# Senate Committee on Commerce, Science, and Transportation Nominee questionnaire for RDML Timothy C. Gallaudet

# A. BIOGRAPHICAL INFORMATION AND QUALIFICATIONS

1.	Name (Include any former names or nicknames to	ısed):
	Timothy Cole Gallaudet (Tim)	

2. Position to which nominated:

Assistant Secretary of Commerce for Oceans and Atmosphere/Deputy Administrator, National Oceanic and Atmospheric Administration.

3. Date of Nomination:

28 August 2017 (estimated)

- 4. Address (List current place of residence and office addresses):
- 5. Date and Place of Birth:

March 18, 1967, Los Angeles CA

- 6. Provide the name, position, and place of employment for your spouse (if married) and the names and ages of your children (including stepchildren and children by a previous marriage).
  - Spouse: Caren Marie Ritter Gallaudet, Self-employed Pet Sitter, North Beach MD.
  - Children:
- 7. List all college and graduate degrees. Provide year and school attended.

- BS in Oceanography: US Naval Academy, 1989
- MS in Oceanography: UC San Diego, Scripps Institution of Oceanography, 1991
- PhD in Oceanography: UC San Diego, Scripps Institution of Oceanography, 2001
- 8. List all post-undergraduate employment, and highlight all managementlevel jobs held and any non-managerial jobs that relate to the position for which you are nominated.

# 2015-2017: Chief of Naval Operations Staff, Washington DC

- Oceanographer of the Navy: Oversee an annual \$350M budget to program and direct all policy for US Navy oceanography, meteorology, oceanography, astrometry, and precise timing capability which is used by all Navy ships, aircraft, submarines and SEAL Teams to safety and successfully operate.
- Navigator of the Navy: Oversee a 5 year budget of \$1.6B for directing all policy, research, development,, and integration of navigation equipment on all Navy ships, submarines, and aircraft.
- <u>Naval Deputy to the NOAA Administrator</u>: Coordinate cooperative
  efforts between the Navy and NOAA on sea floor charging, and
  weather modeling, ocean and weather observations, technology
  development and research, and personnel exchanges.
- <u>Director, US Navy Task Force Climate Change</u>: Direct all Navy policy and plans regarding climate change impacts to facilities, and strategic plans, and capability development, with a focus on the Arctic. Authored the US Navy Arctic Roadmap of 2010, and reviewed and approved the US Navy Arctic Roadmap for 2014-2030.
- <u>Director of the Office of the DoD Executive Agent for Maritime Domain Awareness (MDA)</u>: Directed all DoD strategic planning, partnerships, and system development MDA. Signed the DoD MDA Strategic Plan, Architecture, and Vessel of Interest Lexicon.
- <u>DoD Precise Time and Time Interval Manager and DoD Celestial Reference Frame and Earth Orientation Manager</u>: Oversee a \$20M annual budget that allows the US Naval Observatory to provide the absolute fundamental spatial and temporal references needed for US DoD network and space operations, targeting, and command, control, communications, computers, intelligence, surveillance and reconnaissance.

# 2014-2017: Naval Meteorology and Oceanography Command, Stennis Space Center MS

Commander, Naval Meteorology and Oceanography
 Command/Commander, Task Group 80.7: Direct the operations of

14 subordinate commands comprised of over 2500 military and civilian personnel who provide weather, ocean, seafloor, precise time, and astrometry information to all Navy operating units afloat, aloft, and ashore. These commands continuously deploy all over the globe on Navy ships, submarines, aircraft, and with SEAL Teams, and include reachback centers that assimilate environmental information from satellites, underwater floats and drones, and other sensors worldwide into cyber secure supercomputers that predict the best routes, timelines, weapons setting, sensor configurations, and equipment loads for Navy units to operate safely and effectively.

<u>Hydrographer of the Navy</u>: Develop and direct all US Navy hydrographic survey plans, partnerships, and operations using a Fleet of six \$250M Oceanographic survey vessels as well as a rapidly deplorable Team that uses jet skis equipped with echosounders, underwater drones, and small boats to identify safe routes and harbor berths after natural disasters. The hydrographic partnerships and engagements that I direct include over 60 nations and are highly praised by Geographic Combatant Commanders for contributing to their Theater Security Cooperation (TSC) objectives.

# 2013-2014: Chief of Naval Operations Staff, Washington DC

 <u>Deputy Oceanographer of the Navy</u>: Deputy to the senior Oceanography officer in the Navy, directing the daily actions of a staff of 90 personnel that oversee \$350M of annual resources for the Navy's operational oceanography, meteorology, hydrography, precise time, and astrometry capabilities. Duties also included oversight of the Navigation capabilities, Navy climate change policy and plans, DoD's Maritime Domain Awareness Program, the Navy Space Program, and a variety of classified space rested intelligence programs.

## 2011-2013: US Naval Observatory, Washington DC

Superintendent/Commanding Officer: Commanded a team of over 100 atomic physicists, astrophysicists, astronomers, mathematicians and engineers who develop, maintain, and modernize the DoD's precision time keeping and astrometric observing capabilities. The Master Clock atomic clock ensemble and telescope data processing computers at the US Naval Observatory are designated national critical infrastructure because all US satellites, ballistic missiles, and national defense and economic computer networks would fail to operate without the information they provide.

2008-2011: Chief of Naval Operations Staff, Washington DC

- <u>Deputy Navigator of the Navy</u>: Assisted with management of a 5 year budget of \$1.6B for directing all policy, research, development, and integration of navigation equipment on all Navy ships, submarines, and aircraft.
- <u>Deputy Director, US Navy Task Force Climate Change</u> Established a Task Force of over 120 individuals representing all Navy operating forces, headquarters, system commands, all federal agencies, and numerous universities and labs. Directed all Navy policy and plans regarding climate change impacts to facilities, and strategic plans, and capability development, with a focus on the Arctic. Authored the US Navy Arctic Roadmap of 2010.

