

# Construction Code Communicator



State of New Jersey  
James J. Florio, Governor

Department of Community Affairs  
Melvin R. Primas, Jr., Commissioner

Volume 2 Number 1 Spring 1990

## MASTER PLUMBER'S LICENSE: INTERPRETATION UPDATE

There has been an important change in the way the Master Plumbing Licensing Board interprets the licensing law. Recent directives by the Attorney General's office state that the Licensing Board **cannot** require that those performing plumbing work, including site work, outside a building but inside the property line, have a master plumber's license. An exception to this is that backflow preventer installation and capping of water and sewer lines to be closed do require a licensed master plumber.

Until recently, the license was required for work on water supply, sanitary sewer, and storm sewer lines inside the property line. The Attorney General's office has found this requirement to be unconstitutional, however, since it could prohibit some groups of people from performing work for which they are skilled. The tools, equipment, and skills necessary to properly perform the work of installing water, sewer, and drain piping within a property line are the same as those needed to install such piping outside a property line. Historically, this work has been performed both inside and outside property lines by unlicensed utility contractors without incident and without apparent damage to the public's health, safety, or welfare. Therefore, additional licensing requirements were not supported by the circumstances, past and present, in the state.

As the law will now be enforced, code officials **cannot** require that those people applying for a permit to perform plumbing work outside a building have a Master Plumber's License, the exception being that the installation of backflow preventors and the capping of water and sewer lines **do** require a licensed master plumber. The Department may later revise N.J.A.C. 5:23-2.15 to reflect the changes in the Plumbing Board's interpretation of its law.

Source: Michael Baier  
Code Assistance Unit  
Bureau of Technical Services

## In This Issue...

1990 Code Books .....	7
Barrier Free Parking .....	4
CABO or BOCA? .....	5
Change of Contractor .....	4
Code Change Notice .....	11
Exhausting Power Vent Approval .....	6
Flood Hazard Issue: Elevator Equipment .....	7
The Inspector: A New Breed .....	8
Master Plumber's License .....	1
More Code Modifications .....	3
National Certification Test .....	7
Radon Training .....	3
Records Retention .....	11
Revised Standard Forms .....	5
Soil Conservation Districts .....	9
Stairs .....	1
UCCARS System I Training .....	10
Warranty Questions .....	4

## STAIRS AND RELATED TOPICS

This is the first installment in a brief series of articles which gather and condense the larger features of this sizeable subject. The next issue of the *Communicator* will feature the changes to this material according to the 1990 BOCA Code.

Please let me emphasize that space does not permit inclusion of the related material from N.J.A.C. 5:23-7, the New Jersey Barrier Free Subcode, in the text, and that Barrier Free regulations are **not** found in the accompanying table.

For interior stairs, regulations are the same if they are supplemental or required for egress (816.1), whereas for exterior stairs, modifications exist when supplemental (819.1).

(continued on next page)

(STAIRS, continued from page 1)

There have been many questions about stair nosings, on which subject BOCA, CABO, and the New Jersey Barrier Free Code differ significantly from one another. BOCA, at 816.4.2, Dimensional Uniformity, exception 2, and at an exception to 826.4.2, Risers, refers briefly to marking nosings on certain stairs in assembly aisles. It does not, however, require and regulate nosings as such. CABO, on the other hand, at R-213.1, does require nosings of approximately one inch projection when risers are closed. For handicapped persons who can use stairs, the size and shape of nosings is critical to safety. The New Jersey Barrier Free Code at NJAC 5:23-7.35 and 7.35a provides very detailed and specific regulations which supersede both BOCA and CABO for any building which is not exempted from the Barrier Free Subcode.

The material in this article is based on the 1989 CABO One and Two Family Dwelling Code and the 1987 BOCA code with the 1989 Accumulative Supplement.

	1989 CABO	1987 BOCA with 1989 Accumulative Supplement
<b>HANDRAILS</b>		
Where required:	At least one side of stairways with 3 or more risers.  Ramps: At least one side when slope is > 1:12.	Both sides of stairs 44" or more wide (exceptions). Ramps: At least one side when slope is > 1:15. Both sides of alternating tread stairways. Assembly aisles (826.5, 826.5.2). Theater/auditorium boxes, balconies, galleries (827.4 - 827.4.3).
Height:	30" - 34" all locations.	34" - 38" BUT: 34" - 42" where guards are required; 30" - 34" in individual dwelling units (when guards are not required). Various heights in theaters and auditoriums (827.4 - 827.4.3).
<b>GUARDS</b>		
Where required:	Open side of stairs when > 30" above floor or grade below.  Porches, balconies, raised floor surfaces > 30" above grade below.	Open parking structures (607.6). Roof storage, motor vehicles (609.2.3). Ramps: Both sides (815.5). Stairways: Both sides (816.5). Open-sided floor areas > 30" above floor or grade below (825.5). Retaining walls (1223.5).
Height & Spacing:	36". Sphere < 6" can pass through spaces.	42" (exceptions). Sphere < 6" can pass through spaces (exceptions).

#### **BARRIER-FREE REGULATIONS ARE NOT INCLUDED IN THIS CHART.**

#### **DEFINITIONS:**

**STAIRWAY:** One or more flights of stairs, and the necessary landings and platforms connecting them, to form a continuous and uninterrupted passage from one floor to another.

**HANDRAIL:** A horizontal or sloping rail grasped by hand for guidance or support, and for arresting falls on the adjacent walking surface.

**GUARD:** A guardrail system is a system of building components located near the open sides of elevated walking surfaces for the purpose of minimizing the possibility of an accidental fall from the walking surface to the lower level.

As most readers are aware, much additional information on stairs can be found in BOCA Article 8.

Source: E. Maria Roth  
Code Assistance Unit  
Bureau of Technical Services

## RADON TRAINING

As we approach the adoption of the radon subcode (proposed in the *New Jersey Register* 12/4/89), the Education Unit of BTS will be engaging the Eastern Regional Radon Training Center at Rutgers University for "hands-on" training for construction officials. The course will include radon mitigation techniques for new construction and existing structures. We hope to be able to implement this training as early as May 1990.

The Eastern Regional Radon Training Center (RRTC) at Rutgers University is one of three national radon training centers established in 1989 by the United States Environmental Protection Agency (EPA) in response to the Indoor Radon Abatement Act of 1988. The EPA estimates that as many as 20,000 lung cancer deaths per year are caused by the tasteless, odorless gas called radon. With the establishment of the three national radon training centers, the EPA has taken the first step toward reducing the fatal effects of this life-threatening gas.

The main objective of the Rutgers RRTC is to offer practical training to professionals who deal with radon. Training programs are aimed primarily at radon mitigators, providing state-of-the-art technical information regarding proper mitigation techniques in accordance with EPA guidelines. Programs also address related topics, such as radon measurement, testing, instrumentation, and evaluation. Issues involving worker health, effects of radon in water, and considerations and guidelines for new construction are also included.

Source: Susan McLaughlin  
Supervisor, Education Unit  
Bureau of Technical Services

## MORE CODE MODIFICATIONS

The following is a continuation of the complete list of *New Jersey Register* entries of code change **adoptions** since the Winter 1989 *Communicator*. The numbers after the date indicate volume and page.

<u>New Jersey Register Date</u>	<u>Adoption</u>
11/6/89	21 NJR 3460(a) Educational Facilities Use Group 5:23-3.5
	21 NJR 3460(b) Assumption of Local Enforcement Powers 5:23-4.3
12/4/89	21 NJR 3747(a) Asbestos Hazard Abatement 5:23-8.8
2/5/90	22 NJR 350(b) Underground Storage Tanks; Definitions 5:23-1.4
	22NJR 351 (a) Plumbing Subcode 5:23-3.15
	22 NJR 351 (b) Enforcing Agencies 5:23-4.5, 4.19, 4.20
	22 NJR 352 (a) Dedication of Revenue for Code Enforcement 5:23-4.17

Source: E. Maria Roth  
Code Assistance Unit  
Bureau of Technical Services

• • • • •

The *Construction Code Communicator* is published by the New Jersey Department of Community Affairs in cooperation with Rutgers University's Department of Government Services. Editor: Hilary Bruce. Questions, comments, or suggestions may be directed to William Hartz, Chief, Bureau of Technical Services, CN 816, Trenton, NJ 08625-0816.

## CHANGE OF CONTRACTOR

"Change of contractor" is a contractual matter between the owner/agent and the contractor that is not directly addressed in U.C.C. regulations. Is an inspection of the incomplete work necessary whenever a contractor is replaced? Is the original contractor still responsible for correcting the violations in the job he or she performed or supervised? These questions often arise when an amendment for a change of contractor is filed.

U.C.C. regulations indicate that the owner and/or person in charge of work assumes the ultimate responsibility for securing inspections and correcting violations. The responsibility for ensuring that actual construction work conforms to the approved construction documents lies with the contractor(s) whose name appears on the construction permit, or on the approved amendment. Hence, until the original contractor is replaced through approved amendment, the contractor identified on the permit is responsible for the work performed or supervised by him or her. According to the state contractor licensing laws, however, the licensed contractor may also be held responsible for securing inspections and correcting violations in the work performed or supervised by him or her.

U.C.C. regulations do not specifically require an inspection when a change of contractor occurs, as the inspection schedule is based on the completion of certain stages of work. It may be in the owner's best interest, however, to have the unfinished work inspected before engaging a new contractor. This is less important when the work involved is minor in nature.

Source: Ashok K. Mehta  
Code Assistance Unit  
Bureau of Technical Services

## BARRIER FREE PARKING

On November 29, 1989 the Handicapped Parking Bill was signed into law. This law requires that all barrier-free parking spaces, whether on public or private property, have a barrier-free parking sign which contains a statement of penalties for violation of the law. There is a phase-in period of one year: all signs erected on or after June 1, 1990 must include this statement; all signs erected before June 1, 1990 must include this statement by June 1, 1991.

The purpose of the law is to make it possible for the police to enforce the restricted use of the barrier-free parking spaces. Once the restricted barrier-free parking spaces are properly marked, the police will be able to ticket improperly marked cars or drivers of properly marked cars who either are not disabled or who do not have a disabled passenger. Properly marked cars will include a handicapped license plate or a temporary placard issued by the Division of Motor Vehicles. The fine for violating this law will be \$100 for a first offense and \$100 and 90 days community service for a second offense.

The Department is in the process of amending the Barrier Free Subcode to include the new requirements for the signs. In the meantime, however, all construction officials should be aware of this requirement.

It is important to note that erecting the proper sign is the first step toward effective enforcement.

Source: Emily Templeton  
Code Development Unit

## WARRANTY QUESTIONS? WE HAVE THE ANSWERS!

The intent of this article is to inform all municipal construction officials and subcode officials of the requirements of the New Home Warranty and Builders' Registration Act and related regulations. Each municipal construction official should have a copy of the Act and regulations booklet, but if not, please call our office and we will send you a copy.

Some of the questions directed to the Department by construction and subcode officials are as follows:

1. A builder constructs an eight-unit condominium project consisting of two buildings, four units in each. The builder intends to occupy one of the units. DOES THE UNIT HAVE TO BE WARRANTED?

YES - Even if the builder claims to have constructed the project for his or her own use and occupancy. N.J.A.C. 5:25-3.1 (c) 1, states in part: "In the event one unit in a single condominium or cooperative structure is sold, all remaining units in that structure shall be warranted whether sold or used for rental purposes."

(continued on next page)



(WARRANTY QUESTIONS, continued from page 4)

2. WHAT IS A COMMON ELEMENT AND WHEN DOES A COMMON ELEMENT CERTIFICATE HAVE TO BE ISSUED?

A common element is defined in N.J.A.C. 5:25 - 1.3 as "those elements listed in the master deed on file with the Department for each such development or unit as required under law for common ownership." A common element NHW certificate must be issued for each building in conjunction with the issuance of the first unit occupancy/warranty of the building. There is no NHW fee for this certificate and construction officials should note that **no validated common element certificate should be accepted for verification of individual unit warranties.**

3. An individual contracts a builder to build on his land, but has the electrical work (for example) done by his father, a licensed electrical contractor. WHY IS A WARRANTY NOT APPLICABLE?

N.J.A.C. 5:25-3.1(g) clearly states: "When an owner has contracted with someone other than the builder for either the mechanical, electrical, foundation or framing other than piling foundation, a warranty is not applicable."

In closing, it is important that **NO** Certificates of Occupancy, including temporary Certificates of Occupancy, be issued without proof of warranty coverage, either state (New Home Warranty Program) or private plan. If you have any questions about what constitutes proof of a private plan warranty, please contact Dennis Warford at (609) 530-6189.

If you have any warranty questions or problems, please call our office at (609) 530-6367.

Source: Frank Bonelli  
Supervisor, Warranty Enrollments  
New Home Warranty Program

## REVISED STANDARD FORMS

Use of the revised standard forms has been mandatory since January. We have received very few questions or comments, but, in general, we have heard that they are easier to use and less expensive. How do you like the new forms?

Most of the criteria for revisions were met. I'm sure you like some of the changes but not others. With change come different procedures, and new procedures must be learned. Many of you are closely involved in this process!

Another concern of many municipalities was what to do with their supplies of old forms. Municipalities received the new forms in March '89, which gave them enough time to deplete their supply. All new forms were required to be in use by January 1, 1990, with no exceptions. (The only overlap would be where old forms were given out in December and completed and returned in January or February.)

We did not plan specific training on using the revised forms, but the topic is covered in "Fundamentals of the Uniform Construction Code." If you or your control person would like to learn more on this subject, you should sign up for this seminar.

Our forms are always in evolution. Let us hear from you. Put your compliments and/or concerns **IN WRITING** and send them to BTS, Education Unit, CN 816, Trenton, NJ 08625.

Source: Susan McLaughlin  
Supervisor, Education Unit  
Bureau of Technical Services

## 1 & 2 FAMILY DWELLINGS: CABO OR BOCA?

Architects, designers, homeowners, and code officials are often puzzled about which code to use when designing one- and two-family dwellings. According to N.J.A.C. 5:23-3.14/5:23-3.21, either BOCA or CABO can be used in New Jersey for designing these structures. Of course, there cannot be any mixing and matching - that is, picking one section from CABO and another from BOCA to suit one's own needs.

It is the applicant's responsibility, when filing all documents along with permit application, to declare which code is to be followed. It is the code official's responsibility to ensure that proper declaration has been made. There have been instances of permit documents having been filed, construction permits having been issued, construction having begun, and then the question has come up, "Which code?"

(continued on next page)

(CABO OR BOCA, continued from page 5)

Proper use of the standard forms will prevent this mistake. Although use of either of the above codes is allowable, designers and homeowners should give careful consideration to their building plans and the codes to be followed **before** filing plans/documents for permits and commencement of construction.

The CABO Code deals mainly with wood frame construction and is considered simpler than the BOCA Building Code. But CABO is not as performance-oriented as BOCA regarding building area, type of construction, fire separation distances, exits, protection, ratings, design criteria, etc. BOCA Table 501 allows much more flexibility in selection of different types of construction and permitted building areas. CABO is silent on construction above a garage. Depending on the designer's planning, a future change in use group may be easier if a building is built under the BOCA Code.

This article is not intended to advocate the use of one code over the other. Any in-depth comparison of CABO and BOCA is beyond the scope of this article. We have attempted to clear up some confusion that exists among designers, homeowners, and code enforcing agencies. This general insight will help prospective entrepreneurs and code officials make better decisions.

Source: Farid Ahmad  
Code Assistance Unit  
Bureau of Technical Services

## THE EXHAUSTING POWER VENT APPROVAL

One of the most confusing pieces of equipment related to mechanical code compliance is the power exhausters. The code does not spell out what approvals power exhausters must have, and since mechanical draft systems are something of an oddity, many code officials are reluctant to approve power exhausters.

While power exhausters themselves are generally fairly simple - a squirrel cage or propeller fan installed within a vent pipe to increase draft - the questions arising from approvals and listings can be complex. Most major model codes, including BOCA (sec. M-1213), recognise

power exhausters as an acceptable method of venting appliances, yet none list a specific approval that power exhausters must meet. The New Jersey Mechanical Subcode does state that equipment regulated by the code should bear the label of an approved agency or be approved by the local subcode official in accordance with N.J.A.C. 5:23-3.7 (BOCA NMC M-401.1 as amended in N.J.A.C. 5:23-3.20 (b) 3.i.). N.J.A.C. 5:23-3.7 regulates the approval of non-conforming materials. Hence, if the manufacturer of an unlisted power exhauster can show that the equipment performs satisfactorily for the intended use, the code official may approve the installation.

Below are some installation practices that should be noted when dealing with power exhausters.

- \* The exhauster should be located as close to the outside wall as possible (manufacturer's installation instructions).
- \* The exhauster must be installed with a proving switch that insures that the exhauster is operating before gas is supplied to the appliance (1987 BOCA NMC M-1213.2).
- \* Vent piping subject to positive pressure must be sealed to prevent leakage of the products of combustion (manufacturer's installation instructions).
- \* Appliances must not be installed on the positive pressure side of the exhauster (1987 BOCA NMC M-1213.1).
- \* Exhaust should terminate a minimum distance of 10 feet from adjacent buildings or lot lines (1987 BOCA NMC M-1213.3).
- \* Exhausters should be installed with termination kits recommended by the manufacturer (manufacturer's installation instructions).

NOTE: Forced or induced draft systems that are integral components of appliances are not within the scope of Section M-1213.0 of the 1987 mechanical code.

Source: Michael Baier  
Code Assistance Unit  
Bureau of Technical Services

.....

## NATIONAL CERTIFICATION TEST

The following is the 1990 schedule for National Certification Examinations:

<u>Registration Deadline</u>	<u>Test Date</u>
MARCH 14, 1990	APRIL 21, 1990
JULY 2, 1990	JULY 28, 1990
SEPTEMBER 24, 1990	OCTOBER 27, 1990

Please note that, beginning with the April 21, 1990 administration, Photo I.D.s will be required. Please consult your Candidate Bulletin of Information for more details.

