

Post Disaster Floodplain Administrator Response – 2 Hours

"We knew there had been floods, but water had never gotten into the house."

the stilled

"That's what happened in January 1996, when one of the worst floods the area has ever had swept through the village."



1 Time

"The village was among the areas hit hardest by flooding in June 2006."

It's happened, maybe again, and you're too young to retire. Now what?

Floodplain 101 in Two Slides

- NO BASEMENTS
- Studied Floodplains: Lowest floor at least 2 ft above BFE Coastal V Zones: Lowest structural member at least 2 ft above BFE
- Unstudied Floodplains: Lowest floor at least 3 ft above highest adjacent grade,
- Almost all Development Requires Permits
- Floodway Development Requires Study

NYS Building Standards and Codes, 2016 Uniform Code Supplement: R322.1.4.1 and 1.4.2 for residential construction; 1612.4.1 for all other construction; FEMA, 44 CFR 60.3b, NYS DEC Model Local Law for 5 Acres/50 Lot Requirement

Slide Two

Storage of Materials may Require Permit

Stuff FLOATS...Anchor Everything!

New Structures Require Elevation Certificates (R322.1.10)

Floodplain Residence May Need Rescue!

Keep the Bulldozer out of the Creek!

Call DEC with Questions

DEC Floodplain Coordinators

Central Office

Main Number: 518-402-8185 floodplain@dec.ny.gov

Kelli Higgins-Roche, CFM David Sherman Brad Wenskoski, CFM (518) 408-0340 – Engineering Assistance (518) 402-8215 (518) 402-8280

Western New York Flood Hub: Assists in Regions 6-9

Mary Binder, CFM

(585) 226-5447





Region 1: Long Island Eric Star, Ryan Porciello 631-444-0423, 631-444-0425 Region 2: New York City Jean Occidental 718-482-4935



AH

BAYOU

Region 3: New Paltz Mark Lewis 845-256-3822 *Region 3: White Plains* Berhanu Gonfa 914-428-2505 ext372 Region 4: Schenectady Tom Blanchard, CFM 518-357-2379

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Region 5: Warrensburg Rob Streeter 518-623-1221 Region 6: Utica Albert Ash 315-793-2358





Region 7: Syracuse Kevin Delaney 315-426-7501 *Region 7: Kirkwood* Dan Fuller, Ben Girtain Plowe 607-775-2545





Region 8: Horseheads Brad Chaffee 607-739-0809 *Region 8: Avon* Karis Manning *585-226-5445* Region 9: Buffalo Jim Vogel 716-851-7070

Flood Damage Response

Mitigation Before the Flood Flood Response Repair and Reconstruction Permit Process Post-Disaster Response Packet NFIP Damage Estimation Requirements



Home Owner Mitigation

Protect wells from contamination

Install sewer backflow valves Raise or floodproof HVAC equipment **Anchor fuel tanks, propane tanks** Raise or floodproof electrical components Dry floodproof building (older construction) Build with flood damage resistant materials



Mitigation Before the Flood

Know your floodplains Issue and Enforce Floodplain Permits Public Awareness and Outreach Develop a Standard Operating Procedure Pre-Event Mitigation Planning



Know Your Floodplain

Use Flood Insurance Rate Map to:

- Issue permits
- Determine number & type of flood prone structures
- Review with emergency officials and community planners
 Don't locate critical facilities in floodplains
 - Emergency access/routes should not pass through floodplains





Issue and Enforce Permits

Review application, plans & specifications

- Check flood elevation on plans (R322.1.4)
- Check datum NGVD 29 vs. NAVD 88

Require Elevation Certificate (R322.1.10)

Prepared by design professional

Inspections

• After foundation is prepared but before walls go up



Public Awareness and Outreach

Increase Public Awareness

- Newspaper Articles
- Community Website
- Other media forms
- Road Signs

"Turn Around Don't Drown" FEMA publications



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Standard Operating Procedure

- Coordinate with other officials
- County EMO
- Local responders
- Other municipal departments
 Share flood map information with others
 Stockpile supply of information materials
- Fact sheets
- Press releases
- Permit forms



Pre-Event Mitigation Planning

- Hazard Mitigation Plan Identify Mitigation Projects
- Buyouts
- Move
- Elevate
- Floodproof

