#### Suspend the Rules And Pass the Bill, H.R. 2126, with Amendments

(The amendments strike all after the enacting clause and insert a new text and a new title)

113TH CONGRESS 1ST SESSION H.R. 2126

To facilitate better alignment, cooperation, and best practices between commercial real estate landlords and tenants regarding energy efficiency in buildings, and for other purposes.

### IN THE HOUSE OF REPRESENTATIVES

May 23, 2013

Mr. McKinley (for himself and Mr. Welch) introduced the following bill; which was referred to the Committee on Energy and Commerce

## A BILL

To facilitate better alignment, cooperation, and best practices between commercial real estate landlords and tenants regarding energy efficiency in buildings, 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,
- 3 SECTION 1. SHORT TITLE.
- 4 This Act may be cited as the "Energy Efficiency Im-
- 5 provement Act of 2014".

## 1 TITLE I—BETTER BUILDINGS

SEC. 101. SHORT TITLE. 3 This title may be cited as the "Better Buildings Act of 2014". 4 SEC. 102. ENERGY EFFICIENCY IN FEDERAL AND OTHER 5 6 BUILDINGS. 7 (a) Definitions.—In this section: 8 ADMINISTRATOR.—The term "Adminis-(1) 9 trator" means the Administrator of General Serv-10 ices. 11 (2)Cost-effective **ENERGY EFFICIENCY** 12 MEASURE.—The term "cost-effective energy effi-13 ciency measure" means any building product, mate-14 rial, equipment, or service, and the installing, imple-15 menting, or operating thereof, that provides energy 16 savings in an amount that is not less than the cost 17 of such installing, implementing, or operating. Cost-effective 18 (3)WATER **EFFICIENCY** 19 MEASURE.—The term "cost-effective water efficiency 20 measure" means any building product, material, 21 equipment, or service, and the installing, imple-22 menting, or operating thereof, that provides water 23 savings in an amount that is not less than the cost

1	(b) Model Provisions, Policies, and Best Prac-
2	TICES.—
3	(1) In general.—Not later than 180 days
4	after the date of enactment of this Act, the Adminis-
5	trator, in consultation with the Secretary of Energy
6	and after providing the public with an opportunity
7	for notice and comment, shall develop model com-
8	mercial leasing provisions and best practices in ac-
9	cordance with this subsection.
10	(2) Commercial leasing.—
11	(A) IN GENERAL.—The model commercial
12	leasing provisions developed under this sub-
13	section shall, at a minimum, align the interests
14	of building owners and tenants with regard to
15	investments in cost-effective energy efficiency
16	measures and cost-effective water efficiency
17	measures to encourage building owners and ten-
18	ants to collaborate to invest in such measures.
19	(B) USE OF MODEL PROVISIONS.—The
20	Administrator may use the model commercial
21	leasing provisions developed under this sub-
22	section in any standard leasing document that
23	designates a Federal agency (or other client of
24	the Administrator) as a landlord or tenant.

1	(C) Publication.—The Administrator
2	shall periodically publish the model commercial
3	leasing provisions developed under this sub-
4	section, along with explanatory materials, to en-
5	courage building owners and tenants in the pri-
6	vate sector to use such provisions and mate-
7	rials.
8	(3) Realty Services.—The Administrator
9	shall develop policies and practices to implement
10	cost-effective energy efficiency measures and cost-ef-
11	fective water efficiency measures for the realty serv-
12	ices provided by the Administrator to Federal agen-
13	cies (or other clients of the Administrator), including
14	periodic training of appropriate Federal employees
15	and contractors on how to identify and evaluate
16	those measures.
17	(4) STATE AND LOCAL ASSISTANCE.—The Ad-
18	ministrator, in consultation with the Secretary of
19	Energy, shall make available model commercial leas-
20	ing provisions and best practices developed under
21	this subsection to State, county, and municipal gov-
22	ernments for use in managing owned and leased
23	building space in accordance with the goal of encour-
24	aging investment in all cost-effective energy effi-