.....

## CODE BOOK ORDERING INFO

Adoption of the 1990 model codes is expected in April/May, 1990. These include the BOCA National Building Code, BOCA National Mechanical Code, the National Standard Plumbing Code, and the National Electric Code.

Code books will not be sold at training seminars, nor at the Building Safety Conference of New Jersey. The following addresses and telephone numbers may be used to order code books:

<u>BOCA</u>	Building Officials and Code Administrators 4051 West Flossmoor Road Country Club Hills, IL 60477-5795 (708) 799-2300
<u>NSPC</u>	National Association of Plumbing- Heating-Cooling Contractors PO Box 6808 Falls Church, VA 22046 (703) 237-8100
<u>NFPA</u>	National Fire Protection Association Batterymarch Park Quincy, MA 02269 (617) 770-3000

.....

## FLOOD HAZARD ISSUE: ELEVATOR EQUIPMENT

The National Flood Insurance Program (NFIP) was created by Congress in 1968 to provide federally backed flood insurance coverage, which was generally unavailable from private insurance companies. The NFIP was also intended to reduce future flood losses by ensuring that new development was adequately protected from flood damages. The NFIP was based on a mutual agreement with communities that have been identified as flood-prone.

The Federal Emergency Management Agency (FEMA), the agency charged with administering the program, provides community-wide flood insurance, as long as the community adopts and enforces adequate flood plain management regulations. These regulations must meet or exceed the minimum requirement of the ordinance that establishes design performance standards for buildings subject to flood damage.

Current NFIP policy requires that flood insurance coverage includes elevators and all related equipment, even if such equipment is located below the base flood elevation. In order to properly handle the installation of elevators from a flood plain management perspective, a clear understanding of elevators, their related equipment, and practical methods of protecting them from flood damage is needed.

### *Elevator Types*

There are two types of elevators, hydraulic and traction. The hydraulic elevator consists of a cab attached to the top of a hydraulic jack similar to that used on a car lift in a service station. The hydraulic jack assembly normally extends downward below the lowest floor, and is operated by a hydraulic pump and reservoir, both of which are usually located in a separate room adjacent to the elevator shaft. The traction elevator is the more familiar system. It consists of a cable connected to the top of the cab and is operated by an electric motor located in a penthouse above the elevator shaft.

With regard to flood damage potential of the hydraulic type of elevator, the jack assembly will always be located below base flood elevation (BFE). The jack is located in a casing, and while it will resist damage from small amounts of water seepage, total inundation by flood waters up to or over the ground floor will usually result in

(continued on next page)

(FLOOD HAZARD, continued from page 7)

contamination of the hydraulic oil and possible damage to the cylinders and seals. The hydraulic pump and reservoirs are also susceptible to water damage, but they can easily be relocated up to two stories above the jack, which would be above most flood levels.

In the traction type of elevator, the electric motors and most other equipment are normally located above the elevator shaft and would not be susceptible to flood damage. Certain items that would be at risk are sometimes located at the bottom of the shaft, however, such as the counterweight roller guides, compensation cable and pulleys, and oil buffers.

Other electrical equipment is normally found below flood levels on both systems. Some of this, such as electrical junction boxes and panels, can be relocated above BFE. Other equipment, such as door and pit switches, cannot be relocated, but may sometimes be replaced with more water-resistant models.

Elevators and related machinery may present a substantial liability; however, steps can be taken to reduce the potential for flood damage.

#### *Recommendations*

The primary approach in dealing with the problem of protecting elevators from flood damage would be to require all elevator-related equipment to be raised or otherwise protected where feasible to do so. Some examples of these loss reduction techniques follow.

#### PROPER ELEVATOR FLOOD REQUIREMENTS PREVENT UNNECESSARY DISASTERS

1. Locate elevator-related hydraulic equipment, such as the hydraulic reservoir and pumps, above the base flood elevation.
2. Where feasible, locate elevator-related electrical equipment, such as electrical junction boxes and panels, above the base flood elevation.
3. For electrical equipment that cannot be placed above the base flood elevation, such as door and pit switches, use water resistant models where possible.

4. Consider designs which provide for the elevator cab to stay above flood waters automatically by interlocking the controls with one or more float switches in the elevator shaft.

Source: Clark Gilman, P.E.  
Chief, Flood Plain Management Section and  
New Jersey Coordinator for the National  
Flood Insurance Program

### THE INSPECTOR: A NEW BREED

What did you envision when you read the title of this article? I'm willing to bet such adjectives as rough, gruff, unyielding, and narrow-minded sprang to mind first and foremost!

It's true, at times, that inspectors can be firm and unyielding, but generally not without just cause. People often have preconceived ideas and approach an inspector with chips on their shoulders. When headlines such as, "Inspector Accepts Bribes," appear, they often can be attributed to journalistic sensationalism and unwarranted accusations. With today's high standards of professionalism and required conflict of interest disclosures, this type of headline has virtually disappeared.

Today's inspectors must be versatile and flexible. They are often called upon to work with attorneys, architects, engineers, homeowners, contractors, and other inspectors. They must be diplomatic (especially when an applicant learns the cost of the permit!), and sometimes must act as judge and jury. They must be thoroughly versed in construction methods, materials, and procedures. The plan review process can be undertaken flawlessly, permits filled out properly, and all prior approvals in order, but, without the inspector on the job, the end product could very possibly be inferior and hazardous to human safety.

I have found that this group of individuals is extremely underrated and misunderstood. They are bright, experienced, and multi-talented with interests ranging from stamp collecting to big game hunting. While I don't wish to create the impression that inspectors are really angelic beings masquerading as inspectors, it is time to rid inspectors of the negative image that has been hanging around their necks for entirely too long.

Source: Charles T. Herring  
Construction Official  
Bureau of Local Code Enforcement

## SOIL CONSERVATION DISTRICTS IN NEW JERSEY

The following chart provides updated information for Bulletin 84-3 entitled, "Compliance with Requirements of the Soil Erosion and Sediment Control Act." Please note all address and phone number corrections.

COUNTY	ADDRESS	COUNTY	ADDRESS
BERGEN	327 Ridgewood Avenue Paramus 07652 (201) 261-4407	HUNTERDON	Community Service Annex 8 Gauntt Place Flemington 08822 (201) 782-3915
BURLINGTON	Cramer Building, Route 38 Mount Holly 08060 (609) 267-7410	MERCER	508 Hughes Drive Hamilton Square 08690 (609) 586-9603
CAMDEN	Municipal Building 59 South White Horse Pike Berlin 08009 (609) 767-6299	MORRIS	Court House Morristown 07960 (Location-W. Hanover Avenue Morris Township) (201) 285-2953
CAPE-ATLANTIC	Atlantic County Office Bldg. 1200 W. Harding Hwy. County Rd 606 Mays Landing 08330 (609) 625-3144	OCEAN	6 Mott Place, CN 2191 Toms River 08753 (201) 244-7048
CUMBERLAND	P.O. BOX 144, Route 77 Deerfield 08313 (609) 451-2422	SALEM	1000 East, Route 40, Box 47 Woodstown 08098 (609) 769-1124
FREEHOLD (Monmouth and Middlesex Co.)	211 Freehold Road Manalapan 07726 (201) 446-2300	SOMERSET-UNION	Somerset County 4-H Center 308 Milltown Road Bridgewater 08807 (201) 526-2701
GLOUCESTER	Kandle Center, Suite 1-A 72 East Holly Ave Pitman 08071 (609) 589-5250	SUSSEX	330 Route 206 South Newton 07860 (201) 579-5074
HUDSON, ESSEX, and PASSAIC	571 Bloomfield Avenue Verona 07044 (201) 239-1886	WARREN	Stiger Street Hackettstown 07840 (201) 852-2579

.....



## UCCARS TRAINING

Time is running out! Training on System I of the Uniform Construction Code Activity Reporting System (UCCARS) will soon become very limited. Presently there are 203 municipalities using this system statewide. If you are not among them, you are missing a major opportunity!

System II training is expected to begin within the next 30 days. Only those municipalities using System I will be eligible to move on to System II.

If you are not using UCCARS, your municipality is missing the opportunity to receive free software, training, and technical support. In addition, you would receive programs that could save literally hundreds of hours doing reporting and tracking of permits.

If you need more information, please call 609-530-8798 and ask for Susan McLaughlin or William Hartz.

Source: William Hartz  
Chief  
Bureau of Technical Services

Stan Czwakiel at a UCCARS training program. This five-hour training session takes you through System I, step by step.



Municipal employees get hands-on training in UCCARS System I. After training, many municipalities begin using the program the next day.



## RECORDS RETENTION

Over the years, the Department has received a number of inquiries about records retention - what must be kept on file? How long should files be maintained? The Division of Archives in the Department of State has also received questions from code officials.

In the last few months, with the advice of the UCC Code Advisory Board, the Department has drafted a proposal, to appear in the *New Jersey Register*, explaining what records should be kept and for what duration. If adopted, the rule will require most permit documents, notices, certificates of occupancy, and log books should be kept for the life of the structure, and plans for Class I and II structures are to be retained also. Other documents may be retained at the option of the construction official or the municipal officials.

We hope that adding records retention provisions to the code will clear up confusion about record keeping and make plain that the requirements for U.C.C. documents may differ from those for other purely municipal records.

Source: Chrys Wyluda  
Code Development Unit

## PUBLIC NOTICE

### STATE SPONSORED CODE CHANGE NOTICE

Code changes to be considered for State sponsorship must be submitted as follows:

Plumbing code changes must be received by the Department by **April 15th, 1990**. The Department will forward those proposals approved for State sponsorship to the N.S.P.C. by the May 25th deadline. Those proposals that the State does not wish to sponsor will be returned to the applicant after the May 11th Code Advisory Board Meeting, so that the individual can submit the change independently.

Building, mechanical, and electrical code changes must be received by the Department prior to **May 11th, 1990**, if they are to be considered for State sponsorship. Those proposals that the State wishes to sponsor will be submitted to BOCA by November 1st and to NFPA by November 9, 1990. Those changes not sponsored by the State will be returned to the applicant after the June 22nd Code Advisory Board Meeting so that the proposal can be submitted independently by the individual.

Code change forms and instructions on format and content can be obtained from the model code bodies or from the DCA Code Assistance Unit. You may call the Code Assistance Unit at (609) 530-8793 for more details.

Source: Michael Baier  
Code Assistance Unit  
Bureau of Technical Assistance

# Construction Code Communicator



State of New Jersey  
Jim Florio, Governor

Department of Community Affairs  
Melvin R. Primas, Jr., Commissioner

Volume 2 Number 2 Summer 1990

## ENFORCING AGENCY CLASSIFICATION

The classification of an enforcing agency permits that agency to perform plan review within that classification or any lower classification. NJAC 5:23-3.10(a) states that the classification of an agency is determined by the lowest level of inspector license held by any of the subcode officials in their appointed positions and by the highest level of inspector license held by the appointed construction official. In the case of the subcode officials, the inspector license used to determine the classification of the agency must be in the subcode area for which the individual is appointed.

An example of an enforcing agency classification: suppose all appointed subcode officials are HHS, Class I licensed inspectors. The construction official is an RCS, Class III licensed inspector. The municipality is therefore classified as a Class III agency. This classification shall not permit any enforcement agency to perform plan review beyond the agency classification for the use groups listed in accordance with NJAC 5:23-3.10(c).

Using a mercantile use group as an example, a Class III agency is permitted to perform plan review only for buildings of less than 4800 square feet, one story, and no higher than twenty feet. In the case of a project exceeding these restrictions, the Department would perform the plan review.

Construction officials should understand that permits will not be issued without departmental plan review and release as evidenced by presentation of the released plans. If a partial release is issued by the Department, the enforcing agency must ensure that construction does not proceed beyond the partial release.

Field inspections and final approvals for a project remain the responsibility of the enforcing agency, regardless of the agency's classification.

Any change in the classification of an enforcing agency is effective immediately upon a change in the level of licensure of any of the officials who constitute the agency.

Source: Gerald E. Grayce  
Bureau of Regulatory Affairs

## IN THIS ISSUE

BOCA Research Reports .....	9
Building Safety Conference .....	6-7
Dedication by Rider .....	5
Education Alert .....	11
Electrical Installation Authorization .....	10
Electronic Bulletin Boards .....	3
Enforcing Agency Classification .....	1
Gift Policy .....	10
License Renewal .....	5
Licensing Courses .....	4
Limited Area Sprinklers .....	4
New Home Warranty .....	8
Radon Hazard Subcode .....	11
Recent Code Modifications .....	11
Record-Keeping Procedures .....	10
Settlement Program .....	10
Signature and Seal: Real or Phony? .....	3
Stair and Handrail Facts: 1990 .....	2
State Training Fees .....	9
UCCARS System II .....	3

## STAIR AND HANDRAIL FACTS: 1990 CODE

This is a sequel to the stair article in the Spring 1990 *Communicator*. Stairways are now regulated under BOCA Building Section 817, with 817.12 Exterior Stairways considered a special case. You will note that some sections regulate only "means of egress" stairways, while others, such as 817.6 Treads and Risers and 817.6.1 Dimensional Uniformity, hold true for both supplementary and required stairways. Guard spacings and rail heights have also been updated.

The CABO regulations in the table below specify a minimum guard height two inches higher than the maximum handrail height. Until this problem is corrected through the formal code change process, many construction offices are handling it as a variation.

### DEFINITIONS

GUARD: BOCA Building Section 824.1

HANDRAIL: BOCA Building Section 825.1

STAIRWAY: BOCA Building Section 201 (General Definitions)

As most readers are aware, much additional information on stairs is found in BOCA Article 8.

Source: E. Maria Roth

Code Assistance Unit

Bureau of Technical Services

1989 CABO		1990 BOCA BUILDING CODE
<b>HANDRAILS</b>		
Where required:	At least one side of stairways with 3 or more risers.  Ramps: At least one side when slope is > 1:12.	Both sides of stairs 44" or more wide (exceptions). Ramps: At least one side when slope is > 1:15. Both sides of alternating tread stairways. Assembly aisles (811.5-811.5.2). Theater/auditorium boxes, balconies, galleries (824.4-824.4.3).
Height:	30" - 34" all locations.	34" - 38" BUT: 34" - 42" where guards are required; 30" - 38" in individual dwelling units. Various heights in theaters and auditoriums (824.4-824.4.3).
<b>GUARDS</b>		
Where required:	Open side of stairs when > 30" above floor or grade below.  Porches, balconies, raised floor surfaces > 30" above grade below.	Open parking structures (607.5). Roof storage, motor vehicles (609.2.2). Ramps: Both sides (816.5). Stairways: Both sides (817.7). Open-sided floor areas > 30" above floor or grade below (803.6). Retaining walls (1223.5).
Height & Spacing:	36". Sphere < 6" can pass through spaces.	42" (exceptions). Sphere < 4" can pass through spaces (exceptions).

**BARRIER FREE REGULATIONS ARE NOT INCLUDED IN THIS CHART.**

## UCCARS SYSTEM II

Development of UCCARS System II has finally been completed. On June 13, 1990, five test municipalities were trained and began using the program. They are:

Ramsey, Bergen County: Doug Hansen, C.O.  
Clinton Twp., Hunterdon County: Ed Pittman, C.O.  
South Plainfield, Middlesex County: John Allen, C.O.  
Clifton, Passaic County: Herm Steenstra, C.O.  
Scotch Plains, Union County: Bob LaCosta

This testing will continue through July. Upon successful completion, all municipalities using System I will be notified of the availability of System II. In addition, you will receive information on networking, and how this system would work in your office.

Source: William Hartz  
Chief, Bureau of Technical Services

## ELECTRONIC BULLETIN BOARDS

Electronic bulletin boards are waiting for you! The UCCARS bulletin board system at DCA, and hundreds of other electronic bulletin board systems (EBBS) across the country, are serving as information exchanges for thousands of computer-equipped users. Many EBBS allow users to send messages to individuals in addition to posting messages that are publicly available. And because information is exchanged in digital form, a "message" can be a UCCARS report, a letter, a digitized graphic image, or even a computer program.

A small electronic bulletin board system is inexpensive to build and operate; the hardware required for UCCARS participation is sufficient for a small one. Because of this low cost, small subject-specific EBBS are springing up operated by various individuals, agencies, and associations. Following a discussion at one of the Cracker-barrel sessions at the Building Safety Conference, CIAT, the Center for Information Age Technology at NJIT, has offered to compile and distribute information about EBBS that may be of value to New Jersey municipalities.

If you know of one or more bulletin boards where programs, comments, messages, or data of interest to code

enforcement and other municipal staff are being exchanged, please pass the information on to CIAT (W. Kennedy, CIAT, NJIT, Newark, NJ 07102), or to Susan McLaughlin at the Bureau of Technical Services (609-530-8798).

Source: William Kennedy  
Center for Information Age Technology  
New Jersey Institute of Technology

## SIGNATURE AND SEAL: REAL OR PHONY?

"Plumbing and electrical work shall not be undertaken except by persons licensed to perform such work pursuant to law, except in the case of a single family homeowner on his own dwelling. The seal and signature of the licensed plumbing and electrical contractor shall be affixed to the corresponding subcode application form." (See NJAC 5:23-2.15(b)2i,ii.)

The above code section is familiar and straightforward, and therefore should be easy to enforce, right? Under most circumstances, this is probably so. Things are not always as they appear, however, and this includes the aforementioned "seal and signature." When a general contractor supplies signed and sealed construction documents along with an application for a permit or plan review, how can you be sure the signature and seal are authentic? Even though it takes extra time, each signature and seal should be examined. Not everyone can be Sherlock Holmes, but if there appears to be something wrong with the signature or seal (if they are illegible, for example), just call the plumber or electrician and ask to have the information verified.

