



November 20, 2018

Testimony of Anthony DeVita, Assistant Chief of Operations, FDNY

Oversight Hearing- The Impact of Automatic Sprinkler Systems on Fire Suppression

Good afternoon Chair Borelli and all of the Council Members present. My name is Anthony DeVita and I am Assistant Chief of Fire Operations for the New York City Fire Department. I am joined today by Julian Bazel, Code Counsel for the Fire Department, and Louis Cendagorta, Chief Inspector in the Bureau of Fire Prevention. Thank you for the opportunity to speak with you today about the impact of automatic sprinkler systems on fire suppression.

Sprinklers are an important and highly effective tool in fire suppression. Automatic sprinkler systems have the ability to control an incipient fire and provide precious time for occupants of the building to escape and for the Fire Department to arrive before the fire spreads. Put simply, the presence of a working sprinkler system helps us save lives and property from fire.

The positive impact of sprinklers on deaths and injuries in a fire is profound. This can be demonstrated by looking at data from fires in locations with sprinklers versus locations without. According to research published by the National Fire Protection Association (NFPA), in structural fires during the time period of 2010-2014, the civilian fire death rate in fires in properties *with* sprinklers was 87% lower than the rate of civilian fire deaths in properties *without* an automatic sprinkler system.

The civilian injury rate in fires on properties with sprinklers over this same time period was 27% lower than the injury rate in properties with no sprinkler system. The NFPA points out that many of these injuries occurred in fires that were too small to activate the sprinkler, or in the initial moments of a fire before the sprinkler operated.

The impact of sprinklers on the safety of first responders is also significant. According to the same NFPA research, the average firefighter fireground injury rate in locations with sprinklers was 67% lower than the injury rate in locations where no automatic sprinkler system was present.

As members of the New York City Fire Department, we are not experts on the cost of sprinkler installations and we would defer to our fellow city agencies



November 20, 2018

Testimony of Anthony DeVita, Assistant Chief of Operations, FDNY

Oversight Hearing- The Impact of Automatic Sprinkler Systems on Fire Suppression

regarding those figures. However, as a potentially useful reference, we are aware that a report on Home Fire Sprinkler Cost Assessment conducted by Newport Partners for the NFPA in 2013 noted that the median cost was \$1.22 per square foot, and also that these costs have been decreasing over time. The Council may wish to explore this topic further with local partners in order to understand the specific dynamics of the New York City market, but it is worth noting that the costs for this valuable tool are not exorbitant.

From the standpoint of safety and fire suppression, expanding the use of automatic sprinkler systems in the City of New York would be a positive step to take. We are aware that other factors such as cost and the burden of new construction figure into the conversation. We also know that our fellow city agencies such as the Department of Buildings and the Department of Housing Preservation and Development would have valuable contributions to this discussion. We would be happy to work with the Council and our agency partners on this topic.

I'll now briefly address the legislation being considered today.

Introduction 826

Introduction 826, sponsored by Councilmember Brannan, would require the Fire Department to include information on the usage of fire sprinklers in its annual report on civilian fire deaths. The legislation would require the yearly report to address for each fire:

- whether a sprinkler was found
- the age and type of the sprinkler
- testing and maintenance records
- whether such sprinkler was operational and activated during the incident



November 20, 2018

Testimony of Anthony DeVita, Assistant Chief of Operations, FDNY

Oversight Hearing- The Impact of Automatic Sprinkler Systems on Fire Suppression

If this bill passed, the Department would be able to comply with most aspects of this legislation. However, we would like to clarify for the Council that, while Department personnel do witness periodic testing of sprinkler systems, building owners are responsible for the more frequent routine testing and maintenance of sprinkler and standpipe systems, and the owners maintain such records. The Department would not be able to include such data in our report. Also, depending on the incident, there is often a practical difficulty to determining the age and type of the sprinkler. However, to the degree that it is practical to make a determination in the course of a given fire investigation, we could include in the annual report whether a sprinkler was present, the age and type, and whether such sprinkler was operational and activated during the incident.

