



State of Connecticut
Department of Administrative
Services
Division of Construction Services
Office of Education and Data
Management

Group Home New Construction

*Presented by
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Management
Spring 2016 Career Development Series*

Group Home New Construction

- ▶ Introduction
- ▶ Instructor info
- ▶ Agency info

Group Home New Construction

- ▶ What this program is going to cover
 - 2005 code compliant new construction
 - The next code cycle code development
 - Fire Prevention Code
 - DDS initiatives
- ▶ What is it not going to cover
 - Existing



Services for Intellectual Disabilities

- ▶ Historic perspective
 - Almost always Institutional setting
 - Connecticut
 - Mansfield Training School
 - Southbury Training School
 - Regional Centers



Services for Intellectual Disabilities

- ▶ Historically less than favorable conditions
 - Willowbrook: “The Last Disgrace” by Heraldo Rivera, 1972
 - “Are We Gambling with our Retarded Citizens Lives” Fire Journal 1985 (Chief Michael DJ Skurat)



Services for Intellectual Disabilities

- ▶ This generated a call for code changes from the traditional “boarding homes” at the time
 - “Certified” as capable of self preservation
 - Multiple Death fires
 - Inadequate exits
 - Combustible interior finish
 - Unenclosed stairs, lack of staff training
 - Lack of protection systems



Services for Intellectual Disabilities

- ▶ Residential Board and Care
 - In response to the need for code changes
 - Evacuation Scores
 - Home
 - Staff
 - Resident capabilities
 - Assigned Level
 - Prompt
 - Slow
 - Impractical



Fire History

- ▶ The Fire Problem
 - Historically high incident of multiple death fires
 - Area of origins
 - Cooking
 - Smoking
 - Intentional
 - Clothes washer and dryers
 - Heating equipment



- ▶ The Fire Problem
- ▶ In Connecticut
 - Two deaths in one setting
 - Origin and Cause never confirmed
 - Heavy review of cooking equipment
 - Intentionally set fire
 - Sleeping room
 - No injuries
 - Equipment failed



- ▶ How do we know we have a “group home” that falls under the code?
 - How many people are living there?
 - What is their evacuation capability?
 - Nursing Care, Custodial Care?



- ▶ So..... we have three people living here....
- ▶ Some are getting nursing care
- ▶ Some may not be capable of self preservation
- ▶ What am I?



- ▶ But they want to put a sprinkler system in, are you sure?
- ▶ They may have reasons why
 - Licensing
 - Future development (not so much any more)



- ▶ Generally speaking, IRC
- ▶ R-3
- ▶ How can we be sure it remains in this threshold?
 - DDS licensing
 - Other agencies may not have the oversight as DDS does



- ▶ So what is it that we have here?



- ▶ DDS desire
 - I-2
 - R-4's have been problematic



Definitions

- ▶ Boarding House
- ▶ Community Training Homes
- ▶ Group Home Personal Care Services
- ▶ Custodial Care
- ▶ Nursing Home
- ▶ Incapable of Self Preservation
 - 2012 ICC definition
 - 2005 (2003 ICC definition)



Definitions worth discussing

- **Boarding House:** A building arranged or used for lodging for compensation, with or without meals and not occupied as a single family unit
- DDS term: **Community Training Homes** –does not quite meet it
- Use Group
 - R-1 when not more than 30 days
 - R-2 when they stay more than 30 days

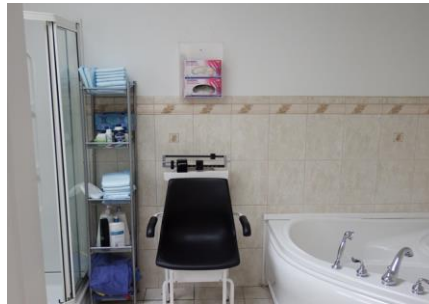


- **Group Home**
 - “A facility for social rehabilitation, substance abuse or mental health problems that contains a group housing arrangement that provides custodial care but does not provide acute care”
 - I-1 and R-4 lists Group Homes under their sections of the code
 - However– Capable of Self Preservation? If so, how about 5 years from now? What then?



- **Personal Care Services**

- The care of persons who do not require medical care. Personal Care involves responsibility for the safety of the persons while inside the building



- **Custodial Care**

- Assistance with day to day living tasks; such as assistance with cooking, taking medication, bathing, using toilet facilities, and other tasks of daily living. Custodial Care include occupants who evacuate at a slower rate and/or who have mental and psychiatric complications
- I-1 or R-4 works....
- Sounds like we found the definition.... But what if they are incapable of self preservation?

- **Nursing Home**

- Facilities that provide care, including both intermediate care facilities and skilled nursing facilities where any of the persons are incapable of self preservation



- ▶ **Incapable of Self Preservation**

- 2012 ICC definition: Persons because of age, physical limitations, chemical dependency, mental limitations, or medical treatment who cannot respond as an individual to an emergency situation
- 2005 (2003 ICC) definition is different; (term– Self Preservation) “The occupants are capable of responding to an emergency situation without physical assistance”

DDS Philosophy in New Home Development

- ▶ An option to age in place, this is their home, in a regular home in a regular neighborhood
 - What happens when the 55 year old has a life changing medical condition that affects their ambulation ability?
 - Aging has an effect on ability of self preservation



- ▶ I-2 seems to work the best
- ▶ We do have some R-4 that pop up



2005 CT Code I-2 Use Group

- ▶ Why the I-2
 - Incapable of self preservation issue
 - Debates on how many that are incapable generates a use group change
 - As we proceed remember that this program is about Group Home development, not nursing homes.



2005 CT Codes

- ▶ Height and Area:
 - Remember that the developers are trying to have a regular home in a regular neighborhood, generally purchasing existing housing stock
 - Type V construction limited to V-A
 - V-B is not permitted



▶ Sprinkler Protection

- 407.12.1 (SBC) requires a NFPA 13 system to be installed (ref 903.3.1.1)
- Quick response or Residential heads
- The historical use of 13D or 13R is not referenced to be used.
- In neighborhoods that lack municipal water requires stored water, fire pump, generator



▶ Outside door or window

- Required for every sleeping room



▶ Interior finish

- Based on a sprinkler protected facility
- Class B for all vertical exits, exit access corridors and other exit ways, as well as all rooms and exit passageways
- Class C permitted in administrative areas and in rooms with a capacity of four or less
 - Sleeping room with less than four in the room, Class C okay



▶ Fire Alarm (SBC 907.2.6)

- Manual fire alarm boxes are generally required at exits
 - Nursing station exemption applicable
- Electrically Supervised
- Smoke Detection
 - May not be required in the corridors
 - UL268 system with corridor visualization
 - Patient sleeping room doors with integral smoke detection
- Emergency Forces Notification– Required 9.7.9.3



▶ Means of Egress

- Illumination required
- Emergency power illumination required
- Minimum door width 32" unless there is bed movement and then 41 ½"
- Access controlled locks not permitted (they may look for a mod)
- Delayed egress is permitted with all of the code requirements

▶ Means of Egress

- Ramps not permitted- sloped walkways (SBC 1022) for exterior

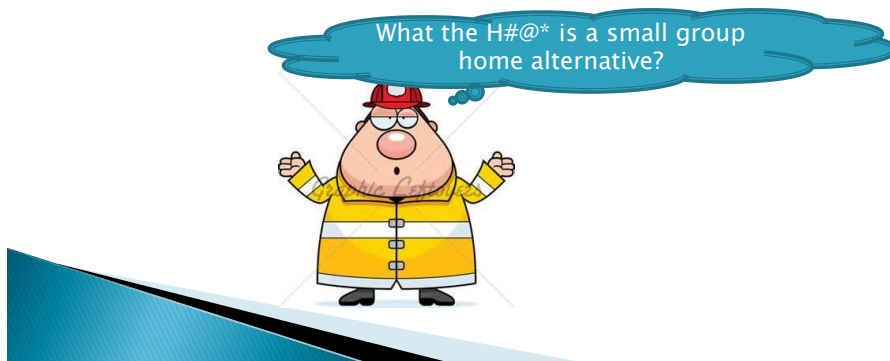


◦ **

What if it is a small home?

Current (2005 code) provides some relief to the developers for a small home

Ct SBC 407.12 “Small Group Home Alternative”



Small Group Home Alternative

- ▶ A Group I-2 group home that serves four to six persons who are not capable of self preservation that comply with the alternative provisions..... shall be considered as code compliant
- ▶ What are these provisions?