1	ciency measures and cost-effective water efficiency
2	measures.
3	SEC. 103. SEPARATE SPACES WITH HIGH-PERFORMANCE
4	ENERGY EFFICIENCY MEASURES.
5	(a) In General.—Subtitle B of title IV of the En-
6	ergy Independence and Security Act of 2007 (42 U.S.C.
7	17081 et seq.) is amended by adding at the end the fol-
8	lowing:
9	"SEC. 424. SEPARATE SPACES WITH HIGH-PERFORMANCE
10	ENERGY EFFICIENCY MEASURES.
11	"(a) Definitions.—In this section:
12	"(1) High-performance energy efficiency
13	MEASURE.—The term 'high-performance energy effi-
14	ciency measure' means a technology, product, or
15	practice that will result in substantial operational
16	cost savings by reducing energy consumption and
17	utility costs.
18	"(2) Separate spaces.—The term 'separate
19	spaces' means areas within a commercial building
20	that are leased or otherwise occupied by a tenant or
21	other occupant for a period of time pursuant to the
22	terms of a written agreement.
23	"(b) Study.—
24	"(1) IN GENERAL.—Not later than 1 year after
25	the date of enactment of this section, the Secretary.

1	acting through the Assistant Secretary of Energy
2	Efficiency and Renewable Energy, shall complete a
3	study on the feasibility of—
4	"(A) significantly improving energy effi-
5	ciency in commercial buildings through the de-
6	sign and construction, by owners and tenants,
7	of separate spaces with high-performance en-
8	ergy efficiency measures; and
9	"(B) encouraging owners and tenants to
10	implement high-performance energy efficiency
11	measures in separate spaces.
12	"(2) Scope.—The study shall, at a minimum,
13	include—
14	"(A) descriptions of—
15	"(i) high-performance energy effi-
16	ciency measures that should be considered
17	as part of the initial design and construc-
18	tion of separate spaces;
19	"(ii) processes that owners, tenants,
20	architects, and engineers may replicate
21	when designing and constructing separate
22	spaces with high-performance energy effi-
23	ciency measures;
24	"(iii) policies and best practices to
25	achieve reductions in energy intensities for

1	lighting, plug loads, heating, cooling, cook-
2	ing, laundry, and other systems to satisfy
3	the needs of the commercial building ten-
4	ant;
5	"(iv) return on investment and pay-
6	back analyses of the incremental cost and
7	projected energy savings of the proposed
8	set of high-performance energy efficiency
9	measures, including consideration of avail-
10	able incentives;
11	"(v) models and simulation methods
12	that predict the quantity of energy used by
13	separate spaces with high-performance en-
14	ergy efficiency measures and that compare
15	that predicted quantity to the quantity of
16	energy used by separate spaces without
17	high-performance energy efficiency meas-
18	ures but that otherwise comply with appli-
19	cable building code requirements;
20	"(vi) measurement and verification
21	platforms demonstrating actual energy use
22	of high-performance energy efficiency
23	measures installed in separate spaces, and
24	whether such measures generate the sav-

1	ings intended in the initial design and con-
2	struction of the separate spaces;
3	"(vii) best practices that encourage an
4	integrated approach to designing and con-
5	structing separate spaces to perform at op-
6	timum energy efficiency in conjunction
7	with the central systems of a commercial
8	building; and
9	"(viii) any impact on employment re-
10	sulting from the design and construction of
11	separate spaces with high-performance en-
12	ergy efficiency measures; and
13	"(B) case studies reporting economic and
14	energy savings returns in the design and con-
15	struction of separate spaces with high-perform-
16	ance energy efficiency measures.
17	"(3) Public Participation.—Not later than
18	90 days after the date of the enactment of this sec-
19	tion, the Secretary shall publish a notice in the Fed-
20	eral Register requesting public comments regarding
21	effective methods, measures, and practices for the
22	design and construction of separate spaces with
23	high-performance energy efficiency measures.

1	"(4) Publication.—The Secretary shall pub-
2	lish the study on the website of the Department of
3	Energy.".
4	(b) CLERICAL AMENDMENT.—The table of contents
5	in section 1(b) of the Energy Independence and Security
6	Act of 2007 is amended by inserting after the item relat-
7	ing to section 423 the following new item:
	"Sec. 424. Separate spaces with high-performance energy efficiency measures.".
8	SEC. 104. TENANT STAR PROGRAM.
9	(a) In General.—Subtitle B of title IV of the En-
10	ergy Independence and Security Act of 2007 (42 U.S.C.
11	17081 et seq.) (as amended by section 3) is amended by
12	adding at the end the following:
13	"SEC. 425. TENANT STAR PROGRAM.
14	"(a) Definitions.—In this section:
15	"(1) High-performance energy efficiency
16	MEASURE.—The term 'high-performance energy effi-
17	ciency measure' has the meaning given the term in
18	section 424.
19	"(2) Separate spaces.—The term 'separate
20	spaces' has the meaning given the term in section
21	424.
22	"(b) TENANT STAR.—The Administrator of the Envi-
23	ronmental Protection Agency, in consultation with the
24	Secretary of Energy, shall develop a voluntary program
25	within the Energy Star program established by section

1	324A of the Energy Policy and Conservation Act (42
2	U.S.C. 6294a), which may be known as Tenant Star, to
3	promote energy efficiency in separate spaces leased by ten-
4	ants or otherwise occupied within commercial buildings.
5	"(c) Expanding Survey Data.—The Secretary of
6	Energy, acting through the Administrator of the Energy
7	Information Administration, shall—
8	"(1) collect, through each Commercial Build-
9	ings Energy Consumption Survey of the Energy In-
10	formation Administration that is conducted after the
11	date of enactment of this section, data on—
12	"(A) categories of building occupancy that
13	are known to consume significant quantities of
14	energy, such as occupancy by data centers,
15	trading floors, and restaurants; and
16	"(B) other aspects of the property, build-
17	ing operation, or building occupancy determined
18	by the Administrator of the Energy Information
19	Administration, in consultation with the Admin-
20	istrator of the Environmental Protection Agen-
21	cy, to be relevant in lowering energy consump-
22	tion;
23	"(2) with respect to the first Commercial Build-
24	ings Energy Consumption Survey conducted after
25	the date of enactment of this section, to the extent

1	full compliance with the requirements of paragraph
2	(1) is not feasible, conduct activities to develop the
3	capability to collect such data and begin to collect
4	such data; and
5	"(3) make data collected under paragraphs (1)
6	and (2) available to the public in aggregated form
7	and provide such data, and any associated results, to
8	the Administrator of the Environmental Protection
9	Agency for use in accordance with subsection (d).
10	"(d) Recognition of Owners and Tenants.—
11	"(1) Occupancy-based recognition.—Not
12	later than 1 year after the date on which sufficient
13	data is received pursuant to subsection (c), the Ad-
14	ministrator of the Environmental Protection Agency
15	shall, following an opportunity for public notice and
16	comment—
17	"(A) in a manner similar to the Energy
18	Star rating system for commercial buildings,
19	develop policies and procedures to recognize
20	tenants in commercial buildings that voluntarily
21	achieve high levels of energy efficiency in sepa-
22	rate spaces;
23	"(B) establish building occupancy cat-
24	egories eligible for Tenant Star recognition

1	based on the data collected under subsection (c)
2	and any other appropriate data sources; and
3	"(C) consider other forms of recognition
4	for commercial building tenants or other occu-
5	pants that lower energy consumption in sepa-
6	rate spaces.
7	"(2) Design- and construction-based rec-
8	OGNITION.—After the study required by section
9	424(b) is completed, the Administrator of the Envi-
10	ronmental Protection Agency, in consultation with
11	the Secretary and following an opportunity for pub-
12	lic notice and comment, may develop a voluntary
13	program to recognize commercial building owners
14	and tenants that use high-performance energy effi-
15	ciency measures in the design and construction of
16	separate spaces.".
17	(b) CLERICAL AMENDMENT.—The table of contents
18	in section 1(b) of the Energy Independence and Security
19	Act of 2007 is amended by inserting after the item relat-
20	ing to section 424 (as added by section 3(b)) the following
21	new item:

"Sec. 425. Tenant Star program.".

# TITLE II—GRID-ENABLED WATER HEATERS

3	SEC. 201. GRID-ENABLED WATER HEATERS.
4	Part B of title III of the Energy Policy and Conserva-
5	tion Act (42 U.S.C. 6291 et seq.) is amended—
6	(1) in section 325(e) (42 U.S.C. 6295(e)), by
7	adding at the end the following:
8	"(6) Additional standards for grid-en-
9	ABLED WATER HEATERS.—
10	"(A) Definitions.—In this paragraph:
11	"(i) ACTIVATION LOCK.—The term
12	'activation lock' means a control mecha-
13	nism (either a physical device directly on
14	the water heater or a control system inte-
15	grated into the water heater) that is locked
16	by default and contains a physical, soft-
17	ware, or digital communication that must
18	be activated with an activation key to en-
19	able the product to operate at its designed
20	specifications and capabilities and without
21	which activation the product will provide
22	not greater than 50 percent of the rated
23	first hour delivery of hot water certified by
24	the manufacturer.

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1	"(ii) Grid-enabled water heat-
2	ER.—The term 'grid-enabled water heater'
3	means an electric resistance water heater
4	that—
5	"(I) has a rated storage tank vol-
6	ume of more than 75 gallons;
7	"(II) is manufactured on or after
8	April 16, 2015;
9	"(III) has—
10	"(aa) an energy factor of
11	not less than 1.061 minus the
12	product obtained by multi-
13	plying—
14	"(AA) the rated storage
15	volume of the tank, ex-
16	pressed in gallons; and
17	"(BB) 0.00168; or
18	"(bb) an equivalent alter-
19	native standard prescribed by the
20	Secretary and developed pursu-
21	ant to paragraph (5)(E);
22	"(IV) is equipped at the point of
23	manufacture with an activation lock;
24	and

1	"(V) bears a permanent label ap-
2	plied by the manufacturer that—
3	"(aa) is made of material
4	not adversely affected by water;
5	"(bb) is attached by means
6	of non-water-soluble adhesive;
7	and
8	"(cc) advises purchasers and
9	end-users of the intended and ap-
10	propriate use of the product with
11	the following notice printed in
12	16.5 point Arial Narrow Bold
13	font:
14	"'IMPORTANT INFORMATION: This water heater is
15	intended only for use as part of an electric thermal storage
16	or demand response program. It will not provide adequate
17	hot water unless enrolled in such a program and activated
18	by your utility company or another program operator.
19	Confirm the availability of a program in your local area
20	before purchasing or installing this product.'.
21	"(B) Requirement.—The manufacturer
22	or private labeler shall provide the activation
23	key for a grid-enabled water heater only to a
24	utility or other company that operates an elec-
25	tric thermal storage or demand response pro-

1	gram that uses such a grid-enabled water heat-
2	er.
3	"(C) Reports.—
4	"(i) Manufacturers.—The Sec-
5	retary shall require each manufacturer of
6	grid-enabled water heaters to report to the
7	Secretary annually the quantity of grid-en-
8	abled water heaters that the manufacturer
9	ships each year.
10	"(ii) Operators.—The Secretary
11	shall require utilities and other demand re-
12	sponse and thermal storage program oper-
13	ators to report annually the quantity of
14	grid-enabled water heaters activated for
15	their programs using forms of the Energy
16	Information Agency or using such other
17	mechanism that the Secretary determines
18	appropriate after an opportunity for notice
19	and comment.
20	"(iii) Confidentiality require-
21	MENTS.—The Secretary shall treat ship-
22	ment data reported by manufacturers as
23	confidential business information.
24	"(D) Publication of information.—

1	"(i) In General.—In 2017 and
2	2019, the Secretary shall publish an anal-
3	ysis of the data collected under subpara-
4	graph (C) to assess the extent to which
5	shipped products are put into use in de-
6	mand response and thermal storage pro-
7	grams.
8	"(ii) Prevention of Product di-
9	VERSION.—If the Secretary determines
10	that sales of grid-enabled water heaters ex-
11	ceed by 15 percent or greater the quantity
12	of such products activated for use in de-
13	mand response and thermal storage pro-
14	grams annually, the Secretary shall, after
15	opportunity for notice and comment, estab-
16	lish procedures to prevent product diver-
17	sion for non-program purposes.
18	"(E) Compliance.—
19	"(i) In General.—Subparagraphs
20	(A) through (D) shall remain in effect
21	until the Secretary determines under this
22	section that—
23	"(I) grid-enabled water heaters
24	do not require a separate efficiency
25	requirement; or

1 "(II) sales of grid-enabled water
2 heaters exceed by 15 percent or great-
ger the quantity of such products acti-
4 vated for use in demand response and
5 thermal storage programs annually
and procedures to prevent product di-
7 version for non-program purposes
8 would not be adequate to prevent such
9 product diversion.
0 "(ii) Effective date.—If the Sec-
1 retary exercises the authority described in
clause (i) or amends the efficiency require-
ment for grid-enabled water heaters, that
4 action will take effect on the date de-
scribed in subsection (m)(4)(A)(ii).
6 "(iii) Consideration.—In carrying
out this section with respect to electric
8 water heaters, the Secretary shall consider
9 the impact on thermal storage and demand
0 response programs, including any impact
on energy savings, electric bills, peak load
2 reduction, electric reliability, integration of
3 renewable resources, and the environment.
4 "(iv) Requirements.—In carrying
5 out this paragraph, the Secretary shall re-

1	quire that grid-enabled water heaters be
2	equipped with communication capability to
3	enable the grid-enabled water heaters to
4	participate in ancillary services programs if
5	the Secretary determines that the tech-
6	nology is available, practical, and cost-ef-
7	fective.";
8	(2) in section 332(a) (42 U.S.C. 6302(a))—
9	(A) in paragraph (5), by striking "or" at
10	the end;
11	(B) in the first paragraph (6), by striking
12	the period at the end and inserting a semicolon;
13	(C) by redesignating the second paragraph
14	(6) as paragraph (7);
15	(D) in subparagraph (B) of paragraph (7)
16	(as so redesignated), by striking the period at
17	the end and inserting "; or"; and
18	(E) by adding at the end the following:
19	"(8) for any person to—
20	"(A) activate an activation lock for a grid-
21	enabled water heater with knowledge that such
22	water heater is not used as part of an electric
23	thermal storage or demand response program;
24	"(B) distribute an activation key for a
25	grid-enabled water heater with knowledge that

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1	such activation key will be used to activate a
2	grid-enabled water heater that is not used as
3	part of an electric thermal storage or demand
4	response program;
5	"(C) otherwise enable a grid-enabled water
6	heater to operate at its designed specification
7	and capabilities with knowledge that such water
8	heater is not used as part of an electric thermal
9	storage or demand response program; or
10	"(D) knowingly remove or render illegible
11	the label of a grid-enabled water heater de-
12	scribed in section 325(e)(6)(A)(ii)(V).";
13	(3) in section 333(a) (42 U.S.C. 6303(a))—
14	(A) by striking "section 332(a)(5)" and in-
15	serting "paragraph (5), (6), (7), or (8) of sec-
16	tion 332(a)"; and
17	(B) by striking "paragraph (1), (2), or (5)
18	of section 332(a)" and inserting "paragraph
19	(1), (2), (5), (6), (7), or (8) of section 332(a)";
20	and
21	(4) in section 334 (42 U.S.C. 6304)—
22	(A) by striking "section 332(a)(5)" and in-
23	serting "paragraph (5), (6), (7), or (8) of sec-
24	tion 332(a)"; and

1	(B) by striking "section 332(a)(6)" and in-
2	serting "section 332(a)(7)".
3	TITLE III—ENERGY EFFICIENT
4	GOVERNMENT TECHNOLOGY
5	SEC. 301. SHORT TITLE.
6	This title may be cited as the "Energy Efficient Gov-
7	ernment Technology Act".
8	SEC. 302. ENERGY-EFFICIENT AND ENERGY-SAVING INFOR-
9	MATION TECHNOLOGIES.
10	Subtitle C of title V of the Energy Independence and
11	Security Act of 2007 (Public Law 110–140; 121 Stat.
12	1661) is amended by adding at the end the following:
10	
13	"SEC. 530. ENERGY-EFFICIENT AND ENERGY-SAVING INFOR-
13 14	"SEC. 530. ENERGY-EFFICIENT AND ENERGY-SAVING INFOR- MATION TECHNOLOGIES.
14	MATION TECHNOLOGIES.
14 15	<ul><li>MATION TECHNOLOGIES.</li><li>"(a) DEFINITIONS.—In this section:</li></ul>
14 15 16	<ul><li>MATION TECHNOLOGIES.</li><li>"(a) DEFINITIONS.—In this section:</li><li>"(1) DIRECTOR.—The term 'Director' means</li></ul>
<ul><li>14</li><li>15</li><li>16</li><li>17</li></ul>	<ul><li>MATION TECHNOLOGIES.</li><li>"(a) DEFINITIONS.—In this section:</li><li>"(1) DIRECTOR.—The term 'Director' means the Director of the Office of Management and Budg-</li></ul>
14 15 16 17 18	<ul><li>MATION TECHNOLOGIES.</li><li>"(a) DEFINITIONS.—In this section:</li><li>"(1) DIRECTOR.—The term 'Director' means the Director of the Office of Management and Budget.</li></ul>
14 15 16 17 18 19	<ul> <li>MATION TECHNOLOGIES.</li> <li>"(a) DEFINITIONS.—In this section:</li> <li>"(1) DIRECTOR.—The term 'Director' means the Director of the Office of Management and Budget.</li> <li>"(2) Information technology.—The term</li> </ul>
14 15 16 17 18 19 20	MATION TECHNOLOGIES. "(a) DEFINITIONS.—In this section: "(1) DIRECTOR.—The term 'Director' means the Director of the Office of Management and Budget. "(2) Information technology' has the meaning given that
14 15 16 17 18 19 20 21	"(a) Definitions.—In this section:  "(1) Director.—The term 'Director' means the Director of the Office of Management and Budget.  "(2) Information technology' has the meaning given that term in section 11101 of title 40, United States
14 15 16 17 18 19 20 21 22	<ul> <li>MATION TECHNOLOGIES.</li> <li>"(a) Definitions.—In this section:</li> <li>"(1) Director.—The term 'Director' means the Director of the Office of Management and Budget.</li> <li>"(2) Information technology.—The term 'information technology' has the meaning given that term in section 11101 of title 40, United States Code.</li> </ul>

1	the Director, the Secretary, and the Administrator of the
2	Environmental Protection Agency to develop an implemen-
3	tation strategy (that includes best practices and measure-
4	ment and verification techniques) for the maintenance,
5	purchase, and use by the Federal agency of energy-effi-
6	cient and energy-saving information technologies, taking
7	into consideration the performance goals established under
8	subsection (d).
9	"(c) Administration.—In developing an implemen-
10	tation strategy under subsection (b), each Federal agency
11	shall consider—
12	"(1) advanced metering infrastructure;
13	"(2) energy-efficient data center strategies and
14	methods of increasing asset and infrastructure utili-
15	zation;
16	"(3) advanced power management tools;
17	"(4) building information modeling, including
18	building energy management;
19	"(5) secure telework and travel substitution
20	tools; and
21	"(6) mechanisms to ensure that the agency re-
22	alizes the energy cost savings brought about through
23	increased efficiency and utilization.
24	"(d) Performance Goals.—

1	"(1) In General.—Not later than 180 days
2	after the date of enactment of this section, the Di-
3	rector, in consultation with the Secretary, shall es-
4	tablish performance goals for evaluating the efforts
5	of Federal agencies in improving the maintenance,
6	purchase, and use of energy-efficient and energy-sav-
7	ing information technology.
8	"(2) Best practices.—The Chief Information
9	Officers Council established under section 3603 of
10	title 44, United States Code, shall recommend best
11	practices for the attainment of the performance
12	goals, which shall include Federal agency consider-
13	ation of the use of—
14	"(A) energy savings performance con-
15	tracting; and
16	"(B) utility energy services contracting.
17	"(e) Reports.—
18	"(1) Agency reports.—Each Federal agency
19	shall include in the report of the agency under sec-
20	tion 527 a description of the efforts and results of
21	the agency under this section.
22	"(2) OMB GOVERNMENT EFFICIENCY REPORTS
23	AND SCORECARDS.—Effective beginning not later
24	than October 1, 2015, the Director shall include in
25	the annual report and scorecard of the Director re-

1	quired under section 528 a description of the efforts
2	and results of Federal agencies under this section.".
3	SEC. 303. ENERGY EFFICIENT DATA CENTERS.
4	Section 453 of the Energy Independence and Security
5	Act of 2007 (42 U.S.C. 17112) is amended—
6	(1) by striking subsection (b)(3); and
7	(2) by striking subsections (c) through (g) and
8	inserting the following:
9	"(c) Stakeholder Involvement.—The Secretary
10	and the Administrator shall carry out subsection (b) in
11	collaboration with information technology industry and
12	other key stakeholders, with the goal of producing results
13	that accurately reflect the best knowledge in the most per-
14	tinent domains. In such collaboration, the Secretary and
15	the Administrator shall pay particular attention to organi-
16	zations that—
17	"(1) have members with expertise in energy ef-
18	ficiency and in the development, operation, and
19	functionality of data centers, information technology
20	equipment, and software, such as representatives of
21	hardware manufacturers, data center operators, and
22	facility managers;
23	"(2) obtain and address input from Department
24	of Energy National Laboratories or any college, uni-
25	versity, research institution, industry association,

1	company, or public interest group with applicable ex-
2	pertise;
3	"(3) follow—
4	"(A) commonly accepted procedures for
5	the development of specifications; and
6	"(B) accredited standards development
7	processes; and
8	"(4) have a mission to promote energy effi-
9	ciency for data centers and information technology.
10	"(d) Measurements and Specifications.—The
11	Secretary and the Administrator shall consider and assess
12	the adequacy of the specifications, measurements, and
13	benchmarks described in subsection (b) for use by the
14	Federal Energy Management Program, the Energy Star
15	Program, and other efficiency programs of the Depart-
16	ment of Energy or the Environmental Protection Agency.
17	"(e) Study.—The Secretary, in collaboration with
18	the Administrator, shall, not later than 18 months after
19	the date of enactment of the Energy Efficient Government
20	Technology Act, make available to the public an update
21	to the Report to Congress on Server and Data Center En-
22	ergy Efficiency published on August 2, 2007, under sec-
23	tion 1 of Public Law 109–431 (120 Stat. 2920), that pro-
24	vides—

1	"(1) a comparison and gap analysis of the esti-
2	mates and projections contained in the original re-
3	port with new data regarding the period from 2007
4	through 2014;
5	"(2) an analysis considering the impact of in-
6	formation technologies, to include virtualization and
7	cloud computing, in the public and private sectors;
8	"(3) an evaluation of the impact of the com-
9	bination of cloud platforms, mobile devices, social
10	media, and big data on data center energy usage;
11	and
12	"(4) updated projections and recommendations
13	for best practices through fiscal year 2020.
14	"(f) Data Center Energy Practitioner Pro-
15	GRAM.—The Secretary, in collaboration with key stake-
16	holders and the Director of the Office of Management and
17	Budget, shall maintain a data center energy practitioner
18	program that leads to the certification of energy practi-
19	tioners qualified to evaluate the energy usage and effi-
20	ciency opportunities in Federal data centers. Each Federal
21	agency shall consider having the data centers of the agen-
22	cy evaluated every 4 years by energy practitioners certified
23	pursuant to such program, whenever practicable using cer-
24	tified practitioners employed by the agency.

- 1 "(g) OPEN DATA INITIATIVE.—The Secretary, in col-
- 2 laboration with key stakeholders and the Office of Man-
- 3 agement and Budget, shall establish an open data initia-
- 4 tive for Federal data center energy usage data, with the
- 5 purpose of making such data available and accessible in
- 6 a manner that encourages further data center innovation,
- 7 optimization, and consolidation. In establishing the initia-
- 8 tive, the Secretary shall consider the use of the online
- 9 Data Center Maturity Model.
- 10 "(h) International Specifications and
- 11 Metrics.—The Secretary, in collaboration with key
- 12 stakeholders, shall actively participate in efforts to har-
- 13 monize global specifications and metrics for data center
- 14 energy efficiency.
- 15 "(i) Data Center Utilization Metric.—The Sec-
- 16 retary, in collaboration with key stakeholders, shall facili-
- 17 tate in the development of an efficiency metric that meas-
- 18 ures the energy efficiency of a data center (including
- 19 equipment and facilities).
- 20 "(j) Protection of Proprietary Information.—
- 21 The Secretary and the Administrator shall not disclose
- 22 any proprietary information or trade secrets provided by
- 23 any individual or company for the purposes of carrying
- 24 out this section or the programs and initiatives established
- 25 under this section.".

#### IV—ENERGY **INFORMA-**TITLE 1 **COMMERCIAL TION FOR** 2 **BUILDINGS** 3 4 SEC. 401. ENERGY INFORMATION FOR COMMERCIAL BUILD-5 INGS. 6 (a) REQUIREMENT OF BENCHMARKING AND DISCLO-7 SURE FOR LEASING BUILDINGS WITHOUT ENERGY STAR 8 Labels.—Section 435(b)(2) of the Energy Independence and Security Act of 2007 (42 U.S.C. 17091(b)(2)) is 9 10 amended— 11 (1) by striking "paragraph (2)" and inserting 12 "paragraph (1)"; and 13 (2) by striking "signing the contract," and all 14 that follows through the period at the end and in-15 serting the following: 16 "signing the contract, the following requirements are 17 met: 18 "(A) The space is renovated for all energy 19 efficiency and conservation improvements that 20 would be cost effective over the life of the lease, 21 including improvements in lighting, windows, 22 and heating, ventilation, and air conditioning 23 systems. 24 "(B)(i) Subject to clause (ii), the space is 25 benchmarked under a nationally recognized, on-

