



AMENDMENT NO. _____

Calendar No. _____

Purpose: To improve the bill.

IN THE SENATE OF THE UNITED STATES—119th Cong., 1st Sess.**S. 1626**

To reauthorize the National Landslide Preparedness Act, and
for other purposes.

Referred to the Committee on _____ and
ordered to be printed

Ordered to lie on the table and to be printed

AMENDMENT intended to be proposed by _____

Viz:

1 Strike section 3 and insert the following:

2 **SEC. 3. REAUTHORIZATION OF NATIONAL LANDSLIDE PRE-**
3 **PAREDNESS ACT.**

4 (a) DEFINITIONS.—Section 2 of the National Land-
5 slide Preparedness Act (43 U.S.C. 3101) is amended—

6 (1) by redesignating paragraphs (4) through
7 (11) as paragraphs (7), (8), (10), (11), (13), (14),
8 (15), and (16), respectively;

9 (2) by inserting after paragraph (3) the fol-
10 lowing:

11 “(4) ATMOSPHERIC RIVER.—The term ‘atmos-
12 pheric river’ has the meaning given the term in sec-
13 tion 12(a) of the Flood Level Observation, Oper-

1 ations, and Decision Support Act (15 U.S.C.
2 9707(a)).

3 “(5) ATMOSPHERIC RIVER FLOODING EVENT.—
4 The term ‘atmospheric river flooding event’ has the
5 meaning given the term in section 12(a) of the
6 Flood Level Observation, Operations, and Decision
7 Support Act (15 U.S.C. 9707(a)).

8 “(6) EXTREME PRECIPITATION EVENT.—The
9 term ‘extreme precipitation event’ has the meaning
10 given the term in section 12(a) of the Flood Level
11 Observation, Operations, and Decision Support Act
12 (15 U.S.C. 9707(a)).”;

13 (3) by inserting after paragraph (8) (as so re-
14 designated) the following:

15 “(9) INSTITUTION OF HIGHER EDUCATION.—
16 The term ‘institution of higher education’ has the
17 meaning given the term in section 101(a) of the
18 Higher Education Act of 1965 (20 U.S.C.
19 1001(a)).”;

20 (4) by inserting after paragraph (11) (as so re-
21 designated) the following:

22 “(12) NATIVE HAWAIIAN ORGANIZATION.—The
23 term ‘Native Hawaiian organization’ has the mean-
24 ing given the term in section 6207 of the Elemen-
25 tary and Secondary Education Act of 1965 (20

1 U.S.C. 7517), except that the term includes the De-
2 partment of Hawaiian Home Lands and the Office
3 of Hawaiian Affairs.”; and

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

5 “(17) TRIBAL ORGANIZATION.—The term ‘Trib-
6 al organization’ has the meaning given the term in
7 section 4 of the Indian Self-Determination and Edu-
8 cation Assistance Act (25 U.S.C. 5304).”.

9 (b) NATIONAL LANDSLIDE HAZARDS REDUCTION
10 PROGRAM.—

11 (1) ESTABLISHMENT.—Section 3(a)(3) of the
12 National Landslide Preparedness Act (43 U.S.C.
13 3102(a)(3)) is amended by striking “protect” and
14 inserting “contribute to protecting”.

15 (2) PROGRAM ACTIVITIES.—Section
16 3(b)(1)(C)(ii) of the National Landslide Prepared-
17 ness Act (43 U.S.C. 3102(b)(1)(C)(ii)) is amended
18 by striking “implement” and inserting “dissemi-
19 nate”.

20 (3) NATIONAL STRATEGY.—Section 3(b)(2) of
21 the National Landslide Preparedness Act (43 U.S.C.
22 3102(b)(2)) is amended—

23 (A) by redesignating subparagraphs (A)
24 through (C) as clauses (i) through (iii), respec-
25 tively, and indenting appropriately;

1 (B) in the matter preceding clause (i) (as
2 so redesignated), by striking “Not later than”
3 and inserting the following:

4 “(A) IN GENERAL.—Not later than”; and
5 (C) by adding at the end the following:

6 “(B) ASSESSMENT.—For purposes of the
7 first national strategy published after the date
8 of enactment of the National Landslide Pre-
9 paredness Act Reauthorization Act of 2025
10 under subparagraph (A), the Secretary, in con-
11 sultation with the Secretary of Commerce, shall
12 include an assessment of the risks that atmos-
13 pheric river flooding events and extreme pre-
14 cipitation events pose to the safety of life and
15 property in the United States with respect to
16 landslide hazards.”.

