, and Recreation.....	4.1.7-1
4.1.8.	Visual Resources.....	4.1.8-1
4.1.9.	Socioeconomics .....	4.1.9-1
4.1.10.	Environmental Justice.....	4.1.10-1
4.1.11.	Cultural Resources .....	4.1.11-1
4.1.12.	Air Quality .....	4.1.12-1
4.1.13.	Noise and Vibrations.....	4.1.13-1
4.1.14.	Climate Change.....	4.1.14-1
4.1.15.	Human Health and Safety .....	4.1.15-1
4.2.	Environmental Consequences .....	4.2-1
4.2.1.	Infrastructure.....	4.2.1-1
4.2.2.	Soils.....	4.2.2-1
4.2.3.	Geology.....	4.2.3-1
4.2.4.	Water Resources .....	4.2.4-1
4.2.5.	Wetlands .....	4.2.5-1
4.2.6.	Biological Resources .....	4.2.6-1
	4.2.6.1. Introduction.....	4.2.6-1
	4.2.6.2. Impact Assessment Methodology and Significance Criteria .....	4.2.6-1
	4.2.6.3. Terrestrial Vegetation .....	4.2.6-9
	4.2.6.4. Wildlife .....	4.2.6-18
	4.2.6.5. Fisheries and Aquatic Habitats .....	4.2.6-42
	4.2.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	4.2.6-57
4.2.7.	Land Use, Airspace, and Recreation.....	4.2.7-1
4.2.8.	Visual Resources.....	4.2.8-1
4.2.9.	Socioeconomics .....	4.2.9-1
4.2.10.	Environmental Justice.....	4.2.10-1
4.2.11.	Cultural Resources .....	4.2.11-1
4.2.12.	Air Quality .....	4.2.12-1
4.2.13.	Noise and Vibrations.....	4.2.13-1
4.2.14.	Climate Change.....	4.2.14-1
4.2.15.	Human Health and Safety .....	4.2.15-1
4.3.	References.....	4.3-1
4.3.1.	Introduction.....	4.3-1
4.3.2.	Affected Environment.....	4.3-3
4.3.3.	Environmental Consequences.....	4.3-29



<b>5. American Samoa .....</b>	<b>5-1</b>
5.1. Affected Environment.....	5.1-1
5.1.1. Infrastructure.....	5.1.1-1
5.1.2. Soils.....	5.1.2-1
5.1.3. Geology.....	5.1.3-1
5.1.4. Water Resources .....	5.1.4-1
5.1.5. Wetlands .....	5.1.5-1
5.1.6. Biological Resources .....	5.1.6-1
5.1.6.1. Introduction.....	5.1.6-1
5.1.6.2. Specific Regulatory Considerations.....	5.1.6-1
5.1.6.3. Terrestrial Vegetation .....	5.1.6-2
5.1.6.4. Wildlife .....	5.1.6-10
5.1.6.5. Fisheries and Aquatic Habitats .....	5.1.6-20
5.1.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	5.1.6-30
5.1.7. Land Use, Airspace, and Recreation.....	5.1.7-1
5.1.8. Visual Resources.....	5.1.8-1
5.1.9. Socioeconomics .....	5.1.9-1
5.1.10. Environmental Justice.....	5.1.10-1
5.1.11. Cultural Resources .....	5.1.11-1
5.1.12. Air Quality .....	5.1.12-1
5.1.13. Noise and Vibrations.....	5.1.13-1
5.1.14. Climate Change.....	5.1.14-1
5.1.15. Human Health and Safety .....	5.1.15-1
5.2. Environmental Consequences.....	5.2-1
5.2.1. Infrastructure.....	5.2.1-1
5.2.2. Soils.....	5.2.2-1
5.2.3. Geology.....	5.2.3-1
5.2.4. Water Resources .....	5.2.4-1
5.2.5. Wetlands .....	5.2.5-1
5.2.6. Biological Resources .....	5.2.6-1
5.2.6.1. Introduction.....	5.2.6-1
5.2.6.2. Impact Assessment Methodology and Significance Criteria .....	5.2.6-1
5.2.6.3. Terrestrial Vegetation .....	5.2.6-9
5.2.6.4. Wildlife .....	5.2.6-18
5.2.6.5. Fisheries and Aquatic Habitats .....	5.2.6-42
5.2.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	5.2.6-57
5.2.7. Land Use, Airspace, and Recreation.....	5.2.7-1
5.2.8. Visual Resources.....	5.2.8-1
5.2.9. Socioeconomics .....	5.2.9-1

5.2.10.	Environmental Justice .....	5.2.10-1
5.2.11.	Cultural Resources .....	5.2.11-1
5.2.12.	Air Quality .....	5.2.12-1
5.2.13.	Noise .....	5.2.13-1
5.2.14.	Climate Change.....	5.2.14-1
5.2.15.	Human Health and Safety .....	5.2.15-1
5.3.	References.....	5.3-1
5.3.1.	Introduction.....	5.3-1
5.3.2.	Affected Environment.....	5.3-2
5.3.3.	Environmental Consequences.....	5.3-28
<b>6.</b>	<b>Guam.....</b>	<b>6-1</b>
6.1.	Affected Environment.....	6.1-1
6.1.1.	Infrastructure.....	6.1.1-1
6.1.2.	Soils.....	6.1.2-1
6.1.3.	Geology.....	6.1.3-1
6.1.4.	Water Resources .....	6.1.4-1
6.1.5.	Wetlands .....	6.1.5-1
6.1.6.	Biological Resources .....	6.1.6-1
6.1.6.1.	Introduction.....	6.1.6-1
6.1.6.2.	Specific Regulatory Considerations.....	6.1.6-1
6.1.6.3.	Terrestrial Vegetation .....	6.1.6-2
6.1.6.4.	Wildlife .....	6.1.6-7
6.1.6.5.	Fisheries and Aquatic Habitats .....	6.1.6-18
6.1.6.6.	Threatened and Endangered Species and Species of Conservation Concern.....	6.1.6-26
6.1.7.	Land Use, Airspace, and Recreation.....	6.1.7-1
6.1.8.	Visual Resources.....	6.1.8-1
6.1.9.	Socioeconomics .....	6.1.9-1
6.1.10.	Environmental Justice.....	6.1.10-1
6.1.11.	Cultural Resources .....	6.1.11-1
6.1.12.	Air Quality .....	6.1.12-1
6.1.13.	Noise and Vibrations.....	6.1.13-1
6.1.14.	Climate Change.....	6.1.14-1
6.1.15.	Human Health and Safety .....	6.1.15-1
6.2.	Environmental Consequences.....	6.2-1
6.2.1.	Infrastructure.....	6.2.1-1
6.2.2.	Soils.....	6.2.2-1
6.2.3.	Geology.....	6.2.3-1
6.2.4.	Water Resources .....	6.2.4-1
6.2.5.	Wetlands .....	6.2.5-1

6.2.6.	Biological Resources .....	6.2.6-1
6.2.6.1.	Introduction.....	6.2.6-1
6.2.6.2.	Impact Assessment Methodology and Significance Criteria .....	6.2.6-1
6.2.6.3.	Terrestrial Vegetation .....	6.2.6-9
6.2.6.4.	Wildlife .....	6.2.6-18
6.2.6.5.	Fisheries and Aquatic Habitats .....	6.2.6-42
6.2.6.6.	Threatened and Endangered Species and Species of Conservation Concern.....	6.2.6-56
6.2.7.	Land Use, Airspace, and Recreation.....	6.2.7-1
6.2.8.	Visual Resources.....	6.2.8-1
6.2.9.	Socioeconomics .....	6.2.9-1
6.2.10.	Environmental Justice.....	6.2.10-1
6.2.11.	Cultural Resources .....	6.2.11-1
6.2.12.	Air Quality .....	6.2.12-1
6.2.13.	Noise and Vibrations.....	6.2.13-1
6.2.14.	Climate Change.....	6.2.14-1
6.3.	References.....	6.3-1
6.3.1.	Introduction.....	6.3-1
6.3.2.	Affected Environment.....	6.3-2
6.3.3.	Environmental Consequences.....	6.3-25
<b>7.</b>	<b>Northern Mariana Islands .....</b>	<b>7-1</b>
7.1.	Affected Environment.....	7.1-1
7.1.1.	Infrastructure.....	7.1.1-1
7.1.2.	Soils.....	7.1.2-1
7.1.3.	Geology.....	7.1.3-1
7.1.4.	Water Resources .....	7.1.4-1
7.1.5.	Wetlands .....	7.1.5-1
7.1.6.	Biological Resources .....	7.1.6-1
7.1.6.1.	Introduction.....	7.1.6-1
7.1.6.2.	Specific Regulatory Considerations.....	7.1.6-1
7.1.6.3.	Terrestrial Vegetation .....	7.1.6-2
7.1.6.4.	Wildlife .....	7.1.6-8
7.1.6.5.	Fisheries and Aquatic Habitats .....	7.1.6-18
7.1.6.6.	Threatened and Endangered Species and Species of Conservation Concern.....	7.1.6-26
7.1.7.	Land Use, Airspace, and Recreation.....	7.1.7-1
7.1.8.	Visual Resources.....	7.1.8-1
7.1.9.	Socioeconomics .....	7.1.9-1
7.1.10.	Environmental Justice.....	7.1.10-1
7.1.11.	Cultural Resources .....	7.1.11-1
7.1.12.	Air Quality .....	7.1.12-1

7.1.13.	Noise and Vibrations.....	7.1.13-1
7.1.14.	Climate Change.....	7.1.14-1
7.1.15.	Human Health and Safety .....	7.1.15-1
7.2.	Environmental Consequences .....	7.2-1
7.2.1.	Infrastructure.....	7.2.1-1
7.2.2.	Soils.....	7.2.2-1
7.2.3.	Geology.....	7.2.3-1
7.2.4.	Water Resources .....	7.2.4-1
7.2.5.	Wetlands .....	7.2.5-1
7.2.6.	Biological Resources .....	7.2.6-1
7.2.6.1.	Introduction.....	7.2.6-1
7.2.6.2.	Impact Assessment Methodology and Significance Criteria .....	7.2.6-1
7.2.6.3.	Terrestrial Vegetation .....	7.2.6-9
7.2.6.4.	Wildlife .....	7.2.6-18
7.2.6.5.	Fisheries and Aquatic Habitats .....	7.2.6-42
7.2.6.6.	Threatened and Endangered Species and Species of Conservation Concern.....	7.2.6-57
7.2.7.	Land Use, Airspace, and Recreation.....	7.2.7-1
7.2.8.	Visual Resources.....	7.2.8-1
7.2.9.	Socioeconomics .....	7.2.9-1
7.2.10.	Environmental Justice.....	7.2.10-1
7.2.11.	Cultural Resources .....	7.2.11-1
7.2.12.	Air Quality .....	7.2.12-1
7.2.13.	Noise and Vibrations .....	7.2.13-1
7.2.14.	Climate Change.....	7.2.14-1
7.2.15.	Human Health and Safety .....	7.2.15-1
7.3.	References.....	7.3-1
7.3.1.	Introduction.....	7.3-1
7.3.2.	Affected Environment.....	7.3-2
7.3.3.	Environmental Consequences .....	7.3-24
<b>8.</b>	<b>Puerto Rico .....</b>	<b>8-1</b>
8.1.	Affected Environment.....	8.1-1
8.1.1.	Infrastructure.....	8.1.1-1
8.1.2.	Soils.....	8.1.2-1
8.1.3.	Geology.....	8.1.3-1
8.1.4.	Water Resources .....	8.1.4-1
8.1.5.	Wetlands .....	8.1.5-1
8.1.6.	Biological Resources .....	8.1.6-1
8.1.6.1.	Introduction.....	8.1.6-1
8.1.6.2.	Specific Regulatory Considerations.....	8.1.6-1
8.1.6.3.	Terrestrial Vegetation .....	8.1.6-2