Prepare Draft Mitigation Proposals Funding: HMGP, PDM, FMA, CDBG



Flood Response

- Contact County Emergency Management
- **Document Flooding**
- Pictures, pictures, pictures!
- **Document Damage**
- More pictures!!
- Notify Public of Need for Building Permits
- Consider Moratorium on New Building Permits
- Non-Flood Related Projects



Conservation

STATE OF

Document Flooding

- High water marks
- Measure depth
- Document location
 Extend of flooding
 Use data to:
- Verify existing flood maps
- Calibrate flood models
- Document unmapped flood prone areas











Document Damage

Site address or location (GPS coordinates)

Water level in structure

Note building type

- One or two or more stories
- With or without basement
- Split level
- Mobile home

Preliminary damage assessment

- Affected habitable (Green Tag)
- Minor (Yellow Tag no substantial damage)
- Major (Yellow Tag substantial damage)
- Destroyed (Red Tag)









Local Permits Required for Repair or Reconstruction of Flood-Damaged Structures



Notify Public of Need for Permit for Repair/Reconstruction

Public Notification

- Newspapers
- Radio
- Television
- Website
- Emergency Shelters
- FEMA Disaster Centers

Direct Notification

- "Red Tag" individual damaged structures
- Notification letters to Property Owners



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Repair and Reconstruction Permit Process

Determine Floodplain Status Determine Extend of Damage Flood Damage Prevention Law Requirements NYS Building Code Requirements Document Retention



Floodplain Status

- Located outside the floodplain
- B or shaded X zone (500-year floodplain)
- C or X zone (no floodplain) Located inside the floodplain
- A zone (floodplain but no elevation data)
- A1-A99 or AE zone (has elevation data)
- AH or AO zone (areas of shallow flooding)
- VE zone (coastal zone with wave runup) Located in or out of the floodway







Older "Flat" Maps



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← → C 🗋 msc.fema.gov/portal

🔛 Apps 📋 Chrome 🧰 Imported 📋 CIS 📋 Community Overview

🐮 FEMA

FEMA Flood Map Service X

Navigation

Q Search

Canguages

MSC Home

MSC Search by Address

MSC Search All Product

 MSC Products and Tools Hazus

LOMC Batch Files

Product Availability

MSC Prequently Asked Questions (FAQs)

MSC Email Subscriptions

Contact MSC Help

FEMA Flood Map Service Center : Welcome!

Looking for a Flood Map? @

Enter an address, a place, or longitude/latitude coordinates:

Enter an address, a place, or longitude/latitude coordinate: Search

Looking for more than just a current flood map?

Visit Search All Products to access the full range of flood risk products for your community.



About Flood Map Service Center

The FEMA Flood Map Service Center (MSC) is the official public source for flood hazard information produced in support of the National Flood Insurance Program (NFIP). Use the MSC to find your official flood map, access a range of other flood hazard products, and take advantage of tools for better understanding flood risk.

FEMA flood maps are continually updated through a variety of processes. Effective information that you download or print from this site may change or become superseded by new maps over time. For additional information, please see the <u>Flood</u> <u>Hazard Mapping Updates Overview Fact Sheet</u>

Announcements

Register for the Hazus Conference and Submit Your Abstract! Registration for the 9th Annual Hazus Conference is now open. The conference will take place from November 7-9, 2016 in Charleston, SC. Check out the conference website for details: www.hazusconference.com. Be sure to submit an abstract to become a presenter at the conference as well. You can find more details under the <u>Abstract Submission</u> section of the conference website. Feel free to reach out to the Hazus Outreach Team with questions at <u>hazus outreach@riskmancds.com</u>.

Historic FIS now available! FEMA's MSC has for the first time exposed historic Flood Insurance Study (FIS) Reports on the



Extent of Damage

- Consistent method of assessment (SDE)
- Previously determined damage assessment
- Substantial Damage
- International Building Code definition, Also FEMA regulations in 44 CFR 59.1:
 - "...damage of any origin sustained by a structure whereby the cost of restoring the structure to its before-damaged condition would equal or exceed 50 percent of the market value of the structure before the damage occurred."