17 (4) NATIONAL LANDSLIDE HAZARDS DATA-
18 BASE.—Section 3(b)(3) of the National Landslide
19 Preparedness Act (43 U.S.C. 3102(b)(3)) is amend-
20 ed—

21 (A) by redesignating subparagraphs (C)
22 and (D) as subparagraphs (D) and (E), respec-
23 tively; and

24 (B) by inserting after subparagraph (B)
25 the following:

1 “(C) the identification of areas in need of
2 additional hazard risk assessment, including
3 areas that may be at risk due to—

4 “(i) hydrology or changes in hydrology
5 that may include erosion, drought, or other
6 characteristics that could impact landslide
7 risk;

8 “(ii) atmospheric river flooding events
9 and extreme precipitation events, as identi-
10 fied by the Secretary of Commerce and the
11 Secretary;

12 “(iii) geologic activity, such as vol-
13 canic eruptions, earthquakes, or tsunamis;
14 or

15 “(iv) data-poor areas or hazards with
16 poor monitoring that could contribute to
17 increased landslide risk;”.

18 (5) LANDSLIDE HAZARD AND RISK PREPARED-
19 NESS FOR COMMUNITIES.—Section 3(b)(4) of the
20 National Landslide Preparedness Act (43 U.S.C.
21 3102(b)(4)) is amended—

22 (A) in the matter preceding subparagraph
23 (A), by inserting “Native Hawaiian organiza-
24 tions and other stakeholders, as appropriate,”
25 before “and Indian tribes”;

1 (B) in subparagraph (A)—

2 (i) in the matter preceding clause (i),
3 by striking “local, and Tribal governments
4 and decisionmakers” and inserting “and
5 local governments, Indian tribes, Tribal or-
6 ganizations, Native Hawaiian organiza-
7 tions, and other decisionmakers”;

8 (ii) by striking clause (iii) and insert-
9 ing the following:

10 “(iii) health and safety with respect to
11 landslides;”;

12 (iii) by redesignating clause (iv) as
13 clause (v); and

14 (iv) by inserting after clause (iii) the
15 following:

16 “(iv) reducing losses from landslides,
17 including the threats caused by atmos-
18 pheric rivers and other extreme precipita-
19 tion events; and”; and

20 (C) in subparagraph (B)—

21 (i) in clause (i), by striking “local,
22 and Tribal officials” and inserting “and
23 local officials, Indian tribes, Tribal organi-
24 zations, and Native Hawaiian organiza-
25 tions”; and

1 (ii) in clause (ii), by striking “local,
2 and Tribal emergency managers” and in-
3 serting “and local emergency managers
4 and emergency managers of Indian tribes,
5 Tribal organizations, and Native Hawaiian
6 organizations”.

7 (6) DEBRIS FLOW EARLY WARNING SYSTEM.—
8 Section 3(b)(5) of the National Landslide Prepared-
9 ness Act (43 U.S.C. 3102(b)(5)) is amended—

10 (A) in subparagraph (B), by striking
11 “State, territorial, local, and Tribal govern-
12 ments” and inserting “State, territorial, and
13 local governments, Indian tribes, Tribal organi-
14 zations, and Native Hawaiian organizations”;

15 (B) by redesignating subparagraphs (A)
16 through (C) as clauses (i) through (iii), respec-
17 tively, and indenting appropriately;

18 (C) in the matter preceding clause (i) (as
19 so redesignated), by striking “In carrying out”
20 and inserting the following:

21 “(A) IN GENERAL.—In carrying out”; and

22 (D) by adding at the end the following:

23 “(B) CONSULTATION.—In carrying out
24 subparagraph (A), the Secretary may consult
25 with an institution of higher education de-

1 scribed in subsection (d)(2)(B)(iv) and other
2 stakeholders to establish and support emer-
3 gency response procedures, as appropriate.”.