2005-2008: Naval Oceanography Special Warfare Center, Coronado CA

- <u>Commanding Officer</u>: Commanded 120 personnel who deployed with US Navy SEAL Teams in Iraq, Afghanistan, Africa, and Southeast Asia to forecast weather, sea state, ocean and river currents, and operate unmanned aerial and underwater vehicles and other technical sensors to detect and locate enemy forces.
- <u>Technical Special Reconnaissance Officer, Commander, Naval Special Warfare Command</u> Established the first Navy SEAL program for unmanned aerial and underwater vehicles and other technical sensors to detect and locate enemy forces

2004-2005: Naval Oceanographic Office, Stennis Space Center MS

Anti-Submarine Warfare (ASW) Program Manager: Coordinated the
undersea data collection of 8 Oceanographic Survey Ships
deployed worldwide, the processing of this data into geophysical
databases used by Navy ships, aircraft, and submarines to operate
their sonars/sonobuoys effectively, and direct teams of deploying
ilitary and civilian personnel to advise these units during ASW
exercises and operations. Deployed on the USNS Bowditch during
the first operational deployment of an ocean glider underwater
drone from a Navy ship.

2003-2004: Commander, Naval Meteorology and Oceanography Command,

Stennis Space Center MS

 <u>Plans and Programs Officer</u>. Oversaw the budget and plans for a highly classified unmanned underwater program executed at a subordinate command (Naval Oceanographic Office).

2001-2003: USS KITTY HAWK (CV-63), Yokosuka, Japan

<u>Meteorology and Oceanography Division Officer</u>. Led 18 personnel
to forecast wind, weather, sea state, and ocean currents for the
KITTY HAWK Carrier Strike Group (CSG) composed of an air wing
of 60 aircraft, and 5 escort ships which conducted the first strikes

- into Afghanistan during Operation Enduring Freedom in October 2001. Also conducted first strikes into Iraq during Operation Iraqi Freedom in March 2003.
- Officer of the Deck: Directed all aircraft carrier movements and all aircraft launches and recoveries for two 4-hour periods each day.
- <u>INSURV Coordinator</u>: Developed and executed a 6 month plan for the 3,000 person crew to prepare the ship for its inspection by the Board of Inspection and Survey (INSURV). This involved tens of thousands of maintenance actions precisely coordinated across a dozen departments.

1997-2001: UC San Diego, Scripps Institution of Oceanography, La Jolla CA

 <u>PhD Student</u>: Completed course work on underwater acoustics, digital signal processing, and computer programming. Performed research at Scripps' Marine Physical Laboratory (MPL). Participated on a research cruise on the R/V New Horizon.

# 1995-1997: USS PELELIU (LHA-5), San Diego CA

- <u>Meteorology and Oceanography Division Officer</u>. Led 15 personnel
  to forecast wind, weather, sea state, and ocean currents for the
  PELELIU Amphibious Ready Group (ARG) composed of a Marine
  Aviation Combat Element of 25 aircraft, 2 escort ships, and a
  Marine Expeditionary Unit. Conducted Operation Southern Watch
  in the Northern Arabian Gulf,
- Officer of the Deck Directed all ship movements and all aircraft launches and recoveries for two 4-hour periods each day.

1993-1995: Naval European Meteorology and Oceanography Center, Rota, Spain

 Command & Forecast Duty Officer: lead weather and ocean forecaster of a watch team supporting Navy, Joint, and Allied Maritime forces operating in Europe and the Mediterranean. Supported NATO operations in Bosnia, and participated in Operation Deny Flight.

1994: Commander, US 6th FLEET, USS LASALLE (LCC-20) Gaeta, Italy

Assistant Fleet Oceanographer. Assistant to the senior oceanographer on the staff of the Commander of the US 6th Fleet. Led a division of 10 personnel who prepared the weather and ocean forecasts for the Fleet Commander daily. Coordinated with staff planners and operations officers to ensure all 6thFleet operations were conducted safely and effectively. Routed dozens of ships around hazardous seas.

1993: Naval European Meteorology and Oceanography Detachment, Sousa Bay, Greece

 Officer in Charge: Led 14 personnel who provided wearther and ocean forecasts for Navy, Joint, and NATO ships and aircraft using the port and air field on the island of Crete.

1991-1993: Oceanographic Unit FIVE, USNS HARKNESS (T-AGS 32), Manama, Bahrain

Operations Officer/Boat Division Officer. Led 60 personnel who
maintained \$5M in hydrographic survey equipment. Also planned,
participated in, and directed over 15 hydrographic surveys in the
Arabian Sea and Arabian Gulf immediately after the first Gulf War.
These surveys were essential to hundreds of future ship and
submarine deployments to the region by US and Allied Naval
forces.

1989-1991: UC San Diego, Scripps Institution of Oceanography, La Jolla CA

- <u>Master's Degree Studen</u>t: Completed academic course work in oceanography, digital signal processing, artificial intelligence, machine learning, computer science, and linear algebra. Performed research on oceanography, remote sensing, and digital signal processing. Participated in an underwater acoustic research cruise onboard the USNS DeSteiger.
- 9. Attach a copy of your resume.

My CV is attached

10. List any advisory, consultative, honorary, or other part-time service or positions with Federal, State, or local governments, other than those listed above, within the last ten years.

None

11. List all positions held as an officer, director, trustee, partner, proprietor, agent, representative, or consultant of any corporation, company, firm, partnership, or other business, enterprise, educational, or other institution within the last ten years.

None

12. Please list each membership you have had during the past ten years or currently hold with any civic, social, charitable, educational, political,

professional, fraternal, benevolent or religious organization, private club, or other membership organization. Include dates of membership and any positions you have held with any organization. Please note whether any such club or organization restricts membership on the basis of sex, race, color, religion, national origin, age, or handicap.