	8.1.6.4. Wildlife .....	8.1.6-6
	8.1.6.5. Fisheries and Aquatic Habitats .....	8.1.6-21
	8.1.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	8.1.6-28
8.1.7.	Land Use, Airspace, and Recreation.....	8.1.7-1
8.1.8.	Visual Resources.....	8.1.8-1
8.1.9.	Socioeconomics .....	8.1.9-1
8.1.10.	Environmental Justice.....	8.1.10-1
8.1.11.	Cultural Resources .....	8.1.11-1
8.1.12.	Air Quality .....	8.1.12-1
8.1.13.	Noise and Vibrations.....	8.1.13-1
8.1.14.	Climate Change.....	8.1.14-1
8.1.15.	Human Health and Safety .....	8.1.15-1
8.2.	Environmental Consequences .....	8.2-1
8.2.1.	Infrastructure.....	8.2.1-1
8.2.2.	Soils.....	8.2.2-1
8.2.3.	Geology.....	8.2.3-1
8.2.4.	Water Resources .....	8.2.4-1
8.2.5.	Wetlands .....	8.2.5-1
8.2.6.	Biological Resources .....	8.2.6-1
	8.2.6.1. Introduction.....	8.2.6-1
	8.2.6.2. Impact Assessment Methodology and Significance Criteria .....	8.2.6-1
	8.2.6.3. Terrestrial Vegetation .....	8.2.6-9
	8.2.6.4. Wildlife .....	8.2.6-18
	8.2.6.5. Fisheries and Aquatic Habitats .....	8.2.6-42
	8.2.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	8.2.6-56
8.2.7.	Land Use, Airspace, and Recreation.....	8.2.7-1
8.2.8.	Visual Resources.....	8.2.8-1
8.2.9.	Socioeconomics .....	8.2.9-1
8.2.10.	Environmental Justice.....	8.2.10-1
8.2.11.	Cultural Resources .....	8.2.11-1
8.2.12.	Air Quality .....	8.2.12-1
8.2.13.	Noise and Vibrations.....	8.2.13-1
8.2.14.	Climate Change.....	8.2.14-1
8.2.15.	Human Health and Safety .....	8.2.15-1
8.3.	References.....	8.3-1
	8.3.1. Introduction.....	8.3-1
	8.3.2. Affected Environment.....	8.3-2
	8.3.3. Environmental Consequences .....	8.3-29

<b>9. U.S. Virgin Islands .....</b>	<b>9-1</b>
9.1. Affected Environment.....	9.1-1
9.1.1. Infrastructure.....	9.1.1-1
9.1.2. Soils.....	9.1.2-1
9.1.3. Geology.....	9.1.3-1
9.1.4. Water Resources .....	9.1.4-1
9.1.5. Wetlands .....	9.1.5-1
9.1.6. Biological Resources .....	9.1.6-1
9.1.6.1. Introduction.....	9.1.6-1
9.1.6.2. Specific Regulatory Considerations.....	9.1.6-1
9.1.6.3. Terrestrial Vegetation .....	9.1.6-2
9.1.6.4. Wildlife .....	9.1.6-7
9.1.6.5. Fisheries and Aquatic Habitats .....	9.1.6-20
9.1.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	9.1.6-28
9.1.7. Land Use, Airspace, and Recreation.....	9.1.7-1
9.1.8. Visual Resources.....	9.1.8-1
9.1.9. Socioeconomics .....	9.1.9-1
9.1.10. Environmental Justice.....	9.1.10-1
9.1.11. Cultural Resources.....	9.1.11-1
9.1.13. Noise and Vibrations.....	9.1.13-1
9.1.14. Climate Change.....	9.1.14-1
9.1.15. Human Health and Safety .....	9.1.15-1
9.2. Environmental Consequences.....	9.2-1
9.2.1. Infrastructure.....	9.2.1-1
9.2.2. Soils.....	9.2.2-1
9.2.3. Geology.....	9.2.3-1
9.2.4. Water Resources .....	9.2.4-1
9.2.5. Wetlands .....	9.2.5-1
9.2.6. Biological Resources .....	9.2.6-1
9.2.6.1. Introduction.....	9.2.6-1
9.2.6.2. Impact Assessment Methodology and Significance Criteria .....	9.2.6-1
9.2.6.3. Terrestrial Vegetation .....	9.2.6-9
9.2.6.4. Wildlife .....	9.2.6-18
9.2.6.5. Fisheries and Aquatic Habitats .....	9.2.6-42
9.2.6.6. Threatened and Endangered Species and Species of Conservation Concern.....	9.2.6-56
9.2.7. Land Use, Airspace, and Recreation.....	9.2.7-1
9.2.8. Visual Resources.....	9.2.8-1
9.2.9. Socioeconomics .....	9.2.9-1
9.2.10. Environmental Justice.....	9.2.10-1

9.2.11.	Cultural Resources .....	9.2.11-1
9.2.12.	Air Quality .....	9.2.12-1
9.2.13.	Noise and Vibrations.....	9.2.13-1
9.2.14.	Climate Change.....	9.2.14-1
9.2.15.	Human Health and Safety .....	9.2.15-1
9.3.	References.....	9.3-1
9.3.1.	Introduction.....	9.3-1
9.3.2.	Affected Environment.....	9.3-2
9.3.3.	Environmental Consequences .....	9.3-28
<b>10.</b>	<b>Cumulative Effects.....</b>	<b>10-1</b>
<b>11.</b>	<b>BMPs and Mitigation Measures .....</b>	<b>11-1</b>
11.1.	Infrastructure.....	11-2
11.1.1.	BMPs and Mitigation Measures for All Project Types.....	11-2
11.1.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-3
11.2.	Soils.....	11-3
11.2.1.	BMPs and Mitigation Measures for All Project Types.....	11-3
11.2.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-4
11.3.	Geology.....	11-4
11.3.1.	BMPs and Mitigation Measures for All Project Types.....	11-4
11.3.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-5
11.4.	Water Resources .....	11-6
11.4.1.	BMPs and Mitigation Measures for All Project Types.....	11-6
11.4.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-9
11.5.	Wetlands .....	11-9
11.5.1.	BMPs and Mitigation Measures for All Project Types.....	11-9
11.5.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-11
11.6.	Biological Resources .....	11-12
11.6.1.	Terrestrial Vegetation .....	11-12
11.6.1.1.	BMPs and Mitigation Measures for All Project Types.....	11-12
11.6.1.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-14
11.6.2.	Wildlife .....	11-14
11.6.2.1.	BMPs and Mitigation Measures for All Project Types.....	11-14
11.6.2.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-20
11.6.3.	Fisheries and Aquatic Habitats .....	11-21
11.6.3.1.	BMPs and Mitigation Measures for All Project Types.....	11-21
11.6.3.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-23
11.6.4.	Threatened and Endangered Species and Species of Conservation Concern .....	11-23
11.6.4.1.	BMPs and Mitigation Measures for All Project Types.....	11-23
11.6.4.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-25

11.7.	Land Use, Airspace, and Recreation.....	11-26
11.7.1.	BMPs and Mitigation Measures for All Project Types.....	11-26
11.7.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-27
11.8.	Visual Resources.....	11-27
11.8.1.	BMPs and Mitigation Measures for All Project Types.....	11-27
11.8.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-28
11.9.	Socioeconomics .....	11-29
11.9.1.	BMPs and Mitigation Measures for All Project Types.....	11-29
11.9.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-30
11.10.	Environmental Justice.....	11-30
11.10.1.	BMPs and Mitigation Measures for All Project Types.....	11-30
11.10.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-31
11.11.	Cultural Resources .....	11-31
11.11.1.	BMPs and Mitigation Measures for All Project Types.....	11-31
11.11.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-32
11.12.	Air Quality .....	11-32
11.12.1.	BMPs and Mitigation Measures for All Project Types.....	11-32
11.12.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-33
11.13.	Noise and Vibrations.....	11-34
11.13.1.	BMPs and Mitigation Measures for All Project Types.....	11-34
11.13.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-35
11.14.	Climate Change.....	11-35
11.14.1.	BMPs and Mitigation Measures for All Project Types.....	11-35
11.14.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-36
11.15.	Human Health and Safety .....	11-36
11.15.1.	BMPs and Mitigation Measures for All Project Types.....	11-36
11.15.2.	Project-Type Specific BMPs and Mitigation Measures.....	11-38
11.16.	References.....	11-38
11.16.1.	Wildlife .....	11-38
11.16.2.	Fisheries and Aquatic Habitats .....	11-40
11.16.3.	Threatened and Endangered Species and Species of Conservation Concern .....	11-41
11.16.4.	Land Use, Airspace, and Recreation.....	11-41
11.16.5.	Socioeconomics .....	11-41
11.16.6.	Environmental Justice.....	11-41
11.16.7.	Human Health and Safety .....	11-41
<b>12.</b>	<b>Comparison of Alternatives .....</b>	<b>12-1</b>
12.1.	Introduction.....	12-1
12.2.	Comparison of Alternatives .....	12-2
12.3.	References.....	12-10



<b>13. Other Required Analyses .....</b>	<b>13-1</b>
13.1. Unavoidable Adverse Impacts .....	13-1
13.2. Irreversible or Irretrievable Commitment of Resources .....	13-1
13.3. Relationship Between Short-term and Long-term Productivity .....	13-3
<b>14. Draft PEIS Public Comments .....</b>	<b>14-1</b>
<b>15. List of Preparers and Contributors.....</b>	<b>15-1</b>
<b>16. Distribution List.....</b>	<b>16-1</b>
<b>17. Index.....</b>	<b>17-1</b>
<b>18. Glossary .....</b>	<b>18-1</b>

## APPENDICES

A	Invited Cooperating Agencies
B	First Responder Network Authority Nationwide Public Safety Broadband Network Programmatic Environmental Impact Statement Scoping Summary Report
C	Environmental Laws and Regulations
D	Threatened and Endangered Species
E	Environmental Justice Demographic Data
F	Climate Change Sources and Models
G	Hawaii Register of Historic Places
H	Radio Frequency Emissions Comments Received—All Regions

## LIST OF TABLES

Table 2.4.1-1:	FCC Regulatory Levels .....	2-10
Table 3.1.1-1:	Public Safety Communications System.....	3.1.1-7
Table 3.1.1-2:	Other Communication Systems .....	3.1.1-7
Table 3.1.2-1:	Major Land Resource Areas in Alaska .....	3.1.2-4
Table 3.1.2-2:	General Characteristics of Soil Suborders Found in Alaska.....	3.1.2-6
Table 3.1.4-1:	Total Surface Waters for Alaska.....	3.1.4-2
Table 3.1.4-2:	Water Quality Summary for Alaska Waterbodies .....	3.1.4-6
Table 3.1.4-3:	Alaska Groundwater Withdrawals in 2005.....	3.1.4-9
Table 3.1.5-1:	Acreages, Types, and Descriptions of Wetlands in Alaska .....	3.1.5-5
Table 3.1.6.3-1:	Vegetation Types/ Land Cover Classes in Alaska.....	3.1.6-4
Table 3.1.6.3-2:	Biophysical Settings and Plant Associations of Concern in Alaska .....	3.1.6-5
Table 3.1.6.6-1:	Federal- and State-listed Threatened and Endangered and Candidate Species Known to Occur in Alaska .....	3.1.6-51
Table 3.1.7-1:	Land Use/Land Cover in Alaska.....	3.1.7-4
Table 3.1.7-2:	Major Land Owners in Alaska.....	3.1.7-5
Table 3.1.7-3:	Acreage of Recreational Lands in Alaska, by Type .....	3.1.7-9
Table 3.1.9-1:	National, State, and Borough Population, Population Density, and Growth Rates .....	3.1.9-5
Table 3.1.9-2:	Population Projections .....	3.1.9-7
Table 3.1.9-3:	Select Economic Indicators .....	3.1.9-8
Table 3.1.9-4:	Housing Units, Occupancy, and Tenure .....	3.1.9-12
Table 3.1.9-5:	Housing Costs.....	3.1.9-13
Table 3.1.9-6:	Median Value of Owner Occupied Single Family Homes, 2009 to 2013 American Community Survey .....	3.1.9-14
Table 3.1.9-7:	Real Estate Taxes, Owner-Occupied Units with a Mortgage, 2013 .....	3.1.9-16
Table 3.1.10-1:	Race and Ethnicity, Alaska.....	3.1.10-3
Table 3.1.11-1:	Historic Properties Listed on the NRHP.....	3.1.11-8
Table 3.1.12-1:	Ambient Air Quality Standards in Alaska .....	3.1.12-2
Table 3.1.12-2:	Nonattainment and Maintenance Areas in Alaska.....	3.1.12-4
Table 3.1.12-3:	PSD Allowable Increase Increments .....	3.1.12-6
Table 3.1.12-4:	Alaska Class I Areas.....	3.1.12-6
Table 3.1.12-5:	General Conformity Emissions Thresholds in Alaska.....	3.1.12-8
Table 3.1.13-1:	Allowable Noise Levels by Receiving Land Use in Anchorage, Alaska .....	3.1.13-2
Table 3.1.13-2:	Typical Noise Levels and Possible Human Effects .....	3.1.13-2
Table 3.1.13-3:	Typical Outdoor Sound Levels by Land Use Category .....	3.1.13-3
Table 3.1.13-4:	Vibration Source Levels for Select Construction Equipment (VdB).....	3.1.13-4
Table 3.1.14-1:	Climatic Regions of Alaska .....	3.1.14-7
Table 3.1.14-2:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for Anchorage, Barrow, Fairbanks, Juneau, and Kodiak, Alaska .....	3.1.14-8

Table 3.1.14-3:	Recorded Severe Weather Occurrences for Alaskan Boroughs/Census Zones (1996-2014) .....	3.1.14-9
Table 3.1.15-1:	Key Health Indicators for Alaska .....	3.1.15-2
Table 3.1.15-2:	Health Conditions Affected by Air Pollution .....	3.1.15-4
Table 3.1.15-3:	Alaska Active Superfund Sites .....	3.1.15-6
Table 3.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	3.2.1-2
Table 3.2.2-1:	Impact Significance Rating Criteria for Soils .....	3.2.2-2
Table 3.2.3-1:	Impact Significance Rating Criteria for Geology .....	3.2.3-2
Table 3.2.4-1:	Impact Significance Rating Criteria for Water Resources.....	3.2.4-2
Table 3.2.5-1:	Impact Significance Rating Criteria for Wetlands.....	3.2.5-2
Table 3.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	3.2.6-3
Table 3.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats....	3.2.6-59
Table 3.2.6.6-2:	Summary of Information on Federally and State-Listed Species and Critical Habitats.....	3.2.6-62
Table 3.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	3.2.6-75
Table 3.2.6.6-4:	Determination of Impact Significance for Listed Species and Critical Habitats as a Result of the Deployable Technologies Alternative .....	3.2.6-77
Table 3.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	3.2.7-2
Table 3.2.8-1:	Impact Significance Rating Criteria for Visual Resources .....	3.2.8-2
Table 3.2.9-1:	Impact Significance Rating Criteria for Socioeconomics.....	3.2.9-2
Table 3.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	3.2.10-2
Table 3.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	3.2.11-2
Table 3.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	3.2.12-2
Table 3.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	3.2.12-7
Table 3.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	3.2.12-8
Table 3.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	3.2.12-8
Table 3.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/Earth Moving Activities .....	3.2.12-9
Table 3.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles .....	3.2.12-12
Table 3.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	3.2.12-12
Table 3.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	3.2.12-16
Table 3.2.12-9:	Combustion Emission Estimates from Diesel Generators on On-Road Vehicles Stationed On-Site.....	3.2.12-17
Table 3.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	3.2.13-2
Table 3.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts .....	3.2.13-6

Table 3.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	3.2.13-7
Table 3.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	3.2.13-8
Table 3.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	3.2.13-11
Table 3.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation—Short-Term.....	3.2.13-12
Table 3.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	3.2.13-17
Table 3.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term .....	3.2.13-18
Table 3.2.14-1:	Impact Significance Rating Criteria for Climate Change .....	3.2.14-2
Table 3.2.14-2:	Projected Temperature and Precipitation Changes.....	3.2.14-4
Table 3.2.14-3:	Projected Global Sea Level Rise Relative to 1992 .....	3.2.14-6
Table 3.2.14-4:	GHG Emission Estimates from Buried Wired Project Deployment.....	3.2.14-11
Table 3.2.14-5:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	3.2.14-12
Table 3.2.14-6:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	3.2.14-13
Table 3.2.14-7:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	3.2.14-14
Table 3.2.14-8:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	3.2.14-16
Table 3.2.14-9:	GHG Emissions from Power Generators for Deployable Technologies .....	3.2.14-17
Table 3.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	3.2.15-2
Table 4.1.1-1:	Airport Distribution by Island in the State of Hawaii.....	4.1.1-7
Table 4.1.1-2:	Hospitals by County in the State of Hawaii.....	4.1.1-11
Table 4.1.1-3:	Public Safety Communications System.....	4.1.1-14
Table 4.1.1-4:	Other Communication Systems .....	4.1.1-15
Table 4.1.2-1:	Major Land Resource Areas in Hawaii .....	4.1.2-4
Table 4.1.2-2:	General Characteristics of Soil Suborders Found in Hawaii .....	4.1.2-5
Table 4.1.3-1:	Volcanoes in Hawaii.....	4.1.3-7
Table 4.1.4-1:	Total Surface Waters for Hawaii .....	4.1.4-2
Table 4.1.4-2:	Summary of Impaired and Attaining Marine Waterbodies in Hawaii.....	4.1.4-10
Table 4.1.5-1:	Acreages, Types, and Descriptions of Wetlands in Hawaii.....	4.1.5-5
Table 4.1.6.3-1:	Vegetation Types/Land Cover Classes in Hawaii .....	4.1.6-4
Table 4.1.6.6-1:	Federal- and State-listed Threatened and Endangered Species Known to Occur in Hawaii.....	4.1.6-29
Table 4.1.7-1:	Land Use/Land Cover in Hawaii .....	4.1.7-6
Table 4.1.7-2:	State Land Use Districts .....	4.1.7-8
Table 4.1.7-3:	Major Land Owners in Hawaii .....	4.1.7-9
Table 4.1.7-4:	Acreage of Recreational Lands in Hawaii, by Type.....	4.1.7-14

Table 4.1.9-1:	National, State, and County Population, Population Density, and Growth Rates .....	4.1.9-3
Table 4.1.9-2:	Population Projections .....	4.1.9-4
Table 4.1.9-3:	Select Economic Indicators .....	4.1.9-4
Table 4.1.9-4:	Housing Units, Occupancy, and Tenure .....	4.1.9-6
Table 4.1.9-5:	Housing Costs .....	4.1.9-7
Table 4.1.9-6:	Median Value of Owner Occupied Single Family Homes, 2009 to 2013 American Community Survey .....	4.1.9-7
Table 4.1.9-7:	Real Estate Taxes, Owner-Occupied Units with a Mortgage .....	4.1.9-8
Table 4.1.10-1:	Race and Ethnicity .....	4.1.10-4
Table 4.1.11-1:	Historic Properties Listed on the NRHP .....	4.1.11-6
Table 4.1.12-1:	Ambient Air Quality Standards in Hawaii .....	4.1.12-2
Table 4.1.12-2:	PSD Allowable Increase Increments .....	4.1.12-5
Table 4.1.12-3:	Hawaii Class I Areas .....	4.1.12-5
Table 4.1.13-1:	Maximum Permissible Sound Levels (dBA) in Hawaii .....	4.1.13-2
Table 4.1.13-2:	Maximum Permissible Sound Levels per Octave Band Center Frequency for Intensive Industrial and Waterfront Districts in Honolulu .....	4.1.13-2
Table 4.1.13-3:	Typical Noise Levels and Possible Human Effects .....	4.1.13-3
Table 4.1.13-4:	Typical Outdoor Sound Levels by Land Use Category .....	4.1.13-4
Table 4.1.13-5:	Vibration Source Levels for Select Construction Equipment (VdB) .....	4.1.13-5
Table 4.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for Hawaii .....	4.1.14-6
Table 4.1.14-2:	Hawaii Severe Weather System Characteristics .....	4.1.14-7
Table 4.1.14-3:	Severe Weather Data for Hawaii (1996-2014) .....	4.1.14-7
Table 4.1.15-1:	Key Health Indicators for Hawaii .....	4.1.15-2
Table 4.1.15-2:	Health Conditions Affected by Air Pollution .....	4.1.15-4
Table 4.1.15-3:	Hawaii Active Superfund Sites .....	4.1.15-6
Table 4.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	4.2.1-2
Table 4.2.2-1:	Impact Significance Rating Criteria for Soils .....	4.2.2-2
Table 4.2.3-1:	Impact Significance Rating Criteria for Geology .....	4.2.3-2
Table 4.2.4-1:	Impact Significance Rating Criteria for Water Resources .....	4.2.4-2
Table 4.2.5-1:	Impact Significance Rating Criteria for Wetlands .....	4.2.5-2
Table 4.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	4.2.6-3
Table 4.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats .....	4.2.6-58
Table 4.2.6.6-2:	Summary of Information on Federally and State-Listed Species in Hawaii .....	4.2.6-61
Table 4.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	4.2.6-73
Table 4.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	4.2.6-76
Table 4.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	4.2.7-2
Table 4.2.8-1:	Impact Significance Rating Criteria for Visual Resources .....	4.2.8-2
Table 4.2.9-1:	Impact Significance Rating Criteria for Socioeconomics .....	4.2.9-2

Table 4.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	4.2.10-2
Table 4.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	4.2.11-2
Table 4.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	4.2.12-2
Table 4.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	4.2.12-7
Table 4.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	4.2.12-8
Table 4.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	4.2.12-8
Table 4.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/ Earth Moving Activities .....	4.2.12-9
Table 4.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles .....	4.2.12-11
Table 4.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	4.2.12-12
Table 4.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	4.2.12-15
Table 4.2.12-9:	Combustion Emission Estimates from Diesel Generators on On-Road Vehicles Stationed On-site .....	4.2.12-16
Table 4.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	4.2.13-2
Table 4.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts .....	4.2.13-6
Table 4.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	4.2.13-7
Table 4.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	4.2.13-8
Table 4.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	4.2.13-11
Table 4.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term.....	4.2.13-12
Table 4.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	4.2.13-17
Table 4.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term .....	4.2.13-18
Table 4.2.14-1:	Impact Significance Rating Criteria for Climate Change .....	4.2.14-2
Table 4.2.14-2:	Projected Temperature Changes .....	4.2.14-4
Table 4.2.14-3:	Projected Global Sea Level Rise Relative to 1992.....	4.2.14-6
Table 4.2.14-4:	GHG Emission Estimates from Buried Wired Project Deployment.....	4.2.14-10
Table 4.2.14-5:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	4.2.14-10
Table 4.2.14-6:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	4.2.14-12
Table 4.2.14-7:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	4.2.14-13

Table 4.2.14-8:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	4.2.14-15
Table 4.2.14-9:	GHG Emissions from Power Generators for Deployable Technologies .....	4.2.14-16
Table 4.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	4.2.15-2
Table 5.1.2-1:	Major Characteristics of MUIDs and Soil Types Found in American Samoa .....	5.1.2-3
Table 5.1.4-1:	Total Surface Waters for American Samoa .....	5.1.4-2
Table 5.1.5-1:	Acreages, Types, and Descriptions of Wetlands in the islands of Tutuila and Aunu'u, American Samoa .....	5.1.5-5
Table 5.1.6.3-1:	Vegetation Types/ Land Cover Classes in American Samoa .....	5.1.6-4
Table 5.1.6.3-2:	Endemic Plant Species in American Samoa .....	5.1.6-7
Table 5.1.6.6-1:	Federal- and Territory-listed Threatened and Endangered Species Known to Occur in American Samoa .....	5.1.6-32
Table 5.1.7-1:	Land Use/Land Cover in American Samoa .....	5.1.7-4
Table 5.1.7-2:	Major Land Owners in American Samoa .....	5.1.7-6
Table 5.1.7-3:	Acreage of Recreational Lands in American Samoa, by Type .....	5.1.7-9
Table 5.1.9-1:	National, Territory, and District Population, Population Density, and Growth Rates .....	5.1.9-2
Table 5.1.9-2:	Population Projections .....	5.1.9-3
Table 5.1.9-3:	Select Economic Indicators, 2010 .....	5.1.9-4
Table 5.1.9-4:	Housing Units, Occupancy, and Tenure, 2010 .....	5.1.9-4
Table 5.1.9-5:	Housing Costs .....	5.1.9-5
Table 5.1.9-6:	Median Value of Owner Occupied Single Family Homes .....	5.1.9-5
Table 5.1.10-1:	Race and Ethnicity, American Samoa, 2010 .....	5.1.10-3
Table 5.1.11-1:	Historic Properties Listed on the NRHP .....	5.1.11-6
Table 5.1.12-1:	Ambient Air Quality Standards in American Samoa .....	5.1.12-2
Table 5.1.12-2:	PSD Allowable Increase Increments .....	5.1.12-5
Table 5.1.13-1:	Typical Noise Levels and Possible Human Effects .....	5.1.13-2
Table 5.1.13-2:	Typical Outdoor Sound Levels by Land Use Category .....	5.1.13-3
Table 5.1.13-3:	Vibration Source Levels for Select Construction Equipment (VdB) .....	5.1.13-4
Table 5.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for American Samoa .....	5.1.14-6
Table 5.1.14-2:	Severe Weather Data for Inhabited Islands in American Samoa (1996-2014) .....	5.1.14-6
Table 5.1.15-1:	Key Health Indicators for American Samoa .....	5.1.15-2
Table 5.1.15-2:	Health Conditions Affected by Air Pollution .....	5.1.15-4
Table 5.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	5.2.1-2
Table 5.2.2-1:	Impact Significance Rating Criteria for Soils .....	5.2.2-2
Table 5.2.3-1:	Impact Significance Rating Criteria for Geology .....	5.2.3-2
Table 5.2.4-1:	Impact Significance Rating Criteria for Water Resources .....	5.2.4-2
Table 5.2.5-1:	Impact Significance Rating Criteria for Wetlands .....	5.2.5-2
Table 5.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	5.2.6-3
Table 5.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats .....	5.2.6-58

