

Leadership in Fire Protection: An Oral History Series

Jim Dalton on the Development of the Residential Fire Sprinkler Movement

– With Mike Love

Mike Love – ML

Jim Dalton – JD

Caption: Taped in Great Falls, VA, June 12th 2012 by Knowlera Media for the United States Fire Administration, FEMA.

Caption: With special thanks to the Fairfax County Fire & Rescue for allowing taping at Station #12, Great Falls, VA.

Caption: Jim “JD” Dalton. Washington/Congressional Liaison. National Fire Sprinkler Association.

Caption: Mike Love. Deputy Chief (Retired), Montgomery Co. (MD) Fire and Rescue Service.

ML: Jim, tell me about when you first became associated with the fire department.

JD: Well, Mike, I got out of the Marine Corps in 1960 and I wasn't a young man who had dreams about being a fireman some day; I kind of needed a job. And I ran into a buddy of mine named Bobby Jones who was a Kensington fireman and he talked to me about the fire department and actually took me down to Silver Spring and watched me fill out an application. That was January of 1960. And I was actually a volunteer for a few months and then went on as a career firefighter March first of 1960.

ML: You obviously started early. How high did you reach in the fire department as far as rank?

JD: Well, as you now, we had a motional competitive system in those days so you took an examination to move forward. Actually, I wasn't a great high school student, tell you the honest truth, but when I got into the fire service, I just fell in love with it, became easy to apply yourself and study, and of course we benefited by Maryland Fire and Rescue Institute Training and whatever. And it adopted the Oklahoma Red Book so you knew what needed to study. So I was really privileged to be first on the Sergeant's list in '65 and then first on the Lieutenant's list in '67, the first on the Captain's list in '70. And then when Chief Gratz left Silver Spring to become the first Director of Fire and Rescue Services for the county in '73, I was promoted to Assistant Chief and that's the highest rank that I achieved.

ML: And you mentioned that...that Warren Isman had recruited you into the Fire Marshal's Office when he became the Director.

JD: Yeah. When Chief Gratz left Warren, who was running the training academy at the time, was appointed Director and he asked me to make a lateral transfer from suppression into the

division of fire prevention. I was a little bit reluctant to tell you the honest truth. He could have made me do it, but he was asking me to do it, and I said yes and it literally changed not only my career, but it literally changed my life.

ML: And that's understandable. Who – what – was the fire marshal before you when you were appointed?

JD: Skip Smith was there and Skip left Montgomery County to become the first full time Executive Director of the Fire Marshals Association of North America, which today you know is the International Fire Marshals Association. And really, a lot of people don't know this, but that was the first section of NFPA.

ML: So that was your first formal job in life safety? The rest of the time you've been all operational, right? And what do you recall about your operational job and what you perceive as a problem with the lack of...of life safety or the lack of fire prevention or...or.... how can you comment about that?

JD: Well, Mike, as you know because you...you lived it also, I spent 17 years in suppression as a firefighter, firefighting officer, and a chief firefighting officer, and you see a lot in 17 years. And I think you gradually begin to mature a little bit. You begin to realize maybe there's a better way to do this. As you know, our Chief in those days, Chief Gratz, was way out on the front of the wave with fire prevention. Lord, we did home inspections back in the '60s and now it's getting popular again. We did a lot of fire prevention things, you know, but you just begin to realize there had to be a better way to do it and gradually I was forced to adopt the three Es which I always talked about which was public education, early warning, which you know we did the smoke detector law later on, and then you know so much today believing in early suppression.

ML: And I know that you've mentioned to me in the past that...that the...the smoke alarm legislation in Montgomery County was the first large jurisdiction to adopt that. Can you say anything more about that, talk about that?

JD: Well, I don't take credit for getting it done. You got to give credit to Dave Gratz and Skip Smith for that and certainly Mary Marshone and Paul Minty, who were in public education and when I inherited them in July of '77. But if you recall, it was passed in the fall of '76 but not to go into effect until July 1 of '78, so it was a long lead time to do a massive public education, public information campaign in the county. And I think we all thought when that passed that that was the end of fire deaths in Montgomery County, Maryland, but as you know, we never had a zero fire death year in Montgomery County until later when Montgomery County had also added residential sprinklers to the local fire protection toolbox, if you will.

ML: Did you have reluctance to...to smoke alarms at...at the beginning?

JD: No. I didn't. You know, it was a new technology, it was a new intervention. I got very involved in that and became one of the members of the International Association of Fire Chiefs' Early Warning Committee in those days, the Smoke Detector/Smoke Alarm Committee. I got to go to the L.A. test where we did a lot of tests between the two types of smoke detection in those days, the ionization chamber and the photoelectric cell. So, you know, you got very involved in

that and obviously it helped us reduce fire deaths substantially. But I think we also began to realize at that point that wasn't the fantasy, that there needed to be something else.

ML: One of the things I often appreciate was, outside of my own work environment, I thought I needed somebody to bounce ideas off of, which, you know, you very accessible for that. Did you have somebody who you felt you served as a mentor or somebody that you could sound things off of when you became Fire Marshal?