We would be happy to take your questions at this time.

Enterprise Association of Steamfitters Local Union 638 U.A.

OF

STEAM, HOT WATER, HYDRAULIC, SPRINKLER, PNEUMATIC TUBE, COMPRESSED AIR, ICE MACHINE, AIR CONDITIONING
AND GENERAL PIPE FITTERS OF NEW YORK AND LONG ISLAND, A.F.L.-C.I.O.

STEAMFITTERS LOCAL UNION 638 OF THE UNITED ASSOCIATION



® 64

Patrick Dolan, Jr.

President

27-08 40th Avenue, 4th Floor
Long Island City, N.Y. 11101

Phone: Office (718) 392-3869
Finances: (718) 392-4074
Fax: (718) 392-5340

- Good afternoon, thank you Council Members for holding this important hearing
- My name Pat Dolan and I am President of Steamfitters Local 638....Our members install and maintain the fire sprinklers, pipes, heating and cooling systems that act as the circulatory system for tens of thousands of buildings in New York City and throughout the region
- Because of that, I can tell you firsthand how crucially important fire sprinklers are in saving lives and containing the damage from fires
- Those facts will become even more clear if this bill is enacted and we are given more information about the role of sprinklers in fires
- Hopefully, as a result of this increased transparency, the city will be compelled to further action in increasing requirements for fire sprinklers
- What we do know is this: According to a study by the National Fire Protection Association, the death rate per 1,000 fires was 87% lower in properties with fire sprinklers and fire damage was confined to the room of origin in 97% of fires where sprinklers were present
- Fire sprinklers are the first line of defense, and with the increasing use of highly flammable building materials and furnishings, which causes modern fires to burn 800 percent than they did 40 years ago, sprinklers are more essential than ever.
- They are among the most effective means we have of mitigating the tragic results of fire and we must continue working to ensure that residents and workers in all buildings in New York City are afforded that vital protection
- Over the decades, we have worked with the City Council to add and strengthen sprinkler requirements for buildings
- This work has led directly to a long and persistent decline in fire deaths

- Since the first fire high-rise sprinkler law was enacted in 1973, fire fatalities have steadily dropped, from about 300 a year in the 1970s down to a record low 48 in 2016, and staying well below 100 per year for the past decade
- This did not happen by accident. It is the result of sustained advocacy, increasing knowledge of the effectiveness of sprinklers, and most important, legislation that repeatedly expanded the required use of sprinklers
- This bill before you is another step on the journey towards universal fire sprinkler protection in all New York City buildings.



Testimony before the New York City Council
Committee on Fire and Emergency Management
Oversight – The Impact of Automatic Sprinkler Systems on Fire Suppression and
Intro 826-2018
November 20, 2018

Good afternoon Chair Borelli and members of the New York City Council Committee on Fire and Emergency Management. My name is Melissa Barbour and I'm with the Mechanical Contractors Association of New York, Inc. (MCA-NY). MCA is an organization comprised of 130 member firms, including The New York Fire Sprinkler Council (NYFSC), employing Steamfitters Local Union 638.

MCA represents licensed contractors that are responsible for the installation, inspection, testing and maintenance of fire-suppression systems in tens of thousands of high-density residential, commercial and industrial buildings, including hospitals, universities, power plants and water treatment facilities across the New York region. We represent the most competent, informed and highly skilled contractors in New York City and Long Island and regularly provide internal educational seminars and programs for our members that further the life-saving message of the importance of proper fire protection.

I'm here today to discuss the importance of fire sprinklers and to testify in favor of Intro 826. Research and data support the fact that fire sprinklers save lives and prevent property damage, thereby preventing displacement. However, the City of New York has not passed significant fire sprinkler legislation for residential buildings since 1999. Yet, residential fires continue to plague the city and particularly older buildings, including the majority of New York City Housing Authority (NYCHA) apartments that are not required to install fire sprinklers if built prior to 1999. These are often the buildings where the most vulnerable populations live.