Table 5.2.6.6-2:	Summary of Information on Federally and Territory-Listed Species in American Samoa.....	5.2.6-61
Table 5.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	5.2.6-74
Table 5.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	5.2.6-76
Table 5.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	5.2.7-2
Table 5.2.8-1:	Impact Significance Rating Criteria for Visual Resources.....	5.2.8-2
Table 5.2.9-1:	Impact Significance Rating Criteria for Socioeconomics.....	5.2.9-2
Table 5.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	5.2.10-2
Table 5.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	5.2.11-2
Table 5.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	5.2.12-2
Table 5.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	5.2.12-7
Table 5.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	5.2.12-8
Table 5.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	5.2.12-8
Table 5.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/Earth Moving Activities .....	5.2.12-9
Table 5.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles.....	5.2.12-11
Table 5.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	5.2.12-12
Table 5.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	5.2.12-15
Table 5.2.12-9:	Combustion Emission Estimates from Diesel Power Generators on On-Road Vehicles Stationed On-Site.....	5.2.12-16
Table 5.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	5.2.13-2
Table 5.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts.....	5.2.13-6
Table 5.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	5.2.13-7
Table 5.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	5.2.13-7
Table 5.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	5.2.13-10
Table 5.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term.....	5.2.13-11
Table 5.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	5.2.13-17
Table 5.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term .....	5.2.13-18



Table 5.2.14-1:	Impact Significance Rating Criteria for Climate Change.....	5.2.14-2
Table 5.2.14-2:	Projected Average Annual Temperature Changes.....	5.2.14-4
Table 5.2.14-3:	Projected Global Sea Level Rise Relative to 1992.....	5.2.14-5
Table 5.2.14-4:	GHG Emission Estimates from Buried Wired Project Deployment.....	5.2.14-10
Table 5.2.14-5:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	5.2.14-10
Table 5.2.14-6:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	5.2.14-12
Table 5.2.14-7:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	5.2.14-13
Table 5.2.14-8:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	5.2.14-15
Table 5.2.14-9:	GHG Emissions from Power Generators for Deployable Technologies .....	5.2.14-16
Table 5.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	5.2.15-2
Table 6.1.2-1:	Major Characteristics of MUIDs and Soil Types Found in Guam .....	6.1.2-5
Table 6.1.3-1:	Geologic Rock Unit Ages in Guam .....	6.1.3-3
Table 6.1.4-1:	Total Surface Waters for Guam.....	6.1.4-2
Table 6.1.5-1:	Acreages, Types, and Descriptions of Wetlands in Guam.....	6.1.5-5
Table 6.1.6.3-1:	Vegetation Types/ Land Cover Classes in Guam .....	6.1.6-4
Table 6.1.6.6-1:	Federal- and Territory-listed Threatened and Endangered Species Known to Occur in Guam.....	6.1.6-28
Table 6.1.7-1:	Land Use/Land Cover in Guam.....	6.1.7-6
Table 6.1.7-2:	Major Land Owners in Guam .....	6.1.7-6
Table 6.1.7-3:	Acreage of Recreational Lands in Guam, by Type.....	6.1.7-9
Table 6.1.9-1:	National and Territory Population, Population Density, and Growth Rates.....	6.1.9-2
Table 6.1.9-2:	Population Projections .....	6.1.9-3
Table 6.1.9-3:	Select Economic Indicators, 2010 .....	6.1.9-4
Table 6.1.9-4:	Housing Units, Occupancy, and Tenure, 2010 .....	6.1.9-4
Table 6.1.9-5:	Housing Costs.....	6.1.9-4
Table 6.1.9-6:	Median Value of Owner-Occupied Single Family Homes, 2010 .....	6.1.9-4
Table 6.1.10-1:	Race and Ethnicity, Guam, 2010 .....	6.1.10-3
Table 6.1.11-1:	Historic Properties Listed on the GRHP and NRHP .....	6.1.11-7
Table 6.1.12-1:	Ambient Air Quality Standards in Guam .....	6.1.12-2
Table 6.1.12-2:	Nonattainment Areas in Guam .....	6.1.12-4
Table 6.1.12-3:	PSD Allowable Increase Increments .....	6.1.12-5
Table 6.1.12-4:	General Conformity Emissions Threshold in Guam.....	6.1.12-6
Table 6.1.13-1:	Typical Noise Levels and Possible Human Effects .....	6.1.13-2
Table 6.1.13-2:	Typical Outdoor Sound Levels by Land Use Category .....	6.1.13-3
Table 6.1.13-3:	Vibration Source Levels for Select Construction Equipment (VdB).....	6.1.13-4
Table 6.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for Guam .....	6.1.14-6
Table 6.1.14-2:	Severe Weather Data for Guam (1996-2014) .....	6.1.14-6
Table 6.1.15-1:	Key Health Indicators for Guam.....	6.1.15-2
Table 6.1.15-2:	Health Conditions Affected by Air Pollution .....	6.1.15-5
Table 6.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	6.2.1-2

Table 6.2.2-1:	Impact Significance Rating Criteria for Soils.....	6.2.2-2
Table 6.2.3-1:	Impact Significance Rating Criteria for Geology .....	6.2.3-2
Table 6.2.4-1:	Impact Significance Rating Criteria for Water Resources.....	6.2.4-2
Table 6.2.5-1:	Impact Significance Rating Criteria for Wetlands.....	6.2.5-2
Table 6.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	6.2.6-3
Table 6.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats....	6.2.6-57
Table 6.2.6.6-2:	Summary of Information on Federally and Territory-Listed Species in Guam..	6.2.6-60
Table 6.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	6.2.6-74
Table 6.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	6.2.6-76
Table 6.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	6.2.7-2
Table 6.2.8-1:	Impact Significance Rating Criteria for Visual Resources.....	6.2.8-2
Table 6.2.9-1:	Impact Significance Rating Criteria for Socioeconomics.....	6.2.9-2
Table 6.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	6.2.10-2
Table 6.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	6.2.11-2
Table 6.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	6.2.12-2
Table 6.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	6.2.12-7
Table 6.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	6.2.12-8
Table 6.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	6.2.12-8
Table 6.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/Earth Moving Activities .....	6.2.12-9
Table 6.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles.....	6.2.12-12
Table 6.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	6.2.12-12
Table 6.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	6.2.12-15
Table 6.2.12-9:	Combustion Emission Estimates from Diesel Generators on On-Road Vehicles Stationed On-Site.....	6.2.12-16
Table 6.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	6.2.13-2
Table 6.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts.....	6.2.13-6
Table 6.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	6.2.13-7
Table 6.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	6.2.13-8
Table 6.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	6.2.13-11

Table 6.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term.....	6.2.13-12
Table 6.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	6.2.13-17
Table 6.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term.....	6.2.13-18
Table 6.2.14-1:	Impact Significance Rating Criteria for Climate Change.....	6.2.14-2
Table 6.2.14-2:	Projected Average Annual Temperature Changes.....	6.2.14-4
Table 6.2.14-3:	Projected Global Sea Level Rise Relative to 1992.....	6.2.14-5
Table 6.2.14-4:	GHG Emission Estimates from Buried Wired Project Deployment.....	6.2.14-10
Table 6.2.14-5:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	6.2.14-10
Table 6.2.14-6:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation.....	6.2.14-12
Table 6.2.14-7:	GHG Emissions Estimates from Heavy and Light Duty Vehicles.....	6.2.14-13
Table 6.2.14-8:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects.....	6.2.14-15
Table 6.2.14-9:	GHG Emissions from Power Generators for Deployable Technologies.....	6.2.14-16
Table 6.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety.....	6.2.15-2
Table 7.1.2-1:	Major Characteristics of MUIDs and Soil Types Found in the Northern Mariana Islands.....	7.1.2-5
Table 7.1.4-1:	Total Surface Waters for the Northern Mariana Islands.....	7.1.4-2
Table 7.1.5-1:	Acreages, Types, and Descriptions of Wetlands on the Northern Mariana Islands.....	7.1.5-5
Table 7.1.6.3-1:	Vegetation Types/Land Cover Classes in the Northern Mariana Islands.....	7.1.6-4
Table 7.1.6.6-1:	Federal- and Commonwealth-listed Threatened and Endangered Species Known to Occur in the Northern Mariana Islands.....	7.1.6-28
Table 7.1.7-1:	Land Use/Land Cover in the Northern Mariana Islands.....	7.1.7-5
Table 7.1.7-2:	Major Land Owners in the Northern Mariana Islands.....	7.1.7-7
Table 7.1.7-3:	Acreage of Recreational Lands in the Northern Mariana Islands, by Type.....	7.1.7-9
Table 7.1.9-1:	National, Territory, and Municipality Population, Population Density, and Growth Rates.....	7.1.9-3
Table 7.1.9-2:	Population Projections.....	7.1.9-3
Table 7.1.9-3:	Select Economic Indicators, 2010.....	7.1.9-4
Table 7.1.9-4:	Housing Units, Occupancy, and Tenure, 2010.....	7.1.9-4
Table 7.1.9-5:	Housing Costs.....	7.1.9-5
Table 7.1.9-6:	Median Value of Owner Occupied Single Family Homes.....	7.1.9-5
Table 7.1.10-1:	Race and Ethnicity, Northern Mariana Islands, 2010.....	7.1.10-3
Table 7.1.11-1:	Historic Properties Listed on the NRHP.....	7.1.11-7
Table 7.1.12-1:	Ambient Air Quality Standards in the Northern Mariana Islands.....	7.1.12-2
Table 7.1.12-2:	PSD Allowable Increase Increments.....	7.1.12-5
Table 7.1.13-1:	Typical Noise Levels and Possible Human Effects.....	7.1.13-2
Table 7.1.13-2:	Typical Outdoor Sound Levels by Land Use Category.....	7.1.13-3
Table 7.1.13-3:	Vibration Source Levels for Select Construction Equipment (VdB).....	7.1.13-4

Table 7.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for Guam (representative of the Northern Mariana Islands) .....	7.1.14-6
Table 7.1.14-2:	Severe Weather Data for the Northern Mariana Islands (1996-2014) .....	7.1.14-6
Table 7.1.15-1:	Key Health Indicators for Northern Mariana Islands .....	7.1.15-2
Table 7.1.15-2:	Health Conditions Affected by Air Pollution .....	7.1.15-4
Table 7.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	7.2.1-2
Table 7.2.2-1:	Impact Significance Rating Criteria for Soils .....	7.2.2-2
Table 7.2.3-1:	Impact Significance Rating Criteria for Geology .....	7.2.3-2
Table 7.2.4-1:	Impact Significance Rating Criteria for Water Resources.....	7.2.4-2
Table 7.2.5-1:	Impact Significance Rating Criteria for Wetlands.....	7.2.5-2
Table 7.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	7.2.6-3
Table 7.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats....	7.2.6-58
Table 7.2.6.6-2:	Summary of Information on Federally and Territory-Listed Species in the Northern Mariana Islands .....	7.2.6-61
Table 7.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	7.2.6-74
Table 7.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	7.2.6-76
Table 7.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation ....	7.2.7-2
Table 7.2.8-1:	Impact Significance Rating Criteria for Visual Resources .....	7.2.8-2
Table 7.2.9-1:	Impact Significance Rating Criteria for Socioeconomics.....	7.2.9-2
Table 7.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	7.2.10-2
Table 7.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	7.2.11-2
Table 7.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	7.2.12-2
Table 7.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	7.2.12-7
Table 7.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	7.2.12-8
Table 7.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	7.2.12-8
Table 7.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/Earth Moving Activities .....	7.2.12-9
Table 7.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles .....	7.2.12-11
Table 7.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	7.2.12-12
Table 7.2.12-8:	Combustion Emission Estimates from Diesel Backup Generators at Wireless Communication Towers .....	7.2.12-15
Table 7.2.12-9:	Combustion Emission Estimates from Diesel Generators on On-Road Vehicles Stationed On-Site.....	7.2.12-16
Table 7.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	7.2.13-2
Table 7.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts .....	7.2.13-6

Table 7.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	7.2.13-7
Table 7.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	7.2.13-8
Table 7.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	7.2.13-11
Table 7.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term.....	7.2.13-12
Table 7.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	7.2.13-17
Table 7.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term.....	7.2.13-18
Table 7.2.14-1:	Impact Significance Rating Criteria for Climate Change.....	7.2.14-2
Table 7.2.14-2:	Projected Average Annual Temperature Changes.....	7.2.14-4
Table 7.2.14-3:	Projected Global Sea Level Rise Relative to 1992.....	7.2.14-5
Table 7.2.14-4:	GHG Emission Estimates from Buried Wired Project Deployment.....	7.2.14-10
Table 7.2.14-5:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	7.2.14-10
Table 7.2.14-6:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	7.2.14-12
Table 7.2.14-7:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	7.2.14-13
Table 7.2.14-8:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	7.2.14-15
Table 7.2.14-9:	GHG Emissions from Power Generators for Deployable Technologies .....	7.2.14-16
Table 7.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	7.2.15-2
Table 8.1.2-1:	General Characteristics of Soil Suborders Found in Puerto Rico.....	8.1.2-5
Table 8.1.3-1:	Large Earthquakes Recorded Near Puerto Rico and the U.S. Virgin Islands.....	8.1.3-5
Table 8.1.4-1:	Total Surface Waters for Puerto Rico.....	8.1.4-2
Table 8.1.5-1:	Acreages, Types, and Descriptions of Wetlands in Puerto Rico .....	8.1.5-5
Table 8.1.6.3-1:	Vegetation Types/Land Cover Classes in Puerto Rico.....	8.1.6-4
Table 8.1.6.6-1:	Federal- and Territory-listed Threatened and Endangered Species Known to Occur in Puerto Rico .....	8.1.6-30
Table 8.1.7-1:	Land Use/Land Cover in Puerto Rico.....	8.1.7-5
Table 8.1.7-2:	Major Land Owners in Puerto Rico.....	8.1.7-7
Table 8.1.7-3:	Acreage of Recreational Lands in Puerto Rico, by Type .....	8.1.7-12
Table 8.1.9-1:	National and Territory Population, Population Density, and Growth Rates.....	8.1.9-2
Table 8.1.9-2:	Population Projections.....	8.1.9-4
Table 8.1.9-3:	Select Economic Indicators, 2013 .....	8.1.9-4
Table 8.1.9-4:	Housing Units, Occupancy, and Tenure .....	8.1.9-8
Table 8.1.9-5:	Housing Costs.....	8.1.9-9
Table 8.1.9-6:	Median Value of Owner-Occupied Single Family Homes, 2013 .....	8.1.9-9
Table 8.1.9-7:	Real Estate Taxes, Owner-Occupied Units with a Mortgage, 2013 .....	8.1.9-9
Table 8.1.10-1:	Race and Ethnicity, Puerto Rico.....	8.1.10-3

Table 8.1.11-1:	Historic Properties Listed on the NRHP.....	8.1.11-5
Table 8.1.12-1:	Ambient Air Quality Standards in Puerto Rico.....	8.1.12-2
Table 8.1.12-2:	Nonattainment and Maintenance Areas in Puerto Rico.....	8.1.12-4
Table 8.1.12-3:	PSD Allowable Increase Increments .....	8.1.12-5
Table 8.1.12-4:	General Conformity Emissions Thresholds in Puerto Rico.....	8.1.12-6
Table 8.1.13-1:	Noise Level Limits .....	8.1.13-2
Table 8.1.13-2:	Typical Noise Levels and Possible Human Effects .....	8.1.13-2
Table 8.1.13-3:	Typical Outdoor Sound Levels by Land Use Category .....	8.1.13-3
Table 8.1.13-4:	Vibration Source Levels for Select Construction Equipment (VdB).....	8.1.13-4
Table 8.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for Puerto Rico .....	8.1.14-6
Table 8.1.14-2:	Severe Weather Data for Puerto Rico (1996-2014).....	8.1.14-6
Table 8.1.15-1:	Key Health Indicators for Puerto Rico .....	8.1.15-2
Table 8.1.15-2:	Health Conditions Affected by Air Pollution .....	8.1.15-4
Table 8.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	8.2.1-2
Table 8.2.2-1:	Impact Significance Rating Criteria for Soils.....	8.2.2-2
Table 8.2.3-1:	Impact Significance Rating Criteria for Geology .....	8.2.3-2
Table 8.2.4-1:	Impact Significance Rating Criteria for Water Resources.....	8.2.4-2
Table 8.2.5-1:	Impact Significance Rating Criteria for Wetlands.....	8.2.5-2
Table 8.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	8.2.6-3
Table 8.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats....	8.2.6-57
Table 8.2.6.6-2:	Summary of Information on Federally and Territory-Listed Species in Puerto Rico .....	8.2.6-59
Table 8.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	8.2.6-74
Table 8.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	8.2.6-76
Table 8.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	8.2.7-2
Table 8.2.8-1:	Impact Significance Rating Criteria for Visual Resources.....	8.2.8-2
Table 8.2.9-1:	Impact Significance Rating Criteria for Socioeconomics.....	8.2.9-2
Table 8.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	8.2.10-2
Table 8.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	8.2.11-2
Table 8.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	8.2.12-2
Table 8.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	8.2.12-7
Table 8.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	8.2.12-8
Table 8.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	8.2.12-8
Table 8.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/ Earth Moving Activities .....	8.2.12-9
Table 8.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles.....	8.2.12-11

Table 8.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	8.2.12-12
Table 8.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	8.2.12-15
Table 8.2.12-9:	Combustion Emission Estimates from Diesel Generators on On-Road Vehicles .....	8.2.12-16
Table 8.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	8.2.13-2
Table 8.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts .....	8.2.13-6
Table 8.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	8.2.13-7
Table 8.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	8.2.13-8
Table 8.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	8.2.13-11
Table 8.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term .....	8.2.13-12
Table 8.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	8.2.13-17
Table 8.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term .....	8.2.13-18
Table 8.2.14-1:	Impact Significance Rating Criteria for Climate Change.....	8.2.14-2
Table 8.2.14-2:	Projected Global Sea Level Rise Relative to 1992 .....	8.2.14-5
Table 8.2.14-3:	GHG Emission Estimates from Buried Wired Project Deployment.....	8.2.14-9
Table 8.2.14-4:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	8.2.14-9
Table 8.2.14-5:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	8.2.14-11
Table 8.2.14-6:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	8.2.14-12
Table 8.2.14-7:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	8.2.14-14
Table 8.2.14-8:	GHG Emissions from Power Generators for Deployable Technologies .....	8.2.14-15
Table 8.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	8.2.15-2
Table 9.1.2-1:	Major Characteristics of MUIDs and Soil Types Found in U.S. Virgin Islands ..	9.1.2-5
Table 9.1.3-1:	Large Earthquakes Recorded Near U.S. Virgin Islands and Puerto Rico.....	9.1.3-4
Table 9.1.5-1:	Acreages, Types, and Descriptions of Wetlands in the U.S. Virgin Islands.....	9.1.5-5
Table 9.1.6.3-1:	Vegetation Types/Land Cover Classes in the U.S. Virgin Islands .....	9.1.6-4
Table 9.1.6.6-1:	Federal- and Territory-listed Threatened and Endangered Species Known to Occur in the U.S. Virgin Islands.....	9.1.6-30
Table 9.1.7-1:	Land Use/Land Cover in U.S. Virgin Islands.....	9.1.7-4
Table 9.1.7-2:	Major Land Owners in U.S. Virgin Islands.....	9.1.7-7
Table 9.1.7-3:	Acreage of Recreational Lands in U.S. Virgin Islands, by Type.....	9.1.7-9
Table 9.1.9-1:	National and Territory Population, Population Density, and Growth Rates.....	9.1.9-2

Table 9.1.9-2:	Population Projections .....	9.1.9-3
Table 9.1.9-3:	Select Economic Indicators, 2010 .....	9.1.9-4
Table 9.1.9-4:	Housing Units, Occupancy, and Tenure, 2010 .....	9.1.9-5
Table 9.1.9-5:	Housing Costs, 2010 .....	9.1.9-6
Table 9.1.9-6:	Value of Owner Occupied Single Family Homes, 2010 U.S. Census .....	9.1.9-6
Table 9.1.10-1:	Race and Ethnicity, U.S. Virgin Islands, 2010 .....	9.1.10-3
Table 9.1.11-1:	Historic Properties Listed on the NRHP .....	9.1.11-5
Table 9.1.12-1:	Ambient Air Quality Standards in the U.S. Virgin Islands .....	9.1.12-2
Table 9.1.12-2:	PSD Allowable Increase Increments .....	9.1.12-5
Table 9.1.12-3:	U.S. Virgin Islands Class I Area .....	9.1.12-5
Table 9.1.13-1:	Typical Noise Levels and Possible Human Response .....	9.1.13-2
Table 9.1.13-2:	Typical Outdoor Sound Levels by Land Use Category .....	9.1.13-3
Table 9.1.13-3:	Vibration Source Levels for Select Construction Equipment (VdB) .....	9.1.13-4
Table 9.1.14-1:	Annual Average Temperature, Humidity, Precipitation, and Wind Speed Data for the U.S. Virgin Islands .....	9.1.14-6
Table 9.1.14-2:	Severe Weather Data for the U.S. Virgin Islands (1996-2014) .....	9.1.14-6
Table 9.1.15-1:	Key Health Indicators for U.S. Virgin Islands .....	9.1.15-2
Table 9.1.15-2:	Health Conditions Affected by Air Pollution .....	9.1.15-4
Table 9.1.15-3:	U.S. Virgin Islands Active Superfund Sites .....	9.1.15-5
Table 9.2.1-1:	Impact Significance Rating Criteria for Infrastructure .....	9.2.1-2
Table 9.2.2-1:	Impact Significance Rating Criteria for Soils .....	9.2.2-2
Table 9.2.3-1:	Impact Significance Rating Criteria for Geology .....	9.2.3-2
Table 9.2.4-1:	Impact Significance Rating Criteria for Water Resources .....	9.2.4-2
Table 9.2.5-1:	Impact Significance Rating Criteria for Wetlands .....	9.2.5-2
Table 9.2.6.2-1:	Impact Significance Rating Criteria for Terrestrial Vegetation, Wildlife, and Fisheries and Aquatic Habitats .....	9.2.6-3
Table 9.2.6.6-1:	Impact Significance Rating Criteria for Listed Species and Critical Habitats .....	9.2.6-57
Table 9.2.6.6-2:	Summary of Information on Federally and Territory-Listed Species in the U.S. Virgin Islands .....	9.2.6-60
Table 9.2.6.6-3:	Determination of Impact Significance for Listed Species as a Result of the Preferred Alternative .....	9.2.6-72
Table 9.2.6.6-4:	Determination of Impact Significance for Listed Species as a Result of the Deployable Technologies Alternative .....	9.2.6-75
Table 9.2.7-1:	Impact Significance Rating Criteria for Land Use, Airspace, and Recreation .....	9.2.7-2
Table 9.2.8-1:	Impact Significance Rating Criteria for Visual Resources .....	9.2.8-2
Table 9.2.9-1:	Impact Significance Rating Criteria for Socioeconomics .....	9.2.9-2
Table 9.2.10-1:	Impact Significance Rating Criteria for Environmental Justice .....	9.2.10-2
Table 9.2.11-1:	Impact Significance Rating Criteria for Cultural Resources .....	9.2.11-2
Table 9.2.12-1:	Impact Significance Rating Criteria for Air Quality .....	9.2.12-2
Table 9.2.12-2:	Combustion Emission Estimates (Monthly) from New Buried Wired Project Deployment .....	9.2.12-7
Table 9.2.12-3:	Combustion Emission Estimates (Monthly) from New Aerial Wired Project Deployment .....	9.2.12-8