JD: Well, no question. You know, Chief Gratz had left, Chief Isman had taken over as the Director, but Chief Gratz was around and doing a lot of international work for NFPA. He was certainly my mentor, there's no question about that. As you well know from growing up in Silver Spring and in the county, he was just that kind of a chief that wouldn't let you be any less than he thought you could be. Oh, and he sent us to college. We all got a college education and was always someone that was there for me, you know, when I needed to bounce ideas off or I needed to get some good counsel and direction, if you will. Chief Gratz was one of those leaders that knew, besides leadership, besides being done out front, every once in a while you had to slip through the rear to give somebody a good booting in the rear end to keep you moving forward. And he was certainly my mentor.

ML: And all that time, of course, once Chief Gratz had left Montgomery County and Chief Isman had taken the Directorship there, you stayed involved in...in things you had mentioned about traveling internationally on some projects that...that Chief Gratz had gotten involved with and a few of the interesting things you might....

JD You know, that kind of came later. I was fortunate to get so involved in public education not long after I went to the Bureau in '77 and of course I was responsible for the implementation of that very comprehensive detector law that you mentioned. And you know that was.... People were beginning to talk. I remember meeting Ronny Coleman in Chief Isman's office and this is a guy who was putting sprinklers in homes in California already. We were still dealing with the implementation of the smoke detector law. So I was just so fortunate to get involved with those things. And then Chief Gratz was doing a lot of the international work for NFPA at the time. So myself and Bill Ale, who you knew as an officer in Silver Spring, we kind of grew up together, had the great opportunity to do some traveling around and tried to help some people across the big water.

ML: And you had mentioned Mary Marshone's name, which is a...a...a...she is a leader in fire public education and who are some of the other people that...that you can mention that you worked with in public education as a fire marshal?

JD: Well, interestingly enough, when I took over the Bureau in July of '77, Mary was actually working as an office assistant. She had been doing public education kind of part time, obviously doing a wonderful job of it. Paul Minty had transferred in from Rockville to do public education. We had the two full time educators and I actually wrote probably maybe the first class spec in the country for a fire educator, had them transfer it into that class spec with the help of Chief Isman and the county personnel people. But I think the thing that did it for me; I got to go to a thing called Airlie, which was the first of the National Fire Safety Conferences, a hundred people, two from each state, after the National Fire Prevention and Control Administration, which is now the U.S. Fire Administration, had been there on 24th and M in D.C. And those first

conferences were at a conference center called Airlie down in Virginia and it brought people, the early gladiators of public education together and that's kind of when I adopted the first of those three Es, of public education as an intervention that we knew we could do better with the fire problem.

ML: You recognized, of course, as a fire marshal that that was a big area that could get you benefits in the area of life safety. What were some of the things that were about to come as far as education that...that you embraced?

JD: Well, I think that, you know, the whole behavioral thing. You know, when the *America Burning* report was...was written, as you know, Dr. Anne Phillips wrote the minority report and she's the one that really kind of kicked off public education. What she was saying was fire service needs to be talking to the public they need to be talking to families, we need to teach survival education, things like the "stop, drop, and roll" and how to survive a high rise fire and all those kinds of things. Of course, NFPA was one of the leaders in public education. ISFSI, the International Society of Fire Service Instructors, which we belonged to years ago, really pushed that pendulum of education as an intervention against fire, public education and forward.

ML: Let's start talking about residential sprinklers, which is kind of the core of what we are sitting here having a conversation about tonight. As an Assistant Chief Fire Marshal in Montgomery County, what were some of the early opportunities to start planning and looking at residential sprinklers as a solution, as a technology to increase life safety in homes?

JD: Well, we were fortunate to be invited to a couple of testing areas that were being done that really even preceded San Francisco, that was the L.A. test, and the Ft. Lauderdale test. I actually went to the L.A. test and I sent John Best, the Deputy of the Bureau, to the Ft. Lauderdale test. So that began to open our eyes. But then I was so privileged; a beneficiary of people like Harry Shaw, Sonny Scarff, and those people that really worked along with the Fire Administration and the industry to put Operation: San Francisco together in 1983. To be able to go to San Francisco, watch those tests, of the combine, of the early warning at the time with the new fast response residential leak. And you know, getting on a plane coming home thinking, you know, "How am I going to go to work with this?" Politically, it was probably ahead of its time, but we actually applied for a HUD community block grant, got it, and put fire sprinklers in ten group homes in Montgomery County, which we thought were prime for multiple life loss fires. And I went to the fire chief and said, you know, "We got to stop building fire stations without residential sprinklers because our firefighters sleep there." So we were rehabbing a couple of stations, building a new station we put them in there. So that was probably the groundwork that was laid and then later on, as you know, Montgomery County was able to move forward with an ordinance requiring sprinklers in new homes.

ML: And in the first standard for residential sprinklers did not have the fast action, the quick action sprinkler heads in them, did they?

JD: No, we didn't. In 1975, NFPA issued the first standard, NFPA-13D for the installation of sprinklers in one to two family homes and mobile homes, you know. The number one gladiator, Ronny Coleman, out in San Clemente, California began to use that standard, but it was like having one arm tied behind your back because he didn't have the fast response link in those days. I met Ronny in Chief Isman's office one day and it was quite a realization that we were still

working to implement a smoke detector law and this guy's out in California putting fire sprinklers in homes. But then the RND work finally got us to the fast response link, Grinnell got the first listing from UL, followed not long after that by Central. And then we had in the market place a whole new intervention because that fast response link became a life safety intervention. We sprinkled buildings before that for property preservation, now we could sprinkler for life safety and still get that property preservation.

ML: Would you say that the...that the fast action technology was one of the most important advancements in technology with residential sprinklers or has there been some other things since then that made it either cheaper or...or more effective?

JD: Certainly things have come to pass since that with the plastic pipe being accepted and then down to your half inch sizes and those kinds of things help. But absolutely, no question, I think the discovery, if you will, of after all the RND of that fast response link, which was really a piece of life safety intervention, if you will, was in my opinion far and away the thing that really allowed us to be able to move forward and put fire sprinklers in homes, both effectively and economically.

ML: Shifting gears a little bit more toward where we are over the last maybe five or six years, possibly over the last ten years. You've been involved in advocating residential sprinklers as well as sprinklers overall, you've done a lot of work on Capitol Hill. Can you talk a little bit about some of your legislative advocacy?

JD: Well, there... We built a lot of buildings, especially a lot of high rise buildings, under older building codes in America without fire sprinklers systems incorporated in them. A lot of these buildings are occupied by older adults, many that had fallen into what we call high risk population groups, perhaps non-ambulatory or whatever, for physical reasons or sometimes just because we all get old. And these buildings are in dire need of retrofit, along with nightclubs and entertainment venues, off campus housing – we have a horrible problem – we got too many nursing homes today unsprinklered. So we have some legislation on Capitol Hill which all of the fire groups have gravitated to, I've just been able to take a leadership role with it. It's called the "Fire Sprinkler Incentive Act". It would amend the 86 revenue code. And really what it does, without going into a long explanation, it would allow a building and the owner who spends the money to retrofit sprinklers into that building, regardless of the occupancy, to recoup that investment pretty rapidly.

ML: And who has been, besides yourself been very actively involved, who in the legislative side has been active sponsors and...and...and initiators of that legislation?

JD: Well, originally of course, Curt Weldon, who's no longer in Congress, who was so instrumental in starting the fire caucus of Capitol Hill and then the Congressional Fire Service Institute. But a lot since then. Of course, we working very closely with the Congressional Fire Service Institute, all of the national fire groups who are headquartered around Washington. Right now, our sponsors are Congressman Schock from Illinois on the House side and Jim Langevin from Rhode Island who suffered in his district from the loss of a hundred people from a nightclub fire, you know, about ten years ago and on the Senate side, Senator Tom Copper from Delaware and Senator Susan Collins from up in Maine. So we've had great support from our

sponsors and beyond. We're just waiting for the right vehicle and some work to be done on the tax code and hopefully we can ride this bus and get that thing done.

ML: Yeah. I guess that it's apparent that sometimes legislation is not exactly what you term an overnight success. It takes a lot of work and background and just...talking to people and influence.

JD: When you try and amend the internal revenue code, you can't just attach that to any bill floating through Washington; you've got to do major tax work. And we've been very patient but anxious for that to come and we're hearing that that will probably come this Congressional, early next Congress.

ML: And going back to Operation: San Francisco, that was a key activity involved with the residential sprinklers and there were many different organizations who observed some of the activities. There were fire chiefs that were involved and became more involved as a result of that. Can you talk more about some of the people who were influenced by Operation: San Francisco and some of the groups that were involved in that?

JD: Well, the guys you've got to give credit for making it happen to begin with the top of the list would be Sonny Scarff and Marriott, they were so involved. And then Harry Shaw, who had formerly been Associate Administrator at U.S. Fire Administration and happened to be in the right seat at the right time when we needed the RND money to develop the fast response link. And you know, and...and...and the U.S. Fire Administration, and the fire sprinkler industry, some of the major manufacturers or whatever made that happen. But it was an opportunity to really show off a companion use of early warning with this new fast response link. And as you pointed out, a lot of us got to go out and see that. And then afterwards, it was like, you know, "How do I integrate this new invention into our local fire defense capability." And people like Dave Hilton and Cobb County, Georgia, Ronny Coleman, I already mentioned, was working with the original 13D even before fast response. Jim Estep in Prince George's County, Maryland, Bob Edwards out in Scottsdale, of course the whole Scottsdale deal was rather infamous. And others like Dave Bibber up in New Hampshire and Tom Siegfried in Altamonte, Florida. These are the guys that kind of stuck their neck out there working with us at Operation: Life Safety, which after Operation: San Francisco kind of became the resource center at the International Association of Fire Chiefs. And those guys deserve a lot of credit because it wasn't an easy thing to do politically or otherwise, but they moved forward and really laid the groundwork for a lot of people that came afterwards.

