



119TH CONGRESS
1ST SESSION

S. _____

To require the Under Secretary of Commerce for Oceans and Atmosphere to conduct a project to improve forecasts of coastal marine fog, and for other purposes.

IN THE SENATE OF THE UNITED STATES

Mr. CRUZ (for himself and Mr. PADILLA) introduced the following bill; which was read twice and referred to the Committee on _____

A BILL

To require the Under Secretary of Commerce for Oceans and Atmosphere to conduct a project to improve forecasts of coastal marine fog, and for other purposes.

1 *Be it enacted by the Senate and House of Representa-*
2 *tives of the United States of America in Congress assembled,*

3 **SECTION 1. SHORT TITLE.**

4 This Act may be cited as the "Fog Observations and
5 Geographic Forecasting Act".

1 **SEC. 2. PROJECT TO IMPROVE FORECASTS OF COASTAL**
2 **MARINE FOG.**

3 (a) **IN GENERAL.**—The Under Secretary of Com-
4 merce for Oceans and Atmosphere shall conduct a project
5 to improve forecasts of coastal marine fog.

6 (b) **GOAL.**—The goal of the project required under
7 subsection (a) is to enhance vessel safety and reduce the
8 economic impact of coastal marine fog events, with a focus
9 on—

10 (1) increasing the number of marine-based ob-
11 servations through additional Federal platforms and
12 commercially acquired observations in locations
13 where impacts from marine fog and reduced visi-
14 bility have major safety and economic impacts, in-
15 cluding through the use of—

16 (A) buoys;

17 (B) meteorological stations measuring visi-
18 bility, temperature, dewpoint, and wind speed
19 and direction as a stand-alone or co-located
20 with water level sensors, such as those that are
21 part of the physical oceanographic observation
22 system program of the National Oceanic and
23 Atmospheric Administration;

24 (C) stationary platforms or drifting instru-
25 ments;

26 (D) vessels;

1 (E) unmanned systems;

2 (F) remote sensing technologies, including
3 rapid refresh hyperspectral satellite imagery;
4 and

5 (G) advanced algorithms that extract ac-
6 tionable information from observational data,
7 including early detection and regular moni-
8 toring of marine fog;

9 (2) advancing geographic coverage, resolution,
10 skill, and accuracy of marine fog modeling, includ-
11 ing, when feasible, additional locations and advance-
12 ments in marine channel forecast capability;

13 (3) improving communication of marine fog
14 advisories by the National Oceanic and Atmospheric
15 Administration;

16 (4) communicating risks posed by hazardous
17 marine fog events in a way that maximizes informed
18 decision making by the public; and

19 (5) providing decision support services based on
20 environmental information that is actionable to the
21 recipient of a marine fog advisory.

22 (c) **STAKEHOLDER ENGAGEMENT.**—In implementing
23 the project required under subsection (a), the Under Sec-
24 retary shall meet with public and private stakeholders re-

1 garding the planning, development, and implementation of
2 the project.

3 (d) **TRIBAL ENGAGEMENT.**—The Under Secretary
4 shall meet with Indian tribes (as defined in section 4 of
5 the Indian Self-Determination and Education Assistance
6 Act (25 U.S.C. 5304)) regarding the planning, develop-
7 ment, and implementation of the project required under
8 subsection (a).

9 (e) **PROJECT PLAN.**—Not later than one year after
10 the date of the enactment of this Act, the Under Secretary
11 shall develop a plan for the project required under sub-
12 section (a) that details the specific research, development,
13 and technology transfer activities, as well as corresponding
14 resources and timelines, necessary to achieve the goal set
15 forth under subsection (b).