

Winter 2003

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UPDATE

Progress of the North Carolina Floodplain Mapping Program

There is good news for counties and municipalities in the Phase I river basins where new, digital Flood Insurance Rate Maps are in various phases of map production or post-preliminary processing. In the White Oak Basin, preliminary DFIRMs have been issued for all of Carteret County and most of Onslow County. Preliminary maps have been issued for all or parts of three counties in the Lumber Basin (Hoke, Moore, and Scotland) and eight counties in the Tar-Pamlico Basin (Beaufort, Edgecombe, Franklin, Hyde, Martin, Pitt, and Vance). The remaining counties in both basins, together with counties located in the Neuse and Pasquotank Basins, are scheduled to receive preliminary DFIRMs by July 2003.

The State's 2001-02 budget shortfall put mapping efforts in the Cape Fear River Basin on hold after acquisition and processing of LIDAR terrain elevation data were completed. The 2002 General Assembly allocated funding to complete the Cape Fear Basin and to begin implementing Phase II which includes six additional river basins. Both of the State's map production contractors, Watershed Concepts and Greenhorne & O'Mara, Inc. have been tasked to perform H&H studies and develop maps for specific counties in the Cape Fear basin. Priority has been placed towards completing maps for counties that are partially located in other Phase I basins and for coastal counties with high vulnerability to hurricane storm surge. All Cape Fear mapping is scheduled for completion by December 2003.

According to FEMA policy, new DFIRMs become effective approximately six months after all preliminary panels have been issued for an entire county. So far, four counties meet this criterion and are scheduled to receive effective DFIRMs in May 2003 (Beaufort and Hyde), June 2003 (Scotland), and July 2003 (Carteret). The effective date for DFIRM panels in Edgecombe County, which has also received a complete set of preliminary maps, will be delayed slightly so that both Nash and Edgecombe counties can go effective on the same date. FEMA and the State will follow this procedure wherever possible to minimize the need to issue multiple versions of border panels that show portions of two or more counties.

For some Phase I counties where a portion of the county lies in a Phase II river basin, FEMA's policy will delay the DFIRM effective date until Phase II mapping for the remainder of

— see *Mapping*, page 5



**NCAAFPM
Annual
Conference**
April 30-May 2

The 2003 NCAAFPM Annual Conference will be held at the Holiday Inn Sunspree in Asheville, NC from Wednesday, April 30 to Friday, May 2. An exciting agenda of speakers and workshops are anticipated as well as evening social events and, of course, the annual golf tournament. Look for more information on our website at www.NCAAFPM.org.

From the Chairman's Desk

Hopefully spring is just around the corner as you read this issue of the FlashFlood News. Flooding has probably been far from everyone's minds as we have dealt with snow and ice storms, power outages and unusually cold weather. With spring quickly approaching, I would like to remind you that the NCAFPM annual conference will be held at the Holiday Inn Sunspree in Asheville, April 30-May 2. You may notice that the conference days will be a little different than in the past, as we will be meeting Wednesday through Friday instead of Monday through Wednesday. As always, you can expect a great program of speakers and social events to make your trip to the mountains well worth your while.

The statewide mapping project continues to roll along as digital FIRMs are developed for more and more counties and communities. The statewide mapping program has made North Carolina the model state for other states looking at how to structure mapping programs as part of FEMA's Map Modernization program. Visit www.ncfloodmaps.com for all kinds of great information (and maps too).

FEMA is now officially within the Department of Homeland Security and is becoming acquainted with the new reorganization. There is no question of the importance of keeping our country safe from acts of terrorism. However, one area of concern to us as floodplain managers is that flood mitigation may lose some of the momentum gained over the past few years. The recent news that much of the funding earmarked for the Flood Mitigation Assistance (FMA) program has been transferred to other divisions of Homeland Security is of real concern. That is partially why our conference theme this year is *FLOODLAND SECURITY, Protecting Lives, Property and the Environment*.

I would like to wish John Gerber and his family the best as he is being activated for a one year tour of duty in the Mid-east. John is the Western Branch NFIP engineer for NCDDEM and is an Apache/Blackhawk pilot with the Army Reserves. Good luck John!