ML: Well, certainly Dave Hilton is somebody that I recall hearing a lot about and recognizing that he was the president of the International Association of Fire Chiefs for his year in time. What was his influence on residential sprinklers? What did he do in Cobb County to further that along?

JD: Well, what they did in Cobb County was they...they...they really put that fast response link to work even beyond the one and two family environment. They did a lot of work in...in light hazard occupancies and whatever and I would say the work they did there and some things that were going on in Florida actually led to the development of what we know today as 13R, which is the residential insulation standard in residences up to four stories. You know, they wrote the Florida Affordable Fire Sprinkler Law based on a lot of what Dave had done in Cobb County. So

along with being a leader in the one to two family push, he really did a lot more things because he was willing to stick his neck out there and do some things that he knew were right regardless of what other people might have thought.

ML: Right. And you had mentioned Operation: Life Safety, “OLS”. Give a little bit more description of, you know, the environment that...that it was intended for. What was its purpose?

JD: Well, after Operation: San Francisco, when a lot of us that had been there were dealing with this “How do I go to work with this new intervention and if so, who do I lean on for assistance and resources and technical information and whatever?” Operation: Life Safety was formed. It was a public-private partnership of the U.S. Fire Administration and the private sector who donated the dollars that were needed for the program. The International Association of Fire Chiefs, who were on 18th Street in D.C. at the time, gave the program a home and it became the primary resource in the early days of residential fire sprinklers to provide technical assistance, educational materials, support, testimony, whatever it took to help these early chiefs kind of win the battle of politics of life safety, if you will, back home and be able to implement residential sprinklers into their...their local fire defense program.

ML: And who were some of the early leaders that...that...that kind of kept OLS going? I know you had to have some employees and some staff that...that were key in...in making these things happen. Who were some of the people involved with it at that time?

JD: Well, you know, we were lucky because we had a succession of IAFC presidents who were big into residential sprinklers. It was like the timing was perfect. You had Dave Hilton, as I mentioned, Jim Estep from Prince George’s County, Tommy Siegfried from down in Altamonte, Florida. So, you know, OLS became kind of a flag ship program but greatly supported by Gary Briese, who was the executive director of the International Association of Fire Chiefs at that time, I had a young lady, Eva Claudio [?], that worked with me. We really, in the early days, were a two person team, if you will. She held down home base and answered a lot of resource questions and mailed out tons of stuff, and I would get on a plane every week and go to one of these communities that we’re trying to go forward to residential sprinklers to do what we could to help them get ready for the night that somewhere down the road they would end up in a public hearing trying to convince their local public policy people that this was a good thing for that community to do. So, there were only a couple of us but I think we were able to do a lot. But because we were home based at IAFC with a lot of good people and we had all that good leadership from the chiefs, who were as kind of a succession of presidents of IAFC through those years.

ML: Prior to you, Harry Shaw was director, correct? And when he left, then you became the actual director?

JD: Well, in the fall of 1986, I had been doing a project for USFA National Fire Prevention Grant type of thing and Harry Shaw was the director of Operation: Life Safety. He.... It had come about after Operation: San Francisco.... And I got a call from Gary Briese, the executive director of IAFC, because they had gotten a separate contract – OLS was a public-private partnership – and they got a contract to develop and deliver a national workshop series on residential sprinklers. And so I plugged in with the program in the fall of ’86, to develop and begin that workshop series. Over the next seven years, we probably did 107 workshops all over

the country in these very early days of trying to get this new intervention to work in a one and two family environment.

ML: You've told me a lot about the workshops. Why don't you talk about, just in general terms, you know, what was a workshop and what it involved?

JD: Well, it was a one day workshop. We would find a host out across the country somewhere. Sometimes it was the state training entity, sometimes it was a local fire department chief who was willing to host the workshop. I had NFPA participated; they did all of the instructional part on the standard itself. I had the National Fire Sprinkler Association participating; they did a lot of technical and actual installation stuff. I did all of the general stuff, if you will, all the politics side, I guess you would call it. And we had a pretty good one day workshop that really tried to make chiefs realize that if you're going to go forward with this intervention at some point, probably not going to be easy, but the important thing is to prepare yourself the best you can to be in that public hearing and be totally prepared with your facts and all the information that it would take to convince your public policy people that this was a good move for your particular community. So, we didn't help people from Washington, we got out on a plane and went out there and worked with them.

ML: So, providing them with knowledge and some, even with some, experience at what they might be up against in their communities...was that...do you think that's the first time the fire service has done that?

JD: Well, I don't know about the first time because Montgomery County had passed such a comprehensive smoke detector law in 1976 and I kind of inherited the implication of that. I traveled the country quite a bit then. Fortunately, Chief Isman was willing to...to let me do that and work with a lot of communities on that whole early warning things. So I was very fortunate to kind of span the...the decades of public information and then early warning and then kind of into this intervention of early suppression, which I still believe today used in synergy, individually, every one of those interventions as you and I know has had a tremendous affect on lowering the fire problem. But you've got to use them in synergy; it's the sum of those parts, the sum of those interventions, which we're striving to use in the future. Continue education, continue our work with early warning, and add early suppression into the one and two family environment.