According to the FDNY 2017 annual report, in 2017, there were a total of 3,279 accidental fires, 1,075 people injured and 73 lives lost in New York City. Just this year in the Bronx we faced the deadliest fire the city has seen in 27 years, which killed 12 people, injured 14 and displaced 22 families. We can and must do more to prevent tragedies like this from happening.

Aside from fire fighting and explosion fatalities, there has never been a multiple loss of life in a fully sprinklered building due to fire or smoke. The death rate per 1,000 is 87% lower in properties with sprinklers than in properties with no automatic extinguishing systems. Smoke detectors are not enough to save lives or prevent property damage. When a fire begins in a sprinklered building, only



the sprinklers closest to the fire go off to contain the fire in the area and completely put out the fire, preventing displacement and saving families money and ultimately the city of New York.

All too often displacement is left out of the larger conversation on fire prevention. The common misconception is that the sole purpose of fire sprinklers is to give more time to escape fire. However, the fact is fire sprinklers control 99% of fires. In properties with fire sprinklers, flame damage was confined to the fire's room of origin 97% of the time. According to an NFPA study, from 2007-2011, fires in high-rise buildings cost \$219 million dollars in property damage each year. Sprinklers are cost effective and retrofitting high-rise buildings is easier because buildings 75 feet or higher already have standpipes on each floor that the FDNY connect to. These standpipes provide the infrastructure to accommodate fire sprinklers. At the same time, owners and residents of high-rise buildings with fire sprinklers receive discounts on their fire insurance.

For all of these reasons, The New York Fire Sprinkler Council urges our elected officials, city agencies and all authorities having jurisdiction to consider mandating fire sprinkler protection in occupancies where they are not currently required. Just as important, we also urge New York City jurisdictions to ensure that the fire sprinkler and standpipe systems currently installed in their locales are properly inspected, tested and maintained.

Intro 826-2018

I'd like to thank Council Member Justin Brannan for introducing Intro 826-2018, which requires the fire department to report on the use of fire sprinklers in fire-related deaths. We currently do not have New York City specific data, therefore this legislation will help us capture the impact of fire sprinklers on fires in New York City and then allow lawmakers to make informed policy and decisions based on this data. While we support Intro 826, we would like to see the reporting provision period lengthened from 2022 so that we have a sufficient time period to study. We believe that with the extended reporting period, this legislation will be critical to preventing future fires by helping learn from past mistakes and MCA supports all attempts to promote fire safety in New York City.

Thank you for your time today and I'm happy to answer any questions.

**THE COUNCIL
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

in favor in opposition

Date: 11/20

(PLEASE PRINT)

Name: Assistant Chief of Operations, Anthony De Vito

Address: 9 Metrotech Center

I represent: FDNY

Address: 9 Metrotech Center

**THE COUNCIL
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

in favor in opposition

Date: 11/20

(PLEASE PRINT)

Name: Chief Inspector Louis Cendagorta

Address: 9 Metrotech Center

I represent: FDNY

Address: 9 Metrotech Center

**THE COUNCIL
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

in favor in opposition

Date: 11/20

(PLEASE PRINT)

Name: Fire Code Counsel, Julian Bazel

Address: 9 Metrotech

I represent: FDNY

Address: 9 Metrotech

**THE COUNCIL
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. 826 ^{+ Oversight} Res. No. _____

in favor in opposition

Date: 11/20/18

(PLEASE PRINT)

Name: Melissa Barbour

Address: 33 Deer Run Water Mill

I represent: Mechanical Contractors Assoc. of NY

Address: 535 8th Ave NY NY

Please complete this card and return to the Sergeant-at-Arms

**THE COUNCIL
THE CITY OF NEW YORK**

Appearance Card

I intend to appear and speak on Int. No. 826 Res. No. _____

in favor in opposition

Date: 11/20/18

(PLEASE PRINT)

Name: Patrick Dolan

Address: 27-08 41st Ave

I represent: SteamFitters Local 638

Address: _____

Please complete this card and return to the Sergeant-at-Arms