And finally, after 3 years, this will be my last term as Chairman of NCAFPM as we will be electing a new chairman in Asheville. It has been a great experience and I have enjoyed meeting and working with all the floodplain folks across the state. I hope to stay involved in some capacity and believe the new board will continue the hard work that has made NCAFPM a great organization.

Bill Tingle, P.G., CFM
NCAFPM Chairman

Flood Mitigation Assistance

FEMA's Flood Mitigation Assistance program (FMA) provides funding to assist states and communities in implementing measures to reduce or eliminate the long-term risk of flood damage to buildings, manufactured homes, and other structures insurable under the National Flood Insurance Program (NFIP). FMA was created as part of the National Flood Insurance Reform Act of 1994 (42 U.S.C. 4101) with the goal of reducing or eliminating claims under the NFIP. FMA is a pre-disaster grant program.

FMA is made available to states on an annual basis. This funding is available for mitigation planning and implementation of mitigation measures only. North Carolina Emergency Management administers the FMA program and is responsible for selecting projects for funding from the applicants submitted by all communities within the State. The State then forwards selected applications to FEMA for an eligibility determination. Although individuals cannot apply directly for FMA funds, their local government may submit an application on their behalf.

The goals of FMA are to:

1. Reduce the number of repetitively damaged structures and the associated claims on the National Flood Insurance Program.
2. Encourage long-term, comprehensive mitigation planning.
3. Respond to the need of communities participating in the NFIP to expand their mitigation activities beyond floodplain development review and permitting.
4. Complement other federal and state mitigation programs with similar, long-term mitigation goals.

For further information, please see www.ncem.org/mitigation/fma.htm. ▲

Changes at EMI

Meal Ticket Prices go up – “Due to wage rate increases beyond the control of the food service contractor, the daily cost of a meal ticket at the National Emergency Training Center is being increased from \$14.50 to \$16.00, effective May 1, 2002, through September 30, 2002. This will mean that the cost of a meal ticket for a 5-day class will be \$80.00, the cost of a 6-day class will be \$107.10, and the cost of a 2-week class will be \$192.00. In addition, there will be an additional \$.50/day increase starting October 1, 2002. Payment may be made by cash, non-personal check, purchase order, or VISA or MasterCard. Payments should be made to Guest Services.”

New Application Form – By October 1, 2002, EMI will discontinue use of the FEMA form 75-5a. The FEMA form 75-5 will be used for enrolling students, whether the course is for state and local audience, or FEMA audience. The 75-5a can still be used

for courses, when appropriate, that will be held prior to September 30, 2002. This is being done in an effort to eliminate confusion on which form students should use, and which form NETC admissions should accept. We will have only one form. Just complete the form, print it out, get the signatures and then fax it to our State Training Office at (919) 733-6327 Attention: Gary Jones.

New Enrollment Procedures – EMI has implemented new Enrollment procedures, which began this fiscal year and it affects all classes from now on at EMI and Mt. Weather. You will need to plan your courses in advance. If you plan on enrolling in any courses at EMI or Mt. Weather that are to be held during the October 1, 2002 to March 31, 2003 timeframe, applications must be received by EMI, via the NCEM Training Office between June 1, 2002 and July 31, 2002. All the details and changes with the EMI Course Enrollment Process is all on FEMA’s website at training.fema.gov/EMIWeb/apply.htm ▲

Home Study Course Update

As discussed at our Annual Conference last fall, a group was formed of NCAFPM members to get the old Home Study Course (HSC) updated. Participating members are: Mike Byrd, Mike Coughlin, Maria Cox, John Gerber, Phil Letsinger, Mike Neal, Tammy Riddle, Spencer Rodgers, Warren Simmons, Christy Sokol, Bill Tingle, Terry Warren and Berry Williams. Most members met in Raleigh on November 5, 2002 for a kickoff. Each member volunteered (or was assigned) one or more sections to review and update. A second meeting was held December 11, 2003. Members were given CD-ROM copies of the HSC. These will be used to make suggested corrections, additions and deletions. At this meeting it was decided that we would prefer a product that contained links to the various references online. It is hoped that we will get the product out late spring or early summer of 2003.