ML: Another completely different subject in talking about how an organization deals with risk in their community, kind of an early look at how you can reduce risk and...and...and save money and...and has some benefits in some of your protection measures. Scottsdale, Arizona. Talk about Scottsdale and what the sprinkler did for them.

JD: Well, you know, they had a unique opportunity with a privatized fire department which obviously had to maintain a very keen focus on dollars. It was a whole other way to approach things. It was a business, to some extent, to be profitable like other businesses. So they were wise enough to grab on to this new opportunity to introduce residential sprinklers into this whole new approach, if you...if you will, that the city of Scottsdale, Arizona was...was willing to adopt, you know. So the early folks there.... When I got involved there, Bob Edwards was chief, Frank Hodges was the fire marshal, he actually participated in that workshop series. And Scottsdale just grabbed on to this thing and really moved forward with it. Today, under the leadership of Jim

Ford, who became the fire marshal after Frank, as you well know they've written several documents about their success. And I think it really proved that if a community is willing, that you can make this intervention just a whole part of this community's approach to fire protection. As Chief Hilton used to say, "It's as simple as putting the wet stuff on the red stuff." Well, all we got to remember is that little residential link does exactly that; it puts the wet stuff on the red stuff. And when people like Scottsdale, Arizona adopted that totally into their fire defense capability at that community level. They just did unbelievable things with it and that was how those reports which they have written have certainly helped a lot of people move forward.

ML: Operation: Life Safety just keeps coming up in all of these discussions and...and descriptions you're providing. Move to the present day and recent years, five, six years past, there's been a thing called "Fire Team USA".

JD: Well, there are a number of years after the demise of Operation: Life Safety and after the workshops that I referred to – probably, I probably did 120 of them and then some folks attempted to continue that for a while afterwards, so there might have been 150 of them totally over seven, eight, nine years, whatever it was, maybe ten years – there was a number of years in there where there really wasn't an educational workshop out across the country dealing with this subject of residential fire sprinklers. I was having an interesting conversation with a young lady named Vickie Pritchett, who later replaced me at National Fire Sprinkler Association as Director of Public Fire Protection, and I just said to Vickie, you know, "There needs to be another national workshop." But as we talked that through, we decided that to take one step instead of eating the cow with one bite. At the time, Tennessee was number two in fire deaths. Tennessee Fire Inspectors Association was willing to jump in with us and write a grant. We wrote a grant to the Assistance to Firefighters Grant Program and were fortunate, in the fire prevention side, to be rewarded a grant to the fire inspectors group in Tennessee and we did six very concentrated workshops in Tennessee that I think were so successful we were able to write future grants and take that workshop literally out across the other 49 states.

ML: Is that still occurring now? Are they still....

JD: Well, right now it's kind of in a little interlude also, but I know there's been another grant submitted in the 2011 grant submittals, probably will be another one written soon for the 2012 money. Hopefully they continue that workshop because it's no question there's still a line in the sand between the building industry in America and the U.S. fire service and, as you know, I believe it will be education that ultimately breaks that down. So I think that I and a whole lot of other people think that workshop gets back up and running and continue to tour the country and provide education about this most important intervention.

ML: So even now, after...after the hard work of many, many fire professionals, yourself included, and getting residential sprinklers into the International Residential Code, you still have a need to continue to educate people and some of these workshops are the way to do that, I guess.

JD: You know, the adoption thing was so important because in the early days at Operation: Life Safety, we had to help a community pass an independent ordinance requiring residential sprinklers and work so hard for years to try to get that into the International Residential Code. That finally happened, as you know, in Minneapolis and ultimately was retained in Baltimore

and into the 2009 code, but it's really words in a book until it gets adopted by states and locals. So that's kind of been the big fight out there. It's become what I call the politics of life safety. And again, I think that ultimately education will be the intervention that allows us to begin to convince more politicians at the state and community level, but this is a good move forward for their community as it relates to their total offering of fire protection.

ML: Now, this is a little bit off where maybe we had talked previously but, well, you brought up the politics of life safety and we were talking about, you know, how we really have to be assertive in those situations knowing that in some cases you're going to get resistance. But what are the scars that you bear for the politics of life safety? Or what have you learned about how to deal with that and continue the north compass reading, if you will.

