data sharing arrangements between industry, federally funded research centers, and Federal agencies for the purpose of advancing artificial intelligence research and technologies, including options for partnership models between government entities, industry, universities, and nonprofits that incentivize each party to share the data they collected.

(f) Best practices for documentation of data sets

Not later than 1 year after January 1, 2021, the Director shall, in collaboration with other public and private sector organizations, develop best practices for datasets used to train artificial intelligence systems, including—

- (1) standards for metadata that describe the properties of datasets, including—
 - (A) the origins of the data;
 - (B) the intent behind the creation of the data;
 - (C) authorized uses of the data;
 - (D) descriptive characteristics of the data, including what populations are included and excluded from the datasets; and
 - (E) any other properties as determined by the Director; and
- (2) standards for privacy and security of datasets with human characteristics.

(g) Authorization of appropriations

There are authorized to be appropriated to the National Institute of Standards and Technology to carry out this section—

- (1) \$64,000,000 for fiscal year 2021;
- (2) \$70,400,000 for fiscal year 2022;
- (3) \$77,440,000 for fiscal year 2023;
- (4) \$85,180,000 for fiscal year 2024; and
- (5) \$93,700,000 for fiscal year 2025.

(Mar. 3, 1901, ch. 872, §22A, as added Pub. L. 116-283, div. E, title LIII, §5301, Jan. 1, 2021, 134 Stat. 4536.)

Editorial Notes

REFERENCES IN TEXT

This division, referred to in subsec. (b)(5), probably means div. E of Pub. L. 116–283, Jan. 1, 2021, 134 Stat. 4523, which is classified principally to chapter 119 of this title.

§ 278i. Reports to Congress

(a) Information to Congress on Institute activities

The Director shall keep the Committee on Commerce, Science, and Transportation of the Senate and the Committee on Science, Space, and Technology of the House of Representatives fully and currently informed with regard to all of the activities of the Institute.

(b) Justification for changes in policies and fees

The Director shall justify in writing all changes in policies regarding fees for standard reference materials and calibration services occurring after June 30, 1987, including a description of the anticipated impact of any proposed changes on demand for and anticipated revenues from the materials and services. Changes in policy and fees shall not be effective unless and until the Director has submitted the proposed schedule and justification to the Congress and 30

days on which both Houses of Congress are in session have elapsed since such submission, except that the requirement of this sentence shall not apply with respect to adjustments which are based solely on changes in the costs of raw materials or of producing and delivering standard reference materials or calibration services.

(Mar. 3, 1901, ch. 872, $\S23$, as added Pub. L. 100–418, title V, $\S5114(2)$, Aug. 23, 1988, 102 Stat. 1432; amended Pub. L. 110–69, title III, $\S3004$, Aug. 9, 2007, 121 Stat. 590; Pub. L. 114–329, title II, $\S204(a)(1)(B)(i)$, Jan. 6, 2017, 130 Stat. 2998.)

Editorial Notes

AMENDMENTS

 $2017\mathrm{--Subsecs.}$ (c), (d). Pub. L. 114–329 struck out subsecs. (c) and (d) which required the Director to submit to Congress a 3-year programmatic planning document for the Institute and annual updates.

2007—Subsecs. (c), (d). Pub. L. 110-69 added subsecs. (c) and (d).

Statutory Notes and Related Subsidiaries

CHANGE OF NAME

Committee on Science, Space, and Technology of House of Representatives treated as referring to Committee on Science of House of Representatives by section 1(a) of Pub. L. 104-14, set out as a note preceding section 21 of Title 2, The Congress. Committee on Science of House of Representatives changed to Committee on Science and Technology of House of Representatives by House Resolution No. 6, One Hundred Tenth Congress, Jan. 5, 2007. Committee on Science and Technology of House of Representatives changed to Committee on Science, Space, and Technology of House of Representatives by House Resolution No. 5, One Hundred Twelfth Congress, Jan. 5, 2011.

§ 278j. Studies by National Research Council

The Director may periodically contract with the National Research Council for advice and studies to assist the Institute to serve United States industry and science. The subjects of such advice and studies may include—

- (1) the competitive position of the United States in key areas of manufacturing and emerging technologies and research activities which would enhance that competitiveness;
- (2) potential activities of the Institute, in cooperation with industry and the States, to assist in the transfer and dissemination of new technologies for manufacturing and quality assurance; and
- (3) identification and assessment of likely barriers to widespread use of advanced manufacturing technology by the United States workforce, including training and other initiatives which could lead to a higher percentage of manufacturing jobs of United States companies being located within the borders of our country.

(Mar. 3, 1901, ch. 872, §24, as added Pub. L. 100-418, title V, §5114(2), Aug. 23, 1988, 102 Stat. 1432)

§ 278k. Hollings Manufacturing Extension Partnership

(a) Definitions

In this section: