| AM  | IENDMENT NO   | Calendar No                |
|-----|---|----------------------------|
| Pu  | rpose: To ensure the appropriate related to government data.            | disclosure of incidents    |
| IN  | THE SENATE OF THE UNITED STATE  | ΓES-112th Cong., 2d Sess.  |
|     | S. 3414   |                            |
|     | To enhance the security and resili-<br>communications infrastructure of | · ·                        |
| R   | eferred to the Committee on ordered to be printed                       | and nted                   |
|     | Ordered to lie on the table as  | nd to be printed           |
|     | AMENDMENT intended to be prop   | osed by Mr. Wyden          |
| Viz | :   |                            |
| 1   | Beginning on page 46, strik   | e line 6 and all that fol- |
| 2   | lows through page 57, line 3, and                                       | insert the following:      |
| 3   | "(4) provide a mechani  | sm to improve and con-     |
| 4   | tinuously monitor the securi-   | ty of agency information   |
| 5   | security programs and syste   | ems, subject to the pro-   |
| 6   | tection of the privacy of ind   | lividual or customer-spe-  |
| 7   | cific data, through a focus o   | n continuous monitoring    |
| 8   | of agency information syste   | ems and streamlined re-    |
| 9   | porting requirements rather   | than overly prescriptive   |
| 10  | manual reporting.   |                            |
|     |   |                            |

## "SEC. 3552. DEFINITIONS.

- 2 "(a) IN GENERAL.—Except as provided under sub-
- 3 section (b), the definitions under section 3502 (including
- 4 the definitions of the terms 'agency' and 'information sys-
- 5 tem') shall apply to this subchapter.
- 6 "(b) OTHER TERMS.—In this subchapter:
- 7 "(1) ADEQUATE SECURITY.—The term 'ade-
- 8 quate security' means security commensurate with
- 9 the risk and impact resulting from the unauthorized
- access to or loss, misuse, destruction, or modifica-
- tion of information.
- 12 "(2) Continuous monitoring.—The term
- 13 'continuous monitoring' means the ongoing real time
- or near real time process used to determine if the
- complete set of planned, required, and deployed se-
- curity controls within an agency information system
- continue to be effective over time in light of rapidly
- changing information technology and threat develop-
- ment. To the maximum extent possible, subject to
- the protection of the privacy of individual or cus-
- 21 tomer-specific data, this also requires automation of
- 22 that process to enable cost effective, efficient, and
- consistent monitoring and provide a more dynamic
- view of the security state of those deployed controls.
- 25 "(3) COUNTERMEASURE.—The term 'counter-
- 26 measure' means automated or manual actions with

| defensive intent to modify or block data packets as-   |
|--|
| sociated with electronic or wire communications        |
| Internet traffic, program code, or other system traf-  |
| fic transiting to or from or stored on an information  |
| system for the purpose of protecting the information   |
| system from cybersecurity threats, conducted on an     |
| information system owned or operated by or on be-      |
| half of the party to be protected or operated by a     |
| private entity acting as a provider of electronic com- |
| munication services, remote computing services, or     |
| cybersecurity services to the party to be protected    |
| "(4) Incident.—The term 'incident' means an            |
| occurrence that—                                       |
| "(A) actually or imminently jeopardizes                |
| without lawful authority, the integrity, con-          |
| fidentiality, or availability of agency informa-       |
| tion or an agency information system; or               |
| "(B) constitutes a violation or imminent               |
| threat of violation of law, security policies, secu-   |
| rity procedures, or acceptable use policies.           |
| "(5) Information Security.—The term 'in-               |
| formation security' means protecting agency infor-     |
| mation and information systems from unauthorized       |
| access, use, disclosure, disruption, modification, or  |
| destruction in order to provide—                       |

| 1  | "(A) integrity, which means guarding                |
|----|---|
| 2  | against improper information modification or        |
| 3  | destruction, and includes ensuring nonrepudi-       |
| 4  | ation and authenticity;                             |
| 5  | "(B) confidentiality, which means pre-              |
| 6  | serving authorized restrictions on access and       |
| 7  | disclosure, including means for protecting per-     |
| 8  | sonal privacy and proprietary information; and      |
| 9  | "(C) availability, which means ensuring             |
| 10 | timely and reliable access to and use of infor-     |
| 11 | mation.   |
| 12 | "(6) Information technology.—The term               |
| 13 | 'information technology' has the meaning given that |
| 14 | term in section 11101 of title 40.                  |
| 15 | "(7) National Security System.—                     |
| 16 | "(A) IN GENERAL.—The term 'national se-             |
| 17 | curity system' means any information system         |
| 18 | (including any telecommunications system) used      |
| 19 | or operated by an agency or by a contractor of      |
| 20 | an agency, or other organization on behalf of an    |
| 21 | agency—   |
| 22 | "(i) the function, operation, or use of             |
| 23 | which—  |
| 24 | "(I) involves intelligence activi-                  |
| 25 | ties;   |

| 1  | "(II) involves cryptologic activi-               |
|----|--|
| 2  | ties related to national security;               |
| 3  | "(III) involves command and                      |
| 4  | control of military forces;                      |
| 5  | "(IV) involves equipment that is                 |
| 6  | an integral part of a weapon or weap-            |
| 7  | ons system; or                                   |
| 8  | "(V) subject to subparagraph                     |
| 9  | (B), is critical to the direct fulfillment       |
| 10 | of military or intelligence missions; or         |
| 11 | "(ii) that is protected at all times by          |
| 12 | procedures established for information that      |
| 13 | have been specifically authorized under cri-     |
| 14 | teria established by an Executive order or       |
| 15 | an Act of Congress to be kept classified in      |
| 16 | the interest of national defense or foreign      |
| 17 | policy.  |
| 18 | "(B) Exclusion.—Subparagraph                     |
| 19 | (A)(i)(V) does not include a system that is to   |
| 20 | be used for routine administrative and business  |
| 21 | applications (including payroll, finance, logis- |
| 22 | tics, and personnel management applications).    |
| 23 | "(8) Secretary.—The term 'Secretary' means       |
| 24 | the Secretary of Homeland Security.              |

| 1  | "SEC. 3553. FEDERAL INFORMATION SECURITY AUTHORITY           |
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| 2  | AND COORDINATION.  |
| 3  | "(a) In General.—Except as provided in sub-                  |
| 4  | sections (f) and (g), the Secretary shall oversee agency in- |
| 5  | formation security policies and practices, including the de- |
| 6  | velopment and oversight of information security policies     |
| 7  | and directives and compliance with this subchapter.          |
| 8  | "(b) Duties.—The Secretary shall—                            |
| 9  | "(1) develop, issue, and oversee the implemen-               |
| 10 | tation of information security policies and directives,      |
| 11 | which shall be compulsory and binding on agencies            |
| 12 | to the extent determined appropriate by the Sec-             |
| 13 | retary, including—   |
| 14 | "(A) policies and directives consistent with                 |
| 15 | the standards promulgated under section 11331                |
| 16 | of title 40 to identify and provide information              |
| 17 | security protections that are commensurate                   |
| 18 | with the risk and impact resulting from the un-              |
| 19 | authorized access, use, disclosure, disruption,              |
| 20 | modification, or destruction of—                             |
| 21 | "(i) information collected, created,                         |
| 22 | processed, stored, disseminated, or other-                   |
| 23 | wise used or maintained by or on behalf of                   |
| 24 | an agency; or  |
| 25 | "(ii) information systems used or op-                        |
| 26 | erated by an agency or by a contractor of                    |

| 1  | an agency or other organization, such as a           |
|----|--|
| 2  | State government entity, on behalf of an             |
| 3  | agency;  |
| 4  | "(B) minimum operational requirements                |
| 5  | for network operations centers and security op-      |
| 6  | erations centers of agencies to facilitate the       |
| 7  | protection of and provide common situational         |
| 8  | awareness for all agency information and infor-      |
| 9  | mation systems;                                      |
| 10 | "(C) reporting requirements, consistent              |
| 11 | with relevant law, regarding information secu-       |
| 12 | rity incidents;                                      |
| 13 | "(D) requirements for agencywide informa-            |
| 14 | tion security programs, including continuous         |
| 15 | monitoring of agency information systems;            |
| 16 | "(E) performance requirements and                    |
| 17 | metrics for the security of agency information       |
| 18 | systems;   |
| 19 | "(F) training requirements to ensure that            |
| 20 | agencies are able to fully and timely comply         |
| 21 | with directions issued by the Secretary under        |
| 22 | this subchapter;                                     |
| 23 | "(G) training requirements regarding pri-            |
| 24 | vacy, civil rights, civil liberties, and information |

| 1  | oversight for agency information security em-          |
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| 2  | ployees;   |
| 3  | "(H) requirements for the annual reports               |
| 4  | to the Secretary under section 3554(c); and            |
| 5  | "(I) any other information security re-                |
| 6  | quirements as determined by the Secretary;             |
| 7  | "(2) review agency information security pro-           |
| 8  | grams required to be developed under section           |
| 9  | 3554(b);   |
| 10 | "(3) develop and conduct targeted risk assess-         |
| 11 | ments and operational evaluations for agency infor-    |
| 12 | mation and information systems in consultation with    |
| 13 | the heads of other agencies or governmental and pri-   |
| 14 | vate entities that own and operate such systems,       |
| 15 | that may include threat, vulnerability, and impact     |
| 16 | assessments and penetration testing;                   |
| 17 | "(4) operate consolidated intrusion detection,         |
| 18 | prevention, or other protective capabilities and use   |
| 19 | associated countermeasures for the purpose of pro-     |
| 20 | tecting agency information and information systems     |
| 21 | from information security threats;                     |
| 22 | "(5) in conjunction with other agencies and the        |
| 23 | private sector, assess and foster the development of   |
| 24 | information security technologies and capabilities for |
| 25 | use across multiple agencies;                          |