Table 9.2.12-4:	Combustion Emission Estimates (Monthly) from Tower, Structure, and Transmission Equipment Delivery and Installation.....	9.2.12-8
Table 9.2.12-5:	Dust Emission Estimates (Monthly) from Excavation/Filling and Grading/Earth Moving Activities .....	9.2.12-9
Table 9.2.12-6:	Combustion Emission Estimates from Heavy-Duty Vehicles.....	9.2.12-11
Table 9.2.12-7:	Combustion Emission Estimates from Light-Duty Trucks.....	9.2.12-12
Table 9.2.12-8:	Combustion Emission Estimates from Diesel Backup Power Generators at Wireless Communication Towers.....	9.2.12-15
Table 9.2.12-9:	Combustion Emission Estimates from Diesel Power Generators on On-Road Vehicles Stationed On-Site.....	9.2.12-16
Table 9.2.13-1:	Impact Significance Rating Criteria for Noise and Vibrations.....	9.2.13-2
Table 9.2.13-2:	Limiting Distances for Maximum Noise Levels Associated with New Buried Wired Activities such as Plowing, Wire Installation, and Construction of Points of Presence and Fiber Huts.....	9.2.13-7
Table 9.2.13-3:	Limiting Distances for Maximum Noise Levels Associated with New Aerial Wired Activities such as Excavation, Grading, and Pole Delivery and Installation .....	9.2.13-8
Table 9.2.13-4:	Limiting Distances for Maximum Noise Levels Associated with Tower, Structure, and Transmission Equipment Delivery and Installation .....	9.2.13-7
Table 9.2.13-5:	Limiting Distances for Maximum Noise Levels Associated with Collocation on Existing Wireless Tower, Structure, or Building.....	9.2.13-11
Table 9.2.13-6:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Short-Term.....	9.2.13-12
Table 9.2.13-7:	Limiting Distances for Maximum Noise Levels Associated with Power Generators and Ventilation Fans at Fiber Huts or Central Offices.....	9.2.13-17
Table 9.2.13-8:	Limiting Distances for Maximum Noise Levels Associated with Deployable Technologies Implementation – Long-Term .....	9.2.13-18
Table 9.2.14-1:	Impact Significance Rating Criteria for Climate Change.....	9.2.14-2
Table 9.2.14-2:	Projected Global Sea Level Rise Relative to 1992.....	9.2.14-5
Table 9.2.14-3:	GHG Emission Estimates from Buried Wired Project Deployment.....	9.2.14-9
Table 9.2.14-4:	GHG Emission Estimates from New Aerial Wired Project Deployment.....	9.2.14-9
Table 9.2.14-5:	GHG Emissions Estimates from Tower, Structure, and Transmission Equipment Delivery and Installation .....	9.2.14-11
Table 9.2.14-6:	GHG Emissions Estimates from Heavy and Light Duty Vehicles .....	9.2.14-12
Table 9.2.14-7:	GHG Emissions from Back-up Diesel Power Generators for Wireless Projects .....	9.2.14-14
Table 9.2.14-8:	GHG Emissions from Power Generators for Deployable Technologies .....	9.2.14-15
Table 9.2.15-1:	Impact Significance Rating Criteria for Human Health and Safety .....	9.2.15-2
Table 10-1:	Additional Broadband Infrastructure Projects .....	10-2
Table 12.2-1:	Comparison of Alternatives by Resource Area and Type of Effect .....	12-4
Table 13.2-1:	Summary of Irreversible and Irretrievable Commitment of Resources by Resource Area.....	13-2

Table 14-1:	Draft PEIS Comment Response Matrix.....	14-3
Table 14-2:	Comments on Other Reports Applicable to this Final PEIS.....	14-37

## LIST OF FIGURES

Figure 1.3-1:	FirstNet Programmatic Environmental Impact Statement Regions of Analysis .....	1-5
Figure 2.4.1-1:	The Electromagnetic Spectrum.....	2-9
Figure 2.4.2-1:	Lattice Cell Tower with Multiple Panel Antennas .....	2-14
Figure 2.4.2-2:	Depiction of Primary Radiation Lobe of a Panel Antenna Attached to a 200-foot (61-meter) Cell Tower .....	2-14
Figure 2.4.2-3:	60-W Antenna (780 MHz) - Power Intensity vs Distance with Respect to FCC Guidelines for Limiting Thermal Radiation .....	2-15
Figure 3-1:	Alaska Geography .....	3-4
Figure 3.1.1-1:	Ports, Railroads, and Roads in Alaska by Location.....	3.1.1-3
Figure 3.1.1-2:	Alaska State Trooper Detachment Boundaries and Post Locations.....	3.1.1-5
Figure 3.1.1-3:	Rural Alaska Water and Sewer System Types .....	3.1.1-8
Figure 3.1.2-1:	Major Land Resources Areas of Alaska .....	3.1.2-3
Figure 3.1.2-2:	Soil Suborder Map of Alaska .....	3.1.2-13
Figure 3.1.3-1:	Primary Mineral Production Areas in Alaska.....	3.1.3-3
Figure 3.1.3-2:	General Seismic Hazard Map of Alaska.....	3.1.3-6
Figure 3.1.3-3:	Active and Dormant Volcanoes in Alaska.....	3.1.3-7
Figure 3.1.4-1:	Spatial Distribution of Alaska's Perennial Streams.....	3.1.4-3
Figure 3.1.4-2:	Major Watersheds in Alaska.....	3.1.4-5
Figure 3.1.4-3:	Example Map of Alaska Floodplains .....	3.1.4-8
Figure 3.1.5-1:	Alaska Wetland Types.....	3.1.5-4
Figure 3.1.5-2:	Palustrine Vegetated Wetland in Alaska .....	3.1.5-7
Figure 3.1.5-3:	Estuarine Vegetated Wetland in Alaska .....	3.1.5-7
Figure 3.1.5-4:	Marine Intertidal Wetland in Alaska .....	3.1.5-8
Figure 3.1.6.3-1:	Vegetation Types and Land Cover Classes in Alaska .....	3.1.6-3
Figure 3.1.6.3-2:	Canada Thistle .....	3.1.6-6
Figure 3.1.6.3-3:	European Bird Cherry.....	3.1.6-7
Figure 3.1.6.3-4:	Giant Hogweed.....	3.1.6-7
Figure 3.1.6.3-5:	Leafy Spurge.....	3.1.6-8
Figure 3.1.6.3-6:	Purple Loosestrife.....	3.1.6-8
Figure 3.1.6.3-7:	Smooth Cordgrass.....	3.1.6-9
Figure 3.1.6.3-8:	Spotted Knapweed.....	3.1.6-9
Figure 3.1.6.4-1:	ADFG Game Management Regions .....	3.1.6-12
Figure 3.1.6.4-2:	Distribution of Alaska Caribou Herds .....	3.1.6-20

Figure 3.1.6.4-3:	Dall Sheep, Bison, and Muskox Distributions in Alaska .....	3.1.6-22
Figure 3.1.6.4-4:	Distribution of Pacific Walrus in Alaska.....	3.1.6-26
Figure 3.1.6.4-5:	Distribution of Beluga Whales in Alaska .....	3.1.6-28
Figure 3.1.6.4-6:	Bird Conservation Regions in Alaska.....	3.1.6-29
Figure 3.1.6.4-7:	Protected Areas in Alaska.....	3.1.6-34
Figure 3.1.6.4-8:	Important Bird Areas in Alaska.....	3.1.6-35
Figure 3.1.6.5-1:	Spatial Distribution of Alaska Fisheries Regions .....	3.1.6-39
Figure 3.1.6.5-2:	Fisheries Regions of Alaska .....	3.1.6-40
Figure 3.1.6.6-1:	Designated Critical Habitats in Alaska.....	3.1.6-64
Figure 3.1.7-1:	Land Use/Land Cover in Alaska.....	3.1.7-6
Figure 3.1.7-2:	Alaska Airspace.....	3.1.7-8
Figure 3.1.7-3:	Recreational Areas.....	3.1.7-10
Figure 3.1.8-1:	Areas in Alaska Managed for Visual Resources .....	3.1.8-2
Figure 3.1.9-1:	Nonsubsistence Use Areas in Alaska .....	3.1.9-3
Figure 3.1.9-2:	Population Distribution and Density .....	3.1.9-6
Figure 3.1.9-3:	Median Household Income.....	3.1.9-9
Figure 3.1.9-4:	Unemployment .....	3.1.9-10
Figure 3.1.9-5:	Property Values .....	3.1.9-15
Figure 3.1.9-6:	Alaska Subsistence Harvest.....	3.1.9-17
Figure 3.1.10-1:	Potential for Environmental Justice Populations.....	3.1.10-7
Figure 3.1.11-1:	Historic Properties Listed on the NRHP.....	3.1.11-21
Figure 3.1.12-1:	Alaska Class I Areas.....	3.1.12-7
Figure 3.1.12-2:	Nonattainment and Maintenance Areas in Alaska.....	3.1.12-9
Figure 3.1.12-3:	Alaska Fuel Distribution and Rural/Urban Transportation Areas .....	3.1.12-10
Figure 3.1.14-1:	The Greenhouse Gas Effect.....	3.1.14-2
Figure 3.1.14-2:	Map of Climatic Regions in Alaska.....	3.1.14-6
Figure 3.2.14-1:	Projected Temperature and Precipitation Changes for Alaska .....	3.2.14-5
Figure 3.2.14-2:	Projected Annual Mean Ground Temperatures at 1-Meter Depth for High (A2) and Low (B1) Scenarios.....	3.2.14-7
Figure 4-1:	Hawaii Geography.....	4-3
Figure 4.1.1-1:	Hawaii Road Transportation Systems .....	4.1.1-4
Figure 4.1.1-2:	Honolulu Rail Transit Route Map .....	4.1.1-5
Figure 4.1.1-3:	Hawaii Port and Airport Transportation Systems .....	4.1.1-6
Figure 4.1.1-4:	Hawaii Hospitals.....	4.1.1-12
Figure 4.1.2-1:	Major Land Resource Areas of Hawaii .....	4.1.2-3
Figure 4.1.2-2:	Soil Suborder Map Hawaii .....	4.1.2-10
Figure 4.1.3-1:	Simplified Geologic Map of Hawaii.....	4.1.3-3
Figure 4.1.3-2:	Primary Mineral Production Areas in Hawaii .....	4.1.3-4
Figure 4.1.3-3:	General Seismic Hazard Map of Hawaii .....	4.1.3-6
Figure 4.1.3-4:	Active and Dormant Volcanoes in Hawaii .....	4.1.3-8
Figure 4.1.4-1:	Spatial Distribution of Hawaii Watersheds .....	4.1.4-3
Figure 4.1.4-2:	Perennial Streams in Hawaii by Island.....	4.1.4-4
Figure 4.1.4-3:	Spatial Distribution of Hawaii Streams .....	4.1.4-5

Figure 4.1.4-4:	Number of Impaired Inland Waterbodies in Hawaii .....	4.1.4-7
Figure 4.1.4-5:	Example Map of Hawaii Floodplains .....	4.1.4-9
Figure 4.1.4-6:	Spatial Distribution of Hawaii Basal and High-Level Aquifers .....	4.1.4-12
Figure 4.1.5-1:	Hawaii Wetland Types .....	4.1.5-4
Figure 4.1.5-2:	Marine Intertidal Wetland on Hawaii .....	4.1.5-4
Figure 4.1.5-3:	Anchialine Pool on Hawaii .....	4.1.5-7
Figure 4.1.5-4:	Estuarine Wetland Along Stream, with Invasive Mangroves on Hawaii .....	4.1.5-7
Figure 4.1.5-5:	Spatial Distribution of Hawaii Wetland Types .....	4.1.5-8
Figure 4.1.6.3-1:	Vegetation Types and Land Cover Classes in Hawaii .....	4.1.6-3
Figure 4.1.6.3-2:	Miconia Invasive Plant .....	4.1.6-5
Figure 4.1.6.3-3:	Cattail .....	4.1.6-6
Figure 4.1.6.3-4:	Ivy Gourd .....	4.1.6-7
Figure 4.1.6.4-1:	Protected Areas of the Hawaiian Islands .....	4.1.6-17
Figure 4.1.6.5-1:	Protected Marine Areas on Hawaii .....	4.1.6-20
Figure 4.1.6.5-2:	Expanded View of Protected Marine Areas on Hawaii .....	4.1.6-21
Figure 4.1.7-1:	Land Use/Land Cover in Hawaii .....	4.1.7-5
Figure 4.1.7-2:	State Land Use Districts .....	4.1.7-7
Figure 4.1.7-3:	Hawaii Airspace .....	4.1.7-11
Figure 4.1.7-4:	Recreational Areas .....	4.1.7-13
Figure 4.1.8-1:	Areas in Hawaii Managed for Visual Resources .....	4.1.8-2
Figure 4.1.10-1:	Potential for Environmental Justice Populations .....	4.1.10-8
Figure 4.1.11-1:	Historic Properties Listed on the NRHP .....	4.1.11-16
Figure 4.1.12-1:	Hawaii Class I Areas .....	4.1.12-6
Figure 4.1.14-1:	The Greenhouse Gas Effect .....	4.1.14-2
Figure 4.2.14-1:	Projected Temperature and Precipitation Changes for Hawaii .....	4.2.14-5
Figure 5-1:	American Samoa Geography .....	5-3
Figure 5.1.1-1:	American Samoa Transportation and Hospital Locations .....	5.1.1-3
Figure 5.1.2-1:	Soil Associations Map of American Samoa .....	5.1.2-5
Figure 5.1.3-1:	Topographic Characteristics of Tutuila Island, American Samoa .....	5.1.3-2
Figure 5.1.3-2:	General Seismic Hazard Map of American Samoa .....	5.1.3-4
Figure 5.1.3-3:	Volcanoes in American Samoa .....	5.1.3-5
Figure 5.1.4-1:	Spatial Distribution of American Samoa Watersheds .....	5.1.4-3
Figure 5.1.4-2:	Spatial Distribution of American Samoa Streams .....	5.1.4-4
Figure 5.1.4-3:	Example Map of American Samoa Floodplains .....	5.1.4-6
Figure 5.1.5-1:	American Samoa Wetland Types .....	5.1.5-7
Figure 5.1.5-2:	Marine Intertidal Wetland on American Samoa .....	5.1.5-7
Figure 5.1.6.3-1:	Vegetation Types and Land Cover Classes in American Samoa .....	5.1.6-3
Figure 5.1.6.3-2:	Rhus Secondary Forest Vegetation on American Samoa .....	5.1.6-5
Figure 5.1.6.3-3:	Rain Forest Vegetation on American Samoa .....	5.1.6-6
Figure 5.1.6.3-4:	Secondary Scrub Vegetation on American Samoa .....	5.1.6-6
Figure 5.1.6.4-1:	Protected Areas on American Samoa .....	5.1.6-18
Figure 5.1.6.5-1:	Coral Reefs and National Park Areas in American Samoa .....	5.1.6-24
Figure 5.1.6.5-2:	American Samoa Marine Protected Areas .....	5.1.6-25