Flood Damage Prevention Law

Local Law

Applies to more than building code

- Schools
- County owned structures
- Agricultural buildings
- Development other than structures
 - = Fill
 - Storage of materials
 - RVs



NYS Building Codes – Using International Building Codes

- International Residential Code: R322
- International Building Code: 1612
- International Mechanical Code
 - Location of mechanical systems, equipment and appliances: duct work, plenum spaces, exhaust openings
- International Plumbing Code
- International Fuel Gas Code
- International Existing Building Code
- NYS Building Standards and Codes: 2016 Uniform Code Supplement
- ASCE 24-14: Flood Resistant Design and Construction



Document Retention

- Floodplain development permit
- **Elevation certificate**
- As built plans or certifications
- Damage assessments
- Inventory of flood-damaged structures
- FEMA Letters of Map Change
- Any other supporting documentation

Post-Disaster Response Packet

Building Classification for Flood Damage Evaluation Building Characteristics Building Damage Flood Forces



Department of Environmental Conservation

Building Classification for Flood Damage Evaluation

Affected habitable

- Basement or 1st floor flooding with no utility impact Minor
- Some living floor damage
- Some utility damage

Major

- Utilities destroyed
- Walls or most of living floor damaged
- Some structural or foundation damage
 Destroyed



Building Characteristics

- Location (in or out of floodplain)
- Age (pre or post FIRM)
- Lowest floor location
- Foundation system
- **Building Materials**
- Quality of construction and maintenance

Building Damage

- Depends on type, severity and duration of flood Supporting soils
- Effects erosion rates
- Ground movement
- **Structural Characteristics**
- Non-reinforced block walls tend to fail
- Quality of Construction





NFIP Damage Estimation Requirements

Depth to Damage Curves

ATC 45 Safety Evaluation of Buildings after Windstorms and Floods

SDE Software

- Data Collection and Field Inspections
- Documentation
- SDE Community Reports





ATC-45 Rapid Evaluation S	afety Assessment Form
Inspection Inspector ID: Affiliation: Areas inspected: Exterior only Exterior	_ Inspection date: ☐ AM ☐ PM _ Inspection time: ☐ AM ☐ PM and interior
Building Description Building name: Address:	Type of Building Mid-rise or high-rise Pre-fabricated Low-rise multi-family One- or two-family dwelling Low-rise commercial
Building contact/phone: Number of stories: "Footprint area" (square feet): Number of residential units:	Primary Occupancy Dwelling Commercial Government Other residential Offices Historic Public assembly Industrial School Emergency services Other:
Evaluation Investigate the building for the conditions below and chect Observed Conditions: Minu Collapse, partial collapse, or building off foundation Building significantly out of plumb or in danger Damage to primary structural members, racking of walls Falling hazard due to nonstructural damage Geotechnical hazard, scour, erosion, slope failure, etc. Electrical lines / fixtures submerged / leaning trees Other (specify) See back of form for further comments.	k the appropriate column. Estimated Building Damage (excluding contents) or/None Moderate Severe (excluding contents) Image: Image of the severe Image of the severe None Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe None Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe Image of the severe I



Posting

Choose a posting based on the evaluation and team judgment. Severe conditions endangering the overall building are grounds for an Unsafe posting. Localized Severe and overall Moderate conditions may allow a Restricted Use posting.

INSPECTED (Green placard)	RESTRICTED USE (Yellow placard)
---------------------------	---------------------------------

UNSAFE (Red placard)

Record any use and entry restrictions exactly as written on placard:

Number of residential units vacated:			
Further Actions Check the boxes belo Barricades needed in the following area	ow only if further act s:	ions are needed.	
 Detailed Evaluation recommended: Substantial Damage determination recommended 	Structural	Geotechnical	Other:
Other recommendations:			
See back of form for further comments.			