1	line, free benchmarking program, with public
2	disclosure, unless the space is a space for which
3	owners cannot access whole building utility con-
4	sumption data, including spaces—
5	"(I) that are located in States with
6	privacy laws that provide that utilities shall
7	not provide such aggregated information to
8	multitenant building owners; and
9	"(II) for which tenants do not provide
10	energy consumption information to the
11	commercial building owner in response to a
12	request from the building owner.
13	"(ii) A Federal agency that is a tenant of
14	the space shall provide to the building owner, or
15	authorize the owner to obtain from the utility,
16	the energy consumption information of the
17	space for the benchmarking and disclosure re-
18	quired by this subparagraph.".
19	(b) Study.—
20	(1) In general.—Not later than 2 years after
21	the date of enactment of this Act, the Secretary of
22	Energy, in collaboration with the Administrator of
23	the Environmental Protection Agency, shall complete
24	a study—
25	(A) on the impact of—

1	(1) State and local performance
2	benchmarking and disclosure policies, and
3	any associated building efficiency policies,
4	for commercial and multifamily buildings;
5	and
6	(ii) programs and systems in which
7	utilities provide aggregated information re-
8	garding whole building energy consumption
9	and usage information to owners of multi-
10	tenant commercial, residential, and mixed-
11	use buildings;
12	(B) that identifies best practice policy ap-
13	proaches studied under subparagraph (A) that
14	have resulted in the greatest improvements in
15	building energy efficiency; and
16	(C) that considers—
17	(i) compliance rates and the benefits
18	and costs of the policies and programs on
19	building owners, utilities, tenants, and
20	other parties;
21	(ii) utility practices, programs, and
22	systems that provide aggregated energy
23	consumption information to multitenant
24	building owners, and the impact of public

1	utility commissions and State privacy laws
2	on those practices, programs, and systems;
3	(iii) exceptions to compliance in exist-
4	ing laws where building owners are not
5	able to gather or access whole building en-
6	ergy information from tenants or utilities;
7	(iv) the treatment of buildings with—
8	(I) multiple uses;
9	(II) uses for which baseline infor-
10	mation is not available; and
11	(III) uses that require high levels
12	of energy intensities, such as data
13	centers, trading floors, and televisions
14	studios;
15	(v) implementation practices, includ-
16	ing disclosure methods and phase-in of
17	compliance;
18	(vi) the safety and security of
19	benchmarking tools offered by government
20	agencies, and the resiliency of those tools
21	against cyber-attacks; and
22	(vii) international experiences with re-
23	gard to building benchmarking and disclo-
24	sure laws and data aggregation for multi-
25	tenant buildings.

1	(2) Submission to congress.—At the conclu-
2	sion of the study, the Secretary shall submit to the
3	Committee on Energy and Commerce of the House
4	of Representatives and Committee on Energy and
5	Natural Resources of the Senate a report on the re-
6	sults of the study.
7	(c) Creation and Maintenance of Database.—
8	(1) In general.—Not later than 18 months
9	after the date of enactment of this Act and following
10	opportunity for public notice and comment, the Sec-
11	retary of Energy, in coordination with other relevant
12	agencies, shall maintain, and if necessary create, a
13	database for the purpose of storing and making
14	available public energy-related information on com-
15	mercial and multifamily buildings, including—
16	(A) data provided under Federal, State,
17	local, and other laws or programs regarding
18	building benchmarking and energy information
19	disclosure;
20	(B) information on buildings that have dis-
21	closed energy ratings and certifications; and
22	(C) energy-related information on buildings
23	provided voluntarily by the owners of the build-
24	ings, only in an anonymous form unless the
25	owner provides otherwise.

1	(2) Complementary programs.—The data-
2	base maintained pursuant to paragraph (1) shall
3	complement and not duplicate the functions of the
4	Environmental Protection Agency's Energy Star
5	Portfolio Manager tool.
6	(d) INPUT FROM STAKEHOLDERS.—The Secretary of
7	Energy shall seek input from stakeholders to maximize the
8	effectiveness of the actions taken under this section.
9	(e) Report.—Not later than 2 years after the date
10	of enactment of this Act, and every 2 years thereafter,
11	the Secretary of Energy shall submit to the Committee
12	on Energy and Commerce of the House of Representatives
13	and Committee on Energy and Natural Resources of the
14	Senate a report on the progress made in complying with
15	this section.
	Amend the title so as to read: "A bill to promote en-

Amend the title so as to read: "A bill to promote energy efficiency, and for other purposes.".