- ▶ Automatic Sprinkler system provisions
 - Allows for the 13 D system
 - Key to developing a home in areas without municipal water
 - 30 minutes of water
 - All storage, habitable and occupiable rooms shall be sprinklered
 - Valves to be electrically supervised



- ▶ Height and Area- remains the same
- ▶ Construction type V-A plus interior walls to be covered with 5/8" type X gypsum board
- ▶ Sleeping room walls- Smoke Partitions
- ▶ Sleeping room doors- 20 minute and self closing or auto closing



- ▶ Means of Egress– in addition to Chapter 10, all client sleeping rooms shall have a door leading directly to the exterior at the level of exit discharge
- ▶ Exit signs may not be required
- ▶ Fire alarm compliant with the core components of I-2 plus single or multiple station detectors that are interconnected



Current Small Group Homes

- ▶ Current Code



▶ Problems encountered

- Difficult to take an existing home from the housing stock to create an I-2
 - Type V-A construction
 - NFPA 13 system
 - Construction costs close to 1 million for a home to serve 4 to 6 people



▶ Problems encountered

- Difficult to take and make a Small Group Home Alternative
 - Type V-A with the 5/8" Type X gypsum
 - Requires a demo of the entire house
 - Doors to the exterior from the sleeping rooms
 - Elopement issues
 - Square footage in the sleeping rooms required to be bigger due to two doors required
 - Inability to use ramps
 - Existing homes with a ramp required excessive landscaping to replace the ramps at times



▶ Problems encountered

- Attached garages– what do we do with them, 13D does not cover garages, it could be used for storage. Most garages are not candidates for single dry heads
- Finished basements

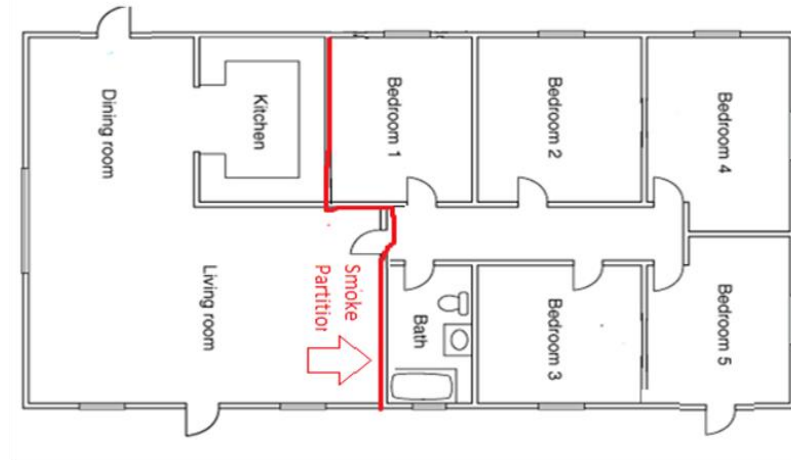


Mod approach

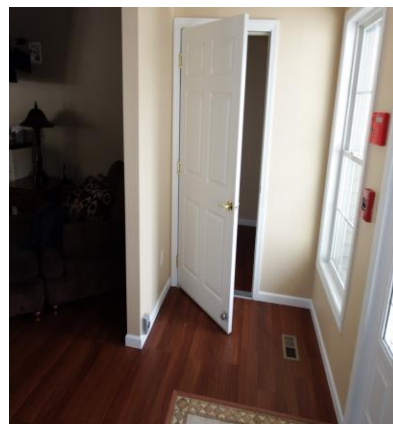
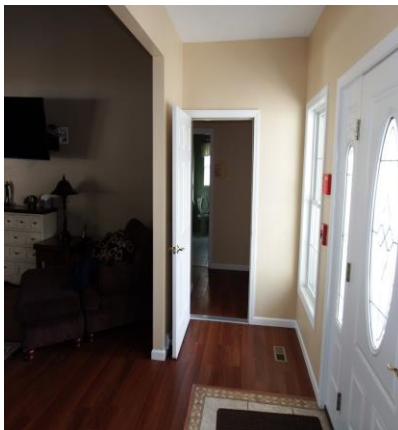
- ▶ Modification created to address the problems
 - Allowed for V-B construction
 - Created a smoke separation between the sleeping room areas and the rest of the house
 - No longer required door to exterior from each sleeping room but one from the corridor via a non lockable space and MoE windows
 - Attic protection
 - Attic access for emergency forces

