..... (Original Signature of Member)

115th CONGRESS 1st Session



To amend the Harmful Algal Bloom and Hypoxia Research and Control Act of 1998 to reauthorize the national harmful algal blooms and hypoxia program and require an assessment and action plan for reducing harmful algal blooms and hypoxia in the Greater Everglades region, and for other purposes.

IN THE HOUSE OF REPRESENTATIVES

Mr. MAST introduced the following bill; which was referred to the Committee on _____

A BILL

- To amend the Harmful Algal Bloom and Hypoxia Research and Control Act of 1998 to reauthorize the national harmful algal blooms and hypoxia program and require an assessment and action plan for reducing harmful algal blooms and hypoxia in the Greater Everglades region, 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,

 $\mathbf{2}$

1 SECTION 1. SHORT TITLE.

2 This Act may be cited as the "Harmful Algal Bloom3 and Hypoxia Research and Control Act of 2018".

4 SEC. 2. HARMFUL ALGAL BLOOMS AND HYPOXIA RE5 SEARCH AND CONTROL.

6 (a) REAUTHORIZATION OF NATIONAL HARMFUL
7 ALGAL BLOOMS AND HYPOXIA PROGRAM.—Section
8 609(a) of the Harmful Algal Bloom and Hypoxia Research
9 and Control Act of 1998 (33 U.S.C. 4003(a)) is amend10 ed—

(1) by striking "and 603B" and inserting ",
603B, and 603C";

13 (2) by striking "\$20,500,000" and inserting
14 "\$22,000,000"; and

15 (3) by striking "2018" and inserting "2023".

(b) GREATER EVERGLADES ASSESSMENT AND ACTION PLAN.—The Harmful Algal Bloom and Hypoxia Research and Control Act of 1998 (33 U.S.C. 4003) is
amended by inserting after section 603B the following new
section:

21 "SEC. 603C. GREATER EVERGLADES HARMFUL ALGAL BLOOMS AND HYPOXIA.

"(a) INTEGRATED ASSESSMENT.—Not later than 18
months after the date of enactment of the Harmful Algal
Bloom and Hypoxia Research and Control Act of 2018,
the Task Force, in accordance with the authority under

section 603, shall complete and submit to the Congress
 and the President an integrated assessment that examines
 the causes, consequences, and potential approaches to re duce harmful algal blooms and hypoxia in the Greater Ev erglades region, including—

6 "(1) a comprehensive analysis of how restora-7 tion efforts undertaken pursuant to such section 8 with respect to the South Florida Ecosystem (as defined in section 528 of the Water Resources Devel-9 10 opment Act of 1996 (33 U.S.C. 2201note; Public 11 Law 104–303)) may impact the distribution, mag-12 nitude, duration, and frequency of harmful algal 13 blooms and hypoxia events within the region; and

14 "(2) the status of, and gaps within, current 15 harmful algal bloom and hypoxia research, moni-16 toring, management, prevention, response, and con-17 trol activities that directly benefit the region and 18 that are carried out by any of the following entities:

- 19 "(A) Federal agencies, including the20 United States Army Corps of Engineers.
 - "(B) State agencies.
 - "(C) Regional research consortia.
- 23 "(D) Institutions of higher education (as
 24 defined in section 101 of the Higher Education
 25 Act of 1965 (20 U.S.C. 1001)).

21

1	"(E) Private industry.
2	"(F) Nongovernmental organizations.
3	"(b) ACTION PLAN.—
4	"(1) IN GENERAL.—Not later than 2 years
5	after the date of enactment of the Harmful Algal
6	Bloom and Hypoxia Research and Control Act of
7	2018, the Task Force shall develop and submit to
8	the Congress a plan, based on the integrated assess-
9	ment under subsection (a), for reducing, mitigating,
10	and controlling harmful algal blooms and hypoxia in
11	the Greater Everglades region.
12	"(2) CONTENTS.—The plan shall—
13	"(A) address the monitoring needs identi-
14	fied in the integrated assessment under sub-
15	section (a);
16	"(B) develop a timeline and budgetary re-
17	quirements for deployment of future assets;
18	"(C) identify requirements for the develop-
19	ment and verification of Greater Everglades
20	harmful algal bloom and hypoxia models, in-
21	cluding—
22	"(i) all assumptions built into the
23	models; and

1	"(ii) data quality methods used to en-
2	sure the best available data are utilized;
3	and
4	"(D) propose the development of an early
5	warning system for alerting local communities
6	in the region to harmful algal bloom risks that
7	may impact human health.
8	"(3) REQUIREMENTS.—In developing the plan,
9	the Task Force shall—
10	"(A) coordinate with the State of Florida
11	and affected local and Tribal governments;
12	"(B) consult with representatives from
13	academic, agricultural, industry, and other
14	stakeholder groups;
15	"(C) ensure that the plan complements
16	and does not duplicate activities conducted by
17	other Federal or State agencies, including the
18	South Florida Ecosystem Restoration Task
19	Force established under subsection (f) of sec-
20	tion 528 of the Water Resources Development
21	Act of 1996 (33 U.S.C. 2201note; Public Law
22	104–303);
23	"(D) identify critical research for reducing,
24	mitigating, and controlling harmful algal bloom
25	events and their effects;