Also, compare the signatures on all technical sections of the application. If they appear to match each other (even though they were supposedly signed by different people), you may have another problem on your hands. This situation occurred in my town, and we discovered it accidentally when the control person called the plumber to obtain a schematic, only to find that he knew nothing at all about the job in question. As in the case of the illegible seal, calling each subcontractor to verify the job should be enough to give you the information you need.

How do you deal with legal problems such as these? You can fine the contractor and deny the permit. You can

(Continued on page 4)



talk to your town attorney or corporation counsel if you need legal advice. Referral to the prosecutor is a possibility. You might also let other construction officials in your area know what happened -- they may have run into similar situations.

As custodians of the state code, we are often the only line of defense against such violations of the people's trust, as well as their health and safety. So examine those seals and signatures, and if you are doubtful of their authenticity, check them out.

Source: Steve Negri  
Construction Official  
Borough of Westwood

## LIMITED AREA SPRINKLER SYSTEMS

A limited area sprinkler system (see 1990 BOCA Building Section 1005) is an automatic sprinkler system consisting of no more than 20 sprinklers in a room or space. This system provides the same protection as a full sprinkler system, but is used in smaller applications that require suppression (such as boiler rooms, storage areas, workshops, etc.), but which are in buildings belonging to a use group which does not require suppression. Certain items associated with sprinklers are not required on limited area systems, including alarms and alarm attachments, fire department connections, and inspectors' test connections. The system must be designed using hydraulic calculations. Pipe scheduling of these systems is not permitted. Limited systems can be used only in rooms or areas enclosed with construction assemblies as required by the building code.

The limited system is supplied as follows:

- a) When the building is equipped with a standpipe that complies with 1990 BOCA Building Section 1012, this standpipe will supply the system.
- b) When no standpipe is available, the domestic water supply may be used. The following additional requirements must then be met:
  - 1) The domestic supply must be adequate to support a system designed with the largest number of sprinklers in any enclosed area.
  - 2) There must be a check valve at the point where the sprinkler piping is connected to the domestic system.
  - 3) There will be no shut-off valve in the sprinkler piping. The domestic water control valve will control the system.

Source: Robert Hedden  
Construction Project Review

## LICENSING AND LICENSE UPGRADING

The following colleges offer Uniform Construction Code licensing courses. For information on specific courses, please call the coordinator at the appropriate college. Control people are also encouraged to take courses. All participants are eligible for a 70 percent tuition remission after a log number is issued.

**Atlantic Comm. College:** James Foran  
609-343-4984  
**Bergen Comm. College:** Lisa DiBisceglie  
201-447-7161  
**Brookdale Comm. College:** Eileen Rainsford  
201-842-1900, ext. 304  
**Burlington Co. College:** Diane Cook or Mary E. Angell  
609-894-9311, ext. 478  
**Camden Co. College:** Matt Davies  
609-227-7200, ext. 486, evenings ext. 224  
**Cumberland Co. College:** Mike Zaccaria  
609-691-8600, ext. 322  
**Essex Co. College:** Carl Weininger or Nora Rappel  
201-228-3971 (W. Caldwell) or 201-877-3439 (Newark)  
**Gloucester Co. College:** Bill Mays or Vanel Perry  
609-468-5000, ext. 254/263  
**Mercer Co. College:** Betty Johnson or  
609-586-4800, ext. 278/281 Linda Milstein  
**Middlesex Co. College:** Dan Cullinane  
201-906-2556  
**Morris Co. College:** Bruce Perkins  
201-361-5000, ext. 233  
**Ocean Co. College:** Debra Speaker  
201-255-4000, ext. 2268  
**Raritan Valley College:** Charles Speierl  
201-526-1200, ext. 8874  
**Union Co. College:** Joann LaPerla  
201-709-7611/7612

The next date for the National Certification Test Modules is July 28, 1990, with a registration deadline of July 2, 1990. Call ETS at 609-921-9000 for information.

Source: Daniel J. McInerney  
Education Unit  
Bureau of Technical Services

.....

**NOTICE:  
DEDICATION BY RIDER**

Commissioner Primas has submitted a proposal to modify the adopted Dedication by Rider regulations. The following is quoted from the summary statement:

The Local Budget Law provides two separate methods for the appropriation of dedicated revenues. If the amounts of such revenues are subject to reasonably accurate estimate in advance, such revenues are to be stated in a municipality's budget in accordance with their respective sources together with the appropriations for the purposes to which such revenues are applicable NJSA 40A:4-36. If, alternatively, the amounts of such revenues are not subject to reasonably accurate estimate in advance, then such revenues may, with the approval of the Director of the Division of Local Government Services, be appropriated through use of a budgetary rider. NJSA 40A:4-39.

For the complete text of the proposal, see the *New Jersey Register* dated June 18, 1990.

Source: William Hartz  
Chief, Bureau of Technical Services

.....

**WHAT YOU SHOULD KNOW ABOUT  
LICENSE RENEWAL**

New Jersey Uniform Construction Code licenses must be renewed every two years. The effective date of renewal is either February 1 or August 1 of the year of renewal, depending on the date a license was initially awarded by the Department of Community Affairs.

Essentially, the license renewal process takes place as follows. A license renewal application is mailed out 90 days prior to the date your code official licenses are due to expire (incidentally, all will expire on the same date). This early mailing allows you to make up any seminars you might need, and gives you a chance to return the renewal form plus the \$30 non-refundable fee in plenty of time before your licenses expire. (Note that the renewal fee is \$30 regardless of the number of licenses being renewed.)

If a license is not renewed, either the application and fee have not been received or you lack some continuing education seminars. In either case, you should call the Licensing Unit at least three weeks prior to the expiration date to find out how to avoid having your licenses lapse.

For each year or partial year that your licenses remain lapsed, a late fee of \$30 is charged in addition to the basic renewal fee. Additionally, you have to make up the annual training requirements for each expired year. Licenses that have been lapsed longer than two years are NOT renewable; you must reapply for them according to licensure requirements and documentation standards currently in effect.

Should you have questions concerning the renewal process, please call the Licensing Unit at 609-530-8803.

Source: Frank Salamandra  
Supervisor, Licensing Unit  
Bureau of Technical Services

The *Construction Code Communicator* is published by the New Jersey Department of Community Affairs in cooperation with Rutgers University's Department of Government Services. Editor: Hilary Bruce. Questions, comments, or suggestions may be directed to William Hartz, Chief, Bureau of Technical Services, CN 816, Trenton, NJ 08625-0816.

## 1990 BUILDING SAFETY CONFERENCE -- A BIG SUCCESS!

On April 18-20, the 9th Annual Building Safety Conference was held at TropWorld in Atlantic City. All reports rated it the best Building Safety Conference to date.

One of the conference highlights was the Cracker-barrel, the opening event on the evening of April 18. Over 250 inspectors attended this session, which consisted of 38 round table discussion groups, each dealing with a different code-related topic. Inspectors could participate in any discussion and would move to another table when the signal was given. There was time for each inspector to attend three tables.

On April 19 and 20, 681 inspectors attended two of the 24 training seminars that were offered. All of the seminars received very good ratings, but the two highest rated programs were "Construction Code Enforcement Techniques" with Gary Lewis as the instructor, and "Non-Structural Plan Review," taught by William Merchut.

Another highlight of the conference was the Inspector of the Year luncheon, where Commissioner Primas and the four inspector associations presented awards to the four inspectors of the year. The recipients of these awards were:

Building:	William J. Howard, Jr.
Fire Protection:	Bruce I. Wingate
Plumbing:	George E. Hamlin
Electrical:	John J. Schneider

Our congratulations to these four individuals for their outstanding achievement.

As excellent as this conference was, we have no time to rest on our laurels. It is already time to start working on the 10th Annual Building Safety Conference. We have signed the contract that should allow us to hold the biggest and best conference yet. We will be at the Taj Mahal Resort in Atlantic City on May 1-3, 1991, so mark your calendars! More information to follow.

Source: William Hartz  
Chief, Bureau of Technical Services



*Above:* John J. Schneider, 1990 Electrical Inspector of the Year, and the late Joseph R. Wagner, President of the Municipal Electrical Inspectors Association of New Jersey.

*Below:* Gerard Garafalow, President of the Building Officials Association of New Jersey, and William J. Howard, Jr., 1990 Building Inspector of the Year.



## SPOUSES' PROGRAM

Nearly 120 women participated this year in the Spouses' Program of the Building Safety Conference. The festivities began with a wine and cheese reception, which provided a relaxing opportunity to renew old acquaintances and make new friends. Most of the group took off early the next morning for a bus trip to Cape May. The weather was perfect for a guided tour, tasty lunch, and a shopping trip in the Victorian street mall.

Those who stayed behind for the in-house program enjoyed shopping in a trendy fashion boutique that offered unique clothing and jewelry items, plus tips on the latest dress, make-up, and color schemes for the coming seasons. The program concluded on Friday with a basket design demonstration that was exceptionally well delivered and enjoyed by all. Two lucky women went home with beautiful filled baskets that were raffled off during the show.

Everyone enjoyed the program that was presented this year. There was a camaraderie among the women who knew each other from previous years, and newcomers were warmly welcomed to the group. I especially appreciated the encouragement and acceptance extended to me and the other hostesses, Debra Jones and Cecilia Heredia. It was a pleasure to meet and work with everyone, and we look forward to another exciting and successful program next year.

Source: Joanne McDonald  
Housing and Development

*Below:* George E. Hamlin, 1990 Plumbing Inspector of the Year, and Thomas McGarrity, President of the New Jersey State Plumbing Inspectors Association.



*Above:* Bruce I. Wingate, 1990 Fire Protection Inspector of the Year, and William I. Schultz, President of the New Jersey Fire Prevention and Protection Association.

## THE MYTH OF THE PRIVATE SECTOR: NEW HOME WARRANTY PROGRAM

For those of us who have careers in public service, nothing grates more than the assertion that the services we perform would be more efficiently delivered by the private sector. For the past three years I have served as administrator of New Jersey's New Home Warranty Program, and I would like to share some observations that support an argument against this unfair assertion.

The New Home Warranty and Builders' Registration Act was enacted in 1978, and provided that all new homes sold in New Jersey would be warranted by the builder and that the builder's warranty would be backed by a plan of insurance. The law also defined a method for resolving disputes over warranty coverage without resorting to the courts.

The organized builders saw this legislation as a way to make a positive contribution to the debate over how to better protect consumers from an industry which had a reputation for running roughshod over them. The new law would enable builders to delineate an objective quality standard for homebuilding, and reduce the likelihood of litigation.

Several years earlier, some builders had already begun marketing homes with warranties backed by the Home Owners Warranty Corporation. Some builders would be unable to obtain private warranty plan backing, however, so the New Home Warranty Security Fund -- the State Plan -- was created as the warranty plan of last resort for these builders. Even the legislature did not expect this plan to succeed: the Act expressly stated that if the State Plan did not have the resources to pay claims, it would not get a bail-out from the taxpayers.

The Department of Community Affairs was charged with the responsibility for implementing the new law. This responsibility involved developing a dispute resolution mechanism and a claim settlement function for homes that would be enrolled in the State Plan; implementing a requirement that all home builders be registered; and scrutinizing private warranty plans before allowing them to back the warranties offered by New Jersey builders.

After ten years, not only has the New Home Warranty Program not had to raise its rates to meet anticipated

shortfalls, it has built a healthy reserve of over \$50 million to meet unanticipated problems of the future. By the end of this fiscal year, the program hopes to announce the enrollment of the 100,000th new home. This volume of business makes the State Plan second largest in New Jersey compared with the five approved private plans. For over eighty percent of the registered new home builders in New Jersey, the "plan of last resort" has become the plan of first resort.

There are many reasons for the success of the New Home Warranty Program. At the outset, the New Jersey Builders Association and the Home Owners Warranty Corporation of New Jersey were instrumental in the development of warranty standards and the principles of warranty protection which continue to guide the program today. Ensuring that home purchasers would actually receive a warranty has been accomplished through the diligence of local construction officials. More than any other aspect in the administration of the Act, local enforcement of the warranty requirement has served to educate builders, real estate agents, and lenders of the requirements of the law. Moreover, with a compliance rate of over 99 percent, the New Home Warranty staff has been able to concentrate more on taking action against bad builders than on chasing people whose only crime was ignorance of the law.

Eventually, many builders preferred to stay in the State Plan even after acquiring the experience necessary to qualify for private warranty protection. Despite the greater premium charge, these builders came to rely on the level of service that the New Home Warranty staff provided. How many businesses can brag about charging twice as much as the competition and not losing customers?

The New Home Warranty Program continues to be unique in the country. One reason is that the staff recognizes that as a public agency not only regulating, but actually competing in a private sector industry, getting by was not enough. No other statistic has more meaning than the fact that, without press releases or advertising, the State Plan has come to be recognized throughout New Jersey as the best deal for the new home purchaser. As public servants, it is for this -- not profits -- that we compete. So, the next time you hear complaints about the inefficiency of the public sector, just remember this article.

Source: Peter Desch  
Chief, Bureau of Homeowner Protection



## BOCA RESEARCH REPORTS

Recently I attended a meeting where several inspectors commented that they had to accept a BOCA "listed" product even though they didn't like it. Obviously, there is some confusion as to what a BOCA Research Report means. The following material is taken directly from the BOCA pamphlet on Evaluation Services.

### WHAT IS A RESEARCH REPORT?

The BOCA National Codes require an objective engineering analysis to determine the conditions, if any, under which a product, method, or agency may be accepted as complying with the codes. A research report is intended solely for the use of the code official as an aid to fulfilling, in a timely and consistent manner, his or her evaluation responsibilities under the BOCA National Codes.

Each report is prepared by a member of the BOCA Evaluation Services staff, and reviewed and balloted by a committee of active code officials. Each report describes a product, method, or agency; documents a product's performance as evidenced by supporting data; and defines what limitations may apply to the subject of the report for its use under the BOCA National Codes.

### CAN CODE OFFICIALS ACCEPT REPORTS AS EVIDENCE OF CODE COMPLIANCE FOR ALTERNATIVE MATERIALS AND EQUIPMENT?

The exact purpose of each report is stated in the report and is intended to aid the code official in his decision. Section 107.4.2 states that, "Supporting data, when required by the code official to assist in the approval of all materials or assemblies not specifically provided for in this code, shall consist of duly authenticated research reports from approved sources."

### IS REPORT ISSUANCE AN "APPROVAL"?

Absolutely not! Only the authority having jurisdiction - i.e., the state or local code official - has authority under the code to approve (or reject) building components. Research Reports are intended to be used, all or in part, as a technical aid to the code official in fulfilling his or her evaluation responsibilities as required under the BOCA National Codes. The Procedures for the BOCA Evaluation Services specifically prohibit any statements or implications that a report is an "approval."

For further information contact BOCA Evaluation Services, Inc., at 708-799-2305.

Source: William Hartz  
Chief, Bureau of Technical Services

## STATE TRAINING FEES

The Department recently amended the UCC regulations concerning state training fees. In July 1989, the training fee rate was increased to \$.0014 per cubic foot. In February 1990, the department formalized by regulation the quarterly reporting procedures that had been in effect via department letter since 1985. To assure the proper transmittal of fees, municipalities should follow these procedures:

- \* State training fee quarterly reports (R840.A) must be submitted with attached municipal check within 30 calendar days following the close of a quarter.
- \* Cubic volume indicated on the quarterly reports must be accurately reflected in the check amount (cubic volume x \$.0014 = check amount). Municipalities may round to the nearest dollar.
- \* Cubic footage for exempt buildings should be noted at the bottom of the quarterly report. This will account for any apparent shortage indicated when the system fails to match reported cubic volume and your municipal check.
- \* Vouchers will not be accepted under any circumstances. State training fees are state funds and the municipality serves as the custodian of these funds. The state is not a vendor and may not sign vouchers. Municipalities may set up a special trust account or arrange internal signoff in order to facilitate state training fee submittals and accommodate municipal accounting requirements.
- \* Checks must be submitted on a quarterly basis. Please do not submit monthly checks.
- \* Municipalities failing to submit check and report within 30 calendar days will be placed on a delinquency list. The Bureau may initiate appropriate sanctions permissible under NJAC 5:23-5.25 in delinquency cases.

The office control person and municipal finance personnel should be aware of the above procedures. Any questions regarding state training fees should be addressed to Henry Riccobene at 609-530-8838.

Source: Henry Riccobene  
Bureau of Regulatory Affairs

## SETTLEMENT PROGRAM

Two Bureaus in the Construction Code Element will be working with the Office of Administrative Law in a new experimental program this summer. The Bureau of Homeowner Protection and the Bureau of Regulatory Affairs will offer a settlement conference before a neutral administrative law judge in several types of New Home Warranty and Regulatory Affairs cases.

At present, after an order is issued, settlement conferences with Element staff are offered at the Element offices before a case is sent to the OAL. Under the experimental arrangement, cases will be sent directly to the OAL for mediation. The administrative law judge in this early settlement conference will not be the same judge to hear the case if settlement efforts are unsuccessful.

At the early settlement conference, the parties involved will attempt to resolve any disputed issues and settle the matter before a hearing. An attorney may appear with the petitioner, although this is not required and no deputy attorney general will be present.

The Bureaus involved look forward to working with this program, which will provide a way for parties to present cases before a neutral third party and avoid litigation.

Source: Vivian G. Lopez  
Chief, Bureau of Regulatory Affairs

## AUTHORIZATION FOR ELECTRICAL INSTALLATIONS

An electrical construction permit and an inspection of the finished work are the minimum requirements for all electrical installations.

The following installations may be performed by non-licensed personnel: 1) electrical systems of 0 to 10 volts; 2) fire or burglar alarm systems of 0 to 30 volts; 3) wiring in a single family house by a resident homeowner.

Requirements for other installations that may be done by non-licensed personnel can be found in the Board of Examiners of Electrical Contractors law in Section 18 of P.L. 1962, c.162 of NJSA 45:5A-18.

Source: Robert Mensak  
Bureau of Construction Project Review

## THANKS, BUT NO THANKS

Hard to believe that someone would send gifts to a DCA employee? Believe it or not, it happens quite often, and we cannot accept them.

Several units in DCA are set up to serve the code enforcement community. Code Assistance and the Education Unit are two of these. Sometimes, people send gifts to thank us for helping them out. **Please don't.** All gifts we receive must be returned, and we have to process a lot of paperwork explaining why we got the gift, and when and how it was returned.

A simple "thank you" will do, or a note to the person's supervisor. We're happy to help, but no gifts, please!

Source: William Hartz  
Chief, Bureau of Technical Services

## RECORD-KEEPING PROCEDURES

After nearly five years reviewing municipal construction code enforcement offices around the state, we have noticed patterns of incorrect compliance with the Uniform Construction Code. We would like to offer some hints to help you avoid some procedural errors, which will in turn help you to avoid any negative consequences arising from an audit by the Municipal Monitoring Unit.

As you know, information on basic record keeping is found in 5:23-4.5 of the UCC book. A brief synopsis follows.

1. Files: Job files are comprised of properly completed forms and documents, including the construction permit application jacket, the permit, pertinent technical sections, Application for Certificate of Occupancy and the C.O. itself, all prior approvals, a current set of plans, homeowner's warranty documentation, and any technical data required. See NJAC 5:23-4.5(b)2 for a comprehensive list of required forms.

2. Logs: The enforcing agency is required to keep four logs: the Permit Fee Log, Inspection Logs (for each subcode), the Certificate Log, and the Ongoing Inspections Log for elevators and escalators. Many agencies use ledgers of their own design. This is fine, as long as the ledgers comply with the regulations stipulated in NJAC 5:23-4.5(c)2.

Plan review can be recorded on the plans. The date and the name or initials of the subcode official as well as those of the construction official should appear, as specified in NJAC 5:23-2.16(e). For locally mandated housing or apartments, use a locally designed form. Bulky plans should be stored separately from the job files, but should be kept readily accessible. Closed files which have been inactive for three years may be placed in remote storage.

When recording revenues on the Permit Fee Log, do not record non-construction revenues (such as inspections for resale housing or change of tenant, contractor licensing or property maintenance fees), as they are sometimes erroneously included with construction fees when monthly and quarterly reports are compiled.

If you have any questions about the Municipal Monitoring Program, call Philip van Leeuwen at 609-530-8838.

Source: Philip van Leeuwen  
Bureau of Regulatory Affairs

## RADON HAZARD SUBCODE

As per NJAC 5:23-10, the Radon Hazard Subcode has been adopted in New Jersey effective May 7, 1990. The original proposal was published in the *New Jersey Register* of December 4, 1989, and all modifications to the original proposal appeared in the *New Jersey Register* of May 7th, 1990.

In the next few weeks, the final print of the subcode shall be mailed to those who are on the mailing list for UCC Update Services and to licensed code officials. Meanwhile, the afore-mentioned issues of the *New Jersey Register* may be consulted for guidance.

Source: Farid Ahmad, P.E.  
Supervisor, Code Assistance Unit

## EDUCATION ALERT

In early August, you will receive your biannual inspector's transcript report from Educational Testing Services. The transcript will list all courses you attended during the most recent licensing cycle. Using your transcript and the continuing education brochure you will receive from Rutgers University at about the same time, you can schedule seminars for the fall semester. Remember to refer to your most recent transcript to avoid repeating seminars you have already taken.

Please try to spread your seminars across the entire two-year licensing cycle, rather than leaving them all until the last minute. We impose a limit of two seminars per semester. If other seminars interest you, however, you may call us a few weeks before they occur, and if there is still room, we will gladly give you the opportunity to attend.

Source: Daniel J. McInerney  
Education Unit  
Bureau of Technical Services

## RECENT CODE MODIFICATIONS

Continuing directly from the list in the Spring 1990 *Communicator*, here are more UCC Code Change adoptions. The numbers after the date indicate volume and page.

*NJ Register*

Date: Adoption:

- |         |  |
|---------|--|
| 5/7/90  | 22NJR 1356(a) Radon Hazard Subcode   |
|         | 22NJR 1355(b) Barrier Free Subcode administrative corrections to 5:23-7.3, 7.50, 7.116     |
| 5/21/90 | 22NJR 1554(a) Adopted Amendments: NJAC 5:23-3.14, 3.15, 3.16, 3.17, 3.20, and 3.21         |
|         | 22NJR 1632(a) Public Notice: Uniform Construction Code: effective date of 1990 model codes |

Source: E. Maria Roth  
Code Assistance Unit  
Bureau of Technical Services

# Construction Code Communicator

State of New Jersey  
Jim Florio, Governor

Volume 2 Number 3



Department of Community Affairs  
Melvin R. Primas, Jr., Commissioner

Fall 1990

## PARTIAL PERMITS

The Construction Code Element is receiving an increasing number of questions concerning 5:23-2.16(g), Approval of Part. An alarming number of these questions are coming from the private sector, and are mainly asking whether construction officials have the right to arbitrarily refuse to issue a partial permit. The answer, of course, is "No." 5:23-2.16(g) states, "The construction official shall issue a permit for the construction of a foundation or any other part of a building or structure before the entire plans and specifications for the whole building or structure have been submitted, provided adequate information and detailed statements have been filed complying with all the pertinent requirements of this code..."

The construction official "shall" issue, not "may" issue. Whenever the word "shall" is contained within our regulations, the discretionary powers of the official are limited. In this instance, a partial permit can be denied only if adequate information and detailed statements have not been filed. A partial permit cannot be denied because the construction official has decided that it's too much paperwork, or that he or she just doesn't like partial permits. Don't laugh! These are the most common reasons we receive for denial of a partial permit.

A frequent mistake made by officials who issue partial permits is that they allow work to proceed without prior approval, misinterpreting the following:

"The holder of such permit for the foundation or other part of a building or structure shall proceed at his own risk with the building operation and without assurance that a permit for the entire structure will be granted."

This section does not authorize an official to issue a partial permit without all prior approvals in place. Only the agency responsible for the prior approval can give such an authorization.

So remember, an official cannot as a matter of policy refuse to issue partial permits, and when issuing these permits must ensure that all prior approvals are in place.

If you have any questions, please contact the Bureau of Regulatory Affairs, at 609-530-8841.

Source: Louis Mraw  
Bureau of Regulatory Affairs



## IN THIS ISSUE

1990 BOCA Conference .....	4
Absenteeism at the Seminars .....	4
Air Distribution Systems Control .....	7
Associates Degree Program .....	11
"B" Label Vents .....	2
Barrier Free Subcode Amendments .....	3
Below Grade Parking-Flood Hazard Areas ..	9
Certificates of Occupancy & Approval .....	4
C.O. Assumption of New Municipalities .....	7
Emergency Shelters Info .....	3
Handicapped Parking Act .....	2
"Hello, This is Regulatory Affairs" .....	5
Monthly Reports-CARS .....	6
New Reroofing Code .....	9
Partial Permits .....	1
Plan Review vs. Plan Release .....	10
Recent Code Modifications .....	10
UCCARS Contract Extended .....	7
Underground Storage Tanks .....	6
Using UCCARS .....	8



## BEWARE OF "B" LABEL VENTS

"B" label vents are deteriorating! While the problem may not be as urgent as those experienced with another common building material, fire retardant treated plywood, there is reason for concern.

Field reports have determined that after about fifteen to twenty years of exposure, some "B" label vents are showing signs of corrosion. The corrosion occurs from the exterior of the vent to the interior along the portions of the vent that are exposed to the atmosphere. When corrosion is severe, the vent no longer functions properly and products of combustion may accumulate within the structure, causing sickness or even death. Also, when corrosion affects the weather tightness of the vent, rainfall can cause water damage to the structure.

Because of the extremely high humidity here, New Jersey is especially susceptible to the problem. While the current standard UL 441 has provisions for corrosion resistance of materials relative to exposure to flue gases, the standard apparently does not adequately address exterior atmospheric corrosion over long periods of time. There has been some discussion that a revision to the standard is needed to further scrutinize the materials from which "B" label vents are made. (The field reports show that the extent of the problem varies according to the material used in manufacture.) UL 441 currently indicates that either stainless steel, porcelain-coated steel, or aluminum may be used.

Code officials are asked to keep an eye out for the problem. In some cases the corrosion is visible from the street; in other cases the problem may be noticed while other work is being performed. Code officials should take appropriate action when the problem is encountered. In cases where deterioration is severe enough to justify action, an Unsafe Structures Notice should be issued by the construction official as provided for in NJAC 5:23-2.32. In less severe cases code officials are asked to notify owners and encourage them to have the vents replaced.

Source: Michael Baier  
Code Specialist  
Bureau of Technical Services



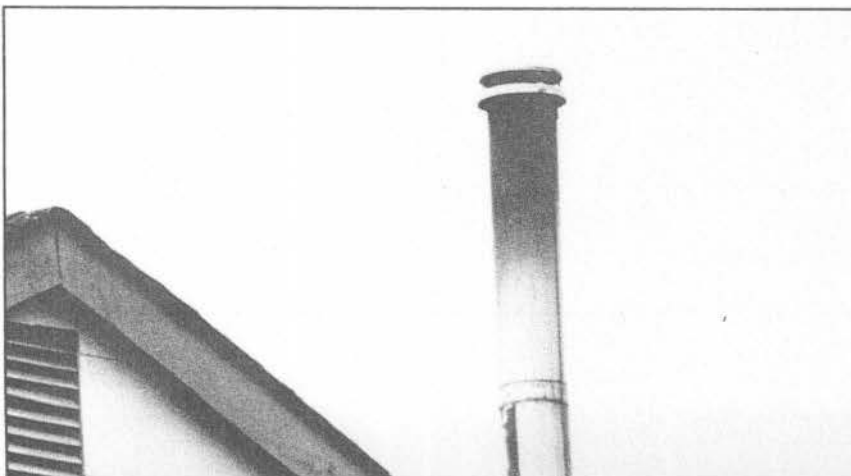
## UPDATE ON THE HANDICAPPED PARKING ACT

The Handicapped Parking Act (Pl. 1989, ch. 201) was signed into law on November 29, 1989. This law aims to facilitate enforcement of the restrictions on all handicapped parking spaces whether on public or private property. To accomplish this, the law defines an appropriately marked handicapped parking space as having two signs: a sign with the international symbol of accessibility and a sign stating the penalties for violating the restrictions on that parking space. The law also defines an appropriately marked vehicle as one with either handicapped license plates or a handicapped parking placard issued by the Division of Motor Vehicles. The law also sets strict penalties for violating the restrictions on the parking space: \$100 fine for a first offense and \$100 and/or up to 90 days community service for a subsequent offense.

The sign with the international symbol of accessibility is the standard sign (R7-8) from the Manual of Uniform Traffic Control Devices. The required penalty sign (R7-8P) has been designed by the New Jersey Department of Transportation. The sign stating "Valid ID Required" is no longer necessary. Newly erected signs must meet these requirements. Existing signs must be modified to include the penalty sign by June 1, 1991. The major sign, the R7-8 sign with the international symbol of accessibility, must be mounted approximately 60 inches above the ground.

The Department of Community Affairs has revised the language in the Barrier Free Subcode to reflect the requirements of the Handicapped Parking Act. The revised language was published in the *New Jersey Register* on September 17, 1990. If you have any questions about the Handicapped Parking Act, please call Emily Templeton at 609-530-8789.

Source: Emily W. Templeton  
Code Development



Left: Deterioration of "B" label vent



## BARRIER FREE SUBCODE AMENDMENTS

The Amendments to the New Jersey Barrier Free Subcode have been adopted effective August 6th, 1990. Full text of the amendments appeared in the August 6, 1990, *New Jersey Register*. Space does not permit complete details here, but some important changes are highlighted below:

1. NJAC 5:23-7.2(a) has been amended to base the scope and applicability of the Barrier Free Subcode on large buildings (total gross enclosed floor area of 10,000 square feet or more) and small buildings (less than 10,000 square feet). Large buildings will be required to have accessible entrances, facilities for the physically handicapped on all accessible floors, and elevators or other means of access for the physically handicapped between floors. Small buildings shall have accessible entrances servicing the first or ground floor areas and facilities for the physically handicapped on any other floors which are on an accessible route of travel. A fire wall or party wall shall not divide the building for the purpose of Barrier Free Subcode compliance if there are openings through these walls allowing human passage.

2. Exemption limit under NJAC 5:23-7.3(a)1 for use group R-2 or R-3 buildings has been reduced from four or fewer dwelling units to three or fewer dwelling units.

3. Other than at the entrance level or on floors served by an elevator or other means of access, all floors in large buildings having floor area less than 3000 square feet shall be exempt under NJAC 5:23-7.3.

4. The provisions of the Barrier Free Subcode shall not apply to a change of use group of a small building. Some other exceptions also apply to small buildings and historic buildings when renovated or modified as per NJAC 5:23-7.8.

5. Under NJAC 5:23-7.9(c), for use group I-3 buildings, provisions have been made to include at least one accessible inmate confinement area or room per institution, and one accessible toilet and bathing facility per institution for inmates.

6. NJAC 5:23-7.18(b)2 has been modified. In use group A-2 and restaurants only in A-3, raised or depressed areas not exceeding 3000 square feet of total floor area shall be allowed provided that at least one third of the usable net area is located on an accessible route of travel and that identical facilities and services are available on accessible levels.

7. Under NJAC 5:23-7.55(a)5 (figure 7.55d) and NJAC 5:23-7.56(a)7 (figure 7.56d) toilet paper dispensers shall be mounted at a height 1'9" from the centerline (not the bottom) of the dispenser to the finished floor. 4'-6" in Figure 7.56d has been changed to read 4'-4" to agree with Figure 7.55d.

8. Figure 7.56b for alternate stall has been modified to indicate 5'-6" minimum for wall-mounted water closet and 5'-9" minimum for floor-mounted water closet.

9. The grab bar mounted next to a urinal as per NJAC 5:23-7.57(b) should be 24" in length with its centerline 36" from the finished floor.

10. In Figure 7.58a for lavatories, the 6" minimum has been changed to a 6" maximum.

11. NJAC 5:23-7.61(a)3 has been modified to indicate height of grab bar for tubs at 9" above the flood rim.

12. For grab bars, NJAC 5:23-7.67 has been modified to specify its applicability to R-1, R-2 and R-3 buildings.

13. Under NJAC 5:23-7.68(a) exceptions 1 and 2 to the elevator requirement for B and F buildings have been deleted. New elevator exemptions have been provided for small buildings, large buildings with floor area less than 3000 square feet, or floors which contain only mechanical equipment, and mezzanines of area less than 3000 square feet in use group B and F.

14. The requirement for handrails (32" high and 1-1/2" clear of the walls) on all walls of the elevator car except the door side has been made mandatory under NJAC 5:23-7.72.

15. Minimum size of the platform lift has been specified under NJAC 5:23-7.80(a)1. For vertical lifts the platform shall be at least 30" wide by 48" long, and for inclined lifts the platform shall be at least 28" wide by 35" long.

16. In NJAC 5:23-7.87, assembly areas shall include only auditoriums and other similar areas which provide fixed seating for viewing a performance or event.

Some typographical errors, editorial changes, cleaning up of the figures, and so on, have also been taken care of through this amendment. The revised version of the Barrier Free Subcode will incorporate all the changes and will be mailed to those who are on the mailing list for the UCC Update Services. Extra copies can be ordered from the Publications Unit of the Bureau of Technical Services.

Source: Farid Ahmad, P.E.  
Supervisor, Code Assistance Unit  
Bureau of Technical Services

□

## NOTICE

On May 1, 1989, the rules governing emergency shelters became effective. If you would like a free copy of the booklet "Rules Governing Shelters for the Homeless," write to:

Department of Community Affairs  
Division of Codes and Standards  
Bureau of Rooming and Boarding House Standards  
CN 804  
Trenton, NJ 08625-0804

or call 609-292-8184.

Source: Bureau of Rooming and  
Boarding House Standards

□

## CERTIFICATE OF OCCUPANCY & CERTIFICATE OF APPROVAL WHICH IS WHICH?

Judging from conversations with construction officials, there is some confusion with respect to the conditions for which certificates of occupancy and certificates of approval are issued.

NJAC 5:23-2.23(a) and (b) state that a building shall not be occupied or used until a form of certificate of occupancy has been issued by the construction official. For example, a business office has undergone a partial alteration. That portion of the office space being altered cannot be occupied or used until a certificate of occupancy has been issued. If the alteration is incomplete, the construction official may, upon the request of the permit holder, issue a temporary certificate of occupancy, so long as the area in question may be occupied safely (NJAC 5:23-2.23(e)). No certificate of occupancy or temporary certificate of occupancy can be issued until all required utilities are installed and in service, and until the appropriate subcode officials have given their approval.

Upon request of the owner of an existing building or structure, and with the approval of the subcode officials, a continued certificate of occupancy is issued by the construction official provided that the use of the building or structure has lawfully existed, an inspection of the visible parts of the building has been made, and no unsafe conditions have been found.

A certificate of approval is issued for equipment which has significant potential for creating a public health or safety hazard. A certificate of approval is required for all equipment and installations listed in NJAC 5:23-2.23(i), and is issued for the length of time specified for the type of equipment. For example, a certificate of approval is issued on a sprinkler system for a twelve-month period. The sprinkler system must be reinspected before the certificate expires, and any violations must be corrected. A new certificate of approval can then be issued.

Source: Gerald E. Grayce  
Bureau of Regulatory Affairs

## 1990 BOCA CONFERENCE

On June 24-29 of this year, I had the pleasure of attending the BOCA Conference in Hamilton, Ontario, hosted by the Canadian Building Officials.

On Monday, the delegates had the opportunity to attend any two of eight seminars offered by the BOCA staff. The two I attended were both excellent; Jake Paul taught the one on life safety, and Ken Huckaby led the other, which covered mixed uses. On Tuesday through Thursday, code change hearings were conducted for the 1991 code. The hearings and dialogues were an exceptional educational opportunity, and those who attended were awarded technical credit toward license renewal.

At the Annual Meeting and Election of Officers on Tuesday, Charles M. Decker, AIA, was elected to the chair of President of BOCA. He was unable to attend the conference, but it was clear that those present were in favor of his appointment. In addition to this auspicious event, the Baum Award was presented to Bob Lemon, construction official for Egg Harbor Township. He was so taken by the honor that he was speechless, but we were all proud of him anyway, given his work with the Code Advisory Board and the New Jersey Building Officials. Congratulations to both men!

All of us with licenses in the building, fire, electrical, and plumbing subcodes work together as the life safety team. Show your support to the team by taking an interest in code changes and by attending next year's BOCA conference in Indianapolis.

Source: Harry M. Clayton  
Construction Official  
Borough of Avalon

## ABSENTEEISM AT THE SEMINARS

During the spring semester, the Education Unit noted a sharp increase in the number of "no shows" at the seminars. We must resolve this problem, as it is expensive and causes inconvenience for your colleagues who would have attended if space had been available.

Registrations are limited for each seminar, both by the size of the hotel meeting rooms and by the instructors, which is why we cannot accept unlimited registrations or walk-ins. Since facilities often charge us according to the number of participants we are expecting, we have to pay for everyone who is registered, whether they show up or not. Since our funding comes from the State Training Fund, not showing up when you are registered costs YOU money.

Occasional errors or conflicts are unavoidable. If, by chance, you receive a confirmation for a course you did not select, or if you must cancel your registration because of a conflict or illness, it is imperative that you call the Education Unit at 609-530-8798 to have your name removed from the roster. Please extend this courtesy to your fellow inspectors. I'm sure they will appreciate the opportunity to attend in your place.

The names of "no shows" are being recorded and those who are making absenteeism a hobby may be notified, and action taken.

We are certain that we can resolve this problem with your cooperation. When your name appears on our roster we will expect you to be there.

Source: Susan McLaughlin  
Supervisor, Education Unit  
Bureau of Technical Services

## "HELLO, THIS IS REGULATORY AFFAIRS CALLING"

It has been almost a year now since I came to this Bureau and got involved in construction code enforcement. I've logged hundreds of calls, gone out (less than I would like) with field staff, and begun to appreciate the complexity of the job of code enforcement. I thought this a good opportunity to describe what the Bureau does, and some of the reasons why Bureau staff may contact a licensed official. It's nice to have the *Communicator* as a vehicle.

### Investigations

The first association made at any mention of Regulatory Affairs is often the Investigations Unit. We all deal with complaints and problems, but the Investigations staff follow through when violations of the UCC are alleged. Most complaints and questions are settled with phone calls or letters. Others become formal investigations and may ultimately result in penalties up to and including license revocation.

The other offices within Regulatory Affairs are not investigative in nature. Their functions, of course, could result in a referral to Investigations, and occasionally they do.

### The Monitoring Unit

We look to the Monitoring Unit to provide municipal assistance. Monitoring staff select towns on a random basis and respond to requests for help in reorganizing record-keeping systems from new construction officials.

Monitoring staff go out to towns, request files, and perform an administrative review of the construction office. Discrepancies are often found and a letter is sent to the town describing what was found, and how any problems can be fixed. Follow-up visits are made to check on progress. There is usually improvement, but occasionally the problems are numerous and follow-up visits show no improvement. Then we talk about it and discuss whether a referral to the Investigations Unit is called for.

The town's construction official is responsible for the administration of the office. Poor or spotty paperwork (plan review signoffs, prior approvals, inspection records, etc.) can be - and often is - a signal that code enforcement is equally poor or spotty.

### Direct Code Enforcement

Rarely, a "problem" project is brought to our attention and the problems cannot be resolved by the local enforcing agency. The Code permits the Department to take jurisdiction directly. The reasons for doing this can be legal or technical, but at the moment the Bureau is acting as enforcing agency for about fifteen projects. These situations have most often occurred as a result of an investigation, hence Regulatory Affairs' involvement.

### State Training Fees

State training fee reports and payments come in every three months from municipalities. Even if there is no new construction activity, the report is still due. We made changes early this year in the computer training fee tracking system and need to get reports to avoid including a municipality on a delinquency list. If we don't receive a scheduled report, letters go out. If a construction official ignores two successive letters, the Bureau will try to find out why, and/or use its authority under the Code to issue sanctions.

### Construction Activity Reports

The Bureau of Technical Services has gotten the CARS (Construction Activity Reporting System) running. This happened only after much planning, training, and set-up assistance, and they will continue to provide help as the system is phased over to Regulatory Affairs for input and enforcement. We are working with data processing staff and are contacting towns who send in wrong or incomplete reports. [See article on monthly reports by Henry Riccobene.]

A wealth of information is contained in those reports, whether sent in over a telephone line or through the mail. Over the next year or so, as the programmers work on it, we will be able to create reports from the information sent to Regulatory Affairs. Look for selected excerpts in future issues of the *Communicator*.

The information going out, of course, is only as good as the information coming in. Without 100 percent compliance in terms of those monthly reports, any overall report generated is inaccurate. The Code requires submission of the reports (again, even when there is no activity). Failure to send in reports (or sending in inaccurate reports) will distort the overall picture of construction activity in New Jersey, and is a violation of the Code.

### Private Agency Authorization

The Bureau authorizes private on-site inspection and plan review agencies. Many towns contract with these agencies to perform subcode functions. We review agency contracts with municipalities, monitor activity, and collect authorization and annual fees. When questions or problems arise, they are either resolved or referred to Investigations.

### Enforcement

Legal staff in this unit help Investigations staff throughout the course of an investigation. The unit also does much to prevent investigations by responding to such questions as what may or may not be a conflict of interest.

The Enforcement unit prepares any orders that may be appropriate, works with attorneys for litigants, and represents the Bureau in settlement conferences. Unit staff also respond to the many letters that raise legal and Code issues, and work with

(Continued on page 6)



(Continued from page 5)

the Attorney General's office in the course of ongoing litigation. Enforcement is also responsible for compliance with final decisions resulting from litigation.

Construction Boards of Appeals send the Bureau copies of all their decisions. It is Enforcement staff who review those decisions and contact the Boards of Appeals when questions arise as to correct Code interpretation, composition of the Board, or other legal issues.

This concludes an overview of Regulatory Affairs and what I hope has been a clarification of why you may find Regulatory Affairs staff on the other end of the line from time to time. To date, I have dealt with many code enforcement officials throughout the state, and have found the skills and knowledge of the vast majority of licensed officials to be impressive. The Bureau hopes to maintain that high level of quality.

Source: Vivian Lopez, Esq.  
Chief

Bureau of Regulatory Affairs

□

## MONTHLY REPORTS - CARS

The Construction Activity Reporting System (CARS) has been operating since January 1990. Over 200 municipalities are either transmitting their municipal monthly activity reports (Permits R812A and Certificates R811A) by modem or generating hard copy reports via UCCARS and forwarding them to DCA. The majority of municipalities are still completing and forwarding the reports required by the UCC administrative code. We are now entering these manually prepared reports into the CARS systems and have noted the following recurring problems:

Nonresidential use groups often are not itemized. All use groups must be itemized as required by BOCA.

Information covering "Public/Private Owned" and "Housing Units Gained/Lost" is sometimes not provided. Please be sure reports are complete before sending to DCA.

Wrong monthly report - some municipalities send the old monthly report (Form R810.) This form is no longer in use and will not be accepted. The current forms are R812A for permits and R811A for certificates.

A few municipalities send the actual permit and certificate logs and apparently expect DCA to complete the reports. All municipal enforcing agencies are responsible for completing their own monthly reports.

Some reports contain extraneous fee information such as zoning, resale certificates, etc. These reports are for UCC fees only. Also, please note that there is no need to include state training fees on the monthly report. State training fees are reported quarterly, on form R840A.

"Cubic Feet" and "Total Value Construction" columns are not completed on some of the reports: these columns must be completed on both reports when applicable. The "Cubic Feet" column must be completed when entry is made for "New Building Addition" column on either report. In cases such as tenant fix-ups or asbestos abatement permits/certificates where cubic feet have been previously reported or are not applicable, place "1" in the cubic feet column. This procedure is necessary only when no other cubic feet measurement has been reported for that particular use group entry.

Monthly reports that cannot be processed will be returned to the municipal enforcing agency for correction. Any questions or requests for assistance may be directed to Henry Riccobene at 609-530-8838.

Source: Henry Riccobene

Bureau of Regulatory Affairs

□

## UNDERGROUND STORAGE TANKS REQUIREMENTS AND PROCEDURES

On August 6th, 1990, the Department of Environmental Protection promulgated the Underground Storage Tank System Technical Requirements and Procedures (NJAC 7:14B). These rules became effective September 4, 1990. The rules address technical issues for underground storage tank systems including installation, closure, upgrading, and operating procedures, and also amend the Registration Requirements and Fee Rules which have been in effect since December 21, 1987. Within 30 days following promulgation, these new rules will be adopted by the Uniform Construction Code and will initially supersede any local municipal ordinances that currently exist. Municipalities will have the opportunity to retain ordinances that are more restrictive than the State rules. All underground storage tank systems are required to follow the full extent of the regulations, with the exception that residential heating oil tanks have to comply with certain portions only.

A permit from the Bureau of Underground Storage Tanks (BUST) is required for all new installations of underground storage tanks systems. The owner must submit a permit application with engineering drawings signed and sealed by a New Jersey Professional Engineer. Once the permit is granted, the owner must then obtain a building permit from the local code official, who will conduct the review. If the owner proposes to install an underground storage tank system with secondary containment (double-wall tank and piping or single-wall tank and piping within a lined excavation, or a combination of the two), then he or she is exempt from obtaining an installation permit from BUST. The signed and sealed plans and the building permit are still required, however.

All existing underground storage tank systems must be upgraded by September 3, 1991, with a monitoring system, corrosion protection, spill prevention, and overfill protection.

The owner or operator must obtain a substantial modification permit from BUST prior to upgrade, and must then obtain a permit from the local official in the municipality. Monitoring system choices include vapor, groundwater, and interstitial monitoring. In some instances, an in-tank monitor may be utilized along with an annual line test for the piping. Corrosion protection choices include the use of non-corrosive materials such as fiberglass, or cathodic protection for metallic systems which may be either sacrificial anodes or an impressed current system. Spill prevention can be satisfied by installing a spill catchment basin around the fill pipe to contain any spillage from the transfer hose. Overfill protection, at a minimum, will alert the transfer operator that the tank is nearing capacity. It can consist of either an automatic shutoff device, a restrictive flow device, or a high level alarm.

For the closure of underground storage tanks, the owner or operator must obtain a closure approval from BUST. The owner or operator must then obtain a demolition permit from the local official in the municipality. The tank must be removed whenever possible and a site assessment is conducted which, in most instances, will utilize groundwater monitoring wells to determine if any contamination is present. If contamination is discovered during any portion of the tank closure, then the facility must conduct a discharge investigation.

The Department of Community Affairs will provide a checklist replacing Bulletin 88-8 which will outline the requirements for installation, closure, and upgrading. In addition, technical guidance documents and interpretations of the regulations will be available.

If you have any questions about the underground storage tank program, the Tank Management Section within the Bureau of Underground Storage Tanks will be happy to assist you. They may be reached at 609-984-3156.

Source: Michael Kelly  
Tank Management Section  
Bureau of Underground Storage Tanks, DEP ☐

## AIR DISTRIBUTION SYSTEMS CONTROL

It is a common belief that the 1990 BOCA Mechanical Code (section M-307.0) requires smoke detectors to be installed in the return air duct only for HVAC units having rated capacity greater than 2000 cfm. This is not necessarily true. There are many situations when unit capacities below 2000 cfm need to be equipped with smoke detectors, such as when there is air transfer from one area to another in factory buildings, modular units, educational buildings, etc., or air intermixing. If such a situation arises and total air distribution exceeds 2000 cfm, all units must be equipped with smoke detectors with interlocking arrangements. Under such an arrangement, activation of one smoke detector must shut down all the units immediately. This is important and sometimes missed by the code enforcing agencies.

A word of caution: as per the 1990 BOCA Mechanical Code section M-1603, air shall not be recirculated or transferred to another occupancy of dissimilar use.

Source: Farid Ahmad, P.E.  
Supervisor, Code Assistance Unit  
Bureau of Technical Services ☐

## CONSTRUCTION OFFICIAL ASSUMPTION OF NEW MUNICIPALITIES

Construction officials newly appointed to municipalities sometimes find records to be either lacking or in disarray. If records and files exist, but the "housekeeping" is poor, it is necessary to put things in proper order as soon as possible to maintain effective operations. In cases where records are lacking, notify your superiors in writing.

If you have problems relating to records/files reconstruction, be sure to follow up on all apparently open permits, even if no inspections have been documented. This will allow Certificates of Approval/Occupancy to be issued and any added assessments made. If you are unsure about the proper documents to use in the administration of an enforcing agency, consult UCC subsections 5:23-4.5(b)2 for forms, and 5:23-4.5(c)1 for logs. Call 609-530-8838 if you need additional information or special assistance via the procedural clinic, a courtesy offered within the Department's Municipal Monitoring Program.

Source: Philip Van Leeuwen  
Bureau of Regulatory Affairs ☐

## UCCARS CONTRACT EXTENDED

The Uniform Construction Code Activity Reporting System (UCCARS) contract has been extended until July 31, 1991. Municipal Information Systems will provide training and technical support for municipalities using UCCARS.

Presently, 247 municipalities are using the UCCARS program. If you are interested in receiving training on the program, please call 609-530-8797 and ask for Susan McLaughlin or Bill Hartz. If you are already on the system and require technical support, call Municipal Information Systems at 908-789-3463 or 908-889-6000.

Source: William Hartz  
Chief  
Bureau of Technical Services ☐



## USING UCCARS

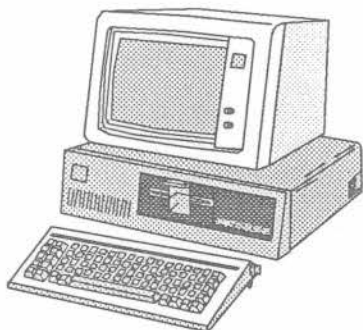
With hundreds of people now using the Uniform Construction Code Activity Reporting System every day, many users find themselves in situations that others have already been in, and often ask the same questions that have been asked before. So, we thought it would be a good idea to highlight in this column some of the more typical issues that users encounter with System I.

By far the most popular question we've heard is, "Why isn't there a way in the system to make corrections to a payment that had been input incorrectly?"

The answer is that there *is* a way, but it's not the way you're thinking of doing it.

The payment screen is different from the permit or certificate screen in that when you enter a permit and store it away, you can always call up that permit information to the screen, modify any data on the screen that you wish (including the fee amounts), and store the corrected or updated permit entry back to your hard disk. The corrections or changes you make completely override the old data. When you hit the <F2> key, everything on the screen is stored on your hard disk in the same place that the old permit entry was stored, and the old data no longer exists.

On the other hand, once you store a payment transaction into your computer, you can never call it back up to the screen. We did not forget to program in the ability to recall an existing payment record to the screen so you can modify it - this was omitted deliberately. The reason you cannot modify payment records once they have been stored is strictly one of security and data integrity. Auditors don't like people to be able to alter records of cash transactions.



OK, so you made a legitimate error when you entered the record of payment and typed in \$155 rather than \$150. No problem. Think of the record of payment data stored in computer like your checkbook entries. When you enter a wrong number for the check amount, it's usually not until several checks later that you realize your error. And the way that you make the correction is not by erasing the original entry, but by making a new entry (the difference between the amount you entered and the actual amount of the check) to adjust the current balance.

In UCCARS you correct wrong payment transactions in exactly the same way. You don't erase or modify the original entry - the auditors wouldn't like that. Instead, you post another entry which adjusts the amount of payment you've received. It's not so important that an individual payment record has the wrong amount. What is very important to you is that the total of the amounts in all the payment and adjustment records for a given permit is correct. And what is of utmost importance to the auditors is that no payment entry is ever modified - rather, additional, adjusting entries are posted when corrections are required.

To post an adjustment, go back to the Main Menu. Select "Enter Data," and enter your third-level password (default is "PWD3"). Now you can select the Adjustment screen. Note that if you are using a lower level of password, UCCARS will not let you into the Adjustment screen.

Now enter the number of the permit, permit update, or certificate that has the wrong payment amount. The upper right corner of the screen will display the total amount of the fees, the total amount of all payments and adjustments that have been posted, and the balance due. If the balance due is zero, stop here; no adjustments are necessary.

Going back to our example above, if the fees were only \$150 but you recorded \$155 in payments, the balance due will show up as -\$5. This means that the applicant overpaid by \$5. Fill out the rest of the screen with your initials, the adjustment date, and the adjustment amount which would be -5 (exactly what is shown for balance due). At this point hit the <F2> key to store the adjustment record.

To see if you made the correction properly, call up the Payment screen and enter the permit number for which you just made the adjustment. In the upper right corner, the total amount of all payment and adjustment transactions should equal the total amount of the fees (\$150), and the balance due should be zero. Also, your Cash Receipts Audit Report should now reconcile. The total of the three columns marked Cash, Checks, and Amount Adjusted should equal the total actual payments taken in.

### Tip for Reconciling

While we're on the subject of the Cash Receipts Audit Report, the most common problem users experience in reconciling it is caused by a payment transaction missing from the report. This generally occurs because the Received Date has been mistyped when the Record of Payment was entered.

When you print the cash audit report and select 'R' for Received Date, UCCARS scans all of the payment and adjustment records in the database and selects only those whose Received Date falls within the date range you specified for the report to cover. If, for example, you erroneously entered "08/08/80" instead of "08/08/90" for a particular payment, that payment

will never show up in any of this year's reports. To find the missing payment record, specify that the report is to cover Posted Dates rather than Received Dates.

When you store a payment record, UCCARS automatically stores the actual time and date at which the record is being stored along with the payment information you typed on the screen. This is called the Posted Date. It is derived from the internal clock/calendar built into your PC, and thus is not subject to typing errors.

So, if the Received Date has been mistyped on the Payment screen, you may never print out a Cash Receipts report whose date range covers the mistyped date. The way to find this missing payment record is to print out a report that selects on the Posted Dates of the payment records, and to specify a date range that covers the period during which the error was made.

Source: Stan Kosciuk  
President  
Municipal Information Systems



## BELOW GRADE PARKING IN FLOOD HAZARD AREAS

### A Zones - Residential Structures

Below grade parking areas are prohibited since the lowest floor (including the basement) of such structures must be elevated to or above the base flood elevation. Enclosed parking areas that are at or above grade are permitted, provided that the openings requirement is met in accordance with Section 2101.6.3.3 of the BOCA National Building Code/1990.

### A Zones - Nonresidential Structures

Below grade parking areas are permissible if they are floodproofed in accordance with Section 2101.6.3.4 Water Resistant Construction, BOCA National Building Code/1990 and 44 CFR 60.3(c). The entrance to the garage can either be at or above the base flood elevation or closures can be used if there is sufficient warning time. The parking areas are generally used only during normal working hours and there are full-time staff available to evacuate any vehicles and implement the floodproofing measures in case of a flood emergency.

Enclosed parking areas with floors that are at or above grade on one or more sides are above grade enclosures and are permitted, provided that the openings requirement is met.

### A Zones - Mixed Use Structures

A mixed use structure having only nonresidential commercial uses on its first floor can be considered a nonresidential structure for the purpose of applying Section 2101.6.3.4 and 44 CFR 60.3(c). Below grade parking can be permitted under the same conditions as nonresidential structures.

### V Zones (Velocity Zones) - Section 2101.6.4 High Hazard Zones, BOCA National Building Code/1990

Below grade parking is prohibited in V Zones. National Flood Insurance Program (NFIP) criteria 44 CFR 60.3(e)(4) requires the "bottom of the lowest horizontal structural member of the lowest floor" to be elevated to or above the base flood elevation. This requirement cannot be met, since the floor of the parking garage is the lowest floor of the structure.

Enclosed parking areas that have floors at or above grade are permitted, provided that they are constructed with non-supporting breakaway walls, insect screening, or lattice work and meet the requirements of Section 2101.6.4.2(4) and provisions of 44 CFR 60.3(e) and (a)(3).

Enclosed parking areas that have floors at or above grade on one or more sides, but below grade on one side or sides (similar to a walkout basement) are also considered to be above grade enclosures and are permitted, provided that they are constructed with non-supporting breakaway walls. However, an added design problem is that any below grade walls must function both as breakaway and retaining walls in the below grade areas of the enclosure. Otherwise, if scour and erosion were to occur, the retaining wall would become an obstruction and would transmit additional wave forces to the piles and columns.

In addition, all construction must meet the requirements of Section 2101.6.11.3.

If you have any questions, contact Bruce Wallauer, Flood Plain Management Section, NJ Department of Environmental Protection, CN 401, Trenton, NJ 08625-0401, or call 609-292-2296.

Source: Clark D. Gilman, P.E.  
Section Chief  
Flood Plain Management Section



## THE NEW REROOFING CODE

The Code Assistance Unit of the Bureau of Technical Services has been receiving many calls from roofing contractors, homeowners, and code officials about the new reroofing codes under Section 2308.3 of the BOCA National Building Code/1990 (also found in the 1989 Supplement to the 1987 Code). This article is intended to alleviate the confusions that persist among all concerned.

An important question is whether a new roof covering can be installed over an existing roof covering of wood shingles, wood shakes, or both. To answer this question, let us first differentiate wood shakes from wood shingles. *Wood shakes* are a roofing product split from logs and then shaped as required by the individual manufacturers. This type of covering does not provide a uniform, level base for a new covering, and therefore must be removed prior to reroofing (see Section 2308.3 Condi-

(Continued on page 10)

(Continued from page 9)

tion #2 of BOCA 1990). *Wood shingles* are a sawed wood product with a uniform butt thickness per individual length and can provide an acceptable base. Therefore, the new roof covering can be applied over the existing wood shingles, as long as the existing roof and shingles are not water-soaked or deteriorated to the point that they could not provide a suitable base for a new covering (see Section 2308.3 Condition #1 of BOCA 1990). Standards for code enforcing agencies to follow for wood shingles and wood shakes are specified under Sections 2305.2.8 and 2305.2.9 of the 1990 BOCA Code.

Section 2308.3 Condition #2 further prohibits new roof covering over existing slate, clay, cement, or asbestos-cement tile roof coverings. Section 2308.3 Condition #3 prohibits new roof covering over an existing roof having two or more applications of any type of roof covering. Exceptions, however, apply where new roof coverings do not rely on existing coverings for support and all roof loads are transmitted directly to the building's structural system.

Source: Farid Ahmad, P.E.

Supervisor, Code Assistance Unit  
Bureau of Technical Services

□

### PLAN REVIEW VS. PLAN RELEASE: THEY ARE NOT THE SAME

After reviewing approximately 150 municipalities for the Municipal Monitoring Program, we have found that many construction officials make no distinction between plan review and plan release. We would like to clarify the distinctions.

#### Plan Review

After completing a physical review of a set of plans, subcode officials must document their reviews (with name or initials and date) either on the plans or on the technical sections. If no plans are required, just check, sign, and date the "No Plans Required" block.

#### Plan Release

The plan release function simply attests to the fact that all pertinent subcode reviews have been made and documented. After ascertaining that all subcodes have appropriately documented their plan reviews, the construction official must sign and date the plans to indicate his or her release of the plans for construction (see NJAC 5:23-2.16(e)).

The best way for all technical staff to determine the status of a set of plans is to have a six-line rubber stamp made and to use it on all plans. The six lines on the stamp should read: PLANS RECEIVED; BUILDING SUBCODE; ELECTRICAL SUBCODE; FIRE SUBCODE; PLUMBING SUBCODE; and CONSTRUCTION OFFICIAL.

Please direct questions relating to this topic to Philip van Leeuwen at 609-530-8838.

Source: Philip van Leeuwen

Bureau of Regulatory Affairs

□

### RECENT CODE MODIFICATIONS

The following is a continuation of the complete list of *New Jersey Register* entries of code change adoptions since the Summer 1990 *Communicator*. The numbers after the date indicate volume and page.

<i>NJ Register</i> Date	Adoption
6/18/90	22NJR 1915(b): Industrialized and Modular Buildings. Adopted Amendments: NJAC 5:23-1.1, 1.4, 3.11, 4.1, 4.12 through 4.15, 4.21, 4.22, 4.24, 4.26, 4.29, 4.31, and 4.39. Adopted Repeals: NJAC 5:23-4.25, 4.27, 4.28, 4.30, 4.32 through 4.38. Adopted New Rules: NJAC 5:23-4A. 22NJR 1947(a): Public Notice, Effective Date of Model Code (Energy).
7/2/90	22NJR 2001(a): Uniform Fire Code Tent Permits. Adopted Amendments: NJAC 5:18-2.7 and 5:23-3.14.
8/6/90	22NJR 2266(b): Electrical Subcode: NJAC 5:23-3.16. 22NJR 2267(a): Barrier Free Subcode. Adopted Amendments: NJAC 5:23-7.2 through 7.6, 7.8, 7.9, 7.11, 7.12, 7.17, 7.18, 7.30, 7.37, 7.41, 7.55 through 7.57, 7.61, 7.67, 7.68, 7.71 through 7.73, 7.75, 7.76, 7.80 through 7.82, 7.87, 7.94 through 7.97. 22NJR 2275(a): Records Retention. Adopted New Rule: NJAC 5:23-9.5.
8/20/90	22NJR 2503(b): Administrative Correction, Uniform Construction Code. 5:23-2.2(b), 2.10(a), 2.14(d), 2.15(b), 1. and 4, 2.37(a), 3.9(b) and (c), 3.11, 3.11A(c), 4.3(d)4., 4.9(a)1., 4.10(a) and (a)1., 5.2(a)1. and (b)2.i, 5.4(d)2. and (d)2.i, 5.5(a), 5.6(a)2., 5.7(a)2, 5.20(a)(b)2. and (b)5.ii(1), 5.21(d)1. and (f), 5.22(a)3., 5.23(a), 5.24(a), (b)8 and (d).

Source: E. Maria Roth

Code Assistance Unit  
Bureau of Technical Services

□

## ASSOCIATES DEGREE IN CODE ENFORCEMENT

An associates degree in construction code enforcement may be a reality by January 1991, through Atlantic County College. If you are interested in the degree program, whether you are presently licensed or considering a possible career in code enforcement, call Mr. James Foran at 609-343-4984. Your name will be taken, and Mr. Foran will get back to you.

Source: William Hartz  
Chief  
Bureau of Technical Services



The *Construction Code Communicator* is published by the New Jersey Department of Community Affairs in cooperation with Rutgers University's Department of Government Services. Editor: Hilary Bruce. Questions, comments, or suggestions may be directed to William Hartz, Chief, Bureau of Technical Services, CN 816, Trenton, NJ 08625-0816.

---

## JOB BANK FORM

The job bank brings together people offering jobs in code enforcement and licensed code officials seeking employment. To be included in the job bank, please complete this form and return it to: **NJ Department of Community Affairs, Division of Codes and Standards, Bureau of Technical Services, Licensing Unit/Job Data Bank, CN 816, Trenton, New Jersey 08625-0816.**

If you are already included in the job bank because you submitted a form earlier, it is not necessary to complete this form. Your name will remain on the list.

### PLEASE PRINT OR TYPE

NAME: \_\_\_\_\_

LICENSE NO.: \_\_\_\_\_

PHONE: \_\_\_\_\_

LICENSES HELD FROM THIS BUREAU:

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

SIGNATURE: \_\_\_\_\_

DATE: \_\_\_\_\_



# Construction Code Communicator



State of New Jersey  
Jim Florio, Governor

Department of Community Affairs  
Melvin R. Primas, Jr., Commissioner

Volume 2 Number 4

Winter 1990

## WE, THE SERVANTS OF THE PEOPLE

You can take courses in all kinds of things these days. Take a look at your community school adult education offerings. I haven't seen one yet on "How to Pack a Suitcase" (although it must be out there), but otherwise, training generally seems to be offered where there's a need.

There are even courses offered in Dealing with Difficult People and Dealing with the Public. Success in these areas can depend on the personalities involved. Delivering bad news, for example, in such manner as to gain respect untainted by personal animosity, is a difficult, and sometimes impossible, objective to achieve. Success can be a function of what's at issue. The recipient of a Notice of Violation and Order to Terminate can react in such a way as to flavor all future dealings with the issuing official.

Why this article out of Regulatory Affairs? Investigators in Regulatory Affairs respond to complaints. Most often, those complaints revolve around how the Uniform Construction Code is being enforced locally. But, also often, the "how" does not involve an alleged technical or administrative Code violation. Those can be investigated and ultimately resolved. What's more difficult is to address complaints that boil down to one of two problems: not taking the time to explain; and occasionally, what sounds like just plain rudeness.

The investigators spend a lot of time listening to telephone complaints, and explaining (particularly to homeowners) why a code official took a particular action. The "outer limit" extreme involves the official whose ego or, worse yet, lack of knowledge of the Code has prompted some version of the "this is my town and you'll do it my way" statement. Sometimes the official is right, and sometimes the official is wrong.

The code official's position is a powerful one. Even the proper exercise of that power can cause financial hardship and radically affect lives. And there is considerable flexibility: to grant a time extension or not; to impose a fine or not; to issue a violation or allow a correction, etc. One unsatisfactory and potentially dangerous way of dealing with the power is to back away from its use and overlook Code violations. Another, usually unsatisfactory, way is to go beyond the Code because you have the power to do it. In either case, it is the rare personality that can resist being affected in some way by the position.

Do you react negatively to negative, unpleasant people? Positively to positive, friendly people? Do you make the time to explain the "why" of what has to be done? Do you permit your reaction to influence your code enforcement actions? Regulatory Affairs does not, and cannot, take action against a licensed official for non-Code complaints. But Regulatory Affairs staff deal with these complaints on a daily basis. This type of complaint could be eliminated by an increase in care taken by the licensed official to explain, to clarify, to exercise authority in a fair and reasonable manner.

In other words, the question must be asked: Are you successful in preserving the delicate balance between the exercise of your considerable power on the one hand and your position as public servant on the other hand? How do you rate yourself?

Source: Vivian Lopez, Esq.  
Chief, Bureau of Regulatory Affairs

✱

### In This Issue

Alterations Mandated by Other Codes .....	5
Barrier-Free Advocates .....	4
Change of Use .....	11
Construction Project Review .....	5
Directory of State Programs .....	12
Dwelling Separations .....	3
Elastomeric Sealing Sleeves .....	3
Electrical Work in Schools .....	4
Fire Protection Inspector .....	4
Foundation Plans from Engineers .....	8
Freezer Floor Drains .....	7
Industrialized Buildings .....	6
Load Management .....	9
Made Electrodes .....	2
New Jersey Register Adoptions .....	12
Nonconforming Materials Approvals .....	8
Open Permits .....	10
Permit Numbering .....	4
Servants of the People .....	1
Spring 1991 Seminars .....	2
UCCARS Equipment .....	10
Unsafe Buildings .....	11
Using UCCARS .....	9



## MADE ELECTRODES

Keeping the resistance of selected made electrodes as low as possible is one of the most important aspects of a properly grounded system. This aspect is not given enough attention by electrical contractors and subcode officials, especially in residential buildings with non-metallic water service. The purpose of a low resistance common grounding electrode is to limit the voltage to ground of the grounded conductor, as well as equipment and conductor enclosures, to reduce the possibility of shock hazards and serious damage to electrical components.

While the lowest practical resistance of the grounding electrode is desirable and will better limit the voltage to ground, it is more important to provide a low impedance path through the grounded conductor to clear a fault promptly, because a voltage to ground fault can occur only during the periods in which a fault exists. The path through the electrodes represents high reactive parallel path of ground fault and thus will not divert any appreciable amount of current sufficient to operate the over current protective device from the main relatively low reactance path. Hence, the grounding electrode system generally has no role in clearing faults in solidly grounded systems with actual utilization voltages. Fault clearing is more of a factor on medium and high distribution voltages.

In this light, if the resistance of a rod, pipe, or plate electrode exceeds 25 ohms, an additional electrode must be installed in parallel, at least 6 feet away. Note that the second electrode is all that is required by Section 250-84 of the NEC, even if the combined resistance still exceeds 25 ohms.

This resistance to ground depends on certain factors like soil resistivity, shape of electrode, moisture content, and presence of corrosive agents in soil. Inspectors must be aware of the conditions and resistivity of the soil in their areas. If in doubt, electrical subcode officials may require the installation of two electrodes unless the contractor can prove by test that the first electrode is sufficient. Provisions for such tests are covered in NJAC 5:23-2.19.

Source: Ashok K. Mehta  
Code Assistance Unit  
Bureau of Technical Services



**Right:** Michael Kelly, from the Bureau of Underground Storage Tanks, Department of Environmental Protection, instructs at "Underground Storage Tanks," one of the many seminars BUST provides for code officials. This popular seminar will be offered four times during the spring 1991 semester.

## SPRING 1991 SEMINAR BROCHURE

Watch your mailbox during the month of January for the new Rutgers brochure of Spring 1991 seminar selections. The brochure will have a new format: all disciplines will appear under one cover. We tried the one-brochure approach last year with the Building Safety Conference material. It was very cost effective, less confusing, and easier to mail. You'll just need to be careful that you sign up for courses in the appropriate discipline! Since each course number is preceded by a letter designating the discipline - B for building, F for fire, E for electrical, P for plumbing, and A for administrative - this shouldn't be too difficult.

Early in February start looking for your biannual transcript from ETS. This will reflect the seminars you have already taken during the current licensing period, which will in turn help you determine what you'll need to complete your educational requirements before your license expires. Please refer to this transcript before you make any course selections for Spring '91. Also, think about saving a seminar or two for the 1991 Building Safety Conference. You'll be receiving that brochure toward the end of February. If you have any questions, please call the Education Unit at 609-530-8798.

Source: Susan H. McLaughlin  
Supervisor, Education Unit  
Bureau of Technical Services



## ELASTOMERIC SEALING SLEEVES

To be allowed or not to be allowed - that is the question. Elastomeric sealing sleeves, used to join sections of pipe that are part of the drain-waste-vent system, are not a new product. However, there still seems to be some controversy about whether they are permitted or not.

The answer is this: if the fitting material meets ASTM C564-76, which the National Standard Plumbing Code (NSPC) recognizes as an appropriate standard for neoprene rubber materials, the fittings are acceptable. The NSPC recognizes the acceptability of this joining method in several sections of Chapter 4, Joints and Connections (see 4.2.11.1, 4.2.11.2, and 4.3.8).

When the sleeves are unshielded, however, the neoprene itself does not resist shears and bending movements well. Therefore, some method of support is needed if the joint will be subject to these stresses. This may mean installing a hanger on each side of the joint, or providing continuous support under the joint such as a cradle for above-ground installations or proper bedding for underground installations.

In conclusion, elastomeric sealing sleeves are permitted if installed properly.