Figure 5.1.7-1:	Land Use/Land Cover in American Samoa .....	5.1.7-5
Figure 5.1.7-2:	Recreational Areas.....	5.1.7-8
Figure 5.1.11-1:	Historic Properties Listed on the NRHP.....	5.1.11-7
Figure 5.1.14-1:	The Greenhouse Gas Effect.....	5.1.14-2
Figure 6-1:	Guam Geography.....	6-2
Figure 6.1.1-1:	Guam Ports and Major Roads.....	6.1.1-3
Figure 6.1.1-2:	Guam Airports .....	6.1.1-4
Figure 6.1.2-1:	Major Land Resource Areas of Guam.....	6.1.2-3
Figure 6.1.2-2:	Soil Associations Map of Guam.....	6.1.2-7
Figure 6.1.3-1:	Geologic Rock Unit Ages in Guam.....	6.1.3-2
Figure 6.1.4-1:	Spatial Distribution of Guam Watersheds .....	6.1.4-4
Figure 6.1.4-2:	Spatial Distribution of Guam Streams.....	6.1.4-5
Figure 6.1.4-3:	Example Map of Guam Floodplains.....	6.1.4-7
Figure 6.1.4-4:	Spatial Distribution of Guam Aquifers.....	6.1.4-10
Figure 6.1.5-1:	Guam Wetland Types .....	6.1.5-7
Figure 6.1.5-2:	Marine Intertidal Wetland on Guam.....	6.1.5-7
Figure 6.1.5-3:	Spatial Distribution of Guam Wetland Types .....	6.1.5-8
Figure 6.1.6.3-1:	Vegetation Types and Land Cover Classes in Guam .....	6.1.6-3
Figure 6.1.6.4-1:	Location of Conservation Lands and Marine Preserves on Gaum .....	6.1.6-17
Figure 6.1.6.5-1:	Marine Protected Areas and Coral around Guam.....	6.1.6-19
Figure 6.1.7-1:	Land Use/Land Cover in Guam.....	6.1.7-5
Figure 6.1.7-2:	Recreational Areas.....	6.1.7-8
Figure 6.1.10-1:	Potential for Environmental Justice Populations.....	6.1.10-7
Figure 6.1.11-1:	Historic Properties Listed on the GRHP and NRHP .....	6.1.11-11
Figure 6.1.14-1:	The Greenhouse Gas Effect.....	6.1.14-2
Figure 6.2.6.6-1:	Location of Designated Critical Habitat for Mariana Fruit Bat.....	6.2.6-63
Figure 7-1:	Northern Mariana Islands Geography .....	7-2
Figure 7.1.1-1:	Northern Mariana Islands Transportation and Hospital Locations.....	7.1.1-3
Figure 7.1.2-1:	Major Land Resource Areas of the Northern Mariana Islands.....	7.1.2-3
Figure 7.1.2-2:	Soil Associations Map of the Northern Mariana Islands.....	7.1.2-7
Figure 7.1.3-1:	General Seismic Hazard Map of the Northern Mariana Islands.....	7.1.3-4
Figure 7.1.3-2:	Volcanoes in the Northern Mariana Islands .....	7.1.3-5
Figure 7.1.4-1:	Spatial Distribution of the Northern Mariana Islands Perennial Streams.....	7.1.4-4
Figure 7.1.4-2:	Spatial Distribution of the Northern Mariana Islands Watersheds.....	7.1.4-5
Figure 7.1.4-3:	Example Map of Northern Mariana Islands Floodplains.....	7.1.4-7
Figure 7.1.5-1:	Northern Mariana Islands Wetland Types.....	7.1.5-4
Figure 7.1.5-2:	Marine Intertidal Wetland (Submerged) on the Northern Mariana Islands.....	7.1.5-7
Figure 7.1.5-3:	Estuarine Mangrove Wetland on the Northern Mariana Islands .....	7.1.5-7
Figure 7.1.5-4:	Wetland Types of the Southern, Inhabited Northern Mariana Islands where NWI Mapping was Available .....	7.1.5-8
Figure 7.1.6.3-1:	Vegetation Types and Land Cover Classes in the Northern Mariana Islands .....	7.1.6-3
Figure 7.1.6.3-2:	Smothering Invasive Vines in the Northern Mariana Islands.....	7.1.6-7
Figure 7.1.6.4-1:	Protected Areas in the Northern Mariana Islands.....	7.1.6-16

Figure 7.1.6.5-1:	Northern Mariana Islands Coral and Marine Protected Areas.....	7.1.6-21
Figure 7.1.6.6-1:	Designated Critical Habitat in Northern Mariana Islands .....	7.1.6-39
Figure 7.1.7-1:	Land Use/Land Cover in the Northern Mariana Islands.....	7.1.7-6
Figure 7.1.7-2:	Recreational Areas.....	7.1.7-8
Figure 7.1.11-1:	Historic Property Listed on the NRHP .....	7.1.11-8
Figure 7.1.14-1:	The Greenhouse Gas Effect.....	7.1.14-2
Figure 8-1:	Puerto Rico Geography .....	8-2
Figure 8.1.1-1:	Major Roads, Ports, and Railroad Transportation in Puerto Rico .....	8.1.1-3
Figure 8.1.1-2:	Airports in Puerto Rico.....	8.1.1-5
Figure 8.1.2-1:	Major Land Resource Areas of Puerto Rico.....	8.1.2-3
Figure 8.1.2-2:	Soil Suborder Map of Puerto Rico.....	8.1.2-10
Figure 8.1.3-1:	Geologic Periods and General Rock Types of Puerto Rico.....	8.1.3-2
Figure 8.1.3-2:	Primary Mineral Production Areas in Puerto Rico.....	8.1.3-4
Figure 8.1.3-3:	General Seismic Hazard Map of Puerto Rico.....	8.1.3-6
Figure 8.1.4-1:	Spatial Distribution of Puerto Rico Watersheds.....	8.1.4-4
Figure 8.1.4-2:	Spatial Distribution of Puerto Rico Streams.....	8.1.4-5
Figure 8.1.4-3:	Example Map of Puerto Rico Floodplains.....	8.1.4-8
Figure 8.1.4-4:	Spatial Distribution of Principal Aquifers in Puerto Rico .....	8.1.4-10
Figure 8.1.5-1:	Puerto Rico Wetland Types.....	8.1.5-4
Figure 8.1.5-2:	Marine Intertidal Wetland on Puerto Rico.....	8.1.5-7
Figure 8.1.5-3:	Estuarine Intertidal Wetland on Puerto Rico .....	8.1.5-7
Figure 8.1.5-4:	Palustrine Wetland on Puerto Rico.....	8.1.5-8
Figure 8.1.5-5:	Spatial Distribution of Puerto Rico Wetland Types .....	8.1.5-9
Figure 8.1.6.3-1:	Vegetation Types and Land Cover Classes in Puerto Rico .....	8.1.6-3
Figure 8.1.6.4-1:	General Habitat Types in Puerto Rico .....	8.1.6-9
Figure 8.1.6.4-2:	Protected Areas in Puerto Rico.....	8.1.6-19
Figure 8.1.6.5-1:	Puerto Rico Marine Protected Areas and Habitats of Particular Concern.....	8.1.6-26
Figure 8.1.6.6-1:	Critical Habitat Designations in Puerto Rico.....	8.1.6-51
Figure 8.1.7-1:	Land Use/Land Cover in Puerto Rico.....	8.1.7-6
Figure 8.1.7-2:	Puerto Rico Airspace .....	8.1.7-9
Figure 8.1.7-3:	Recreational Areas.....	8.1.7-11
Figure 8.1.8-1:	Areas in Puerto Rico Managed for Visual Resources.....	8.1.8-2
Figure 8.1.9-1:	Population Distribution and Density .....	8.1.9-3
Figure 8.1.9-2:	Median Household Income.....	8.1.9-5
Figure 8.1.9-3:	Unemployment .....	8.1.9-6
Figure 8.1.9-4:	Property Values .....	8.1.9-10
Figure 8.1.10-1:	Potential for Environmental Justice Populations.....	8.1.10-7
Figure 8.1.11-1:	Historic Properties Listed on the NRHP.....	8.1.11-15
Figure 8.1.12-1:	Nonattainment and Maintenance Areas in Puerto Rico.....	8.1.12-7
Figure 8.1.14-1:	The Greenhouse Gas Effect.....	8.1.14-2
Figure 9-1:	U.S. Virgin Islands Geography.....	9-2
Figure 9.1.1-1:	Major Roads and Ports in the U.S. Virgin Islands.....	9.1.1-3
Figure 9.1.1-2:	Airports in the U.S. Virgin Islands .....	9.1.1-5

Figure 9.1.2-1:	Major Land Resources Areas of the U.S. Virgin Islands.....	9.1.2-3
Figure 9.1.2-2:	Soil Associations Map of the U.S. Virgin Islands .....	9.1.2-7
Figure 9.1.3-1:	Geologic Periods and General Rock Types of the U.S. Virgin Islands .....	9.1.3-2
Figure 9.1.3-2:	General Seismic Hazard Map of the U.S. Virgin Islands .....	9.1.3-5
Figure 9.1.4-1:	Spatial Distribution of the U.S. Virgin Islands Watersheds .....	9.1.4-3
Figure 9.1.4-2:	U.S. Virgin Islands Non-Perennial Streams .....	9.1.4-4
Figure 9.1.4-3:	Example Map of U.S. Virgin Islands Floodplains.....	9.1.4-6
Figure 9.1.4-4:	Spatial Distribution of Principal Aquifers in the U.S. Virgin Islands .....	9.1.4-9
Figure 9.1.5-1:	U.S. Virgin Islands Wetland Types .....	9.1.5-7
Figure 9.1.5-2:	Marine Wetland (Coast) and Estuarine Wetland (Lagoon) U.S. Virgin Islands...	9.1.5-7
Figure 9.1.5-3:	Estuarine Wetland (Red Mangroves) in the U.S. Virgin Islands.....	9.1.5-8
Figure 9.1.5-4:	Overview of Spatial Distribution of U.S. Virgin Islands Wetland Types .....	9.1.5-9
Figure 9.1.5-5:	Spatial Distribution of Wetland Types on St. Thomas and St. John.....	9.1.5-10
Figure 9.1.5-6:	Spatial Distribution of Wetland Types on St. Croix.....	9.1.5-11
Figure 9.1.6.3-1:	Vegetation Types and Land Cover Classes in the U.S. Virgin Islands.....	9.1.6-3
Figure 9.1.6.4-1:	General Habitat Types on the U.S. Virgin Islands .....	9.1.6-10
Figure 9.1.6.4-2:	Protected Areas on the U.S. Virgin Islands .....	9.1.6-18
Figure 9.1.6.5-1:	U.S. Virgin Islands Coastal Protected Areas .....	9.1.6-25
Figure 9.1.6.6-1:	Designated Critical Habitat in the U.S. Virgin Islands.....	9.1.6-52
Figure 9.1.7-1:	Land Use/Land Cover in U.S. Virgin Islands.....	9.1.7-5
Figure 9.1.7-2:	Recreational Areas.....	9.1.7-10
Figure 9.1.10-1:	Potential for Environmental Justice Populations.....	9.1.10-7
Figure 9.1.11-1:	Historic Properties Listed on the NRHP.....	9.1.11-8
Figure 9.1.12-1:	U.S. Virgin Islands Class I Area.....	9.1.12-6
Figure 9.1.14-1:	The Greenhouse Gas Effect.....	9.1.14-2