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https://www.atcouncil.org/atc-45



Department of Environmental Conservation

Flood Depth to Building Damage



https://planning.erdc.dren.mil/toolbox/library/EGMs/egm04-01.pdf https://planning.erdc.dren.mil/toolbox/library/IWRServer/96-R-12.pdf NEW YORK STATE OF OPPORTUNITY Department of Environmental Conservation

Building D	Building Damage Percent by Building Type (based on replacement value)					
	1 Story	2 Story	Split Level	1 or 2	Split Level	
Flood	without	without	without	Story with	with	Mobile
Depth	Basement	Basement	Basement	Basement	Basement	Home
-	2 0) 0	0	4	3	0
<u> </u>	1 0	0	0	8	5	0
	0 9	5	i 3	11	6	8
	1 14	9	9	15	16	44
	2 22	2 13	13	20	19	63
	3 27	/ 18	25	23	22	73
	4 29	20	27	28	27	78
	5 30	22	28	33	32	80
	6 40	24	33	38	35	81
	7 43	26	i 34	44	36	82
	8 44	29	41	49	44	82
	9 45	i 33	43	51	48	82
1	0 46	ک 38	45	53	50	82
1	1 47	/ 38	46	55	52	82
1	2 48	38	47	57	54	82
1	3 49	38	47	59	56	82
1	4 50	38	47	60	58	82
1	5 50	38	47	60	58	82
1	6 50	38	47	60	58	82

From Flood Insurance Administration 1970s-1980s actuarial data Replacement costs from Marshall & Swift

Data up to 8 feet is considered good. Data over 8 feet is fair



Department of Environmental Conservation

Building Da	Building Damage % by Building Type (depreciated replacement value)					
	1 Story	2 Story	Split Level	1 Story	2 Story	Split Level
Flood	without	without	without	with	with	with
Depth	Basement	Basement	Basement	Basement	Basement	Basement
-2	0	0	0	13.8	10.2	10.4
-1	2.5	3	6.4	19.4	13.9	14.2
0	13.4	9.3	7.2	25.5	17.9	18.5
1	23.3	15.2	9.4	32	22.3	23.2
2	32.1	20.9	12.9	38.7	27	28.2
3	40.1	26.3	17.4	45.5	31.9	33.4
4	47.1	31.4	22.8	52.2	36.9	38.6
5	53.2	36.2	28.9	58.6	41.9	43.8
6	58.6	40.7	35.5	64.5	46.9	48.8
7	63.2	44.9	42.3	69.8	51.8	53.5
8	67.2	48.8	49.2	74.2	56.4	57.8
9	70.5	52.4	56.1	77.7	60.8	61.6
10	73.2	55.7	62.6	80.1	64.8	64.8
11	75.4	58.7	68.6	81.1	68.4	67.2
12	77.2	61.4	73.9	81.1	71.4	68.8
13	78.5	63.8	78.4	81.1	73.7	69.3
14	79.5	65.9	81.7	81.1	75.4	69.3
15	80.2	67.7	83.8	81.1	76.4	69.3
16	80.7	69.2	84.4	81.1	76.4	69.3

From US Army Corps flood damage reduction studies



Substantial Damage Estimator

- FEMA software
- Used to estimate damage
- Flexible
- Insures consistency
- Defendable in court







https://www.fema.gov/media-library/assets/documents/18692



Post Disaster Considerations



can be done when the number of building permit

disaster...what

Atter a

overwhelming?

Courtesy of Bill Walsh

Post Disaster Permitting

Each community needs a coordinated method for rapidly processing large numbers of permits.

And be able to separate substantially damaged structures from those that are not.



The Key?

Plan now, before the disaster

- Pre-disaster planning will ensure compliance with the substantial damage and substantial improvement requirements
- Pre-planning will help reduce disaster victims frustration during a time of trauma and inconvenience





Post Disaster Guidelines

Impose a temporary or short term moratorium for issuing permits

Issue a press release that informs property owners and contractors about the community's substantial damage and substantial improvement requirements 55



Post Disaster Guidelines...

Post disaster inspection teams complete initial damage assessment to determine if the structure is safe for occupancy and:

- If it is obvious that the structure <u>is not</u> substantially damaged or
- If it is uncertain whether or not the structure is substantially damaged
- If it is obvious that the structure is substantially damaged



SUBSTANTIAL DAMAGE

Questions and Answers



Definition of Substantial Improvement

Any reconstruction, rehabilitation, addition, or other improvements of a structure, the cost of which equals or exceeds 50% of the market value of the structure before the "start of construction" of the improvement.

Definition of Substantial Improvement...

This term includes structures which have incurred "substantial damage", regardless of the actual repair work performed.



Definition of Substantial Damage

Damage of any origin sustained by a structure whereby the cost of restoring the structure to its before damaged condition would equal or exceed 50% of the market value of the structure before the damage occurred.





