

118TH CONGRESS
2D SESSION

H. R. 4755

IN THE SENATE OF THE UNITED STATES

APRIL 30, 2024

Received; read twice and referred to the Committee on Commerce, Science,
and Transportation

AN ACT

To support research on privacy enhancing technologies and
promote responsible data use, 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,*

1 SECTION 1. SHORT TITLE.

2 This Act may be cited as the “Privacy Enhancing
3 Technology Research Act”.

4 SEC. 2. PRIVACY ENHANCING TECHNOLOGY.

5 (a) NATIONAL SCIENCE FOUNDATION SUPPORT OF
6 RESEARCH ON PRIVACY ENHANCING TECHNOLOGY.—The
7 Director of the National Science Foundation, in consulta-
8 tion with the heads of other relevant Federal agencies (as
9 determined by the Director), shall support merit-reviewed
10 and competitively awarded research on privacy enhancing
11 technologies, which may include the following:

12 (1) Fundamental research on technologies for
13 de-identification, pseudonymization, anonymization,
14 or obfuscation to mitigate individuals’ privacy risks
15 in data sets while maintaining fairness, accuracy,
16 and efficiency.

17 (2) Fundamental research on algorithms and
18 other similar mathematical tools used to protect in-
19 dividual privacy when collecting, storing, sharing,
20 analyzing, or aggregating data.

21 (3) Fundamental research on technologies that
22 promote data minimization in data collection, shar-
23 ing, and analytics that takes into account the trade-
24 offs between the data minimization goals and the in-
25 formational goals of data collection.

1 (4) Research awards on privacy enhancing tech-
2 nologies coordinated with other relevant Federal
3 agencies and programs.

4 (5) Supporting education and workforce train-
5 ing research and development activities, including re-
6 training and upskilling of the existing workforce, to
7 increase the number of privacy enhancing technology
8 researchers and practitioners.

9 (6) Multidisciplinary socio-technical research
10 that fosters broader understanding of privacy pref-
11 erences, requirements, and human behavior to in-
12 form the design and adoption of effective privacy so-
13 lutions.

14 (7) Development of freely available privacy en-
15 hancing technology software libraries, platforms, and
16 applications.

17 (8) Fundamental research on techniques that
18 may undermine the protections provided by privacy
19 enhancing technologies, the limitations of such pro-
20 tections, and the trade-offs between privacy and util-
21 ity required for the deployment of such technologies.

22 (9) Fundamental research on technologies and
23 techniques to preserve the privacy and confiden-
24 tiality of individuals from unconsented, unwanted, or

1 unauthorized location tracking, including through
2 GPS.

3 (b) INTEGRATION INTO THE COMPUTER AND NET-
4 WORK SECURITY PROGRAM.—Subparagraph (D) of sec-
5 tion 4(a)(1) of the Cyber Security Research and Develop-
6 ment Act (15 U.S.C. 7403(a)(1)(D)) is amended by in-
7 serting “, including privacy enhancing technologies” be-
8 fore the semicolon.

9 (c) COORDINATION WITH THE NATIONAL INSTITUTE
10 OF STANDARDS AND TECHNOLOGY AND OTHER STAKE-
11 HOLDERS.—

12 (1) IN GENERAL.—The Director of the Office of
13 Science and Technology Policy, acting through the
14 Networking and Information Technology Research
15 and Development Program, shall coordinate with the
16 Director of the National Science Foundation, the Di-
17 rector of the National Institute of Standards and
18 Technology, the Federal Trade Commission, and the
19 heads of other Federal agencies, as appropriate, to
20 accelerate the development, deployment, and adop-
21 tion of privacy enhancing technologies.

22 (2) OUTREACH.—The Director of the National
23 Institute of Standards and Technology shall conduct
24 outreach to—

- 1 (A) receive input from private, public, and
2 academic stakeholders on the development of
3 privacy enhancing technologies; and
4 (B) facilitate and support ongoing public
5 and private sector engagement to inform the
6 development and dissemination of voluntary,
7 consensus-based technical standards, guidelines,
8 methodologies, procedures, and processes to
9 cost-effectively increase the integration of pri-
10 vacy enhancing technologies in data collection,
11 sharing, and analytics performed by the public
12 and private sectors.

13 (d) REPORT ON PRIVACY ENHANCING TECHNOLOGY
14 RESEARCH.—Not later than three years after the date of
15 the enactment of this Act, the Director of the Office of
16 Science and Technology Policy, acting through the Net-
17 working and Information Technology Research and Devel-
18 opment Program, shall, in coordination with the Director
19 of the National Science Foundation, the Director of the
20 National Institute of Standards and Technology, and the
21 heads of other Federal agencies, as appropriate, submit
22 to the Committee on Commerce, Science, and Transpor-
23 tation of the Senate, the Subcommittee on Commerce,
24 Justice, Science, and Related Agencies of the Committee
25 on Appropriations of the Senate, the Committee on

1 Science, Space, and Technology of the House of Rep-
2 resentatives, and the Subcommittee on Commerce, Jus-
3 tice, Science, and Related Agencies of the Committee on
4 Appropriations of the House of Representatives, a report
5 containing information relating to the following:

6 (1) The progress of research on privacy enhanc-
7 ing technologies.

8 (2) The progress of the development of vol-
9 untary resources described under subsection
10 (c)(2)(B).

11 (3) Any policy recommendations that could fa-
12 cilitate and improve communication and coordination
13 between the private sector and relevant Federal
14 agencies for the implementation and adoption of pri-
15 vacy enhancing technologies.

16 (e) PROTECTING PERSONAL IDENTIFYING INFORMA-
17 TION.—Any personal identifying information collected or
18 stored through the activities authorized under this section
19 shall be done in accordance with part 690 of title 45, Code
20 of Federal Regulations (relating to the protection of
21 human subjects), or any successor regulation.

22 (f) DEFINITION.—In this section, the term “privacy
23 enhancing technology”—

24 (1) means any software or hardware solution,
25 technical process, or other technological means of

1 mitigating individuals' privacy risks arising from
2 data processing by enhancing predictability, manage-
3 ability, disassociability, and confidentiality; and

4 (2) may include—

5 (A) cryptographic techniques for facili-
6 tating computation or analysis on data while
7 mitigating privacy risks;

8 (B) techniques for—

9 (i) publicly sharing data without ena-
10 bling inferences to be made about specific
11 individuals;

12 (ii) giving individuals' control over the
13 dissemination, sharing, and use of their
14 data; and

15 (iii) generating synthetic data; and

16 (C) any other technology or approach that
17 reduces the risk of re-identification, including
18 when combined with other information.

Passed the House of Representatives April 29, 2024.

Attest: KEVIN F. MCCUMBER,

Clerk.