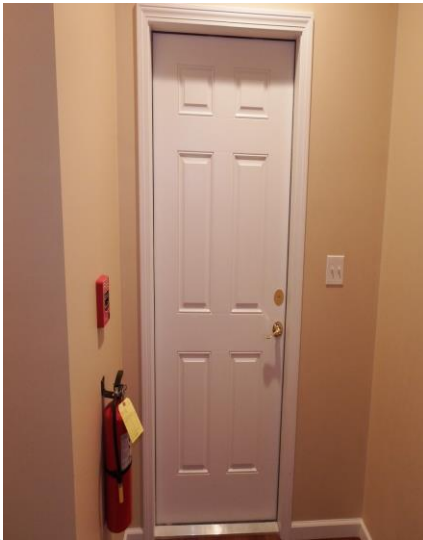
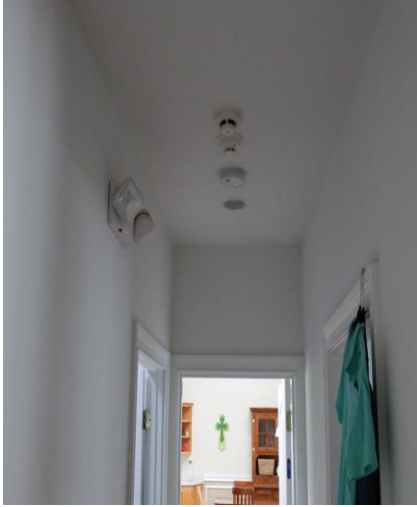


Modified Small Group Home



Modified approach



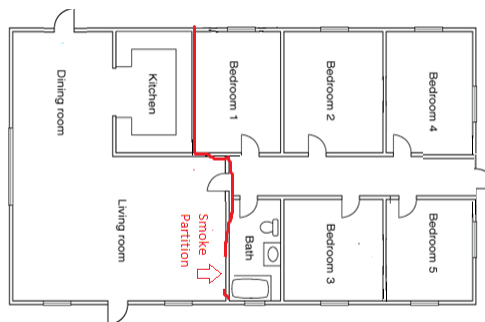




2012 ICC codes

- ▶ New Code
- ▶ 407.13 “ Small I-2Homes”
 - Addressed many of the identified problems
 - Cleaned up some issues with the “mod” approach

- 5/12 ilust. issue



Next Code Cycle

- ▶ New “Small I-2 Homes”
- ▶ Height and Area: Chapter 5 and 6 remain
- ▶ Type V-B is permitted



Next Code Cycle

- ▶ Type V-B permitted when
 - Limited to a single story dwelling
 - Not more than 4500 square feet
 - Attic space is protected either by heat detection or sprinkler protection
 - And is connected to the building fire alarm system



Next Code Cycle

- ▶ Door sizes
 - Minimum width of all doors shall provide a clear width of 34 inches
 - Measuring of the clear width of door ways with swinging doors shall be measured between the face of the door and the stop with the door open 90 degrees



Next Code Cycle

- ▶ Door latches
 - Every door to closets, storage areas and other similar spaces need to be openable from the inside
 - Client sleeping room and bathroom doors– shall be designed to allow the opening from the inside and a opening device be accessible to the staff in an emergency



Next Code Cycle

- ▶ Exterior Ramps
 - Will be permitted in accordance with section 1026 of the SBC
- ▶ Means of Escape–
 - In addition to Chapter 10, the sleeping rooms shall have means of escape windows– in accordance with SBC 1029



Next Code Cycle

- ▶ Sleeping room walls
 - Smoke walls separating the room from the hallway and other habitable areas
 - Does not need to be continuous through a concealed space and through the ceiling



Next Code Cycle

- ▶ Sleeping Area Separation
 - Requires a door to the exterior from the created “wing”
 - Door needs to be at the level of exit discharge
 - A smoke partition
 - Separates the sleeping rooms from the common areas
 - 20 minute door
 - Self closing or automatic closing



Next Code Cycle

- ▶ Automatic fire sprinkler system
 - Enhanced 13D or 13R
 - 30 minutes of water minimum
 - Design area, 2 heads @ 13 gpm X 30 minutes
 - All storage, habitable and occupiable rooms



Next Code Cycle

- ▶ Garage exception:
 - Unheated garages may be code compliant without sprinkler protection with
 - 1 hour resistive construction
 - 45 minute opening protection
 - Heat detection connected to the building fire alarm