New Flood Insurance RATES

Below are annual flood insurance premiums for an example home¹. The New Flood Insurance Manual Effective May 1, 2002 can be downloaded at

www.fema.gov/nfip/manual05_02.htm

Effective May 1, 2002

Annual Flood Insurance Premiums for an Example Home¹ at Various Elevations Located Within a Special Flood Hazard

	AE Zone	VE Zone
Minimum elevation (BFE) ²	\$682	\$1,453
Added elevation: +1 foot	\$431	\$1,118
+2 feet	\$284	\$833
+3 feet	\$254	\$668
+4 feet	\$254	\$598

Annual Flood Insurance Premiums for an Example Home¹ Located OUTSIDE a Special Flood Hazard

X Zone	\$556 (\$221 for a Preferred Risk Policy ³)
AE Zone	\$682
VE Zone	\$1,453

¹ The Example Home referenced is a single-family home (with no basement) valued at \$100,000 and the contents are valued at \$25,000. For this example, this home meets all current floodplain regulations and is insured for 100% of building and contents value. Other factors can affect the rate for our example home, including the level of flood risk, the age of the structure, and its elevation.

² FEMA requires elevation to at least the BFE (Base Flood Elevation). If the lowest floor of your home is higher than the minimum elevation you may be able to reduce your annual flood insurance costs by better than one half in some zones!

³ If your home (no matter who owned it) has not had previous flood claims or received previous Federal Disaster Assistance payments, you might qualify for a Preferred Risk Policy. To qualify, your home must also be located in the B, C, or X Zone on the current effective FIRM.

Region B

Mike Coughlin, CFM

Hazard Mitigation Planning and Prior HMGP Projects in Wake County

Anyone who has gone through a Hazard Mitigation Grant Project, probably has some interesting stories to tell. In my case, my project initially proposed the buyout of nine residences flooded by Hurricane Fran. Three potential participants eventually opted not to participate (why, I'll never understand). When the six remaining homes were eventually bought out and demolition commenced I started getting some phone calls. Perhaps you guessed it – two of the families that declined to participate now wanted back in. Unfortunately that was not an option at that point.

The point is that you have an opportunity when writing your local Hazard Mitigation Plan to identify properties such as these, and get them in a good position for a buyout or elevation project when the next disastrous flooding event occurs.

Region C

Chris Roberson, CFM

Craven County

Stephanie Currier, Assistant Director of the Craven County Planning and Community Development Dept., attended the NFIP - CRS course at the Emergency Management Institute in Emmitsburg, MD on November 4-8. The NFIP-CRS course describes activities eligible for credit under the Community Rating System, how a community applies, and how a community modifies an application to improve its classification. The course is recommended for those officials with some floodplain management experience.

Duplin County

Duplin County has purchased approximately 100 parcels consisting of about 125 acres in the flood plain as part of the HMGP buyout grant. The county has recently developed a policy to manage the parcels. The County Commissioners adopted the policy on December 16, 2002, which allows leasing the parcels to interested citizens. The policy places a higher priority on public or civic uses of the property. For more information on the policy, contact Randall Tyndall, at the Duplin County Planning Dept. 910-296-2102.

Duplin County is making use of one of the buy-out parcels as a wetland mitigation site to offset wetland losses resulting from construction at the county airport. The permit issued by the Corps of Engineers requires new wetland acreage to be created and existing wetlands on the parcel to be enhanced. Grading and planting work will begin in January 2003. The parcel may have future uses for wetlands education purposes. For more information, contact Mike Aldridge at the Duplin County Planning Dept. 910-296-2102.

Region D

Warren Simmons, CFM, Guilford County Watershed Protection Engineer

Guilford County Flood Mitigation

Guilford County has relatively few floodplain issues, even though there is quite a bit of floodplain. The last Community Assistance Visit revealed there were only 75 floodplain insurance policies written and only one repetitive loss claim. The answer must be in the Development Ordinance.

According to the Guilford County Development Ordinance, when subdividing a tract of land, the developer is required to dedicate for public use the

area between the natural 100-year flood contour lines. For many commercial projects the same requirements can be enforced. If a record plat of the property is needed, such as for right-of-way dedication or platting a BMP for water quality, the County will also require floodplain dedication. To resolve inaccuracies in a surveyor tracing the flood boundaries from FIRM maps, a requirement is made of the developer to field locate the 100-year BFE. As a concession to the developer, the ordinance allows the development of smaller lots, under certain conditions, that back up to floodplain.

The dedication addresses several issues. First, the floodplain is protected against any intrusion of land development, including land disturbance and building of structures. In the rare occurrence the dedication cannot take place, the County will accept a drainage easement over the same area. In either case construction of buildings must occur outside the flood prone areas. Secondly, by the dedication of floodplain to the public Guilford County can assure that the area will remain in a natural and undisturbed condition.

Thirdly, this allows Guilford County to work toward the establishment of a continuous system of corridors for trails, open space, and compliance with watershed and NPDES regulations.

Even though reduction of floodplain permits was not the original intent, the request for floodplain development becomes limited to the tracts of land on record prior to the implementation of the development ordinance. As a result, an average of one or fewer permits are issued in the floodplain each year. As of 2000, the required dedication of floodplain in Guilford County had resulted in more than 750 acres of open space.▲

Ductwork

Ductwork, including the cross-over duct under multiple section mobile homes, has been an important issue being addressed by many communities, citizens and professionals lately here in North Carolina. Per 44CFR 60.3 (a)(3)(iv), *if a proposed building site is in a flood-prone area, all new construction and substantial improvements shall be constructed with electrical, heating, ventilation, plumbing, and air conditioning equipment and other service facilities that are designed and/or located so as to prevent water from entering or accumulating within the components during conditions of flooding.* This includes ductwork. If ductwork is to be floodproofed to meet this requirement, it must be certified by a registered professional engineer or architect, using the FEMA Form 81-65. While this form is titled for non-residen-

tial structures, you may accept it for floodproofing of ductwork only for residential structures.

Note that the Elevation Certificate should indicate that the ductwork is below BFE. The Floodproofing Certificate is available on the FEMA web site, www.FEMA.gov/mit/tsd/DL_fpc.htm. The owner should be aware that this may affect the flood insurance rates for the structure. In addition, this could also effect the community-wide CRS rating.

In addition, further assistance is also available through Publication 348 entitled "Protecting Building Utilities from Flood Damage" – www.fema.gov/library/lib06b.htm and through Technical Bulletins 2-93 and 3-93 available at www.fema.gov/mit/techbul.htm. ▲

Mapping, from front

the county is complete. Fortunately, the 2002-03 State budget also includes funding to begin implementing Phase II river basins: the Chowan, Roanoke, Yadkin, Catawba, New, and Watauga. Elevation data will be acquired, through LIDAR technologies, this winter and the State has solicited proposals in anticipation of qualifying one or more additional mapping contractors to develop maps in these basins.

For most of the counties that have received preliminary DFIRMs, a full suite of digital flood hazard, terrain elevation, and GIS base map data has been posted on the North Carolina Floodplain Mapping Information System (FMIS). The information can be viewed online and downloaded in various formats. The address for the mapping program website where the FMIS can be accessed is www.ncfloodmaps.com.

Inquiries about the program can be made to Rodger Durham, at 919-715-8000 extension 276. ▲

2003 NFIP Claims Presentation

The annual NFIP Claims Presentation is the official forum for resolving concerns about the adjustment and settlement of policyholder claims. In all flooding events, regional problems materialize, and adjusting issues, as well as policy and claims questions, need to be addressed. These claims workshops are conducted by the NFIP Bureau and Statistical Agent for certification of claims adjusters, but

they are open to insurance agents, community officials, floodplain managers and others. Workshop 21 will be in Wilmington on May14, 2003 at the Hilton Riverside. Complete the registration form found at www.fema.gov/nfip/ca1.htm and return by April 3, 2003 with a check for \$10.00. ▲

Elevation Certificates

FEMA introduces a new training tool to assist surveyors in the completion of the new Elevation Certificate form. This **Surveyor's Guide to the Elevation Certificate** is now online at training.nfipstat.com/ecsurveyor.