JD: You know, first of all you got to kind of believe that what you're doing is the right thing to stay in power, to continue because, you know, we wrote 13D in 1975, we got the fast response link in the early '80s, Operation: San Francisco '83, then the Operation: Life Safety program. All of these were workshops, you know, whatever, and we're still not where we need to be and politics has been one of those stumbling blocks. So I think you have to have the staying power, but maybe more than anything else, I think the nation's fire service has got to stand up, maybe a little bit angry that another industry might be dictating the level of fire protection at the community level. And, you know, really fight to integrate this technology into their local fire defense capability. And that's not doing away with suppression. You keep good suppression all across the country. Fires are not going to end tomorrow. But as you know, we're up to 85 percent now of our over 3,000 fire deaths annually in the one and two family environment. It was like 70 percent when I got involved. So fires and deaths in one and two families is getting a lot worse, not better, and we need this intervention to make a huge step forward with fire protection in that particular occupancy in this country. So we wrote a document called "Installation of Residential Fire Sprinklers" to ensure reliability because we want to make sure that the installer is qualified to put that system in, that that family, if you will, is getting a system that they can trust and depend on should there be a fire in that home. So that was a critical document and one we used, obviously, in that workshop series. But we wrote another document and it was called "A Tale of Two Cities" and we took places like Scottsdale and Cobb County, Georgia and Napa, California and what Ronny Coleman had done earlier in San Clemente and some of these other communities who had adopted residential sprinklers quite successfully, had all the stakeholders working together and things were going along pretty smooth. And we compared that to, you know, cities that weren't able to move forward with residential sprinklers and kind of did this "Tale of Two Cities" type of thing. And it was able to show, you know, how much more effective could you be in reducing fire deaths and injuries in that particular environment if you were willing to take this other step and put this whole box together in a synergistic way, as I mentioned earlier.

ML: So the old compare and contrast problem solving?

JD: Yeah. Right. We did that with our smoke detector law in Montgomery County and over here in Fairfax years ago when Virginia had their hands tied by the state minimax and we were able to move forward in Maryland without that encumbrance. And Virginia wanted so much to move forward with sprinklers, with – excuse me – smoke detectors. They had to go to Richmond and get enabling piece of legislation for the community to cross the state to do smoke detectors. So, again, politics is sometimes in the way. Hopefully education will overcome that like it did in the

smoke detector era with the whole residential sprinkler movement, if you will. Well, you know, I came from the suppression background. I got to tell you, for 17 years I thought it all started when the bell went off in the fire station. I talked earlier about getting into the Bureau and becoming mature about what's going on and having seen so many disastrous, ugly things through all your suppression years, and you begin to realize that that's not how it works. You got to start the clock at ignition so if you got a fire in a house at three o'clock in the morning there's some lapse time before anybody even discovers we got a fire, then there's even more lapse time in somehow reporting the fire. It may be 911 on the phone, maybe running around the neighborhood yelling, "Fire!", who knows? But that's all lapse time before the bell goes off in the station and if the best fire departments in America under the best circumstances even have a minimum response time of, say, five minutes or less, if you take the aggregate of that, the best study we ever did in America puts it out around 14, 15, 16 minutes. Well, people today are dying in homes by something that's called "flashover" with modern fire load furnishings and whatever happening certainly well less now than that five minutes. So it's not a matter of how good or how bad your fire department is, it's a matter of them not being able to beat the clock often enough to save the life in that home and to some extent to save that piece of property. You know, they're just face with a time relationship that is impossible to overcome. Good example: Every once in a while, you read about a child dying in a house across the street from the fire station. The whole town's in an uproar. "What's wrong with our fire department?" Nothing. They couldn't beat that clock. That child was probably dead before that bell went off in that station. So this whole time thing's so incredibly important. We developed a very rough chart of that which we used in a workshop or whatever. We handed it off to some people. We gave it to Tom Lee out in Illinois who, with the Illinois Fire Sprinkler Advisory Board, has done wonders with communities with residential sprinklers in the Chicago area. And they took it and they fancied it up into what most people are using today, much to their credit. And it just shows the layperson and the...the public policy person, if you will, what we're really dealing with as it relates to time. It's an impossible situation for this fire department.

ML: I think it's an excellent educational visual. You have this algorithm of the time and then you plug in the things like smoke alarm activation and sprinkler activation and then plug in how much later, you know, your suppression forces are.

JD: You can plug in the public education things, too, right?

ML: Right. Exactly.

JD: You know, the EDITH thing, Exit Drill in the Home. Everybody should gather in one place and count up the heads, make sure everybody's out. So, again, it's kind of the synergy of education, early warning, suppression. They've all done good things independently, but used together, the sum of those parts is where we need to get in the future. Obviously, when you get out into rural America that clock that we were just talking about can change awful radically, even beyond those times that I'd talked about. But as it relates to Fire Team USA, there was another young man, a guy named Shane Ray, who was the volunteer chief, as you know, in a little place called Pleasantview, Tennessee outside of Nashville that wrote his Executive Officer paper out at the National Fire Academy on this whole business of survey and fire chiefs and what they saw to be the road blocks and why wouldn't they be moving forward with this prevention and whatever. And it was a really quality document. I'm sure it got good grades at the Academy. But we plugged that paper and Fire Chief Ray into the Fire Team workshop series and the early

team that went out there were Vickie Pritchett, Shane Ray, myself, John Corso from National Fire Sprinkler Association doing the little technical piece. We called it “Residential Sprinklers Aren’t Rocket Science” and that went into the whole installation thing. It’s really not that difficult or expensive as some people would like to make it out to be and a guy named Wayne Waggoner represented the Tennessee Fire Safety Inspectors Association. We took that five person team out there and created that day and a half workshop. We also did a side by side live burn with the local fire department’s assistance, whatever. Many times, again, with the assistance of Tom Lee and that gang in Illinois who really perfected that. We used all of the Home Fire Sprinkler Coalition and Education materials, which were purely done for the end user, and went and delivered a pretty dag gone workshop at a day and a half for a mixed audience. The fire people, the building official, the water purveyor, the public policy person, other stakeholders that would be involved in not only the decision at the community level to adopt residential fire sprinklers as part of the total fire protection offering but that would have a part afterwards in making sure it was successful.