Source: Michael Baier  
Code Assistance Unit  
Bureau of Technical Services



## DWELLING SEPARATIONS

When you have established the absence or presence of a lot line between dwellings, you have taken the most important step in arriving at the correct type and fire rating of the separating assembly. Section I below gives the regulations for dwellings without lot lines between them, and Section II offers two choices for dwellings on separate lots.

### I. No lot lines between units

Two-family dwellings built according to CABO use group R-4 need a 1 hr. fire-resistive rated assembly (CABO Sect. R.218) for separation. The same is true for two-family dwellings built according to BOCA (Table 401 line 5). The multiple (more than two) single-family dwellings defined at BOCA Section 309.4 require a 2 hr. rated fire partition or a 1 hr. rated partition and fire sprinklers throughout.

### II. Lot lines between units

Attached dwellings can utilize either two adjacent exterior-type walls or a party wall between them to meet the fire-resistive requirements, either:

A. Adjacent exterior walls need no weather resistive membrane since, as BOCA magazine of Dec. 1985 states, they "are not exposed to the elements." CABO at Section 202.1 and BOCA at Table 401 line 1 modified by Section 905.2 require each such adjacent wall to be an assembly rated 1 hr. for exposure to fire from both sides. At the roof on either side of such a combined wall, CABO has no special fire protective requirement and BOCA at Section 905.6 specifically exempts R-3 structures from the parapet requirement and its alternative roof treatment.

or:

B. The single shared party or common wall must have a 2 hr. rating and either continue above the roof as a parapet or provide the fire-resistive alternative at the roof sheathing or deck. CABO at Section R-202 does allow properly rated combustible wall assemblies, but BOCA at Section 907 specifies "non-combustible material."

In order to assure that important terms in this article are understood as intended by the Codes, they are defined as follows:

*Condominium, co-op, and row house* are real estate terms only, and not applicable to code enforcement.

*Fire wall:* A fire-resistance rated wall, having protected openings, which restricts the spread of fire and extends continuously from the foundation to or through the roof (see Section 907.0).

*Lot line and property line* are used interchangeably by BOCA and CABO to denote the border of a parcel of land.

*Party wall* (See BOCA "Wall" definitions): A fire wall on an interior lot line used or adapted for joint service between two buildings.

*Townhouse* appears in CABO only: "Single family dwelling unit constructed in a row of attached units separated by property lines and with open space on at least two sides." This definition is more limited than the common real estate application of this term.

Please note that buildings of use groups R-3 and R-4, construction classification 5 as regulated by BOCA/1990 and 1989 CABO, are the only subjects of this discussion. Mixed use separation regulations are not covered here.

Now to sum up: first, determine if there are individual lot lines. If not, apply Section I. But, if a dwelling stands on a parcel of land which is individually owned by the dwelling owner and bordered by lot lines, apply Section II, A or B.

Source: E. Maria Roth  
Code Assistance Unit  
Bureau of Technical Services



## BASIC FIRE PROTECTION INSPECTOR RESPONSIBILITIES

There appears to be some ambiguity regarding specific subcode responsibility for various inspection elements of some buildings. In the case of a single-family residence, the fire protection subcode inspector must inspect all such new structures (including additions) for the presence and operation of smoke detectors and heating unit installations. In many municipalities, the electrical inspector checks the smoke detectors. A Fire Subcode Technical Section (UCC form F-140A) must be issued in all cases and inspections annotated as well as that for plan review.

Source: Philip van Leeuwen  
Bureau of Regulatory Affairs

✱

## BARRIER-FREE SUBCODE ADVOCATES

During the past year, the Education Unit of the Bureau of Technical Services has held three training sessions for barrier-free subcode advocates; nearly 150 advocates have been trained. The comprehensive, two-day session includes a section-by-section review of the Barrier-Free Subcode and a clear delineation of the responsibilities of a barrier-free advocate.

The primary responsibility of the barrier-free advocate is to provide testimony at hearings held by the Construction Board of Appeals. Occasionally, the advocate may be asked by a construction official for an opinion on accessibility. It is important for all concerned to recognize that the barrier-free advocate can give an opinion only; the advocate **cannot** make a technical judgment and **cannot** give an interpretation of either design or law. Barrier-free advocates may not charge a fee for their services.

The Education Unit is in the process of collating an updated list of barrier-free advocates. The list is arranged by county and includes the names of all the trained advocates willing to serve in the county. Once complete, the list will be mailed to all county offices on the handicapped. A construction official or a member of the Construction Board of Appeals who would like the names of barrier-free advocates in his or her area should call the Education Unit in the Bureau of Technical Services or the Office of Code Development in the Construction Code Element.

Source: Emily W. Templeton  
Code Development Unit

✱

## PERMIT NUMBERING

During our enforcing agency monitorings, we encounter some very unusual numbering sequences for permits. Standardizing permit numbering sequences statewide is recommended as follows:

On the first business day of each new year, begin permit numbering by utilizing the last two digits of the year and -0001 and so on. As an example, your first permit number for 1991 will be 91-0001. This will allow you to easily compare your permit traffic with any past year by comparing dates of issuance. Note that this system is compatible with the UCCARS system. When all open permit files are consolidated in such order separately from closed files, you have, in effect, a perfect tickler file for following up on open permits, since they are issued on a chronological basis by permit number.

In no case should numbers preprinted on receipt books be used. Be sure to issue only *one* permit number per job instead of numbering each subcode separately (we have seen this in some municipalities). All permit updates should have the same number as the original permit. Never continue numbering through from one year to the next, but start at -0001 on January 2 of each year, as described above. And incidentally, when issuing certificates, make the certificate number the same as the permit number for the same job.

Source: Philip van Leeuwen  
Bureau of Regulatory Affairs

✱

## ELECTRICAL WORK ON SCHOOL PREMISES

Frequently, concerns are raised by code officials about the exemptions provided under the Electrical Contractor's Licensing Act of 1962, which permit one of the regular employees of a school district to perform electrical installation work even without having the electrical contractor's license. Uniform Construction Code regulations under NJAC 5:23-2.14 and NJAC 5:23-2.18 concerning the issuance of permits and inspection of work are still applicable for all electrical works performed on school premises.

The Uniform Construction Code is more concerned about the end result - that is, the quality of construction work for the purpose of ensuring safety to life and property. For this reason, code officials should be more alert when performing inspections in schools of electrical work which may have been done by an unlicensed electrician who happens to be a regular employee of the school district.

Source: Ashok K. Mehta  
Code Assistance Unit  
Bureau of Technical Services

✱

## ALTERATIONS MANDATED BY OTHER CODES

The purpose of section NJAC 5:23-2.4(a)7 of the State Uniform Construction Code, as explained during its adoption, is to ensure that alterations mandated under any maintenance code do not trigger the need for strict conformance with all other requirements of the State Uniform Construction Code.

Section NJAC 5:23-2.4(a)7 makes it clear that property owners of existing buildings cited under any fire or property maintenance code(s), such as the State Uniform Fire Code, regulations under the Rooming and Boarding House Act, regulations for the Maintenance of Hotels and Multiple Dwellings, or any other State or local maintenance code, will have to comply only with those codes. They shall not, as a consequence of their attempt to comply, become subject to higher standards imposed by any subcode adopted under NJAC 5:23, the Uniform Construction Code.

Hence, construction officials shall not insist that alterations mandated under various maintenance codes must conform to the regulations of the Uniform Construction Code unless the code requiring the alterations so requires. A bulletin will be issued by the Department concerning this issue.

Source: Farid Ahmad, P.E.  
Supervisor, Code Assistance Unit  
Bureau of Technical Services



## REVIEW COMMENTS WITHIN 20 DAYS? YES WE DO!!

Contrary to popular opinion, the Bureau of Construction Project Review does return plan review deficiency comments within 20 business days. Believe it or not, we've been doing that for almost two years. Although from time to time certain subcode reviews did not meet the 20-day requirement, for the most part comments were returned in a timely manner. This delay was primarily due to our inability to fill vacancies because of various hiring freezes. Most of that is behind us now, and although there are still a few vacancies, the deficiency comments are being sent out in a timely manner.

All too often we hear the complaint that we require too much detailed information on the drawings. The consultants should keep in mind that this bureau does not have the opportunity to perform field inspections. Also, we cannot assume that all contractors or local code officials know all the code requirements from memory. Consequently, if all the appropriate information is on the drawings or in the specifications, then one can just refer to those documents at the job site, and code compliance is relatively simple matter.

In order to assist the applicants, a Plan Review Application Guide has been developed by the bureau and is provided to all applicants. A series of checklists is included in the guide to help the applicant understand what must appear on the drawings and in the specifications. The most common omission made by applicants is the failure to read the checklists! We didn't develop them for our health; they are a simple tool designed to help us all work more efficiently. If you have a question regarding an item on the application or checklist, please call us. A phone number is provided in the guide for just that purpose.

A few of the most common omissions are as follows:

1. Not signing and sealing the drawings (A/Es check the licensing laws)
2. No soil certification
3. No structural calculations
4. No electrical grounding details
5. No HVAC or energy calculations (remember the energy crisis)

Again, I cannot emphasize enough the importance of reading the Application Guide, and especially those checklists, to help keep these omissions to a minimum.

Over the last few months we've been hearing that "we're in an economic slow-down." Well, so far that doesn't apply to the Bureau of Construction Project Review. There are approximately 370 active projects in various stages of review, and new submissions are still coming in at the same pace as last year. I never thought I would be hoping for a little slowdown just so we could catch our breath and fine-tune our procedures!

Enough on plan review. I would like to digress for a moment, and briefly reflect on the past. It wasn't that long ago that this bureau was carrying over 700 active projects. Reducing that number and achieving the 20-day turnaround should not be credited to the bureau chief. Part of the credit should go to my superiors, who provided the necessary computer equipment and fought for the additional positions necessary to hire additional plan reviewers and inspectors. They also gave me a great deal of latitude in managing this bureau, for which I thank them.

The greater portion of the credit for the bureau's success should go to the plan reviewers, team leaders, and clerical staff who continued to grind out all the reviews, send out the correspondence, follow up on delinquent projects, and keep the computer data and files up to date. To all of them, whose names seldom appear in print and who rarely receive public recognition, I would like to express my sincerest gratitude for all their efforts.

Source: Arthur Lange  
Chief, Bureau of Construction Project Review  
Acting Chief, Bureau of Local Code Enforcement ✱



## INDUSTRIALIZED BUILDINGS: NEW & REVISED REGULATIONS

Recently New Jersey adopted new and revised regulations for industrialized buildings. The regulations now permit certification of industrialized building units under the following two categories:

(a) Units manufactured by New Jersey-approved manufacturers/New Jersey-authorized inplant inspection agencies (IPIA) in conformance with the Uniform Construction Code (UCC) and its subcodes.

(b) Units manufactured by other states recognized by New Jersey because their codes and code enforcement systems are equivalent to New Jersey's.

This article will address documentation, insignia, data plate requirements, and code enforcement responsibility related to category (a) insofar as they relate to the responsibilities of local officials.

### Documentation

#### A. For factory-built portions of the construction:

Submission shall be in accordance with NJAC 5:23-4A.11(a)2; i.e., a schematic floor plan and elevations with the manufacturer citing the Department's or IPIA's identifying numbers. The manufacturer shall certify that the schematic plans are in accordance with the Department's or IPIA's approved plans. The submission should also include all field installation and connection details needed to assure code compliance as installed.

#### B. For site-built portions of the construction:

Necessary plans shall be prepared by an architect or engineer licensed in New Jersey (ref. NJAC 5:23-4A.11(a)3). Plans for the site-built portion of the work should include the same level of detail as any other site-built work. The plans should also show any connection or installation details needed to ensure proper installation of the factory-built portions on the site. The review and approval of such plans shall be in accordance with NJAC 5:23-4A.11(a)3.i and ii and shall be completed by:

1. The Department; or

2. The local enforcing agency for those types of industrialized/modular buildings and components listed in NJAC 5:23-4A.8(a).

### Insignias

All units shall have appropriate New Jersey insignias (labels) in accordance with NJAC 5:23-4A.12(b) and (c), and 4.31(a) and (b); i.e.,

1. One modular unit insignia for each dwelling unit.

2. One modular unit insignia for each module (box) other than residential.

### Data Plates

All modular buildings and building components shall have a data plate containing the information listed in NJAC 5:23-4A.9(d) and if required, 4A.12(c)2.

### Responsibility

The new rules return plan review responsibility for Class III buildings to local jurisdiction. The Department assumed all plan review responsibility for both factory-built and site-built portions of all premanufactured construction except low-rise housing several years ago. This action was the result of numerous code problems discovered by the Department in new buildings utilizing factory-built construction. Those problems were often the result of confusion about which parts of the construction local officials were responsible for and which parts the inplant inspection agencies authorized by the Department were responsible for.

The Department is returning full jurisdiction for Class III to local agencies because it is now confident that with the new rules, and with improvements in the inplant inspection system which have taken place in recent years, the code can be well enforced at the local level. If this delegation of Class III structures incorporating premanufactured construction goes well, then the Department intends to delegate Class II and Class I work as well to all appropriately classified local agencies at some time in the future.

It is important, therefore, that local agencies understand and carry out their responsibilities in connection with industrialized buildings. These responsibilities are as follows:

**Plan Review:** The agency having plan review responsibility for the site-built portion of the work (DCA or the local enforcing agency) is responsible to ensure that the entire building conforms to the code. It should not be assumed that it will comply simply because the factory-built components carry a label. That label only certifies that those components are in accordance with the requirements of the code and information on the data plate regarding construction type and allowable loads, etc.

The agency having plan review jurisdiction should ensure that all site-built portions of the work conform to the code and, equally important, that the entire structure conforms to the code for things which depend on the arrangement of the factory-built components such as height and area, travel distance, and other code requirements. In carrying out this plan review responsibility, the Department or local enforcement agency must assume that all parts of the factory-built portions of the work comply with the code and are as represented by the information on the data plate. It is neither necessary nor permitted for the local enforcing agency or Department plan review staff to review plans for the factory-built components. That is the responsibility of the Department-approved evaluation and inspection agency which applies the label.



**Inspection:** The local enforcing agency is always entirely responsible for the site inspection of buildings which include state-labeled, factory-built portions as the construction progresses. The local enforcing agency is responsible to ensure that:

1. All the construction is in accordance with the approved plans.
2. The factory-built portions of the building are free from any apparent transit damage and that everything that can be visually inspected without any disassembly is in accordance with the code.
3. The factory-built portions are correctly installed and in accordance with the installation and connection plans and details which are required to be submitted with the permit application for the building.
4. Certificates of occupancy should be handled in the same way as those for conventional site-built structures. The rules, policies, and responsibilities of the local enforcing agency should be the same for both types of construction.

Finally, the responsibilities of the local enforcing agency when there are apparent violations in the factory-built portions of the construction need to be understood. Whether the suspected problem comes up at the plan review stage or on inspection, the local agency does not have the authority to order corrections. Responsibility for the factory-built portion rests with the Department-approved evaluation and inspection agency which applied the state label. Accordingly, suspected violations should be brought to the attention of the Bureau of Code Services. The Bureau will contact the evaluation and inspection agency and resolve the problem. The local enforcing agency will be informed of the outcome. Local enforcing agencies may not withhold permits or certificates of occupancy over alleged violations in the factory-built portions of the work that cannot be visually inspected. Only the Bureau of Code Services can order the withholding of a permit or a certificate in such a case, so it is important that the Bureau be notified as soon as possible when a local enforcing agency has such a concern. The local enforcing agency is, however, obligated to withhold permits and certificates and take such other enforcement action as may be necessary when there is a violation which involves the site-built portion of the work, the installation and connection of the factory-built portion, or which results from the way the factory-built components are arranged when they are assembled into a complete building.

Our intention is to include an article addressing units manufactured and certified through reciprocity in a future issue of the *Construction Code Communicator*. However, construction officials should be aware that the factory-built portions of such construction must bear a New Jersey label in addition to the label of the other state recognized by New Jersey.

Source: Robert Kaleita  
Supervisor, Industrialized Building Unit      \*

## THE FLABBERGASTING FREEZER FLOOR DRAIN

A code change regarding the installation of drains in freezers, coolers, and other refrigerated equipment has been received somewhat coldly by some plumbing inspectors. Pardon the pun, but because of a code change that appeared in 1989 to section 7.16.4 of the National Standard Plumbing Code, the controversy over such installations is starting to heat up. The code presently states that floor drains shall not be installed in walk-in freezers, coolers, or any refrigerated equipment, making it seem as though supermarkets and other establishments who want a drain are left out in the cold (enough already!).

When you get down to the nitty-gritty, the whole argument centers around sanitation. A drain is needed somewhere in or near the refrigerated equipment or freezer for proper cleaning. However, the presence of a drain connected to the sanitary system within a food storage area presents some health risks. Drains connected to the sanitary system allow a path for backing-up sewage to reach food. Ensuring good sanitary practice is a dirty job, but someone has to do it, and that someone in this case is the plumbing inspector.

So how safe is safe? Naturally, locating the drain outside the area where food is stored is the safest. Yet when dealing with large areas and USDA meat packing facilities, the safest way is not always practical or even allowable. For instance, the USDA requires a drain to be installed in every 500 sq. ft. of freezer area if a meat packing facility wishes to be USDA certified. So what's a supermarket to do?

The key is that drains located within freezers, coolers, and refrigerated equipment should not be connected to the sanitary system. They may be installed indirectly (see section 9.1.2). While it may not be evident that this is allowed from reading section 7.16.4, the underlying issue is keeping sewage away from food, pure and simple...well, hopefully pure, and maybe not so simple. The fact that an indirect installation meets the intent of the Code can be seen in the NSPC 1990 Code Change Guide. An information note under the code change states that drain holes in the bottom of freezers or coolers are not considered floor drains unless tied into the sanitary system. Thus, it is evident that the National Standard Plumbing Code does not consider an indirect drain to be a floor drain in the context of section 7.16.4, and therefore indirect drains are permitted.