4 (7) EMERGENCY RESPONSE ACTIVITIES.—Sec-
5 tion 3(b)(6) of the National Landslide Preparedness
6 Act (43 U.S.C. 3102(b)(6)) is amended—

7 (A) by redesignating subparagraphs (A)
8 through (C) as clauses (i) through (iii), respec-
9 tively, and indenting appropriately;

10 (B) in the matter preceding clause (i) (as
11 so redesignated), by striking “In carrying” and
12 inserting the following:

13 “(A) IN GENERAL.—In carrying”;

14 (C) in subparagraph (A) (as so des-
15 ignated)—

16 (i) in the matter preceding clause (i)
17 (as so redesignated), by inserting “Native
18 Hawaiian organizations,” before “and In-
19 dian tribes”;

20 (ii) in clause (ii) (as so redesignated),
21 by striking “and” at the end;

22 (iii) in clause (iii) (as so redesign-
23 ated), by striking the period at the end
24 and inserting “; and”; and

1 (iv) by adding at the end the fol-
2 lowing:

3 “(iv) to improve real-time risk man-
4 agement during landslide events, including
5 with respect to landslide events caused
6 by—

7 “(I) hydrology or changes in hy-
8 drology that may include erosion,
9 drought, or other characteristics that
10 could impact landslide risk;

11 “(II) atmospheric river flooding
12 events and extreme precipitation
13 events, as identified by the Secretary
14 of Commerce and the Secretary;

15 “(III) geologic activity, such as
16 volcanic eruptions, earthquakes, or
17 tsunamis;

18 “(IV) data-poor areas or hazards
19 with poor monitoring that could con-
20 tribute to increased landslide risk; or

21 “(V) thawing permafrost and gla-
22 cial retreat causing destabilization of
23 slopes.”; and

24 (D) by adding at the end the following:

1 “(B) CONSULTATION.—In carrying out
2 subparagraph (A), the Secretary may consult
3 with an institution of higher education de-
4 scribed in subsection (d)(2)(B)(iv) and the pri-
5 vate sector.”.

6 (8) ADVISORY COMMITTEE.—Section 3(d)(2)(B)
7 of the National Landslide Preparedness Act (43
8 U.S.C. 3102(d)(2)(B)) is amended—

9 (A) in clause (iii), by striking “geological”;
10 and

11 (B) in clause (vi), by striking “local, and
12 Tribal emergency management agencies” and
13 inserting “and local emergency management
14 agencies and emergency management agencies
15 of Indian tribes and Native Hawaiian organiza-
16 tions”.

17 (9) REGIONAL PARTNERSHIPS.—Section 3 of
18 the National Landslide Preparedness Act (43 U.S.C.
19 3102) is amended—

20 (A) by redesignating subsections (e)
21 through (i) as subsections (f) through (j), re-
22 spectively; and

23 (B) by inserting after subsection (d) the
24 following:

25 “(e) REGIONAL PARTNERSHIPS.—

1 “(1) IN GENERAL.—As soon as practicable
2 after the date of enactment of the National Land-
3 slide Preparedness Act Reauthorization Act of 2025,
4 the Secretary shall establish in each region in which
5 the Secretary determines that there is a high land-
6 slide hazard a regional partnership with an eligible
7 partner described in paragraph (2).

8 “(2) ELIGIBLE PARTNERS.—An organization or
9 institution of higher education with expertise in
10 landslide mapping, research, and monitoring shall be
11 eligible for a regional partnership under paragraph
12 (1).

13 “(3) PURPOSES AND DUTIES.—A regional part-
14 nership established under paragraph (1) shall—

15 “(A) allow the Secretary to leverage appli-
16 cable expertise in regional organizations;

17 “(B) coordinate long-term landslide re-
18 search specific to the applicable region; and

19 “(C) align interagency landslide moni-
20 toring efforts.”.