- US Naval Institute, Lifetime Member, 1989-2017
- US Navy League, Lifetime Member, 1989-2017
- US Naval Weather Service, Lifetime Member, 1989-2017
- US Naval Academy Alumni Association, Lifetime Member, 1989-2017
- UC San Diego Alumni Association, Member, 1989-2017
- Acoustical Society of America, Member, 1997-2001
- International Hydrographic Organization, Member, 2014-2017
- Marine Technology Society, invited speaker
- · American Geophysical Union, invited speaker
- American Meteorology Society, invited speaker
- Oceanology International, invited speaker

None of these restrict membership on the basis of sex, race, color, religion, national origin, age or handicap; however the UC San Diego Alumni association and USNA Alumni Association restrict membership to alumni of their respective institutions

13. Have you ever been a candidate for and/or held a public office (elected, non-elected, or appointed)? If so, indicate whether any campaign has any outstanding debt, the amount, and whether you are personally liable for that debt.

No.

14. Itemize all political contributions to any individual, campaign organization, political party, political action committee, or similar entity of \$500 or more for the past ten years. Also list all offices you have held with, and services rendered to, a state or national political party or election committee during the same period.

None

15. List all scholarships, fellowships, honorary degrees, honorary society memberships, military medals, and any other special recognition for outstanding service or achievements.

## Military

- Legion of Merit (2)
- Meritorious Service Medal (3)
- Navy and Marine Corps Commendation Medal (5)
- Navy and Marine Corps Achievement Medal
- Joint Unit Commendation Medal
- Meritorious Unit Commendation Medal
- Navy Unit Commendation Medal
- · Humanitarian Service Medal
- Global War of Terror Service Medal
- Southwest Asia Service Medal.
- National Defense Service Medal

## **Professional**

Commander, Naval Air Forces Leadership Award, 2002

## Academic

UC San Diego Distinguished Alumni Award, 2016

## **Athletic**

- US Swimming Master's National Record Holder, 1500 m freestyle, 2008.
- US Naval Special Warfare Command Superfrog Half Iron Man Triathlon Relay Course Record Holder, 2006
- US Naval Academy Record Holder, 500 yd, 1000 yd, 1650 yd, 400 m 800 m, 1500 m freestyle, 1985-1989
- Bronze Medalist, National Sports Festival, 400 m freestyle, 1985
- Junior National Swimming Champion, 500 vd freestyle, 1984
- #1 National Prep School All American Swimmer, 500 vd freestyle, 1984

16. Please list each book, article, column, or publication you have authored, individually or with others. Also list any speeches that you have given on topics relevant to the position for which you have been nominated. Do not attach copies of these publications unless otherwise instructed.

## Academic

- Detection of sonar induced measurement uncertainties in environmental sensing: a case study using the Toroidal Volume Search Sonar, in Impact of Littoral Environmental Variability of Acoustic Predictions in Environmental Sensing, pp. 571-577, Springer, 2002, (C de Moustier, lead author)
- Multi beam volume acoustic backscatter imagery and reverberation measurements in the northeastem Gulf of Mexico, J. Acoustic. Soc. Am., 2002 (with C. De Moustier)

- Shallow water acoustic backscatter and reverberation measurements using a 68 kHz cylindrical array, Ph.D. Dissertation, Univ. Calif. San Diego, 2001
- On optimal amplitude shading for arrays of irregularly spaced or noncoplanar elements, IEEE J. Oceanic Eng., 25, 553-567, 2000 (with C, de Moustier)
- An empirical orthogonal function analysis of remotely sensed sea surface temperature variability and its relation to interior oceanic processes off Baja California, Remote Sensing of the Environment, 47(3), pp.375-389, 1994.
- Automated cloud screening of AVHRR imagery using split and merge clustering, Remote Sensing of the Environment, 44(4), 1991

### Professional

- Naval Oceanography Information Warfare Strategy, US Navy, 2017
- Securing The Weather Gauge of the 21st Century, Navy Live, 2017
- Naval Oceanography Electromagnetic Maneuver Warfare Strategy, US Navy, 2016
- Exploring Our Past, Forging Our Future: Diving on the USS Independence, The Sextant, Naval Historical and Heritage Command, 2016
- US Navy Ocean Gliders: Unmanned Underwater Vehicles That Are Improving Our Understanding of the World's Oceans, DOD Live, 2016
- Navy Meteorology and Oceanography Makes It Real During RIMPAC 2016, DOD Live, 2016
- Naval Oceanography Unmanned Systems Strategy, US Navy, 2015
- Charting the Invisible Terrain, US Naval Institute Proceedings, 2015
- Keeping the Fleet Safe Through Inclusion, Diversity, and Innovation, DOD Live, 2015
- Honoring Our Veterans, USNA Alumni Magazine Shipmate, 2015
- Department of the Navy and the Arctic, Statement to the Joint Subcommittee Hearing on Foreign Affairs, US House of Representatives, Subcommittee on Europe, Eurasia, and Emerging Threats and Subcommittee on the Western Hemisphere, November 17, 2015

**PRESENTATIONS:** A select list of the hundreds of formal presentations over my academic and professional career include:

## Congressional

 Oral Testimony to the US House of Representatives Joint Subcommittee Hearing on Charting the Arctic: Security, Economic, and Resource Opportunities, November 2015

## **Academic**

- UC San Diego/Scripps Institution of Oceanography, US Navy actions to address sea level rise, 2014
- University of Maine, US Navy actions to address climate change in the Arctic, 2010
- Meetings of the Acoustical Society of America, Seattle WA, 1999, Berlin GE, 2000