Substantial Improvement or Damage Does Not Include...

Any project for improvement of a structure to correct existing violations of state or local health, sanitary, or safety codes which have been identified by the local code enforcement official and which are the minimum necessary to assure safe living conditions or...



Substantial Improvement or Damage Does Not Include...



Any alteration of an "historic structure", provided that the alteration will not preclude the structure's continued designation as an "historic structure."



Requirements For Substantial Improvement

Substantially improved structures are considered NEW CONSTRUCTION and must meet all of the minimum building standards of the NFIP.



Department of Environmental Conservation

Answers to Questions about Substantially Damaged Buildings/ FEMA 213



Federal Emergency Management Ag Federal Insurance Administration



Answers to Questions About Substantially Damaged Buildings

National Flood Insurance Program Community Assistance Series Federal Emergency Management Agency Federal Insurance Administration May,1991



http://www.fema.gov/library/viewRecord.do?id=1636



Structures That Are Obviously <u>Not</u> Substantially Damaged

These permits can be processed quickly so that owners can repair and reoccupy their structures as soon as possible:

- There is no structural damage
 - -Replacement of saturated items such as insulation, wall board, and carpet



Borderline Structures

Structural damage is visible

Detailed estimates of repair cost and market value are required



Structures That <u>Are</u> Obviously Substantially Damaged

These structures are usually uninhabitable and can not be reoccupied until extensive repairs are made.



Structures That <u>Are</u> Obviously Substantially Damaged...

After a disaster, these permits should be less of a priority than the "borderline" cases:

- Visible, extreme structural damage
 - Structure dislodged from foundation, roof ripped off, collapsed walls

The structure cannot be immediately reoccupied because repair and reconstruction will take a long time

"Tagging" Structures

Each inspected structure gets a tag and identification number:

- Structures that are clearly not substantially damaged, and are safe for occupancy get a green tag
- Structures where it is uncertain whether or not they are substantially damaged and/or safe for occupancy get a yellow tag
- Structures that are clearly substantially damaged ar for are unsafe for occupancy get a red tag



Exercise

Which of the following structures should be green-tagged, yellow-tagged, or red-tagged?














The Four-Step Approach

- 1) Initial Screening
- 2) Detailed Evaluation
- 3) Certified Appraisal on Appeal
- 4) Owner and Contractor Affidavits



Initial Screening

Green Tag structures are clearly not substantially damaged. Red Tag structures are clearly substantially damaged Yellow Tag structures require evaluation

- Use depth/damage table to determine percent damage
- > 40% or < 60% run SDE

OR if wiring got wet then run SDE





Building Damage % by Building Type (depreciated replacement value)								
	1 Story	2 Story	Split Level	1 Story	2 Story	Split Level		
Flood	without	without	without	with	with	with		
Depth	Basement	Basement	Basement	Basement	Basement	Basement		
-2	0	0	0	13.8	10.2	10.4		
-1	2.5	3	6.4	19.4	13.9	14.2		
0	13.4	9.3	7.2	25.5	17.9	18.5		
1	23.3	Not s	Not substantially damagedno need to run SDE					
2	32.1	20.9	12.9	38.7	27	28.2		
3	40.1	26.3	17.4	45.5	31.9	33.4		
4	47.1	31.4	22.8	52.2	36.9	38.6		
5	53.2	36.2	28.9	58.6	41.9	43.8		
6	58.6	40.7	35.5	64.5	46.9	48.8		
7	63.2	44.9	42.3	69.8	51.8	53.5		
8	67.2	48.8	49.2	74.2	56.4	57.8		
9	70.5	52.4	56.1	77.7	60.8	61.6		
10	73.2	55.7	62.6	80.1	64.8	64.8		
11	75.4	58.7	68.6	81.1	68.4	67.2		
12	77.2	61.4	73.9	81.1	71.4	68.8		
13	78.5	63.8	78.4	81.1	73.7	69.3		
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16	80.7	69.2	84.4	81.1	76.4	69.3		

From US Army Corps flood damage reduction studies Data from 1996-2001 (Economic **Guidance Memo** 04-01 & 01-03)