21 “(10) GRANT PROGRAMS.—Section 3 of the Na-
22 tional Landslide Preparedness Act (43 U.S.C. 3102)
23 is amended, in paragraph (1) of subsection (f) (as
24 redesignated by paragraph (9)(A))—

1 (A) in subparagraph (A)(i), by striking
2 “local, and Tribal governments to research,
3 map, assess” and inserting “and local govern-
4 ments, Indian tribes, Tribal organizations, and
5 Native Hawaiian organizations to research,
6 map, assess, monitor”;

7 (B) in subparagraph (B)—

8 (i) in clause (i), by inserting “institu-
9 tions of higher education described in sub-
10 section (d)(2)(B)(iv),” before “and Indian
11 tribes”; and

12 (ii) in clause (ii)—

13 (I) by redesignating subclauses
14 (II) through (IV) as subclauses (III)
15 through (V), respectively; and

16 (II) by inserting after subclause
17 (I) the following:

18 “(II) in regions that have re-
19 cently experienced loss of life due to
20 landslides;”; and

21 (C) in subparagraph (C)—

22 (i) in clause (i), by inserting “award-
23 ed” after “grants”; and

1 (ii) in clause (ii), by striking “made”
2 and inserting “or other accomplishments
3 resulting”.

4 (11) SIGNIFICANT EVENTS.—Section 3 of the
5 National Landslide Preparedness Act (43 U.S.C.
6 3102) is amended, in subsection (h)(3) (as so reded-
7 igned), by striking “local, and Tribal partners”
8 and inserting “and local partners, Indian tribes,
9 Tribal organizations, and Native Hawaiian organiza-
10 tions”.

11 (12) FUNDING.—Section 3 of the National
12 Landslide Preparedness Act (43 U.S.C. 3102) is
13 amended, in subsection (i) (as redesignated by para-
14 graph (9)(A))—

15 (A) in the matter preceding paragraph (1),
16 by striking “2024” and inserting “2030”; and

17 (B) in paragraph (1), by striking
18 “\$25,000,000 to carry out this section” and in-
19 serting “\$35,000,000 to carry out this section,
20 of which not less than \$10,000,000 shall be
21 made available for the purchase, deployment,
22 and repair of landslide early warning systems in
23 high risk areas”.

24 (c) 3D ELEVATION PROGRAM.—

14

1 (1) ESTABLISHMENT.—Section 5(a) of the Na-
2 tional Landslide Preparedness Act (43 U.S.C.
3 3104(a)) is amended—

4 (A) in paragraph (1)(A), by inserting “and
5 derivative” after “3D elevation”; and

6 (B) in paragraph (2)(B)(i), by inserting “,
7 process, and integrate” after “acquire”.

8 (2) 3D ELEVATION FEDERAL INTERAGENCY CO-
9 ORDINATING COMMITTEE.—Section 5(b)(3) of the
10 National Landslide Preparedness Act (43 U.S.C.
11 3104(b)(3)) is amended—

12 (A) by redesignating subparagraphs (D)
13 and (E) as subparagraphs (E) and (F), respec-
14 tively; and

15 (B) by inserting after subparagraph (C)
16 the following:

17 “(D) the 3D Hydrography Program Work-
18 ing Group;”.

19 (3) GRANTS AND COOPERATIVE AGREE-
20 MENTS.—Section 5(d)(3) of the National Landslide
21 Preparedness Act (43 U.S.C. 3104(d)(3)) is amend-
22 ed by striking “publically” and inserting “publicly”.

23 (4) FUNDING.—Section 5(e) of the National
24 Landslide Preparedness Act (43 U.S.C. 3104(e)) is
25 amended by striking “2024” and inserting “2034”.