**Professional:** Keynote and invitational addresses at major conferences/meetings hosted by:

- AFCEA Intelligence, Surveillance, and Reconnaissance Conferences, 2014-2017
- NDIA's Undersea Warfare Conferences, 2015-2017
- AUSVI Conferences, 2014-2017
- US State Department's Our Oceans Conference, 2016
- Marine Technology Society/IEEE Oceans Conferences, 2014-2016
- Maury Project for Ocean Educators, sponsored by ONR, 2014-2016.
- National Ocean Sciences Bowl, hosted by NOAA and the Office of Naval Research
- ONR Program Meeting on International Cooperation and Engagement on Polar Programs and Research presentations on US Navy Arctic research activities, 2015
- Naval Studies Board presentations on unmanned systems technology, operations, 2015
- Defense Science Board presentations on unmanned systems technology, operations, 2014-2016
- Defense Science Board presentations on US Navy actions to address climate change, 2010-2014
- National Research Council presentations on US Navy actions to address climate change, 2010-2014
- 17. Please identify each instance in which you have testified orally or in writing before Congress in a governmental or non-governmental capacity and specify the date and subject matter of each testimony.
  - Oral Testimony to the US House of Representatives Joint Subcommittee Hearing on Charting the Arctic: Security, Economic, and Resource Opportunities, November 2015
- 18. Given the current mission, major programs, and major operational objectives of the department/agency to which you have been nominated, what in your background or employment experience do you believe

affirmatively qualifies you for appointment to the position for which you have been nominated, and why do you wish to serve in that position?

- a) I believe I am qualified for this position because I have 28 years of experience in the Navy doing exactly the same work that NOAA does for the nation, including practical, policy, and leadership experience in weather forecasting, ocean forecasting, hydrographic survey and charting, and counter-illegal fishing policy and planning.
- b) I wish to serve in this position because I have a lifelong commitment to serve my country, as well as an intellectual passion for the earth sciences. I would be honored to serve in a similar capacity that I have served in the Navy, but at a higher level.
- 19. What do you believe are your responsibilities, if confirmed, to ensure that the department/agency has proper management and accounting controls, and what experience do you have in managing a large organization?
  - a) If confirmed as the Assistant Secretary and Deputy Administrator, I would make it one of my top responsibilities to ensure the proper management and accounting controls of NOAA, and to ensure that our nation's taxpayer dollars are used as effectively and efficiently as possible. To do this, if confirmed, I would ensure NOAA has a rigorous programming, planning, budgeting, and execution process that is tied to well-defined requirements which are derived from a comprehensive NOAA Strategic Plan that is informed by input from external and internal stakeholders.
  - b) I have experience managing large organizations as detailed above in question A(8) and my attached CV. Specifically, I led the Navy equivalent to NOAA, the Naval Meteorology and Oceanography Command from 2014-2017, and I served as the Oceanographer of the Navy from 205-2017.
- 20. What do you believe to be the top three challenges facing the department/agency, and why?

I believe the top 3 challenges facing NOAA are:

a) Implementing the requirements of the Weather Research and Forecasting Innovation Act of 2017: The Congress passed this legislation, and the President signed it for a very clear reason; to improve our hazardous weather and tsunami prediction capability that can impact our nation by billions of dollars each year. If confirmed, I will conduct a review of our nation's approach to weather modeling to determine if we can improve alignment between, NOAA, the Navy and the USAF and ensure that we have a plan with a clearly articulated pathway to ensure the United States regains preeminence in weather modeling in the defense and non-defense sectors. If confirmed, I would make it my top priority to meet the intent of

- this law, especially the aspects concerning improvement to severe weather, tornado and hurricane warnings, and satellite data collection program management. I would also increase focus on cybersecurity for all NOAA information systems as these directly underpin it's effective hazardous weather warning capabilities. Finally, I will need to work with the NOAA Administrator as well as NESDIS and NWS ledership to focus on the NOAA satellite programs which are growing at an unsustainable rate and that have been delayed numerous times.
- b) Ensuring National Marine Fisheries, National Marine Sanctuary, and National Ocean Service policies and efforts that successfully balance the economic, conservation, national security, and homeland security requirements for our nation: I share the view of many Americans that we need to preserve our natural marine resources and undertake any development or activity (military, law enforcement, etc) in these regions in a sustainable, environmentally conscious way. I do believe we can do this while simultaneously benefiting from the vast energy, mineral, and fishery resources that exist within our Exclusive Economic Zones. NOAA is a critical enabler to economic development in the United States, especially in the rapidly expanding "blue economy" sector. If confirmed, I would ensure NOAA increases focus on this aspect of its mission to ensure the United States retains its competitive advantage over other nations that are expanding their maritime activities and investments (e.g. aquaculture, shipping, offshore energy, etc).
- c) Organizing and resourcing NOAA to more effectively and efficiently achieve its mission and meet legislative and legal requirements. As I indicated in my response to A(19), if confirmed I would immediately review NOAA's planning, programming, budgeting, and execution process to ensure every single tax dollar is optimally allocated to effectively achieve NOAA's mission. To do this effectively requires reviewing NOAA's current processes to determine if they are rigorous and to then determine if NOAA's approach requires changes to support this critical objective. Of these processes, improving how NOAA hires, trains, and retains its highly talented workforce would receive my focused attention.

## **B. POTENTIAL CONFLICTS OF INTEREST**

1. Describe all financial arrangements, deferred compensation agreements, and other continuing dealings with business associates, clients, or customers. Please include information related to retirement accounts.

None

2. Do you have any commitments or agreements, formal or informal, to maintain employment, affiliation, or practice with any business, association or other organization during your appointment? If so, please explain.

No

3. Indicate any investments, obligations, liabilities, or other relationships which could involve potential conflicts of interest in the position to which you have been nominated.

None

4. Describe any business relationship, dealing, or financial transaction which you have had during the last ten years, whether for yourself, on behalf of a client, or acting as an agent, that could in any way constitute or result in a possible conflict of interest in the position to which you have been nominated.

None

5. Describe any activity during the past ten years in which you have been engaged for the purpose of directly or indirectly influencing the passage, defeat, or modification of any legislation or affecting the administration and execution of law or public policy.

