ALASKAN COMMAND



NORTHERN EDGE 2017



Alaskan Command U.S. Pacific Fleet

The Overall Classification of this Briefing is: UNCLASSIFIED



Background

- NORTHERN EDGE (NE) is a U.S. Pacific Command (PACOM) exercise preparing for crisis in the Indo-Asia-Pacific region
 - ALCOM plans and conducts NE on behalf of PACOM
- Biennial exercise (odd years) dating back to 1975
 - Late spring/early summer since 2002
- Participation from all military services and interagency partners







Overview

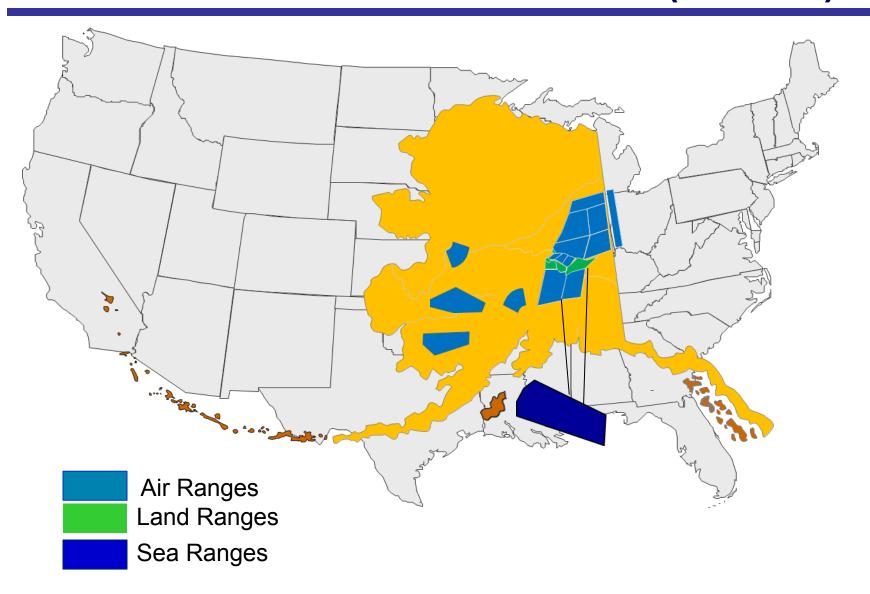
- PACOM contingency exercise
 - Replicate most challenging Pacific theater scenarios
 - Joint interoperability tactics, techniques & procedures
 - Requires Alaskan-sized spaces to simulate vast distances that modern military forces face
- Comprehensive, realistic training
 - Air-to-Air
 - Air-to-Surface
 - Tactical Command and Control
 - Live-Virtual-Constructive Integration





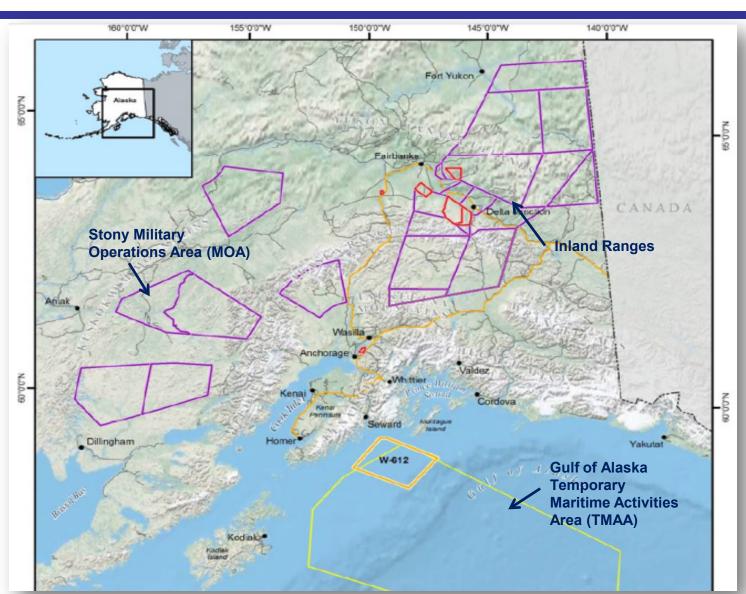


Joint Pacific Alaska Range Complex (JPARC)



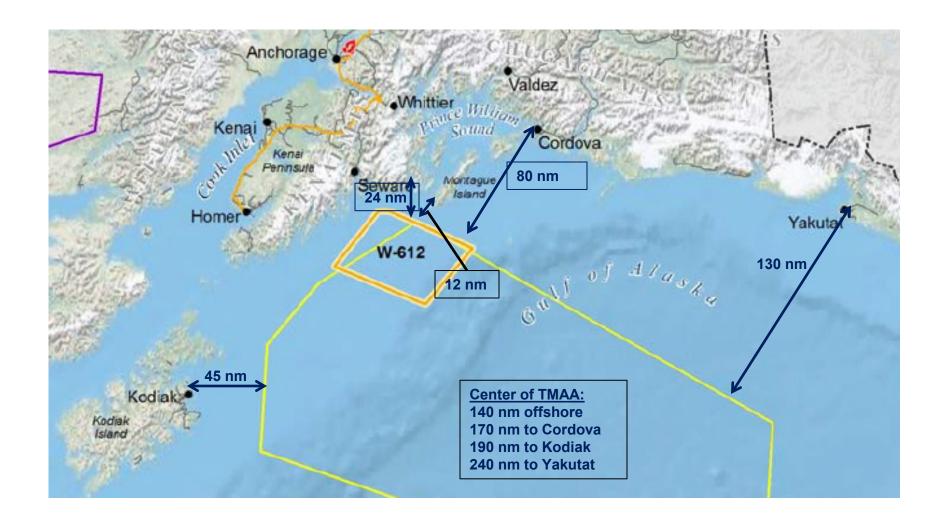


JPARC





Proximity of Temporary Maritime Activities Area (TMAA) to Shore





NE15 Economic Impact

- Total estimated economic impact of over \$13 million
 - Lodging, rental cars, support contracts
 - Port fees for ship visit
 - Contracted fishing vessels
 - Participant spending in communities
- Spread across Southcentral and Interior Alaska
- Expect similar economic contributions for NE17



USS Shoup (DDG 86) mooring at the Port of Anchorage during NE15



NE17 Exercise Planning

- Scheduled exercise window: 1-12 May 2017
 - Driven by force availability, resource constraints, weather considerations
 - Tied to / restrained by larger PACOM exercise calendar



- Exercise planning on-going
 - Maritime activities include air defense and anti-surface warfare
 - Final planning conference (Feb)





NE17 Participants

Participating organizations:

- United States Army Alaska
- Marine Corps Forces Pacific
- U.S. Pacific Fleet
- Pacific Air Forces
- U.S. Coast Guard District 17

Including:

- Approximately 6,000 personnel
- 175 fixed-wing aircraft at JBER and Eielson AFB
- 2 Navy ships with embarked helicopters



Navy/Maritime Goals and Planned Activities

- One Navy surface combatant ship
- One support ship (fuel/food)
- One Coast Guard vessel
- Contracted Alaskan fishing vessels (~5) to play opposition force
- Training objectives/activities required by Combatant Commander (PACOM)
 - Coordination and integration with joint forces
 - Practice in anti-submarine exercises by aircraft and ships (i.e., tracking "simulated" submarine)
 - Practice in Visit, Board, Search, and Seizure techniques
 - Aircraft combat maneuvering between land and maritime areas
 - Small arms gunnery
- Port Visit logistics planning underway

Training Ordnance or Expended Materials	Maximum Amount Analyzed in 2011 Final EIS/OEIS (for 2 events at 3 weeks each)	NE15 Level of Activity (12 Days long)
Bombs	360	0
Missiles	66	0
Naval Gunshells (Various Types)	26,376	15 actual (all inert/non-explosive)
Small Arms Rounds	11,400	2,100 (approximate)
Pyrotechnics	156	5 (signal flares)
Targets	94	6 (floating targets)
Sonobuoys	1,587 (80 explosive)	1200 (250 Active / 950 passive; all non-explosive)
Portable Undersea Training Range (PUTR)	7 (Anchors on Sea Floor)	0; Not Installed
Ordnance used during SINKEX (Various Types)	858	0