The Office of Management and Budget has approved the revised Elevation Certificate. See www.fema.gov/nfip/elvinst.htm for a pdf and template. ▲



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of Floodplain Managers

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Certified Floodplain Surveyor Pilot Program

Another option will soon exist for property owners who disagree with their lender's determination that they are located in a flood zone and need a quick resolution to this predicament. The Certified Floodplain Surveyor (CFS) Pilot Program has been initiated in North Carolina to expedite determinations from the Federal Emergency Management Agency (FEMA) and possibly delegate all or some of this responsibility in the future. The goal of reduced turnaround time will be achieved by training licensed land surveyors on the requirements for Letters of Map Change (LOMCs), namely Letters of Map Amendment (LOMAs) and Letters of Revision – based on Fill (LOMR-Fs), as well as streamlining review and processing procedures followed by FEMA.

FEMA is leading the CFS Pilot Program in partnership with the American Congress on Survey and Mapping, the North Carolina Division of Emergency Management, the North Carolina Geodetic Survey, the North Carolina Society of Surveyors, and FEMA's Map Coordination Contractor - Dewberry & Davis LLC. Under this Pilot Program, a training seminar was held in Cornelius, North Carolina, from October 16 to 18, 2002, for over 60 surveyors. A subsequent CFS training seminar will be held in March 2003. In the future, other training opportunities such as this may be available. After the initial training seminars and the successful start of the Pilot Program, the American Congress on Survey and Mapping will lead the CFS Program.

Successful completion of the CFS training

and a comprehensive exam, administered on the seminar's last day, will equip surveyors with the necessary skills to provide FEMA complete and error-free LOMC requests. These submittals will result in expedited issuance of LOMAs and LOMR-Fs with fast-tracked determinations from FEMA within 5 business days instead of the 45 to 60 days typically needed to process LOMCs through traditional processes. In addition to shorter turnaround time for LOMC processing, other expected benefits include improved service to property owners, increased local ownership of the flood maps, greater involvement of the public and private sectors in the LOMC process, and reduced costs to FEMA.

The delegation of LOMC processing is an objective under FEMA's Map Modernization Plan, and FEMA continues to examine all aspects of its current process. The success of this Pilot Program could lead to other professional groups or qualified communities partnering with FEMA to amend or revise flood maps provided through the National Flood Insurance Program. The CFS Pilot Program is a key step in the possible delegation of LOMC processing to organizations and/or professional groups with the necessary skills and training to ensure appropriate standards and procedures are followed. After the completion of this Pilot Program, it is envisioned that the American Congress on Survey and Mapping will establish and lead a national program on a state-by-state basis to train and certify licensed land surveyors on the requirements for amending and revising flood maps. ▲

Updated MT-1 and MT-2 Forms Now Available

The updated MT-1 and MT-2 application packages are now available for download on the FHM Web site. The application packages were designed to assist requesters (community officials, individual property owners, and others) in gathering the information FEMA needs to determine whether parcel(s) of land or structure(s) are likely to be flooded as a result of a base (1-percent-annual-chance) flood.

The forms in the MT-1 package shall be used to request Letters of Map Amendment (LOMAs), Conditional Letters of Map Amendment (CLOMAs), Letters of Map Revision Based on Fill (LOMR-Fs), and Conditional Letters of Map Revision Based on Fill (CLOMR-Fs).

The web sites for these forms are: www.fema.gov/mit/tsd/dl_mt-1.htm and www.fema.gov/mit/tsd/dl_mt-2.htm ▲

Mentor a Community

The good news is 456 communities in North Carolina participate in the National Flood Insurance Program (NFIP). Unfortunately, almost 200 communities do not – even after 14 federally declared disasters between 1989 and 1999. Most of these non-participating communities are small and may believe they lack adequate resources to implement a floodplain management program. However, numerous communities in the State are participating in the NFIP because another jurisdiction, typically their county, implements and enforces the community's flood damage prevention ordinance.