Between 2009-2017, as part of my official duty in the Navy, I have prepared submissions for the Navy Meteorology and Oceanography Command's portion of each annual National Defense Authorization Act (NDAA). These submissions averaged approximately \$350M each year, and included budget requests for weather and ocean sensors, supercomputers for weather and ocean modeling, hydrographic survey ships, and the funding for operations and salaries for approximately 2,500 Navy Sailor and civilian

oceanographers, meteorologists, hydrographers, atomic physicists, engineers, and support personnel.

6. Explain how you will resolve any potential conflict of interest, including any that may be disclosed by your responses to the above items.

Any potential conflict of interest will be resolved in accordance with the terms of my ethics agreement. I understand that my ethics agreement has been provided to the Committee. I am not aware of any potential conflict of interest other than those that are the subject of my ethics agreement.

## C. LEGAL MATTERS

1. Have you ever been disciplined or cited for a breach of ethics, professional misconduct, or retaliation by, or been the subject of a complaint to, any court, administrative agency, the Office of Special Counsel, professional association, disciplinary committee, or other professional group?

No / Not applicable

2. Have you ever been investigated, arrested, charged, or held by any Federal, State, or other law enforcement authority of any Federal, State, county, or municipal entity, other than for a minor traffic offense? If so, please explain.

No / Not applicable

3. Have you or any business or nonprofit of which you are or were an officer ever been involved as a party in an administrative agency proceeding, criminal proceeding, or civil litigation? If so, please explain.

No / Not applicable

4. Have you ever been convicted (including pleas of guilty or *nolo* contendere) of any criminal violation other than a minor traffic offense? If so, please explain.

No / Not applicable

5. Have you ever been accused, formally or informally, of sexual harassment or discrimination on the basis of sex, race, religion, or any other basis? If so, please explain.

No / Not applicable

 Please advise the Committee of any additional information, favorable or unfavorable, which you feel should be disclosed in connection with your nomination.

None

# D. RELATIONSHIP WITH COMMITTEE

1. Will you ensure that your department/agency complies with deadlines for information set by congressional committees?

Yes

2. Will you ensure that your department/agency does whatever it can to protect congressional witnesses and whistle blowers from reprisal for their testimony and disclosures?

Yes

3. Will you cooperate in providing the Committee with requested witnesses, including technical experts and career employees, with firsthand knowledge of matters of interest to the Committee?

Yes

4. Are you willing to appear and testify before any duly constituted committee of the Congress on such occasions as you may be reasonably requested to do so?

Yes

(Nominee is to include this signed affidavit along with answers to the above questions.)

# F. Affidavit

signed the foregoing Statement on Biographical and Financial Information and that the information provided therein is, to the best of his/her knowledge, current, accurate, and complete.

Signature of Nominee

Subscribed and sworn before me this  $\frac{1}{2}$  day of  $\leq EP$ , 201?

Barbara & Munary Notary Public

> BARBARA A. MURNANE NOTARY PUBLIC DISTRICT OF COLUMBIA My Commission Expires April 30, 2018

# Rear Admiral Timothy Cole Gallaudet, Ph.D., U.S. Navy



## **FOCUS**

I have a lifelong commitment to serve my country, and an intellectual passion for the physical sciences of oceanography, meteorology, and hydrography. I owe this to my father, a retired U.S. Navy Captain, and mother, a lifelong member of the Daughters of the American Revolution. They inspired me towards a professional career in the U.S. Navy's Oceanography community, in which I have served since 1989 and have led since 2014. I would be honored to continue to serve our great nation at an even higher level in a similar capacity.

### **EXPERTISE**

**Leadership:** broad experience ranging from small Navy units of a few dozen personnel conducting tactical-scale scientific support missions, to large enterprises of thousands of military and civilian teams providing ocean, weather, and sea floor information to every Navy ship, submarine, aircraft, and SEAL Team to ensure their safe and effective mission accomplishment.

**Management:** diverse portfolio to include: running the pre-inspection maintenance program for a \$7 billion Navy aircraft carrier (as a collateral duty); coordinating a \$5 billion 5-year budget submission for all US Nav's Information Warfare programs, and planning and executing the research, development, and integration of over \$1.6 billion dollars of navigation equipment on all US Navy ships, aircraft, and submarines.

**Strategy:** far reaching results in developing US Navy strategy for environmental support Naval Special Warfare, Anti-submarine Warfare, Electromagnetic Manuever Warfare,

and,Information Navy Warfare; Unmanned systems development and operations, Arctic research, development, capability development, and operations; and adaptation of Naval facilities and operational planning to climate change.

**Science & Technology:** proven expertise in the skillful oversight and direction of research, development, acquisition, and transition of capabilities covering multiple disciplines, to include: digital signal processing, information technology, cyber security, machine learning, artificial intelligence, remote sensing, underwater acoustics, atomic physics, astrophysics, astrometry, oceanography, meteorology, and hydrography.

**Partnerships:** widely recognized initiative and support to academic, research, and operational partnerships across the US federal agencies, domestic and international research institutions and universities, and the Joint US DoD force.

# **EDUCATION**

# Degrees

- PhD Oceanography, UC San Diego, Scripps Institution of Oceanography, 2001
- MS. Oceanography, UC San Diego, Scripps Institution of Oceanography, 1991
- BS. Oceanography, U.S. Naval Academy, 1989

#### Courses

- Harvard Business School: Executive Cyber Security Course, 2016
- Air War College: Executive Cyber Security Course, 2015
- MIT: Summer Seminar, 2013
- Naval Post Graduate School: Effects Based Strategy Course, 2009

## **EXPERIENCE**

## 2015-2017: Chief of Naval Operations Staff, Washington DC

- Oceanographer of the Navy: oversee an annual \$350M budget to program and direct all
  policy for US Navy oceanography, meteorology, oceanography, astrometry, and precise
  timing capability which is used by all Navy ships, aircraft, submarines and SEAL Teams
  to safety and successfully operate.
- Navigator of the Navy: oversee a 5 year budget of \$1.6B for directing all policy, research, development,, and integration of navigation equipment on all Navy ships, submarines, and aircraft.
- Naval Deputy to the NOAA Administrator: coordinate cooperative efforts between the Navy an NOAA on sea floor charging, and weather modeling, ocean and weather observations, technology development and research, and personnel exchanges.
- <u>Director, US Nevy Task Force Climate Change</u>: direct all Navy policy and plans
  regarding climate change impacts to facilities, and strategic plans, and capability
  development, with a focus on the Arctic. Authored the US Navy Arctic Roadmap of
  2010, and reviewed and approved the US Navy Arctic Roadmap for 2014-2030.
- <u>Director of the Office of the DoD Executive Agent for Maritime Domain Awareness</u>
   (<u>MDA</u>): directed all DoD strategic planning, partnerships, and system development
   MDA. Signed the DoD MDA Strategic Plan, Architecture, and Vessel of Interest Lexicon.
- <u>DoD Precise Time and Time Interval Manager and DoD Celestial Reference Frame and Earth Orientation Manager</u>: oversee a \$20M annual budget that allows the US Naval Observatory to provide the absolute fundamental spatial and temporal references

needed for US DoD network and space operations, targeting, and command, control, communications, computers, intelligence, surveillance and reconnaissance.

# 2014-2017: Navai Meteorology and Oceanography Command, Stennis Space Center MS

- Commander, Naval Meteorology and Oceanography Command/Commander, Task
   Group 80.7: Direct the operations of 14 subordinate commands comprised of over 2500
   military and civilian personnel who provide weather, ocean, seafloor, precise time, and
   astrometry information to all Navy operating units afloat, aloft, and ashore. These
   commands continuously deploy all over the globe on Navy ships, submarines, aircraft,
   and with SEAL Teams, and include reachback centers that assimilate environmental
   information from satellites, underwater floats and drones, and other sensors worldwide
   into cyber secure supercomputers that predict the best routes, timelines, weapons
   setting, sensor configurations, and equipment loads for Navy units to operate safely and
   effectively.
- Hydrographer of the Navy: Develop and direct all US Navy hydrographic survey plans, partnerships, and operations using a Fleet of six \$250M Oceanographic survey vessels as well as a rapidly deplorable Team that uses jet skis equipped with echosounders, underwater drones, and small boats to identify safe routes and harbor berths after natural disasters. The hydrographic partnerships and engagements that I direct include over 60 nations and are highly praised by Geographic Combatant Commanders for contributing to their Theater Security Cooperation (TSC) objectives.

# 2013-2014: Chief of Naval Operations Staff, Washington DC

 <u>Deputy Oceanographer of the Navy</u>: Deputy to the senior Oceanography officer in the Navy, directing the daily actions of a staff of 90 personnel that oversee \$350M of annual resources for the Navy's operational oceanography, meteorology, hydrography, precise time, and astrometry capabilities. Duties also included oversight of the Navigation capabilities, Navy climate change policy and plans, DoD's Maritime Domain Awareness Program, the Navy Space Program, and a variety of classified space rested intelligence programs.

# 2011-2013: US Naval Observatory, Washington DC

<u>Superintendent/Commanding Officer</u>: Commanded a team of over 100 atomic
physicists, astrophysicists, astronomers, mathematicians and engineers who develop,
maintain, and modernize the DoD's precision time keeping and astrometric observing
capabilities. The Master Clock atomic clock ensemble and telescope data processing
computers at the US Naval Observatory are designated national critical infrastructure
because all US satellites, ballistic missiles, and national defense and economic
computer networks would fail to operate without the information they provide.

# 2008-2011: Chief of Naval Operations Staff, Washington DC

- <u>Deputy Navigator of the Navy</u>: Assisted with management of a 5 year budget of \$1.6B for directing all policy, research, development,, and integration of navigation equipment on all Navy ships, submarines, and aircraft.
- <u>Deputy Director</u>, <u>US Navy Task Force Climate Change</u> Established a Task Force of over 120 individuals representing all Navy operating forces, headquarters, system commands, all federal agencies, and numerous universities and labs. Directed all Navy policy and plans regarding climate change impacts to facilities, and strategic plans, and capability development, with a focus on the Arctic. Authored the US Navy Arctic Roadmap of 2010.

# 2005-2008: Naval Oceanography Special Warfare Center, Coronado CA

- <u>Commanding Officer</u>: Commanded 120 personnel who deployed with US Navy SEAL Teams in Iraq, Afghanistan, Africa, and Southeast Asia to forecast weather, sea state, ocean and river currents, and operate unmanned aerial and underwater vehicles and other technical sensors to detect and locate enemy forces.
- <u>Technical Special Reconnaissance Officer, Commander, Naval Special Warfare</u>
   <u>Command</u> Established the first Navy SEAL program for unmanned aerial and
   underwater vehicles and other technical sensors to detect and locate enemy forces

# 2004-2005: Naval Oceanographic Office, Stennis Space Center MS

Anti-Submarine Warfare (ASW) Program Manager: Coordinated the undersea data
collection of 8 Oceanographic Survey Ships deployed worldwide, the processing of this
data into geophysical databases used by Navy ships, aircraft, and submarines to
operate their sonars/sonobuoys effectively, and direct teams of deploying ilitary and
civilian personnel to advise these units during ASW exercises and operations. Deployed
on the USNS Bowditch during the first operational deployment of an ocean glider
underwater drone from a Navy ship.

# 2003-2004: Commander, Naval Meteorology and Oceanography Command, Stennis Space Center MS

 <u>Plans and Programs Officer.</u> Oversaw the budget and plans for a highly classified unmanned underwater program executed at a subordinate command (Naval Oceanographic Office).