1	"(E) evaluate cost-effective, incentive-
2	based partnership approaches;
3	"(F) ensure that the plan is technically
4	sound and cost-effective;
5	"(G) utilize existing research, assessments,
6	reports, and program activities;
7	"(H) publish a summary of the proposed
8	plan in the Federal Register at least 180 days
9	prior to submitting the completed plan to Con-
10	gress;
11	"(I) after submitting the completed plan to
12	Congress, provide biennial progress reports on
13	the activities toward achieving the objectives of
14	the plan;
15	``(J) conduct the assessment under sub-
16	section (a) and submit the plan under sub-
17	section (b) through the agencies that are mem-
18	bers of the Task Force using funds authorized
19	and available for such agencies in support of
20	restoration of the Greater Everglades; and
21	"(K) include the funding for the assess-
22	ment in the plan and carry out the plan in the
23	annual cross-cut budget for the South Florida
24	Ecosystem Restoration Program under section
25	528 of the Water Resources Development Act

 $\overline{7}$

1	of 1996 (33 U.S.C. 2201note; Public Law 104–
2	303).
3	"(c) GREATER EVERGLADES.—In this section, the
4	term 'Greater Everglades' means—
5	"(1) all lands and waters within the administra-
6	tive boundaries of the South Florida Water Manage-
7	ment District;
8	"(2) regional coastal waters, including Biscayne
9	Bay, the Caloosahatchee Estuary, Florida Bay, and
10	Indian River Lagoon; and
11	"(3) the Florida Reef Tract.".
12	(c) INTER-AGENCY TASK FORCE.—Section 603(a) of
13	the Harmful Algal Bloom and Hypoxia Research and Con-
14	trol Act of 1998 (33 U.S.C. 4001(a)) is amended—
15	(1) in paragraph (12), by striking "and" at the
16	$\mathrm{end};$
17	(2) by redesignating paragraph (13) as para-
18	graph (14) ; and
19	(3) by inserting after paragraph (12) the fol-
20	lowing:
21	"(13) the Army Corps of Engineers; and".
22	(d) Scientific Assessments of Freshwater
23	HARMFUL ALGAL BLOOMS.—Section 603(f)(1) Harmful
24	Algal Bloom and Hypoxia Research and Control Act of
25	1998 (33 U.S.C. $4001(f)(1)$) is amended by striking "later

than 24 months" and all that follows and inserting "less 1 than once every 5 years, the Task Force shall complete 2 3 and submit to Congress a scientific assessment of harmful 4 algal blooms in United States coastal waters and fresh-5 water systems. Each assessment shall examine both marine and freshwater harmful algal blooms, including those 6 7 in the Great Lakes, Greater Everglades, and upper 8 reaches of estuaries, those in freshwater lakes and rivers, 9 and those that originate in freshwater lakes or rivers and 10 migrate to coastal waters.".

11 SEC. 3. CONSULTATION REQUIRED.

Section 102 of the Harmful Algal Bloom and Hypoxia Amendments Act of 2004 (33 U.S.C. 4001a) is
amended by striking "the amendments made by this title"
and inserting "the Harmful Algal Bloom and Hypoxia Research and Control Act of 1998".

17 SEC. 4. NATIONAL HARMFUL ALGAL BLOOM AND HYPOXIA 18 PROGRAM.

(a) PROGRAM DUTIES.—Section 603A(e) of the
Harmful Algal Bloom and Hypoxia Research and Control
Act of 1998 (33 U.S.C. 4002(e)) is amended—

(1) in paragraph (1), by inserting ", including
to local and regional stakeholders through the establishment and maintenance of a publicly accessible
Internet website that provides information on Pro-

1	gram activities completed pursuant to this section"
2	after "Program";
3	(2) in paragraph (3) —
4	(A) in subparagraph (B), by striking ";
5	and" and inserting a semicolon;
6	(B) in subparagraph (C), by inserting
7	"and" after the semicolon at the end; and
8	(C) by adding at the end the following:
9	"(D) to accelerate the utilization of effec-
10	tive methods of intervention and mitigation to
11	reduce the frequency, severity, and impacts of
12	harmful algal bloom and hypoxia events;";
13	(3) in paragraph (4), by striking "and work co-
14	operatively with regional, State, tribal, and local gov-
15	ernment agencies" and inserting ", and work coop-
16	eratively to provide technical assistance to, regional,
17	State, tribal, and local government entities, and re-
18	gional information coordination entities (as defined
19	in section 12303(6) of the Integrated Coastal and
20	Ocean Observation System Act of 2009 (33 U.S.C.
21	3602))"; and
22	(4) in paragraph (7) —
23	(A) by inserting "and extension" after "ex-
24	isting education"; and

(B) by inserting "intervention," after
 "awareness of the causes, impacts,".