## ACRONYMS AND ABBREVIATIONS

°F	degree Fahrenheit	ASPA	American Samoa Power Authority
°N	degrees north	ATO	Air Traffic Organization
µg/m <sup>3</sup>	microgram(s) per cubic meter	ATWC	Alaska Tsunami Warning Center
µPa	micro Pascal	AURORA	Alaska Uniform Response Online Reporting Access
%	percent	BACT	best available control technology
A	attained	BCE	before Common Era
AAC	Alaska Administrative Code	BCR	Bird Conservation Regions
AAFIS	Alaska Public Safety Identification System	BGEPA	Bald and Golden Eagle Protection Act
AAQS	Ambient Air Quality Standards	BLM	Bureau of Land Management
ACHP	Advisory Council on Historic Preservation	BLS	U.S. Bureau of Labor Statistics
ACS	American Community Survey (U.S. Census Bureau)	BMP	best management practice
ADEC	Alaska Department of Environmental Conservation	BRFSS	Behavioral Risk Factor Surveillance System
ADFG	Alaska Department of Fish and Game	BSAI	Bering Sea/Aleutian Island
AGL	above ground level	BWG	BioInitiative Working Group
AIRFA	American Indian Religious Freedom Act	CAA	Clean Air Act
AJRCCM	American Journal of Respiratory and Critical Care Medicine	CAB	Clean Air Branch
AKNHP	Alaska National Heritage Program	CARB	California Air Resources Board
AKOSH	Alaska Occupational Safety and Health	CBIA	Coastal Barrier Improvement Act of 1990
AKWAS	Alaska Warning System	CBRA	Coastal Barrier Resources Act of 1982
ALMR	Alaska Land Mobile Radio	CCP	Comprehensive Conservation Plan
ANCSA	Alaska Native Claims Settlement Act	CDC	Center for Disease Control
ANFIRS	Alaska Fire Incident Reporting System	CDLNR	Commonwealth Department of Lands and Natural Resources
ANSI	American National Standards Institute	CE	Common Era
APE	Area of Potential Effect	CELCP	Coastal and Estuarine Land Conservation Program
APLIC	Avian Power Line Interaction Committee	CEPD	Caribbean Environmental Protection Division
APSIN	Alaska Public Safety Information Network	CEQ	Council on Environmental Quality
AQCR	air quality control region	CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
ARFF	Aircraft Rescue and Firefighting	CFMC	Caribbean Fisheries Management Council
ARMS	Alaska Records Management System	CFR	Code of Federal Regulations
ARPA	Archaeological Resources Protection Act of 1979	cfs	cubic feet per second
AS	Alaska Statute	CH <sub>4</sub>	methane
ASAC	American Samoa Administrative Code	CHC	Commonwealth Health Center
ASCA	American Samoa Code Annotated	CIA	Central Intelligence Agency
ASCMP	American Samoa Coastal Management Program	CMIP3	Coupled Model Intercomparison Project phase 3
ASDHS	American Samoa Department of Homeland Security	CNMI	Commonwealth of Northern Mariana Islands
ASDMWR	American Samoa Department of Marine and Wildlife Resources	CNMIAC	Commonwealth of Northern Mariana Islands Administrative Code
ASEPA	American Samoa Environmental Protection Agency	CO	carbon monoxide
ASHPO	American Samoa Historic Preservation Office	CO <sub>2</sub>	carbon dioxide
		CO <sub>2</sub> e	carbon dioxide equivalents
		COMAR	Committee on Man and Radiation



CPA	Commonwealth Ports Authority	FirstNet	First Responder Network Authority
CRMP	Coastal Resources Management Program	FMP	Fishery Management Plan
CSP	Central South Pacific	FPPA	Farmland Protection Policy Act of 1981
CUC	Commonwealth Utilities Corporation	FR	Federal Register
CWA	Clean Water Act	ft	feet
CZMA	Coastal Zone Management Act	g/hp-hr	grams per horsepower-hour
CZMP	Coastal Zone Management Program	g/mi	grams per mile
DACA	Deployable Airborne Communications Architecture	GAP	Gap Analysis Program
DAR	Division of Aquatic Resources (Hawaii)	GCA	Guam Code Annotated
DAWR	Division of Aquatic and Wildlife Resources (Guam)	GDA	Guam Department of Agriculture
dB	decibel(s)	GEPA	Guam Environmental Protection Agency
dba	A-weighted decibel(s)	GHG	greenhouse gas
DBCP	1,2-dibromo-3-chloropropane	GIS	geographic information system
dBZ	Z-weighted decibel(s)	GMP	General Management Plan
DCP	1,2-dichloropropane	GOA	Gulf of Alaska
DEC	Department of Environmental Conservation	GRHP	Guam Register of Historic Places
DHHL	Department of Hawaiian Homelands	GWP	global warming potential
DLNR	Department of Land and Natural Resources (Hawaii)	H <sub>2</sub> S	hydrogen sulfide
DMA	Disaster Mitigation Act of 2000	HDOH	Hawaii Department of Health
DNER	Department of Natural and Environmental Resources of Puerto Rico	HEI	Health Effects Institute
DOA	Department of Agriculture	HHCA	Hawaiian Homes Commission Act of 1920
DOD	Department of Defense	HI-EMA	Hawaii Emergency Management Agency
DOE	U.S. Department of Energy	HIANG	Hawaii Air National Guard
DOH	Department of Health	HIARNG	Hawaii Army National Guard
DOH-CAB	Hawaii Department of Health, Clean Air Branch	HIHWNMS	Hawaiian Islands Humpback Whale National Marine Sanctuary
DOT	U.S. Department of Transportation	HIOSH	Hawaii Occupational Safety and Health Division
DPNR	Department of Planning and Natural Resources (U.S. Virgin Islands)	hp	horsepower
DPS	Department of Public Safety	HRD	(Guam) Historic Resources Division
EA	Environmental Assessment	HRHP	Hawaii Register of Historic Places
EAS	Emergency Alert System	HRS	Hawaii Administrative Rules, Revised Statute
EBS	Emergency Broadcast System	HTA	Hawai'i Tourism Authority
EDB	ethylene dibromide	HUC	hydrologic unit code
EFH	essential fish habitat	I/M	Inspection/Maintenance
EMS	emergency medical services	IARC	International Agency for Research on Cancer
ENSO	El Niño/Southern Oscillation	IBA	Important Bird Area
EO	Executive Order	IEEE	Institute of Electrical and Electronics Engineers
EPCRA	Emergency Planning and Community Right-to-Know Act	IFC	International Finance Corporation
ERP	effective radiated power	in	inches
ESA	Endangered Species Act	IPCC	Intergovernmental Panel on Climate Change
ESI	Environmental Sensitivity Index	IR	ionizing radiation
FAA	Federal Aviation Administration	ITCZ	Intertropical Convergence Zone
FAD	Fish Aggregating Device	IUCN	International Union for Conservation of Nature
FCC	Federal Communications Commission	kg/gal	kilograms per gallon
FEMA	Federal Emergency Management Agency	KIRC	Kaho'olawe Island Reserve Commission

LAER	lowest achievable emission rate	NOAA	National Oceanic and Atmospheric Administration
lb/day	pounds per day	NOx	nitrogen oxides
lb/hp-hr	pounds per horsepower-hour	NP	National Park
LBJ	Lyndon B. Johnson	NPDES	National Pollutant Discharge Elimination System
Ldn	day-night average sound level	NPL	National Priorities List
Leq	equivalent noise levels	NPS	National Park Service
LNG	liquefied natural gas	NPSBN	nationwide public safety broadband network
LTE	Long Term Evolution	NRCS	Natural Resources Conservation Service
µg/m <sup>3</sup>	microgram(s) per cubic meter	NRHP	National Register of Historic Places
µPa	micro Pascal	NSPS	New Source Performance Standards
m/s	meter per second	NTIA	National Telecommunications and Information Administration
MBTA	Migratory Bird Treaty Act	NVSR	National Vital Statistics Report
mg/m <sup>3</sup>	Milligram(s) per cubic meter	NWI	National Wetland Inventory
mgd	million gallons per day	NWR	National Wildlife Refuge
MHz	megahertz	NWWS	National Weather Wire Satellite System
MLRA	Major Land Resource Area	OHA	Office of History and Archaeology
mm/s	millimeters per second	OIA	Office of Insular Affairs (USDI)
MMPA	Marine Mammal Protection Act	OSHA	Occupational Safety and Health Administration
MOA	Memorandum of Agreement	PA	Programmatic Agreement
MPA	Marine Protected Area	PAG	Port Authority of Guam
mph	miles per hour	PAHO	Pan American Health Organization
MSA	Magnuson-Stevens Fishery Conservation and Management Act	PCB	polychlorinated biphenyl
MTR	Military Training Route	PCP	pentachlorophenol
MUID	Map Unit Identification Data	PCS	Personal Communications Service
MW	megawatt	PDO	Pacific Decadal Oscillation
mW/cm <sup>2</sup>	milliwatts per centimeter squared	PEIS	Programmatic Environmental Impact Statement
N	north; not attained	PL	Public Law
N <sub>2</sub> O	nitrous oxide	PM	particulate matter
NA	not applicable; not assessed	PM <sub>10</sub>	particulate matter up to 10 micrometers in diameter
NAAQS	National Ambient Air Quality Standards	PM <sub>2.5</sub>	particulate matter up to 2.5 micrometers in diameter
NAGPRA	Native American Graves Protection and Repatriation Act	POPs	points of presence
NANSR	Nonattainment New Source Review	ppm	parts per million
NAWAS	National Warning System	PRDNER	Puerto Rico Department of Natural and Environmental Resources
NCA	National Climate Assessment	PREQB	Puerto Rico Environmental Quality Board
NCD	non-communicable disease	PR OSHA	The Puerto Rico Occupational Safety and Health Administration
NCDC	National Climatic Data Center	PRASA	Puerto Rico Aqueduct and Sewer Authority
NCN	no common name	PREPA	Puerto Rico Electric Power Authority
NCRP	National Council on Radiation Protection and Measurements	PRSHPO	Puerto Rico State Historic Preservation Office
ND	no data	PSD	Prevention of Significant Deterioration
NE	northeast	PUAG	Public Utility Agency of Guam
NEPA	National Environmental Policy Act	Pub. L.	Public Law
NESHAP	National Emission Standards for Hazardous Air Pollutants		
NFIP	National Flood Insurance Program		
NFIRS	National Fire Incident Reporting System		
NHPA	National Historic Preservation Act		
NIR	non-ionizing radiation		
NMFS	National Marine Fisheries Service		
NMHC	non-methane hydrocarbon compounds		
NMOG	non-methane organic compounds		
NNE	north-northeast		

PV	photovoltaic	UVA	University of Virginia
RAN	radio access network	VdB	vibration decibel(s)
RCP	Representative Concentration Pathway	VIC	Virgin Islands Code
RCRA	Resource Conservation and Recovery Act	VIPA	Virgin Islands Port Authority
RF	radio frequency	VISHPO	Virgin Islands State Historic Preservation Office
RIN	Regulation Identification Number	VOC	volatile organic compound
rms	root mean square	vog	volcanic smog
ROW	right-of-way	VRM	Visual Resource Management
SAAQS	State Air Quality Standards	W	watt(s)
SAFETEA-LU	Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users	W/m <sup>2</sup>	watts per meters squared
SARA	Superfund Amendments and Reauthorization Act of 1986	WAPA	Water and Power Authority
SE	Standard of Error	WHO	World Health Organization
SHPO	State Historic Preservation Office	WIMARCS	West Indies Marine Animal Research and Conservation Science
SIP	State Implementation Plan	WNP	Western North Pacific
SLR	sea level rise	WNW	west-northwest
SMA	Special Management Area	WPC	watts per channel
SMS	Scenery Management System	WPRFMC	Western Pacific Regional Fishery Management Council
SO <sub>2</sub>	sulfur dioxide		
SO <sub>x</sub>	sulfur oxides		
SPCC	Spill Prevention, Control, and Countermeasure		
SPCZ	South Pacific Convergence Zone		
SPOC	State Single Point of Contact		
SRES	Special Report on Emission Scenarios		
SSA	sole source aquifer		
STATSGO2	State Soil Geographic [Database]		
SW	southwest		
TAAQS	Territory Ambient Air Quality Standards		
TCP	traditional cultural property		
TEMCO	Territorial Emergency Management Coordinating Office		
TMDL	Total Maximum Daily Load		
TOC	total organic compound		
tpy	tons per year		
TRI	Toxic Release Inventory		
TSCA	Toxic Substances Control Act		
U.S.	United States		
UAMES	University of Alaska Museum Earth Sciences		
USACE	U.S. Army Corps of Engineers		
USC	United States Code		
USDA	U.S. Department of Agriculture		
USDI	U.S. Department of the Interior		
USEPA	U.S. Environmental Protection Agency		
USFWS	U.S. Fish and Wildlife Service		
USGCRP	U.S. Global Climate Change Research Program		
USGS	U.S. Geological Survey		
USVIDOH	U.S. Virgin Islands Department of Health		
USVIPD	U.S. Virgin Islands Police Department		

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## 15. LIST OF PREPARERS AND CONTRIBUTORS

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