When presented the facts on the benefits of the NFIP, such as reduced flood losses due to building requirements and quicker recovery from flood damage due to the availability of flood insurance, almost all communities join the NFIP. To encourage informed decisions, the Division of Emergency Management will be mailing letters to all North Carolina communities that do not participate in the NFIP. The mailing will begin with the eastern portions of the State and will include communities that have received flood maps under the North Carolina Floodplain Mapping Program. These letters reference

information, which is also available at www.fema.gov/nfip/intnfip.htm, to provide background and an introduction on floodplain management and the NFIP.

Your help is needed to spread the word. As a floodplain manager in North Carolina, you are encouraged to take personal responsibility to not only learn the facts about floodplain management, but explain them to others involved in our profession. Please take the time to contact an official from a non-participating community (list available at www.ncfloodmaps.com/pubdocs) to explain the benefits of floodplain management. After the community joins the NFIP, the continued training and support of a Floodplain Administrator will ensure that our common goals of reducing flood losses and protecting the natural resources and functions of floodplains are met.

Non-participating communities can join the NFIP by taking three steps. First, local officials must complete an application for participation. Second, the local government must adopt a resolution indicating intent to participate in the NFIP. Finally, the governing body must adopt a local floodplain management ordinance, which places standards on new development and substantial improvements to existing buildings. Communities previously participating in the NFIP, but now considered "suspended" for not complying with certain requirements, will require a site visit by FEMA before re-entering the program. ▲

RSDE 2.0

A NEW version of FEMA's Residential Substantial Damage Estimator (RSDE 2.0) is now available on CD. The Users Guide is included on the CD. This new version of RSDE is now compatible with Windows 2000 in addition to Windows 95/98/NT 4.0. To order copies of the RSDE software, contact FEMA Publications at 1-800-480-2520. ▲

BFE Information Sources for Un-numbered A-Zones

US Army Corps of Engineers

BFE determinations – to search for past studies or request a new study.

Bobby Willis, PE

Wilmington District
Planning Services Section
Floodplain Mgmt Svs
PO Box 1890
Wilmington, NC 28402
910/251-4728
bobby.l.willis@
saw02.usace.army.mil

NC Department of Transportation

For BFE data available at floodplain crossings

Joseph W. Dunneho, PE

Hydraulics Unit
1590 Mail Service Center
Raleigh, NC 27699-1590
919/250-4100
919/250-4108 fax
jwdunneho@dot.state.nc.us

FEMA Publication

265, 1995 Guide

Managing Floodplain Development in Approximate Zone A Areas

This manual provides engineering guidelines for determining base flood elevations in Special Flood Hazard Areas studied by approximate methods only. A **Quick-2 User's Guide** is included in the appendices of this manual, which now downloadable at www.fema.gov/mit/tsd/dl_zonea.htm ▲


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Calendar

March 9-12, 2003

NC NATURAL HAZARD
CONFERENCE
Sunset Beach, NC

April 30-May 2, 2003

NCAAFPM ANNUAL CONFERENCE
Asheville, NC

May 12-16, 2003

ASFPM ANNUAL CONFERENCE
St. Louis, Missouri

See website at
www.ncafpm.org for more
details on these events.

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Kelly Keesling
Editor

FlashFlood
NCAAFPM, Winter 2003

Floodplain Management Resources

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National Flood Insurance Program
Mary Rountree, NFIP Specialist
FEMA Region IV
770/220-5366

LOMA/LOMR/No-Rise
Mohammed Waliullah
770/220-5493

NFIP Flood Hazard Map Information
877/336-2627 (toll free)

Individual Lot LOMA/LOMR
LOMA DEPOT
P.O. Box 2210
Merrifield, VA 22116-2210

Flood Insurance Policy Issues
Roger Widdifield
770/396-9117

Web Sites

NCAAFPM www.ncafpm.org
FEMA www.fema.gov
ASFPM www.floods.org
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919/715-8000 x273

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800/358-9616; Fax: 800/358-9620

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