- ▶ Laundry Rooms
 - Table 704 requirements
 - 100 sq. feet apply to the “footprint” of the appliances



Next Code Cycle

- ▶ Fire Alarm and detection system
 - System required
 - Detection required
 - Smokes– all sleeping rooms and common spaces
 - EXCEPT kitchens and bathrooms
 - Heat Detection as required elsewhere in this section
 - Attic space, garages, etc...
- ▶ Carbon Monoxide
 - Battery operated okay



Next Code Cycle

- ▶ Attic space access
 - Required
 - 36 X 36
 - Unless existing single family home, then 30 X 22



Next Code Cycle

- ▶ Standby power
 - Required- standby only



Operational Issues



Operational issues, fire prevention code

- ▶ 13 D sprinkler systems (CSFPC 13.3.3.2.1)
 - Required for monthly maintenance
 - Visual for sprinkler obstruction
 - Valves are open
 - Air Pressure for dry systems
 - Water level



- ▶ 13D sprinkler systems cont'd
 - Required quarterly maintenance
 - Test all water flow alarms
 - Testing of alarm system
 - Damaged or painted heads....
- ▶ 13R– in accordance with NFPA 25



▶ Fire Extinguishers

- Required– number determined by NFPA 10
- DDS regulations require 2
 - Kitchen, Basement
- Tags
 - Occasionally may be approached to remove the tags and place them with the fire plan



▶ Means of Egress

▶ Delayed egress locking

- Unlocks for any of these conditions
 - Sprinkler activation
 - Not more than one heat detector
 - Not more than 2 smoke detectors
 - Loss of power



▶ Unlocking conditions cont'd

- Irreversible process unlocks within 15 seconds
 - With specific reqm'ts
 - Sounds a local alarm
 - Relocking has to be manually done
- Sign Requirements
 - **“PUSH UNTIL ALARM SOUNDS, DOOR CAN BE OPENED IN 15 SECONDS”**
 - The signage has been problematic at times
 - The locking mechanism as well




Fire Plans (CSFPC 20.4 / 10.9)

Evacuation and Relocation Plans


“The administration of every health care occupancy shall have in effect and available to all supervisory personnel written copies of a plan for the protection of all persons in the event of a fire, for their evacuation to areas of refuge and for their evacuation from the building when necessary”



Fire Plans

- ▶ GIN 97-02
 - ▶ The GIN talks about “for keeping persons in place”
 - ▶ No “Areas of Refuge”
 - ▶ Small I-2 Home we cannot “defend in place”
 - ▶ Conceptually a temporary action taken, aka “Staged Evacuation”
- 

Fire Plans

- ▶ Plan requirements (10.9.2)
 - Procedures for reporting of emergencies
 - Occupant and staff response to emergencies
 - Evac procedures appropriate to the home
 - Design and conduct of fire drills
 - Type and coverage of fire protection systems
 - Other items required by the AHJ
- 

Fire Plans

- ▶ Plan requirements (20.4.2.2.2)
 - Use of alarms
 - Transmission to the FD
 - Emergency Phone Call to the FD
 - Response to alarms
 - Isolation of Fires
 - Evacuation of immediate areas
 - Evacuation of smoke compartment
 - Prep for evacuation
 - Extinguishment

<http://www.ct.gov/ddc/cwp/view.asp?a=12&q=440280>



STATE OF CONNECTICUT
DEPARTMENT OF
DEVELOPMENTAL SERVICES

Fire Safety and Emergency Guidelines



DBS

Issued March 2004
Reviewed and Revised 7/09
Reissued August, 2009

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The screenshot shows the DBS website with the following content:

- DBS DEPARTMENT OF DEVELOPMENTAL SERVICES**
- Fire Safety, Training and Awareness**
- Fire Safety, Training and Awareness**
- The Department of Developmental Services (DBS) was awarded a grant by the Federal Emergency Management Agency (FEMA) for its Fire Safety, Training and Awareness. In collaboration with the Connecticut Fire Academy and University of Connecticut Health Center, the department produced the Fire Safety, Training and Awareness Manual for public and private sector employees and the other for individuals and families.
- The manual is available through the DBS website, the department and regional offices of Connecticut Emergency Management and Homeland Security.
- Make: Check Copying (CC) allow people with hearing disabilities to use the video and have the audio displayed on the screen. When viewing the video, the CC button is in the bottom left hand corner. When you click on the button video, the audio is in English and the CC is in Spanish.**
- Fire Safety Training Introduction (Video)**
- Fire Safety Training for Individuals and Families (Manual)**
- Fire Safety Training and Information for Support Staff (Manual)**
- Fire Prevention and Safety, Fire Drills**
- Fire Prevention and Safety, Training Manual**
- Fire of Life Program**
- DBS Fire Safety & Emergency Guidelines**
- Safety Handbook on Child Locking Arrangements**
- DBS Home