# 2001-2003: USS KITTY HAWK (CV-63), Yokosuka, Japan

- Meteorology and Oceanography Division Officer: Led 18 personnel to forecast wind, weather, sea state, and ocean currents for the KITTY HAWK Carrier Strike Group (CSG) composed of an air wing of 60 aircraft, and 5 escort ships which conducted the first strikes into Afghanistan during Operation Enduring Freedom in October 2001. Also conducted first strikes into Iraq during Operation Iraqi Freedom in March 2003.
- Officer of the Deck. Directed all aircraft carrier movements and all aircraft launches and recoveries for two 4-hour periods each day.
- <u>INSURV Coordinator</u>. Developed and executed a 6 month plan for the 3,000 person crew to prepare the ship for its inspection by the Board of Inspection and Survey (INSURV). This involved tens of thousands of maintenance actions precisely coordinated across a dozen departments.

# 1997-2001: UC San Diego, Scripps Institution of Oceanography, La Jolla CA

 <u>PhD Student</u>: Completed course work on underwater acoustics, digital signal processing, and computer programming. Performed research at Scripps' Marine Physical Laboratory (MPL). Participated on a research cruise on the R/V New Horizon.

## 1995-1997: USS PELELIU (LHA-5), San Diego CA

- Meteorology and Oceanography Division Officer. Led 15 personnel to forecast wind, weather, sea state, and ocean currents for the PELELIU Amphibious Ready Group (ARG) composed of a Marine Aviation Combat Element of 25 aircraft, 2 escort ships, and a Marine Expeditionary Unit. Conducted Operation Southern Watch in the Northern Arabian Gulf,
- Officer of the Deck Directed all ship movements and all aircraft launches and recoveries for two 4-hour periods each day.

# 1993-1995: Naval European Meteorology and Oceanography Center, Rota, Spain

 <u>Command & Forecast Duty Officer</u>: lead weather and ocean forecaster of a watch team supporting Navy, Joint, and Allied Maritime forces operating in Europe and the Mediterranean. Supported NATO operations in Bosnia, and participated in Operation Deny Flight.

# 1994: Commander, US 6th FLEET, USS LASALLE (LCC-20) Gaeta, Italy

 Assistant Fleet Oceanographer. Assistant to the senior oceanographer on the staff of the Commander of the US 6th Fleet. Led a division of 10 personnel who prepared the weather and ocean forecasts for the Fleet Commander daily. Coordinated with staff planners and operations officers to ensure all 6thFleet operations were conducted safely and effectively. Routed dozens of ships around hazardous seas.

# 1993: Naval European Meteorology and Oceanography Detachment, Sousa Bay, Greece

 Officer in Charge: Led 14 personnel who provided wearther and ocean forecasts for Navy, Joint, and NATO ships and aircraft using the port and air field on the island of Crete.

# 1991-1993: Oceanographic Unit FIVE, USNS HARKNESS (T-AGS 32), Manama, Bahrain

 Operations Officer/Boat Division Officer. Led 60 personnel who maintained \$5M in hydrographic survey equipment. Also planned, participated in, and directed over 15 hydrographic surveys in the Arabian Sea and Arabian Gulf immediately after the first Gulf War. These surveys were essential to hundreds of future ship and submarine deployments to the region by US and Allied Naval forces.

# 1989-1991: UC San Diego, Scripps Institution of Oceanography, La Jolla CA

 <u>Master's Degree Studen</u>t: Completed academic course work in oceanography, digital signal processing, artificial intelligence, machine learning, computer science, and linear algebra. Performed research on oceanography, remote sensing, and digital signal processing. Participated in an underwater acoustic research cruise onboard the USNS DeSteiger.

## REFERENCES

### **Federal**

- Congressman Ryan Zinke (R-MO); fellow staff officer at the Headquarters of the Naval Special Warfare Command, 2007
- Dr. Kathy Sullivan Under Secretary of Commerce for Oceans & Atmosphere/NOAA Administrator, partner in a Navy-NOAA MOA

### Military

- ADM John Richardson Chief of Naval Operations (CNO); I served on his staff, away20015-2017
- ADM William Moran Vice Chief of Naval Operations; I coordinated with him on US Navy Navigation and Oceanography policy while serving on the CNO's staff, 2016-2017
- ADM Michelle Howard Commander, Naval Forces Europe; I coordinated with her on US Navy Navigation and Oceanography policy, 2015-2016
- ADM Scott Swift Commander, US Pacific Fleet; I deployed my units and reported to him to support his operations, 2015-2017

- ADM Harry Harris Commander, US Pacific Command; I deployed my units to support his operations, 2015-2017
- VADM Nora Tyson Commander, US 3<sup>rd</sup> Fleet; I deployed my units to support her operations, 2015-2016
- VADM Jan Tighe Deputy Chief of Naval Operations for Information Warfare; I report to her as my immediate superior officer, 2016-2017
- VADM Gardner Howe Military aide to the Director, CIA; I reported to him on the staff of the Commander, Naval Special Warfare Command, 2007
- GEN(ret) John Kelly former Commander, US Southern Command; he served as my senior mentor during the Chairman of the Joint Chiefs of Staff CAPTSTONE training program, 2016
- ADM(ret) William Gortney former Commander, US Northern Command; I reported to him as my immediate superior officer, 2014-2015
- VADM(ret) Paul Gaffney former Chief of Naval Research; I continue to coordinate with him on ocean science outreach efforts
- VADM(ret) Joseph Kernan former Deputy Commander, US Southern Command; I reported to him while serving on his staff at the Naval Special Warfare Command, 2007
- RADM(ret) Jon White former Oceanographer of the Navy, CEO Consortium for Ocean Leadership; I served as his Executive Aide and Deputy on the CNO staff, 2013
- RADM(ret) David Titley former Oceanographer of the Navy, Director Pennsylvania State
   University Center for Climate and Weather Security; I served as his Deputy on CNO staff, 2009

### **Academic**

- Dr. Margery Lienen Director, Scripps Institution of Oceanography
- Dr. Walter Munk, Professor, UC San Diego, Scripps Institution of Oceanography
- Dr. Bill Kuperman Professor, Director, Marine Physical Laboratory, UC San Diego, Scripps Institution of Oceanography
- Dr. Marc Abbott Director, MIT/Woods Hole Oceanographic Institution
- . Dr. Robert Ballard Ocean Exploration Trust, University of Road Island