NE17 levels would be similar to or less than NE15



NE Exercise Summary

- One of PACOM & DoD's premier exercises
- Alaska's military infrastructure allows top-quality training unmatched anywhere else
- Interagency cooperation & community support are keys to exercise success

Level of activity varies by exercise





Navy Environmental Planning

- 2011: Gulf of Alaska Environmental Impact Statement (EIS) for training from 2011-2016
- 2013: Initiated Supplemental EIS (SEIS/SOEIS) for beyond 2016
- July 2016: Released Final SEIS/SOEIS
- Marine Mammal Protection Act Permit (MMPA), Endangered Species Act (ESA), and Record of Decision forthcoming
- National Marine Fisheries Service (NMFS): Cooperating Agency in the environmental planning process
- Government-to-Government consultation with tribes in Kodiak area and Native Village of Eyak Tribe in Cordova



EIS Alternatives

Alternative 1 includes:

- Conducting one annual large-scale Carrier Strike Group (CSG) exercise, occurring over a maximum time period of up to 21 consecutive days during the April–October timeframe
- No sinking exercise

Alternative 2 includes:

- Conducting up to two annual large-scale CSG exercises, each occurring over a maximum time period of up to 21 consecutive days during the April–October timeframe
- Conducting one sinking exercise per CSG exercise for a total of two per year

EIS analyzes maximum levels of activity –
Actual activity is generally considerably less



EIS Analysis – Marine Mammals

- Marine Mammal EIS analysis addresses impacts between April and October
- Quantitative analysis (modeling) done for entire date range
- Navy's monitoring program has supported species occurrence information in GOA
 - Over 8 years (2009-2017), monitoring found higher likelihood for more marine mammal species in summer-fall (July-Oct) as compared to spring-early summer (May-June)
- Overall, analysis using best available science shows the potential for minimal impacts to individuals of various species, but no population level effects





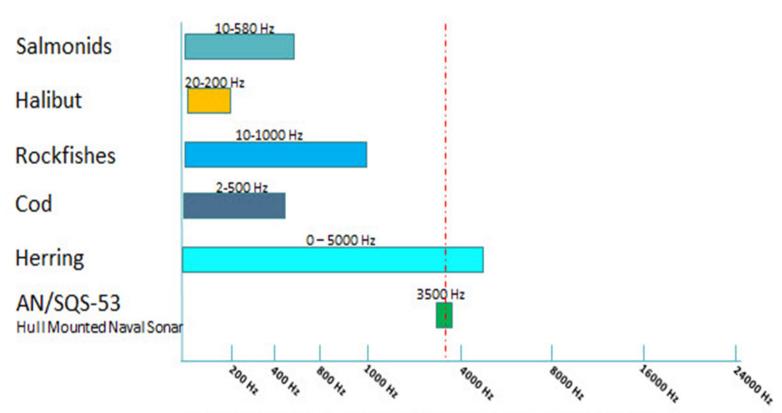
EIS Analysis – Fisheries

- Alaska commercial fishing seasons occur throughout the year. However, not all fisheries management areas overlap the TMAA:
 - Partial overlap with groundfish management areas
 - Minimal overlap with shellfish management areas
 - No overlap with salmon management areas
 - No overlap with herring management areas
- Training will not interfere with commercial, subsistence or recreational fishing
 - De-confliction of training activities and other users
 - Similar training levels as previous years planned for near term future



Fish Hearing and Sonar

FISH HEARING AND NAVALSONAR



Sources: Astrup 1999; Astrup and Mohl 1993; Hawkins and Johnstone 1978; Jorgensen et al. 2003; Lovell et al. 2003; Mann et al. 2003; Popper 2008; and Popper and Carlson 1998.