Fire Plans

- ▶ Can they perform to the fire plan?
 - What is the order of removal?
 - Does it meet the needs of the home and the people who live there?
 - Recent experiences
 - 3rd shift drill findings
 - FD arrival findings
 - Strict order of removal that does not meet the needs of the home



Fire Plans

- ▶ “All employees shall be periodically instructed and kept informed with respect to their duties under the plan”
 - Does the drill report indicate compliance with the plan?
 - Recent findings staff did not know how to operate fire alarm panel for the drill-??????
 - New staff on a different shift?
 - DDS requires annual fire safety training
 - Drills are an opportunity for refresher on their plan



Fire Plans– Drills

- ▶ Drills shall include the transmission of a fire alarm signal and simulation of emergency fire conditions
 - Improves drill times
 - Keeps training current

- ▶ Drills required to be quarterly on each shift




Fire Plans– Drills


- ▶ IFC 2012-401.7
- ▶ “an unplanned evacuation may not substitute for a required drill”
- ▶ NOT APPLICABLE



Fire Plans– Procedures in Case of Fire

- ▶ Fire Plan should reflect
 - ▶ 1) Removal of those directly involved with the fire emergency
 - ▶ 2) Transmission of the fire alarm
 - ▶ 3) Confinement by closing doors
 - ▶ 4) Relocation, staged evacuation, total evacuation.... Aka
 - ▶ The RACE Plan
- 

Fire Plans– Smoking

- ▶ Required to have a regulation
 - Prohibition in areas of flammable liquids, combustible gasses, and oxygen with signage
 - Where building prohibits smoking– signage at major entrances
 - Smoking by occupants classified as not responsible smoking shall be prohibited unless under direct supervision
 - Noncombustible and safe ashtrays
- 

Other

- ▶ Rated curtains, traditional health care applications
- ▶ Combustible decoration prohibited except
 - Retardant/ treated, 701 approved etc.
 - Photos, paintings etc.. applied to walls ceilings and non rated doors shall
 - Not interfere with door latching
 - Less than 30% of the surface



Other

- ▶ Linen and trash containers have requirements– 32 gallon size
- ▶ Clean waste and record recycling awaiting destruction limited to 96 gallon container
- ▶ Portable Space Heating Devices
 - Prohibited..... unless both of the following are met
 - Non sleeping staff and employee area
 - The heating element does not exceed 212 degrees



Items that have been wrestled with

- ▶ Group Home (pre 2005= Res Board and Care)
 - Wants to add square footage for another sleeping room
 - Wants to perform interior renovations to repurpose the room to add a sleeping room
 - What does the design professional design to?



Items that have been wrestled with

- ▶ Pre 2005 group home recently had a reduction in census to less than 4.
- ▶ It stays that way for a couple of years
- ▶ They have maintained the house for these two years in accordance with Part 4 and CFPC
- ▶ They now want to add two people to make it a five bed home
- ▶ Part 3 (I-2 or R-4) or Part 4 (Res B/C)



Items that have been wrestled with

- ▶ Part 4 is acceptable
- ▶ DDS will be maintaining the licenses as a regulated structure



Problems out there

- ▶ DDS is responsive to the safety concerns
- ▶ Quality Management, Licensing
- ▶ STS FD- in cooperation with the OSFM

- ▶ If we go out (all hours, all shifts), the local FM is notified, follow up is provided
- ▶ Reports to QM, DDS Region, Provider, OSFM and AHJ as applicable



Summary

- ▶ Extensive history
- ▶ 3 bed homes, single family, still presents with concerns but limited jurisdiction
- ▶ R-4 a possible answer for a home design
- ▶ DDS avoids due to the self preservation issue
- ▶ I-2
- ▶ I-2 Small Group Home Alternative
- ▶ I-2 SGHA mod
- ▶ NEW Small I-2 Home coming to a family of codes.... Some time soon



Thank you

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