| 1  | "(6) designate an entity to receive reports and        |
|----|--|
| 2  | information about information security incidents,      |
| 3  | threats, and vulnerabilities affecting agency informa- |
| 4  | tion systems;  |
| 5  | "(7) provide incident detection, analysis, miti-       |
| 6  | gation, and response information and remote or on-     |
| 7  | site technical assistance to the heads of agencies;    |
| 8  | "(8) coordinate with appropriate agencies and          |
| 9  | officials to ensure, to the maximum extent feasible,   |
| 10 | that policies and directives issued under paragraph    |
| 11 | (1) are complementary with—                            |
| 12 | "(A) standards and guidelines developed                |
| 13 | for national security systems; and                     |
| 14 | "(B) policies and directives issues by the             |
| 15 | Secretary of Defense, Director of the Central          |
| 16 | Intelligence Agency, and Director of National          |
| 17 | Intelligence under subsection (g)(1);                  |
| 18 | "(9) not later than March 1 of each year, sub-         |
| 19 | mit to Congress a report on agency compliance with     |
| 20 | the requirements of this subchapter, which shall in-   |
| 21 | elude—   |
| 22 | "(A) a summary of the incidents described              |
| 23 | by the reports required in section 3554(c);            |
| 24 | "(B) a summary of the results of assess-               |
| 25 | ments required by section 3555;                        |

| 1  | "(C) a summary of the results of evalua-                    |
|----|---|
| 2  | tions required by section 3556;                             |
| 3  | "(D) significant deficiencies in agency in-                 |
| 4  | formation security practices as identified in the           |
| 5  | reports, assessments, and evaluations referred              |
| 6  | to in subparagraphs (A), (B), and (C), or other-            |
| 7  | wise; and   |
| 8  | "(E) planned remedial action to address                     |
| 9  | any deficiencies identified under subparagraph              |
| 10 | (D); and  |
| 11 | "(10) with respect to continuous monitoring re-             |
| 12 | porting, allow operators of agency information sys-         |
| 13 | tems to use processes that will protect the privacy         |
| 14 | of individual or non-government customer specific           |
| 15 | data.   |
| 16 | "(c) Issuing Policies and Directives.—When                  |
| 17 | issuing policies and directives under subsection (b), the   |
| 18 | Secretary shall consider any applicable standards or guide- |
| 19 | lines developed by the National Institute of Standards and  |
| 20 | Technology and issued by the Secretary of Commerce          |
| 21 | under section 11331 of title 40. The Secretary shall con-   |
| 22 | sult with the Director of the National Institute of Stand-  |
| 23 | ards and Technology when such policies and directives im-   |
| 24 | plement standards or guidelines developed by National In-   |
| 25 | stitute of Standards and Technology. To the maximum ex-     |

| 1  | tent feasible, such standards and guidelines shall be com- |
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| 2  | plementary with standards and guidelines developed for     |
| 3  | national security systems.                                 |
| 4  | "(d) Communications and System Traffic.—                   |
| 5  | "(1) In General.—Notwithstanding any other                 |
| 6  | provision of law, in carrying out the responsibilities     |
| 7  | under paragraphs (3) and (4) of subsection (b), if         |
| 8  | the Secretary makes a certification described in           |
| 9  | paragraph (2), the Secretary may acquire, intercept,       |
| 10 | retain, use, and disclose communications and other         |
| 11 | system traffic that are transiting to or from or           |
| 12 | stored on agency information systems and deploy            |
| 13 | countermeasures with regard to the communications          |
| 14 | and system traffic, unless the head of an agency de-       |
| 15 | termines within a reasonable time, and reports to          |
| 16 | the President, that such acquisition, interception, re-    |
| 17 | tention, use, or disclosure is contrary to the public      |
| 18 | interest and would seriously undermine important           |
| 19 | agency goals, activities, or programs.                     |
| 20 | "(2) Certification.—A certification described              |
| 21 | in this paragraph is a certification by the Secretary      |
| 22 | that—  |
| 23 | "(A) the acquisitions, interceptions, and                  |
|    |  |

countermeasures are reasonably necessary for

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| 1  | the purpose of protecting agency information      |
|----|---|
| 2  | systems from information security threats;        |
| 3  | "(B) the content of communications will be        |
| 4  | collected and retained only when the commu-       |
| 5  | nication is associated with a known or reason-    |
| 6  | ably suspected information security threat, and   |
| 7  | communications and system traffic will not be     |
| 8  | subject to the operation of a countermeasure      |
| 9  | unless associated with the threats;               |
| 10 | "(C) information obtained under activities        |
| 11 | authorized under this subsection will only be re- |
| 12 | tained, used, or disclosed to protect agency in-  |
| 13 | formation systems from information security       |
| 14 | threats, mitigate against such threats, or, with  |
| 15 | the approval of the Attorney General, for law     |
| 16 | enforcement purposes when—                        |
| 17 | "(i) the information is evidence of a             |
| 18 | cybersecurity crime that has been, is being,      |
| 19 | or is about to be committed; and                  |