Potential Impacts to Fish

- Mid-frequency active sonar is not heard by most fish species
- The few fish species that are able to hear sonar are not likely to be affected
 - Not impulsive source, vessel movement and fish behavior
- Use of explosives during training may injure individual fish if present and only those close to the surface and within the immediate vicinity of where explosives may be used
 - No effects to bottom fish species or fish swimming at depth below surface
- Military expended materials will not have significant effects on fish or fish habitat



Protective Mitigation Measures

- Extensive mitigation measures developed in coordination with NMFS
 - Implement mitigation zones for sonar and explosive activities
 - Monitor zones before and during training
 - Post qualified Lookouts
 - Report monitoring results and training activities
 - Coordinate with regulatory agencies stranding program
 - Conduct population density surveys and other research
 - No aircraft fuel release in air unless required for safety

- New Mitigations for NE17
 - North Pacific Right Whale Cautionary Area during feeding time (June-Sept)
 - No hull mounted Mid-Frequency Sonar
 - No explosives
 - No explosives over Portlock Bank

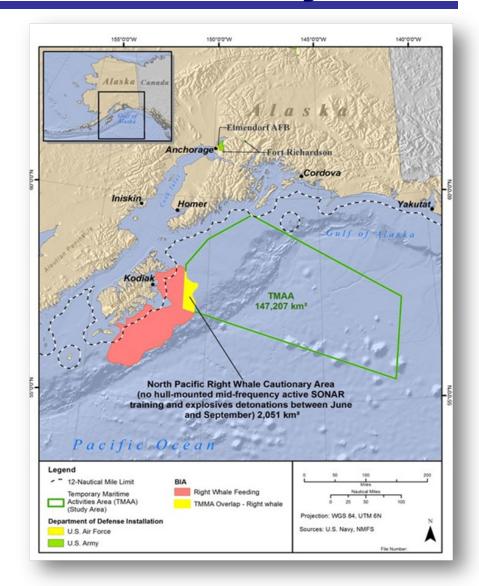






North Pacific Right Whale Cautionary Area

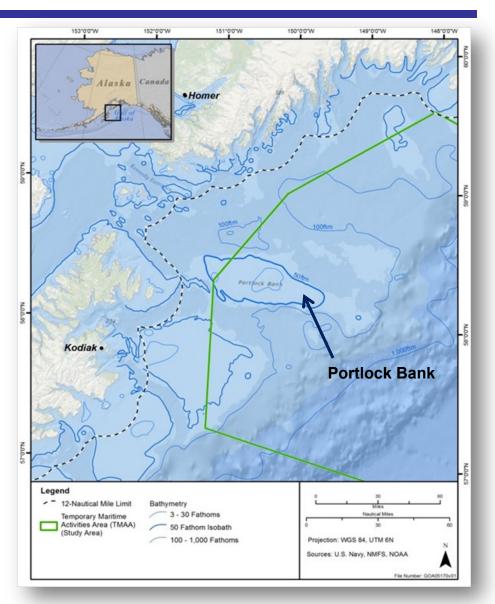
- Measure developed with NMFS as part of MMPA process and based on public comments
- Implementation of Cautionary Area in months of feeding importance (June – September) in southwest corner of Temporary Maritime Activity Area (TMAA)
 - No hull-mounted midfrequency active SONAR
 - No explosives
 - Not a factor for NE17





Portlock Bank

- Westernmost portion of TMAA
- Area identified during consultation with fishermen and tribes
- Agreed not to conduct training with explosives





Summary

- Environmental protection is an integral part of the exercise.
 - The Navy's at-sea training activities are conducted with an extensive set of mitigation measures designed to minimize the potential risk to marine life
- NE planned activity in Gulf of Alaska well below max allowable under the SEIS/SOEIS
- Training in Gulf of Alaska de-conflicted from areas of concern highlighted by fishing communities
- We are grateful to the citizens of the state of Alaska for their support as we use the unique training environment in Alaska



Questions?