3 (b) INTEGRATED COASTAL AND OCEAN OBSERVING 4 System.—Section 603A(i) of the Harmful Algal Bloom 5 and Hypoxia Research and Control Act of 1998 (33) 6 U.S.C. 20 4002(i)) is amended by inserting "coordinate 7 with the regional information coordination entities referred to in subsection (e) and" after "this title shall". 8 9 (c) NATIONAL OCEANIC AND ATMOSPHERIC ADMIN-ISTRATION ACTIVITIES.—Section 603A(f) of the Harmful 10 11 Algal Bloom and Hypoxia Research and Control Act of 1998 (33 U.S.C. 4002(f)) is amended— 12

(1) in paragraph (3), by inserting ", which shall
include unmanned systems," after "infrastructure";
(2) in paragraph (5), by striking "and" at the
end;

17 (3) in paragraph (6)(C), by striking the period18 at the end and inserting a semicolon; and

19 (4) by adding at the end the following:

20 "(7) use cost effective methods in carrying out
21 this Act; and

22 "(8) develop contingency plans for the long-23 term monitoring of hypoxia.".

11

1 SEC. 5. HYPOXIA OR HARMFUL ALGAL BLOOM EVENTS OF

SIGNIFICANCE.

3 (a) Relief.—

4 (1) IN GENERAL.—Upon a determination under 5 subsection (b) that there is an event of significance, 6 the appropriate Federal official is authorized to 7 make sums available to the affected State or local 8 government for the purposes of assessing and miti-9 gating the detrimental environmental, economic, sub-10 sistence use, and public health effects of the event 11 of significance.

12 (2) FEDERAL SHARE.—The Federal share of
13 the cost of any activity carried out under this sub14 section for the purposes described in paragraph (1)
15 may not exceed 50 percent of the cost of that activ16 ity.

17 (3) DONATIONS.—Notwithstanding any other 18 provision of law, an appropriate Federal official may 19 accept donations of funds, services, facilities, mate-20 rials, or equipment that the appropriate Federal offi-21 cial considers necessary for the purposes described 22 in paragraph (1). Any funds donated to an appro-23 priate Federal official under this paragraph may be 24 expended without further appropriation and without 25 fiscal year limitation.

26 (b) DETERMINATIONS.—

1 (1) IN GENERAL.—At the discretion of an ap-2 propriate Federal official, or at the request of the 3 Governor of an affected State, an appropriate Fed-4 eral official shall determine whether a hypoxia or 5 harmful algal bloom event is an event of signifi-6 cance.

7 (2) CONSIDERATIONS.—In making a determina-8 tion under paragraph (1), the appropriate Federal 9 official shall consider the toxicity of the harmful 10 algal bloom, the severity of the hypoxia, its potential 11 to spread, the economic impact, the toxicity to fish 12 and wildlife, size and nature of the human popu-13 lation potentially exposed to the bloom, the relative 14 size in relation to the past 5 occurrences of harmful 15 algal blooms or hypoxia events that occur on a re-16 current or annual basis, and the geographic scope, 17 including the potential to affect several municipali-18 ties, to affect more than 1 State, or to cross an 19 international boundary.

20 (c) DEFINITIONS.—In this section:

21 (1) APPROPRIATE FEDERAL OFFICIAL.—The
22 term "appropriate Federal official" means—

23 (A) in the case of a marine or coastal hypoxia or harmful algal bloom event, the Under

1	Secretary of Commerce for Oceans and Atmos-
2	phere; and
3	(B) in the case of a freshwater hypoxia or
4	harmful algal bloom event, the Administrator of
5	the Environmental Protection Agency.
6	(2) EVENT OF SIGNIFICANCE.—The term
7	"event of significance" means a hypoxia or harmful
8	algal bloom event that has had or will likely have a
9	significant detrimental environmental, economic,
10	subsistence use, or public health impact on an af-
11	fected State.
12	(3) Hypoxia or harmful algal bloom
13	EVENT.—The term "hypoxia or harmful algal bloom
14	event" means the occurrence of hypoxia or a harm-
15	ful algal bloom as a result of a natural, anthropo-
16	genic, or undetermined cause.
17	SEC. 6. HYPOXIA OR HARMFUL ALGAL BLOOM FORE-
18	CASTING.
19	The Harmful Algal Bloom and Hypoxia Research and
20	Control Act of 1998 is amended by inserting after section
21	603B (33 U.S.C. 4003) the following new section:
22	"SEC. 603C. HYPOXIA OR HARMFUL ALGAL BLOOM FORE-
23	CASTING.
24	"Not later than one year after the date of the enact-

and Control Act of 2018, the Under Secretary shall com-1 2 plete and submit to Congress a plan for developing the capacity for sustained operational ecological forecast mod-3 4 els for forecasting harmful algal blooms or hypoxia. The 5 plan shall include a process for how such forecast models can be supported and operated with regional information 6 7 coordination entities identified under subsection (c)(4) of 8 section 12304 of the Integrated Coastal and Ocean Observation System Act of 2009 (33 U.S.C. 3603) for purposes 9 of the National Integrated Coastal and Ocean Observation 10 11 System established under such section.".