Building Damage % by Building Type (depreciated replacement value)								
	1 Story	2 Story	Split Level	1 Story	2 Story	Split Level		
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Depth	Basement	Basement	Basement	Basement	Basement	Basement		
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0	13.4	9.3	7.2	25.5	17.9	18.5		
1	23.3	15.2	9.4	32	22.3	23.2		
2	32.1	20.9	12.9	38.7	27	28.2		
3	40.1	2 <mark>6.3</mark>	Maybe substar	33.4				
4	47.1	31.4	22.8	52.2	36.9	38.6		
5	53.2	36.2	28.9	58.6	41.9	43.8		
6	58.6	40.7	35.5	64.5	46.9	48.8		
7	63.2	44.9	42.3	69.8	51.8	53.5		
8	67.2	48.8	49.2	74.2	56.4	57.8		
9	70.5	52.4	56.1	77.7	60.8	61.6		
10	73.2	55.7	62.6	80.1	64.8	64.8		
11	75.4	58.7	68.6	81.1	68.4	67.2		
12	77.2	61.4	73.9	81.1	71.4	68.8		
13	78.5	63.8	78.4	81.1	73.7	69.3		
14	79.5	65.9	81.7	81.1	75.4	69.3		
15	80.2	67.7	83.8	81.1	76.4	69.3		
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From US Army Corps flood damage reduction studies Data from 1996-2001 (Economic Guidance Memo 04-01 & 01-03)

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Building Damage % by Building Type (depreciated replacement value)							
	1 Story	2 Story	Split Level	1 Story	2 Story	Split Level	
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Depth	Basement	Basement	Basement	Basement	Basement	Basement	
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0	13.4	9.3	7.2	25.5	17.9	18.5	
1	23.3	15.2	9.4	32	22.3	23.2	Fr
2	32.1	20.9	12.9	38.7	27	28.2	Co
3	40.1	26.3	17.4	45.5	31.9	33.4	re
4	47.1	31.4	22.8	52.2	36.9	38.6	Da
5	53.2	36.2	28.9	58.6	41.9	43.8	20
6	58.6	40.7	35.5	64.5	46.9	48.8	G
7	63.2	⁴ C	Clearly substantially damagedno need to run SDE				
8	67.2	4 8.0	49.2	/4.2	30. 4	57.8	
9	70.5	52.4	56.1	77.7	60.8	61.6	
10	73.2	55.7	62.6	80.1	64.8	64.8	
11	75.4	58.7	68.6	81.1	68.4	67.2	
12	77.2	61.4	73.9	81.1	71.4	68.8	
13	78.5	63.8	78.4	81.1	73.7	69.3	
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From US Army Corps flood damage reduction studies Data from 1996-2001 (Economic Guidance Memo 04-01 & 01-03)

> NEW YORK STATE OF OPPORTUNITY Conservation

Initial Screening Thresholds

(DC/MV)(100) <= 40%; Not Substantial Improvement

 $(DC/MV)(100) \ge 60\%$; Substantial Improvement

- 40% < (DC/MV)(100) < 60%; Detailed Evaluation is Required
 - DC = Damage Cost
 - MV = Market Value



Step #2: Detailed Evaluation



Improvement/Repair Cost

The same improvement/repair cost estimate that was used for initial screening is used for the detailed evaluation.





Market Value

Market Value is estimated using the structure's full value assessment.







Department of Environmental Conservation

Detail Example

- 1234 Cat Hollow Rd, Colchester NY
- Given: Land value = \$500
- Given: Total value = \$2000
- Calculated: Structure value \$1500
 Equalization Rates
- http://orpts.tax.ny.gov/MuniPro/
- 2007 Colchester rate = 3.82%
- Market Value: \$1500/.0382 = \$39,267





Certified Appraisal on Appeal



Appeal

If the applicant objects to the market value determination, then he or she may appeal by obtaining a certified appraisal based on the market comparison approach.





Appraisals

Remember, appraisals based on "economic" or other forms of "external" obsolescence are not acceptable

The community must always review the appraisal for "reasonableness"

If deemed reasonable, then the certified appraisal is the final market value determination (Don't forget to adjust property taxes!)

