

113TH CONGRESS  
2D SESSION

# H. R. 5521

To direct the Administrator of the Federal Emergency Management Agency to enter into an agreement with the National Research Council to conduct a study on urban flooding, and for other purposes.

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## IN THE HOUSE OF REPRESENTATIVES

SEPTEMBER 17, 2014

Mr. QUIGLEY (for himself and Mr. KING of New York) introduced the following bill; which was referred to the Committee on Transportation and Infrastructure, and in addition to the Committee on Financial Services, for a period to be subsequently determined by the Speaker, in each case for consideration of such provisions as fall within the jurisdiction of the committee concerned

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## A BILL

To direct the Administrator of the Federal Emergency Management Agency to enter into an agreement with the National Research Council to conduct a study on urban flooding, 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 “Urban Flooding  
5 Awareness Act of 2014”.

1 **SEC. 2. URBAN FLOODING DEFINED.**

2 (a) IN GENERAL.—In this Act, the term “urban  
3 flooding” means the inundation of property in a built envi-  
4 ronment, particularly in more densely populated areas,  
5 caused by rain falling on increased amounts of impervious  
6 surface and overwhelming the capacity of drainage sys-  
7 tems, such as storm sewers.

8 (b) INCLUSIONS.—In this Act, the term “urban flood-  
9 ing” includes—

10 (1) situations in which stormwater enters build-  
11 ings through windows, doors, or other openings;

12 (2) water backup through sewer pipes, showers,  
13 toilets, sinks, and floor drains;

14 (3) seepage through walls and floors;

15 (4) the accumulation of water on property or  
16 public rights-of-way; and

17 (5) the overflow from water bodies, such as riv-  
18 ers and lakes.

19 (c) EXCLUSION.—In this Act, the term “urban flood-  
20 ing” does not include flooding in undeveloped or agricul-  
21 tural areas.

22 **SEC. 3. URBAN FLOODING STUDY.**

23 (a) AGREEMENT WITH NATIONAL RESEARCH COUN-  
24 CIL.—The Administrator of the Federal Emergency Man-  
25 agement Agency shall enter into an agreement with the  
26 National Research Council under which the National Re-

1 search Council will conduct a study on urban flooding in  
2 accordance with the requirements of this section.

3 (b) CONTENTS.—

4 (1) GENERAL REVIEW AND EVALUATION.—In  
5 conducting the study, the National Research Council  
6 shall review and evaluate the latest available re-  
7 search, laws, regulations, policies, best practices,  
8 procedures, and institutional knowledge regarding  
9 urban flooding.

10 (2) SPECIFIC ISSUE AREAS.—The study shall  
11 include, at a minimum, an examination of the fol-  
12 lowing:

13 (A) The prevalence and costs associated  
14 with urban flooding events across the United  
15 States, with a focus on the largest metropolitan  
16 areas and any clear trends in frequency and se-  
17 verity over the past 2 decades.

18 (B) The adequacy of existing federally pro-  
19 vided flood risk information and the most cost-  
20 effective methods and products to identify, map,  
21 or otherwise characterize the risk of property  
22 damage from urban flooding on a property-by-  
23 property basis, whether or not a property is in  
24 or adjacent to a 1-percent (100-year) flood  
25 plain, and the potential for training and certi-

1           fying local experts in flood risk characterization  
2           as a service to property purchasers and owners  
3           and their communities.

4           (C) The causes of urban flooding and its  
5           apparent increase over the past 20 years, in-  
6           cluding the impacts of—

7                     (i) global climate change;

8                     (ii) increasing urbanization and the  
9                     associated increase in impervious surfaces;  
10                    and

11                   (iii) undersized, deteriorating and oth-  
12                   erwise ineffective stormwater infrastruc-  
13                   ture.

14           (D) The most cost-effective strategies,  
15           practices, and technologies used to reduce the  
16           impacts of urban flooding, with a focus on de-  
17           centralized, easy-to-install, and low-cost ap-  
18           proaches, such as nonstructural and natural in-  
19           frastructure on public and private property.  
20           The examination under this subparagraph shall  
21           include an assessment of opportunities for im-  
22           plementing innovative strategies and practices  
23           on government-controlled land, such as Federal,  
24           State, and local roads, parking lots, alleys, side-

1 walks, buildings, recreational areas, and open  
2 space.

3 (E) The role of the Federal Government  
4 and State governments, as conveners, funders,  
5 and advocates, in spurring market innovations  
6 based on public-private-nonprofit partnerships.  
7 Such innovations may include smart home tech-  
8 nologies for improved flood warning systems  
9 connected to high-resolution weather forecast  
10 data and Internet- and cellular-based commu-  
11 nications systems.

12 (F) The most sustainable and effective  
13 methods for funding flood risk and flood dam-  
14 age reduction at all levels of government, in-  
15 cluding—

16 (i) the potential for establishing a  
17 State revolving fund program for flood pre-  
18 vention projects similar to the revolving  
19 fund programs under the Federal Water  
20 Pollution Control Act and the Safe Drink-  
21 ing Water Act;

22 (ii) stormwater fee programs using  
23 impervious surface as the basis for fee  
24 rates and providing credits for the installa-

1                   tion of flood prevention or other  
2                   stormwater management features;

3                   (iii) grant programs; and

4                   (iv) public-private partnerships.

5                   (G) Information and education strategies  
6                   and practices, including nontraditional ap-  
7                   proaches such as the use of social media, for  
8                   community leaders, government staff, and prop-  
9                   erty owners on—

10                   (i) flood risks;

11                   (ii) flood risk reduction strategies and  
12                   practices; and

13                   (iii) the availability and effectiveness  
14                   of different types of flood insurance poli-  
15                   cies.

16                   (H) The relevance of the National Flood  
17                   Insurance Program and Community Rating  
18                   System to urban flooding areas outside tradi-  
19                   tional flood plains, and strategies for broad-  
20                   ening coverage and increasing participation  
21                   under the programs.

22                   (I) Strategies for protecting downstream  
23                   communities from the flooding impacts of devel-  
24                   opment in upstream communities, including a  
25                   review of—

1 (i) potential standards for watershed-  
2 wide flood protection planning; and

3 (ii) the potential establishment of  
4 streamlined legal processes for victims of  
5 flood damage, to avoid the need for expen-  
6 sive litigation.

7 (c) CONSULTATION.—The Administrator of the Fed-  
8 eral Emergency Management Agency shall carry out this  
9 section in consultation with the Secretary of the Army  
10 (acting through the Chief of Engineers), the Secretary of  
11 Housing and Urban Development, the Administrator of  
12 the Environmental Protection Agency, and State, regional,  
13 and local stormwater management agencies, and such  
14 other interested parties as the Administrator of the Fed-  
15 eral Emergency Management Agency considers appro-  
16 priate.

17 (d) REPORT TO CONGRESS.—Not later than 3 years  
18 after the date of enactment of this Act, the Administrator  
19 of the Federal Emergency Management Agency shall sub-  
20 mit to the Committee on Financial Services and the Com-  
21 mittee on Appropriations of the House of Representatives  
22 and the Committee on Banking, Housing, and Urban Af-  
23 fairs and the Committee on Appropriations of the Senate  
24 a report containing the findings of the National Research  
25 Council based on the results of the study, including rec-

- 1 ommendations for implementation of strategies, practices,
- 2 and technologies relating to urban flooding by Congress
- 3 and the executive branch.

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