1 **SEC. 4. NEXT GENERATION WATER OBSERVING SYSTEM.**

2 The Act of December 24, 1942 (56 Stat. 1086, chap-
3 ter 822; 43 U.S.C. 36b), is amended—

4 (1) in the first section, by striking “That the
5 Secretary of the Interior” and inserting the fol-
6 lowing:

7 **“SECTION 1. GAGING STREAMS AND UNDERGROUND**
8 **WATER RESOURCES.**

9 “The Secretary of the Interior (referred to in this Act
10 as the ‘Secretary’);

11 (2) in section 1 (as so designated)—

12 (A) in the second sentence, by striking “of
13 the Interior”; and

14 (B) in the proviso—

15 (i) by striking “this Act” each place it
16 appears and inserting “this section”; and

17 (ii) by striking “of the Interior”; and

18 (3) by adding at the end the following:

19 **“SEC. 2. NEXT GENERATION WATER OBSERVING SYSTEM.**

20 “(a) **ESTABLISHMENT.**—The Secretary shall estab-
21 lish within the United States Geological Survey a system,
22 to be known as the ‘Next Generation Water Observing
23 System’ (referred to in this section as the ‘System’).

24 “(b) **PURPOSE.**—The purpose of the System is to
25 provide real-time data on water quantity and quality—

1 “(1) that, as compared to previous systems, is
2 more affordable, more rapid, and available in more
3 locations; and

4 “(2) to support advanced modeling tools—

5 “(A) to provide state-of-the-art flood and
6 drought forecasts;

7 “(B) to inform emergency- and water-man-
8 agement decision support systems; and

9 “(C) to help evaluate—

10 “(i) the near-term and long-term risks
11 of floods and droughts, including any sce-
12 narios that modify those risks;

13 “(ii) the quantity of water stored in
14 seasonal snow packs, and how changes in
15 seasonal snow packs affect water supplies;

16 “(iii) the early stages of drought;

17 “(iv) the predicted timelines for
18 drought recovery;

19 “(v) the quantity of water lost to
20 evapotranspiration;

21 “(vi) water quality differences during
22 wet and dry periods;

23 “(vii) the effects of streamflow on
24 groundwater;

1 “(viii) the effects of groundwater on
2 streamflow; and

3 “(ix) ice and water volume stored in
4 glaciers and changing water volumes due
5 to glacial retreat.

6 “(c) SYSTEM REQUIREMENTS.—The System shall
7 provide for—

8 “(1) state-of-the-art measurements;

9 “(2) a dense array of sensors at selected sites;

10 “(3) increased spatial and temporal coverage;

11 “(4) new technology testing and implementa-
12 tion;

13 “(5) improved operational efficiency; and

14 “(6) modernized and timely data storage and
15 delivery.

16 “(d) PRIORITY REGIONS.—In determining in which
17 regions of the United States Geological Survey to carry
18 out the System, the Secretary shall give priority to regions
19 of the United States Geological Survey in which there is—

20 “(1) a high level of drought;

21 “(2) a reliance on reservoirs for water storage;

22 “(3) a reliance on hydrologic storage, including
23 groundwater, aquifers, and snowpack; and

24 “(4) flooding and extreme rainfall.

25 “(e) AUTHORIZATION OF APPROPRIATIONS.—

1 “(1) IN GENERAL.—There is authorized to be
2 appropriated to carry out this section in 10 initial
3 basins, as determined by the Secretary, \$30,000,000
4 for fiscal year 2026, to remain available until ex-
5 pended.

6 “(2) DERIVATION OF FUNDS.—Amounts made
7 available to carry out this section shall be derived
8 from amounts appropriated or otherwise made avail-
9 able to the United States Geological Survey.”.

10 **SEC. 5. WATER DATA ENHANCEMENT AND NATIONAL**
11 **GROUNDWATER RESOURCES MONITORING**
12 **BY UNITED STATES GEOLOGICAL SURVEY.**

13 Section 9507 of the Omnibus Public Land Manage-
14 ment Act of 2009 (42 U.S.C. 10367) is amended—

15 (1) in subsection (a)—

16 (A) in paragraph (2)(C)—

17 (i) in clause (i), by striking “and” at
18 the end;

19 (ii) in clause (ii), by inserting “and”
20 after the semicolon at the end; and

21 (iii) by adding at the end the fol-
22 lowing:

23 “(iii) the conduct of groundwater
24 quality assessments relating to permafrost
25 thaw and changes in precipitation rates;”;

1 (B) in paragraph (4)—

2 (i) in subparagraph (A)—

3 (I) in the matter preceding clause

4 (i), by striking “10 years” and insert-
5 ing “11 years”; and

6 (II) in clause (i), by striking “na-
7 tional streamflow information pro-
8 gram” and inserting “Federal priority
9 streamgage program”;

10 (ii) in subparagraph (B), by striking
11 “Federal Priority streamgage program”
12 and inserting “Federal Priority
13 Streamgage Network”; and

14 (iii) by adding at the end the fol-
15 lowing:

16 “(C) PRIORITY SITES.—In selecting sites
17 for the installation of streamgages under sub-
18 paragraph (A), the Secretary shall give priority
19 to regions of the United States Geological Sur-
20 vey in which there is—

21 “(i) a high level of drought;

22 “(ii) a reliance on reservoirs for water
23 storage;

1 “(iii) a reliance on hydrologic storage,
2 including groundwater, aquifers, and
3 snowpack; and

4 “(iv) flooding and extreme rainfall.

5 “(D) NO IMPACT ON EXISTING SITES.—

6 The priority provided under subparagraph (C)
7 shall have no impact on any site or region in
8 which a streamgage has been installed, and is
9 operating, as of the date of enactment of the
10 National Landslide Preparedness Act Reauthor-
11 ization Act of 2025, subject to the condition
12 that the data from such a site or region are
13 continuing to meet the priority needs of stake-
14 holders, as determined by the Secretary.”; and

15 (C) in paragraph (6)—

16 (i) in subparagraph (B), by striking
17 “\$10,000,000 for each of fiscal years 2009
18 through 2028” and inserting “\$30,000,000
19 for each of fiscal years 2026 through
20 2033”; and

21 (ii) by adding at the end the fol-
22 lowing:

23 “(C) DERIVATION OF FUNDS.—Amounts
24 made available to carry out this subsection shall
25 be derived from amounts appropriated or other-

21

1 wise made available to the United States Geo-
2 logical Survey.”; and

3 (2) in subsection (b)—

4 (A) in paragraph (2)—

5 (i) in subparagraph (B), in the matter
6 preceding clause (i), by striking “and State
7 and local water resource agencies and
8 Tribes” and inserting “, State and local
9 water resource agencies, Indian tribes,
10 Tribal organizations, and Native Hawaiian
11 organizations”; and

12 (ii) in subparagraph (C), by striking
13 “State water resource agency or Tribe”
14 and inserting “State water resource agen-
15 cy, Indian tribe, Tribal organization, or
16 Native Hawaiian organization”;

17 (B) in paragraph (6)—

18 (i) by striking “give priority to those
19 activities” and inserting the following:
20 “give priority to—

21 “(A) activities”;

22 (ii) in subparagraph (A) (as so des-
23 ignated)—

24 (I) by striking “State, a Tribe”
25 and inserting “State, Indian tribe,

1 Tribal organization, Native Hawaiian
2 organization,”; and

3 (II) by striking the period at the
4 end and inserting “; and”; and

5 (iii) by adding at the end the fol-
6 lowing:

7 “(B) activities conducted in regions of the
8 United States Geological Survey in which there
9 is—

10 “(i) a high level of drought;

11 “(ii) a reliance on reservoirs for water
12 storage;

13 “(iii) a reliance on hydrologic storage,
14 including groundwater, aquifers, and
15 snowpack; and

16 “(iv) flooding and extreme rainfall.”;
17 and

18 (C) in paragraph (7)—

19 (i) by striking “There are authorized
20 to be appropriated” and inserting the fol-
21 lowing:

22 “(A) IN GENERAL.—There is authorized to
23 be appropriated”; and

24 (ii) by adding at the end the fol-
25 lowing:

1 “(B) DERIVATION OF FUNDS.—Amounts
2 made available to carry out this subsection shall
3 be derived from amounts appropriated or other-
4 wise made available to the United States Geo-
5 logical Survey.”.