## **AWARDS**

## Military

- Legion of Merit (2)
- Meritorious Service Medal (3)
- Navy and Marine Corps Commendation Medal (5).
- · Navy and Marine Corps Achievement Medal
- Joint Unit Commendation Medal
- Meritorious Unit Commendation Medal
- Navy Unit Commendation Medal
- Humanitarian Service Medal
- Global War of Terror Service Medal
- Southwest Asia Service Medal
- National Defense Service Medal

### Professional

Commander, Naval Air Forces Leadership Award, 2002

## Academic

UC San Diego Distinguished Alumni Award, 2016

## Athletic

- US Swimming Master's National Record Holder, 1500 m freestyle, 2008
- US Naval Special Warfare Command Superfrog Half Iron Man Triathlon Relay Course Record Holder, 2006
- US Naval Academy Record Holder, 500 yd, 1000 yd, 1650 yd, 400 m 800 m, 1500 m freestyle, 1985-1989
- Bronze Medalist, National Sports Festival, 400 m freestyle, 1985
- Junior National Swimming Champion, 500 vd freestyle, 1984
- #1 National Prep School All American Swimmer, 500 yd freestyle, 1984

## **ASSOCIATIONS**

- US Naval Institute, Lifetime Member, 1989-2017
- US Navy League, Lifetime Member, 1989-2017
- US Naval Weather Service, Lifetime Member, 1989-2017
- US Naval Academy Alumni Association, Lifetime Member, 1989-2017
- UC San Diego Alumni Association, Member, 1989-2017
- Acoustical Society of America, Member, 1997-2001
- International Hydrographic Organization, Member, 2014-2017
- Marine Technology Society, invited speaker
- · American Geophysical Union, invited speaker
- · American Meteorology Society, invited speaker
- · Oceanology International, invited speaker

## **PUBLICATIONS**

## **Academic**

- Detection of sonar induced measurement uncertainties in environmental sensing: a case study using the Toroidal Volume Search Sonar, in Impact of Littoral Environmental Variability of Acoustic Predictions in Environmental Sensing, pp. 571-577, Springer, 2002, (C de Moustier, lead author)
- Multi beam volume acoustic backscatter imagery and reverberation measurements in the northeastern Gulf of Mexico, J. Acoustic. Soc. Am., 2002 (with C. De Moustier)
- Shallow water acoustic backscatter and reverberation measurements using a 68 kHz cylindrical array, Ph.D. Dissertation, Univ. Calif. San Diego, 2001
- On optimal amplitude shading for arrays of irregularly spaced or non-coplanar elements, IEEE
   J. Oceanic Eng., 25, 553-567, 2000 (with C, de Moustier)
- An empirical orthogonal function analysis of remotely sensed sea surface temperature variability and its relation to interior oceanic processes off Baja California, Remote Sensing of the Environment, 47(3), pp.375-389, 1994.
- Automated cloud screening of AVHRR imagery using split and merge clustering, Remote Sensing of the Environment, 44(4), 1991

## **Professional**

Naval Oceanography Information Warfare Strategy, US Navy, 2017

- Securing The Weather Gauge of the 21<sup>st</sup> Century, Navy Live, 2017.
- Naval Oceanography Electromagnetic Maneuver Warfare Strategy, US Navy, 2016
- Exploring Our Past, Forging Our Future: Diving on the USS Independence, The Sextant, Naval Historical and Heritage Command, 2016
- US Navy Ocean Gliders: Unmanned Underwater Vehicles That Are Improving Our Understanding of the World's Oceans, DOD Live, 2016
- Navy Meteorology and Oceanography Makes It Real During RIMPAC 2016, DOD Live, 2016
- Naval Oceanography Unmanned Systems Strategy, US Navy, 2015.
- Charting the Invisible Terrain, US Naval Institute Proceedings, 2015
- Keeping the Fleet Safe Through Inclusion, Diversity, and Innovation, DOD Live, 2015
- · Honoring Our Veterans, USNA Alumni Magazine Shipmate, 2015
- Department of the Navy and the Arctic, Statement to the Joint Subcommittee Hearing on Foreign Affairs, US House of Representatives, Subcommittee on Europe, Eurasia, and Emerging Threats and Subcommittee on the Western Hemisphere, November 17, 2015

**PRESENTATIONS:** A select list of the hundreds of formal presentations over my academic and professional career include:

# Congressional

 Oral Testimony to the US House of Representatives Joint Subcommittee Hearing on Charting the Arctic: Security, Economic, and Resource Opportunities, November 2015

## Academic

- UC San Diego/Scripps Institution of Oceanography, US Navy actions to address sea level rise, 2014
- University of Maine, US Navy actions to address climate change in the Arctic, 2010
- Meetings of the Acoustical Society of America, Seattle WA, 1999, Berlin GE, 2000

Professional: Keynote and invitational addresses at major conferences/meetings hosted by:

- AFCEA Intelligence, Surveillance, and Reconnaissance Conferences, 2014-2017
- NDIA's Undersea Warfare Conferences, 2015-2017
- AUSVI Conferences, 2014-2017
- US State Department's Our Oceans Conference, 2016
- Marine Technology Society/IEEE Oceans Conferences, 2014-2016
- Maury Project for Ocean Educators, sponsored by ONR, 2014-2016
- National Ocean Sciences Bowl, hosted by NOAA and the Office of Naval Research
- ONR Program Meeting on International Cooperation and Engagement on Polar Programs and Research presentations on US Navy Arctic research activities, 2015
- Naval Studies Board presentations on unmanned systems technology, operations, 2015
- Defense Science Board presentations on unmanned systems technology, operations, 2014-2016
- Defense Science Board presentations on US Navy actions to address climate change, 2010-2014
- National Research Council presentations on US Navy actions to address climate change, 2010-2014