A Note About Appraisals

Many individuals planning extensive improvements are required to obtain a certified appraisal for a construction loan Consider asking the applicant to obtain the appraisal "up-front" so you can make your substantial improvement evaluation before issuing the permit

Conservation

STATE OF



Owner and Contractor Affidavits



Department of Environmental Conservation

Owner and Contractor Affidavits

The purpose of these documents is to ensure that the owner and contractor understand that they are subject to enforcement action and/or fines if repairs or improvements are made that are not included in the substantial improvement evaluation

- This is particularly important when the project falls just short of the substantial improvement threshold
- A modified project that brings it over the threshold is a substantial improvement



A structure is substantially damaged and is not brought into compliance, how will this impact flood insurance?









2016 - Structure Repaired - Elevated



2016 - Structure Repaired - Elevated

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2016 - Structure Repaired - Elevated



INCREASED COST OF COMPLIANCE (ICC)







Department of Environmental Conservation

INCREASE COST OF COMPLIANCE COVERAGE (ICC)

National Flood Insurance Reform Act of 1994

The National Flood Insurance Program...shall enable the purchase of insurance to cover the cost of compliance with land use and control measures established under Section 1361.



ICC Coverage

- ICC is an endorsement to the Standard Flood Insurance Policy
- ICC coverage provides for the payment of a claim to help pay for the cost to comply with State or Community floodplain management laws or ordinances after a flood event in which a building has been declared <u>substantially</u> or <u>repetitively</u> damaged.



ICC Coverage

Mitigation Measures under ICC:

Elevation

Floodproofing (non-residential)

Relocation

Demolition



Conservation

NEW YORK

OPPORTUNITY

STATE OF

ICC Coverage

Limits of Coverage- \$30,000 for Residential and Non-Residential.

Applies to only flood damaged buildings within a mapped Special Flood Hazard Area.

Only provided on a building covered by a Standard Flood Insurance Policy.



Eligibility for ICC Claim

A building is eligible for an ICC claim if it is in an A or V zone and the <u>community</u> makes the following determination:

Substantially Damaged by flood

A building is a Repetitive Loss structure in a community that has passed a Repetitive Loss definition in its local law.


Eligibility for ICC Claim

National Flood Insurance Reform Act Definition for Repetitive Loss Structure:

"Flood related damages on two occasions during a 10-yr period ending on the date of the event for which the 2nd claim is made, in which the cost of repair, on the average equaled or exceeded 25% of the market value for each flood event."



Eligibility for ICC Claim

Two losses when combined must equal or exceed 50% of the market value within a 10-yr. period.

- if 1st loss is 10%, 2nd loss must be at least 40%
- if 1st loss is 45%, 2nd loss must be at least 5%



Community's Role

- Community's are not <u>required</u> to amend their floodplain management ordinance to include a " repetitive loss" provision.
- However, if policy holders want ICC coverage for <u>repetitive</u> loss structures, communities must adopt the provision.
- ICC remains available in all participating communities for substantially damaged structures.
- Pre-FIRM, or Post-FIRM affected by higher BFE or larger SHFA
- In SFHA



Eligibility for ICC Claim

Post-FIRM building is eligible for ICC claim if:

- Variance was granted
- Compliant building increase in BFE
- Non–compliant building increase in BFE

Post-FIRM <u>NOT</u> eligible for ICC claim if:

- Compliant building no increase in BFE
- Non- compliant building no increase in BFE



Community's Role

Factors a community should consider in determining whether to adopt a repetitive loss provision:

- Would the provision significantly mitigate the flood risk?
- Does the community have the administrative capability to enforce the provision?
 - Would need to Determine Detailed % Damage after <u>each</u> flood event and maintain records for 10 years.



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Community's Responsibilities

Ensure the mitigation measure meets the NFIP requirements, as well as State Building Code.

- Require all necessary permits.
- Inspect to ensure the mitigation measure is completed according to plans.
- Issue a Certificate of Occupancy/ Compliance.



Further Guidance:



" Guidance for State and Local Officials on ICC Coverage"

National Flood Insurance Program Increased Cost of Compliance Coverage

Guidance for State and Local Officials FEMA 301 / September 2003



http://www.fema.gov/library/viewRecord.do?id=1532



Thank You

- William Nechamen
- Chief, Floodplain Mgmnt
- NYS DEC
- 625 Broadway, 4th Fl
- Albany, NY 12233.3504
- william.Nechamen@dec.ny.gov
- 518-402-8185

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