ML: You had talked about some of the work that northern Illinois people had done with the side by side fires and it makes me think of...of...of the visual representation of...of...of...of fire and how sprinklers can impact that. And of course early on in your days of Operation: Life Safety, there was some...a new innovation, some trailers. Can you talk about that...that concept and what the thought pattern was behind, you know, what was the usefulness of the trailers, the sprinkler trailers?

JD: Well, actually it preceded Operation: Life Safety, Mike. I mentioned earlier the Airlie National Fire Education Conferences and it gradually moved from Airlie to accommodate more people. The International Society of Fire Service Instructors got a contract from the U.S. Fire Administration to broaden that conference out. So we had several in Chrystal City, as you remember, in the Hyatt and the Marriott there. And I had left Montgomery County and I was up at USFA at the time, but provided to them, not working as a federal employee, by the Society of Instructors. And as we were working towards the delivery of one of those national education conferences and this residential sprinkler thing was kind of coming along at the same time, somebody got the bright idea, Eddie Wall, at USFA in those days, and Jimmy Coyle, along with Eddie McCormack at ISFSI, that maybe we needed a visual to show people, you know, the generation of fire and how quick this fast response link would operate and extinguish that fire. So, we were able to get an old trailer from USFA. Of course, it had gone under FEMA at the time. We’d got an old trailer from FEMA and we used it at the Fire Safety Education Conference at the Hyatt in Chrystal City, I’m going to guess that was, oh, Lord, 1984 maybe, maybe ’85, whatever it was. And then a trailer was outfitted for each of the ten FEMA regions. And those trailers kind of ran the wheels off for a little while, then gradually people started building their own with the help of industry and U.S. Fire Administration and whatever. And that trailer demonstration really preceded the side by side burn, which has become so popular today.

ML: You’ve written and spoken many, many times about the history of the residential fire sprinkler evolution and revolution. Can you talk a little bit more about the two of those concepts and what they mean to you?

JD: Well, first of all, I have...I have a document called “A History of Residential Sprinklers in America” and I probably ought to expand it and get it published somewhere, which makes me so excited about doing this here today for the U.S. Fire Administration because I congratulate them

on stepping forward and interviewing, before me, a lot of the key players and hopefully when they get this thing together and they get it in the library up there and it can be used in the Executive Fire Officer and other classes at USFA, that'll help expand the whole knowledge base. But, you know, honestly, some years ago, a line got drawn in the sand between the home building industry and the United States Fire Service and the home building industry just kind of decided "we're not going to do this thing". And the fire service has kept pushing on it. So as the technology has evolved and as we've evolved into more communities moving forward and then gradually, eventually evolved into an actual requirement and a code, the revolution side hasn't really gone away. It's still, what I call, the "Battle of the Politics of Life Safety" out there. Again, I certainly would like to think that, if we stay the course, that more education and rhetoric across the aisles between the home building industry and the fire service can get us somewhere to where perhaps this intervention would be more accepted. And I think when we get to there, I think we will show that we then will be capable of a major, major reduction in what still is an unacceptable set of data as it relates to one and two family fires and fire deaths and injuries in America.

ML: The whole concept of community interaction and education seemed to...seemed to occur around the time when...when Operation: Life Safety was doing workshops and so on. Prince George's County did an interesting concept where they appointed a task force of stakeholders in the community very much like what is in your guideline you had...had participated in writing for getting residential sprinklers in a community. Can you talk about Prince George's County's experience with the stakeholders and task force that Chief Estep put together?

JD: Well, certainly a tremendous amount of credit for the leadership goes to Chief Jim Estep and then subsequent of that, you know, we just had a succession of really dedicated fire marshals, chief engineer, and then the Bureau was, you know, out on the front of the wave. Everybody was working together and they were able to, as kind of I described to you at one point, kind of reach the skids a little bit because there's a tendency at the community level to think "Oh, well now we got to hire all of these new plan reviewers, you know, and maybe the plan review process is going to be turned over from the fire department to the building inspector and he doesn't know how to inspect the residential fire sprinklers," and what on and whatever. So with that express design system that they integrated, they even had a little template that they would give the building inspector, you know, who might see, "Well, I see a plan here and the sprinkler's actually six or eight inches over here." You know, you put the template up. If it's in the template, it's okay. Everything's fine, what have you. And those kinds of innovative things that they developed and put to work in that county we were then able to share with other people. For example, if you go to put 50 houses on a track, you're probably only building really five different models, you don't have to plan and review 50 houses, you do those five and you got a little process where, if there's major changes physically to the interior of the house, you might have to do a little change order or something. But it was a lot simpler because people in Prince George's County and others, you know, learned how to make it work well and then we at Operation: Life Safety shared all of those good things with other people so that they didn't have to rediscover America, if you will.

ML: So Prince George's County changed their business practices to improve, you know, that whole operation and...and of course you mentioned the express process that...that to reduce the time it took to get to a permit and those kind of things. Some real innovations at the time. But

they also had some incentives in the community and certainly others have taken advantage of incentives to promote sprinklers as well as some of the other things you can do. Can you talk about some of the incentives that you believe in?

JD: Well, those are some things, Mike, that we kind of coined, created, if you will. Harry Shaw had a great mind for that kind of thing and just like we did that time versus combustion chart, which was so helpful later on with the layperson or the public policy person. We began to think about what is it you could do, development wise, when you are going to put 50, 70, 100 homes on what was a vacant track. And, well, you know, things like reducing street width, perhaps, saving a lot of money on pavement, main size, hydrant distances. Every fire code in America, like ours in Montgomery, had that dead end radius turn around because we never learned how to back up fire trucks, right, we needed that big radius. So you could go to a T turn around and save a lot of pavement there. Set back; we could put the houses a little closer together, which gave you more density on the track. All of these things together saved a tremendous amount of money for the developer which probably pretty much bought the money to sprinkler the 50, 70, 100 homes you're going to put on that track. So people again, like Prince George's, Maryland and of course a lot of others did too, grabbed a hold of these things and actually wrote them into their actual residential sprinkler ordinance, put them to work successfully, and then these things were adopted by other people across the country as we worked then, subsequently, with them as Operation: Life Safety out across the country.

ML: And as a result, thousands of homes in Prince George's County have residential sprinklers in them and they...it has an impact there, there's no doubt about it. What do you think is...is Jim Dalton's forecast for sprinkler future, residential sprinkler future? Where...where.... Are we going to get through this line in the sand? What are...what are some of the things that have to happen?

JD: Well, you know, I'd like to think so. Again, I keep going back to education and I just believe that if you keep pounding away at that, sooner or later somebody's light goes on and they listen, whether those be public policy people at the state and local level that realize that this is a necessity. But, you know, everywhere I go on Capitol Hill, all I hear about is how broke we are in America, not just at the federal level but at the state level, at the community level. There's some severe, severe problems out there today with economics and I don't think we're getting ready to do away with fire protection offered in the traditional manner like this red truck sitting behind us. That's going to be needed for a long, long time. But I think, maybe, public policy people at the community level, city managers type folks, are beginning to kind of think a little bit about the future of the economy at the local level. And as I said earlier, that little fast response link does the same thing, ultimately, as this big enterprise of firefighting that we fund at the community level. You know, it puts the wet stuff on the red stuff, but it does it right now, very efficiently, very effectively, and I just got to think, at some point, people will begin to realize that the future of fire protection America may gradually have to change a little bit over the long term. And this residential sprinkler link is probably the key in integrating that into our total fire defense capability at the community level. Every report we've ever written in America says fire is a local problem, needs local solutions. So, regardless of what the thinking might be at the federal and state local, sooner or later, I think at the community level, public policy people led by good city managers and mayors and what have you are going to realize that it's just a better way to do it, more efficient, more effective, but it's also a more economical way to do it.

ML: Reflecting back, as Jim Dalton, what are some of the things, a few things, that you're most proud of in regard to this whole effort in promoting residential fire sprinklers?

JD: Well, I guess you got to start before that, Mike. I mean, I've been blessed with a 52 year career, I work for, as you know, one of the great innovative fire chiefs in the country, and Dave Gratz, then for Warren Isman for seven or eight years, another real innovator, what have you. I have the great pleasure of working up in the Fire Administration for a while. I had the great pleasure of being introduced to the Intervention of Public Fire Safety Education, then implementing that very comprehensive smoke detector law and gradually working into and adopting this whole residential fire sprinkler thing. So...so I just been kind of blessed to...to have my career span these tremendous advances and interventions that have the individual ability to have a major affect on the fire problem. And I guess the one thing I'd like to see before I pass on is this synergy I talked about earlier. Realize how good each one of them is, but how much better they are taken in total, used in synergy, the sum of parts being better than others, integrated into the public fire protection offering at the community level. And I think at some point, hopefully, able to make another major dent. And it...what...It's still.... The numbers don't lie. I mean, when you're still...we're now up to 85 percent of our fire deaths in one and two family dwellings. We've protected through all of our codes where almost every other occupancy you can think about. Why would we send the family home to the place they're most likely to die in a fire and not give them protection. So, down the road, I think, hopefully, sound minds will prevail and folks will stay the course and I think we'll get there.

ML: Well, I – we've – talked a lot...

JD: We talked a lot.

ML: ...of the last 30, 40 years of...of residential fire protection and I certainly appreciate your candidness and...

JD: Good to see you again. And, again, I would thank the Fire Administration and all the great people, all those chiefs we talked about earlier that I was privileged to work with through the years and if the Lord lets me stick around a while longer, I'll continue to work for this intervention.

ML: That's great.