Hopefully, this will help temper the debate over floor drains in coolers, freezers, and refrigerated equipment. In all likelihood, we will propose a change to the wording of section 7.16.4 to make the job of ensuring proper sanitation a little easier.

Source: Michael Baier  
Code Assistance Unit  
Bureau of Technical Services      \*

## ACCEPTANCE OF FOUNDATION PLANS FROM ENGINEERS

In August 1990 the Department wrote to the New Jersey Architects' and Engineers' Boards, informing them that we intended to read the "new" laws governing their practice (P.L. 1989 c. 275-277) as allowing the submission of foundation plans by an engineer, since a foundation is a "structural system," within the practice of engineering.

The "new" laws provide for a Joint Board which, were it appointed, would have the authority to decide all disputes. Since the Joint Board is not currently functioning, construction officials may follow the Department's decision to accept foundation plans from engineers. This may not be a uniformly popular practice with professionals in the field; however, the Department has found it to be a reasonable policy under the laws as written and currently interpreted.

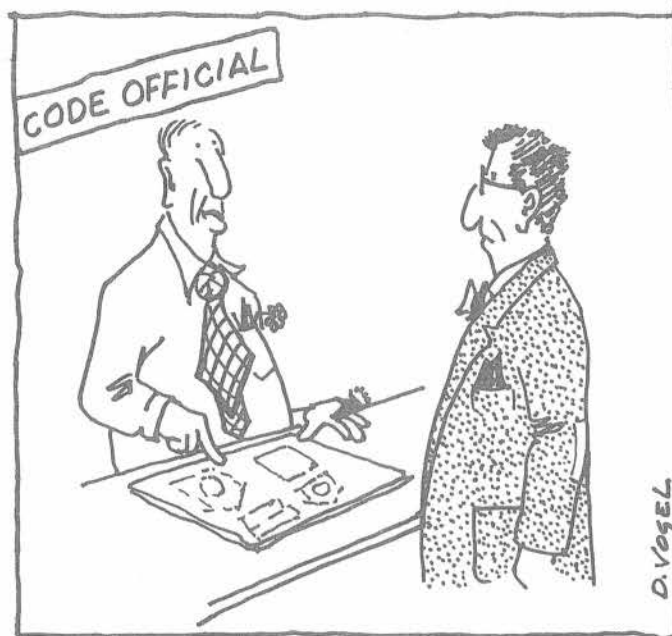
Until that board is formed, local officials should use their own judgment or seek the Department's advice. Local officials should not feel that they must respond to disgruntled professionals. The Department believes that many unanswered questions surround this issue which must be settled by the joint board. Until those issues are resolved, the Department expects local officials to issue permits based on the plans submitted (if they show compliance with the code) and further expects them to refer any complaints from affected professionals to the joint board.

Construction officials should not withhold permits because the wrong kind of professional prepared them unless it is absolutely clear from guidance already provided by the Department that the architect or engineer in question has violated the law. The Department is aware of a few isolated incidents where design professionals have approached construction officials, anonymously or otherwise, in a threatening manner over this issue. We are taking steps to stop this conduct and would like to be notified by the affected construction official whenever it occurs.

Source: Chrystene Wyluda  
Code Development Unit, and  
William Connolly  
Director, Division of Codes and Standards



The *Construction Code Communicator* is published by the New Jersey Department of Community Affairs in cooperation with Rutgers University's Department of Government Services. Editor: Hilary Bruce. Questions, comments, or suggestions may be directed to William Hartz, Chief, Bureau of Technical Services, CN 816, Trenton, NJ 08625-0816.



"Doghouse or not, I still need foundation plans!"

## A GUIDELINE FOR MUNICIPAL APPROVALS OF NONCONFORMING MATERIALS

Appropriate subcode officials have the authority to approve fixtures, appurtenances, materials, and methods not conforming to the regulations. As per NJAC 5:23-3.7, they can do so on the basis of the following considerations:

1. Those are not expressly prohibited by regulations.
2. Adequate proof is provided and/or available to show that those are of such design and quality to render them suitable and safe for the specific use.
3. Sufficient technical data and documentary evidence is furnished and/or available to prove that those can perform according to the use intended.

Tremendous responsibility for the subcode officials! Here are some tips to make their lives easier. Authenticated research reports from BOCA Evaluation Services, Inc., or other approved sources, such as ICBO and SBCCI evaluation services, contain technical details of the building products and materials and their performances under the BOCA National Codes and NJ Uniform Construction Code. These reports are not binding upon the subcode officials. But, they do provide useful data upon which code acceptance of new and innovative construction products may be based as per NJAC 5:23-3.7(c).

The subcode officials are further advised that the following procedure may be used to make a determination:

1. Identify the situation that will require their approval (covered fully or partly by code, going through a code change process, equivalency established or not, etc.)

2. Evaluate the results in test reports and research reports with the test standards.

3. Examine carefully the product labels and the reports of the test agencies and quality assurance agencies.

4. Evaluate construction details. All data collected from different sources (contractor/designer/owner) must apply to the material or method in question and must compare favorably with the performance requirements.

Source: Farid Ahmad, P.E.

Supervisor, Code Assistance Unit  
Bureau of Technical Services

✱

## LOAD MANAGEMENT

In recent months the Department has received reports that at least one utility has installed load management devices without following DCA rules and without applying for municipal permits, paying municipal permit fees, and getting inspections as required by law.

On September 29, 1989, the Department adopted regulations at NJAC 5:23-2.18A, called "Utility Load Management Device Installation Programs." These rules set up a procedure for a utility to follow when installing load management devices (remote-controlled radio switches to cycle off appliances such as air conditioners and water heaters). The rules allow a utility to apply to the Department by submitting information on its devices to be installed and its installation schedule. If approved, the utility can then install an approved device, according to submitted schedules, with departmental monitoring. One third of the total installations will be inspected by the municipalities in the schedule, and normal fees for these inspections are to be paid to the municipalities. The program applies only to residences whose owners voluntarily agreed to participate.

Any load management devices installed by a utility which has not received approval from the Department for its program are either minor work or regular work. In either instance, the utility must apply for a permit, must pay 100% fees, and must get an electrical inspection for each installation. To date, only Atlantic Electric Company has received Departmental approval for installations on residential air conditioners and water heaters in the southern area of the state.

Any construction official who believes that devices have been installed by utilities without actual departmental approval or without municipal permits should investigate installations. It may be necessary to issue notices and penalties to the utility responsible if the required application, permit, and inspection

procedures are not followed. Any questions about what activities of a utility have been authorized by DCA may be directed to Chrys Wyluda at 609-530-8789.

Source: Chrystene Wyluda

Code Development Unit

✱

## USING UCCARS

Welcome back to the new "Using UCCARS" column. We started the series in the last issue of the *Construction Code Communicator* for those who have computerized their code enforcement operations via the UCCARS program. In each issue we will be highlighting a different area of UCCARS that users frequently ask about.

For you newcomers to UCCARS, you will remember that there is a very easy way built into UCCARS for correcting any typos or for modifying any information that has been entered into a permit or a certificate record. All you do is select the 'Enter Data' option of the main menu; then choose either the 'Permit Fee Log' or the 'Certificate Log' option of the next menu screen. You will then be asked to enter the number of the permit or the certificate whose contents you wish to alter.

When you enter a new permit number, UCCARS searches through your database for a corresponding entry; when it doesn't find any, UCCARS assumes that you want to enter a new permit and presents you with a blank permit (or certificate) screen for you to fill out.

When you enter the number of a permit that was previously keyed in and stored, all the previously entered data will be brought from the hard drive to the screen; you can then cursor up or down to the data item you want to change and type right over the old data. When you hit the [F2] key, any changes you have just made will be stored onto your hard drive, replacing the old data you originally called up to the screen. Remember that this technique works for permit and certificate data only. To make any corrections to actual payments you take in over the counter, refer to the last issue's "Using UCCARS" column.

What about changing the permit number itself? A valid question, because it too can easily be mistyped. The best way is to hit the [F5] key to abort the permit input process if you happen to detect your error before saving the permit. But if you don't catch it in time, there is another way.

To modify or correct the actual permit number itself, you must select the 'Enter Data' option of the main menu, then log in with the fourth-level (administrator's) password. From there you choose the 'Permit Fee Log' option of the next menu screen, and enter the permit number as it currently exists. At that point you will see the following message at the lower right corner of the screen:

(Continued on page 10)



(Continued from page 9)

### [F2] modify Permit/Certificate Number, [F10] continue

If you press the [F2] key, the data for that permit is displayed so you can make sure you are working with the correct permit. You may then type a new permit number in the permit number field, directly over the old permit number. When you store the data, UCCARS replaces the old permit number with the new one you just entered.

You should be aware that UCCARS does a lot more than just change the permit number in that particular permit record. What about permit updates, or payments? The behind-the-scenes work UCCARS does includes searching for these and the following other records, then changing their permit numbers accordingly:

- Permit Update Records
- Certificate Records
- TCO Records
- Payment Records
- Adjustment Records

All this is done automatically. By the time UCCARS finishes changing the permit number, the old permit number no longer exists, anywhere.

Source: Stanley Kosciuk  
President, Municipal Information Systems \*

## UCCARS EQUIPMENT

Those of you who have carefully followed DCA's equipment recommendations in acquiring your PC and peripheral equipment for use with System I will generally be in good shape for System II. UCCARS System II has also been developed to interface specifically with the Epson LQ-1050 printer, the Maynard tape drive, and the Hayes modem.

A word of caution... not all equipment vendors carry these specific lines, and thus, municipalities are often quoted items from other manufacturers. Some vendors bid a non-Epson, non-Maynard, or non-Hayes unit either to gain a competitive edge or to increase their margins. Unfortunately, those buyers who do question the component substitutions typically get the response "no problem, it will work just as well"... only to discover too late that it really doesn't.

With regard to your PC, System II will be much more demanding than System I. The most common PC configuration throughout the UCCARS user community is an IBM-compatible, AT-class, 80286-based machine with a 10-12 megahertz clock speed, 1 megabyte of memory and a 40-megabyte hard drive. Those of you who are so equipped will have no problems running System II.

The type of monitor you have will not affect your ability to use System II. UCCARS works equally well with any video system - monochrome, CGA, EGA, or VGA. Your choice

depends on a combination of personal preference and available funds, and sometimes on special requirements of other software that may be used on the same PC.

On the other hand, if your PC has less than the recommended 640K of memory, it will probably not run System II. Likewise, if you have memory-hungry RAM-resident programs on your machine, or if you have more than one PC and they are networked using local area network software other than Novell, your PC will probably not have enough available memory to run System II (see "UCCARS Network Guidelines" distributed by DCA).

If your PC is an XT-class machine with an 8088 or 8086 processor, you will find that System II takes much longer to execute than System I - particularly if you are using an older XT with a slow clock speed and a slow hard drive. If migrating to a faster machine is out of the question for now, you might be able to upgrade your current PC for half the cost of a new one.

Because of the large amounts of data that are constantly being accessed by System II, the speed of your hard drive will be as important a factor in determining its responsiveness as the speed of the CPU itself. Drive speeds of 75 milliseconds are typical of XT-class PCs, and are even found in older 286 PCs; by comparison, speeds of today's most commonly used hard drives are on the order of 28 milliseconds.

Even more critical than speed itself is the capacity of your hard drive. A 20-megabyte drive is not recommended. Although you may be able to get by for the first year of System II operation if you don't do much else with your computer, it is recommended that you upgrade to a fast 40-megabyte hard drive.

Source: Stanley Kosciuk  
President, Municipal Information Systems \*

## OPEN PERMITS

Our monitoring effort has resulted in the administrative review of construction offices in 171 municipalities. We have found that the majority of these offices are in general compliance with the Uniform Construction Code and its regulations.

One situation, however, occurs fairly frequently. That is the absence of inspections after a construction permit has been issued for a project. We refer in particular to projects that have been "open" for longer than six months in the records of the municipality and in the records of the on-site inspection and plan review agencies.

Our concern is based on the premise of the UCC: that construction projects are to be inspected and determined to be safe by a licensed inspector prior to the occupancy or use of the project. Examples of the types of open projects we find during the course of our monitoring include, but are not limited to, pool

installations in early spring, roofing and siding projects, electrical services, room additions, decks, and occasionally even a new home. Often, the permit file will contain the contractor's proposal for the job and sometimes even a note that the job is ready for inspection; however, there is no record of an inspection having been performed.

With just a little more effort, inspectors can track projects that are in need of inspection.

When we remind the officials that a project has not received a final inspection, we are often quoted NJAC 5:23-2.18(c)1, which states, "The owner or other responsible person in charge of work shall notify the enforcing agency when work is ready for any required inspection." We respond that the lack of an inspection request does not relieve the enforcing agency of its responsibility. If the person in charge of work fails to make an inspection request, the enforcing agency should follow up, and has the ultimate option of enforcing compliance under 5:23-2.31(b), which allows a penalty of \$500 for violation of the provision of the act or the regulations.

The appropriate citation to reference regarding the inspector's inspection responsibility is found in NJAC 5:23-2.18(b)1, which states, "The construction official and appropriate subcode officials shall carry out such periodic inspections during the progress of work as are necessary to insure that work installed conforms to the approved plans and the requirements of the regulations." Please note that the on-site inspection and plan review agencies act as subcode officials and, as such, must also fulfill this regulatory requirement.

Various methods are available to implement a follow-up inspection program. The simplest is to file open permit files in a separate cabinet with index cards to separate the files by future inspection (follow-up) date. An alternative is the use of the UCC Form F-150 Tickler/X-RefCard; this is a 3x5 card that is then filed by future inspection date.

We must recognize that merely issuing a construction permit does not fulfill our obligation under the UCC. Inspections, regardless of who initiates them, are necessary in order to meet the intent of the UCC as found in NJAC 5:23-2.1(d): "The regulations shall be construed to secure its expressed intent, which is to insure public safety, health, and welfare insofar as they are affected by building construction..."

Our monitoring staff has raised the question of a follow-up inspection program in each town they visited, but the response to date sometimes has been less than satisfactory. Increased emphasis is being placed by our staff on meeting this UCC requirement.

Source: Felix Cabarle  
Bureau of Regulatory Affairs

✱

## UNSAFE BUILDINGS

Under what circumstances does a construction official determine a building to be an unsafe structure? What assistance does the Uniform Construction Code provide to construction code officials in making those decisions?

NJAC 5:23-2.32(a) describes the conditions for which a building or structure may be deemed unsafe. I am sure you will agree that some decisions are subject to one's interpretation of what constitutes a danger to human life or public welfare. For example, it is easy to determine that a building severely damaged by fire is unsafe, but what about a building having a required exit door blocked by boxes? Would this situation require the same action as if, say, the exit door had been removed? Clearly, a required exit door that has been removed is a danger to human life and public welfare, and the construction code official might opt to order the building vacated as an unsafe structure. In the case of the door blocked by boxes, however, while this situation also presents a danger to human life, the hazard may be easily eliminated by simply moving the boxes, and may not require vacating the building.

The regulations require the appropriate subcode official to examine or investigate any building reported as dangerous, unsafe, etc., and prepare a report documenting the conditions found. The more documentation (written and perhaps photographic) the code official can obtain, the easier it will be to justify his/her decisions should that become necessary.

Source: Gerald Grayce  
Bureau of Regulatory Affairs

✱

## CHANGE OF USE

Field representatives of the Department's Fire Safety Element have asked us to remind construction officials that "new" or changed uses for an existing structure may require new features to meet code, and a new certificate of occupancy for the new use. Inspectors have found no current certificate of occupancy (CO) in the following situations: tenants occupying part of a shell building or strip mall, where a CO was granted for the shell or the mall in general but no CO was subsequently granted for the individual interior spaces; industrial buildings in which a portion is devoted to a new, more hazardous use without a CO; day-care centers placed in other types of buildings, and expansions of existing buildings.

While the Department realizes that officials may not be aware of every new or changed use, especially where actual construction work is minimal, we hope that there can be cooperation with Fire Safety field representatives if irregularities are discovered.

Source: Chrystene Wyluda  
Code Development Unit

✱



## DIRECTORY OF STATE PROGRAMS FOR REGULATING CONSTRUCTION

The Office of Business Advocacy in the Department of Commerce and Economic Development publishes a quick reference guide to construction permits, certificates, and approvals issued by State agencies. The "Directory of State Programs for Regulating Construction" is an effective resource in providing assistance on requirements for general construction activities that are most often regulated by the State.

Information is also provided concerning special jurisdictional agencies and federal-state permits applicable to construction. Copies of the Directory are available at no charge by contacting:

Office of Business Advocacy  
Department of Commerce and Economic Development  
CN 823  
Trenton, New Jersey 08625

Or call toll-free within New Jersey: 1-800-533-0186; outside New Jersey: 609-292-0700. \*

## NEW JERSEY REGISTER ADOPTIONS

Date	Adoption
10/1/90	22NJR 3147(a): Dedication of Revenue for Code Enforcement, Adopted Amendment NJAC 5:23-4.17.
	22NJR 3148(a): Code Interpretations; Seismic Zones, Adopted New Rule: NJAC 5:23-9.4.
10/15/90	22NJR 3214(a): Uniform Construction Code Sub-codes, Adopted Amendments: NJAC 5:23-3.4, 3.5, 3.8A, 3.10, 3.11, 3.11A, 3.14 through 3.18, 3.20 and 4A.8.

Source: E. Maria Roth  
Code Assistance Unit  
Bureau of Technical Services \*

THE STATE UNIVERSITY OF NEW JERSEY  
**RUTGERS**

**Construction Code Communicator**

P.O. Box 5079

New Brunswick, NJ 08903-5079

Non-Profit Org.  
U.S. POSTAGE  
PAID  
New Brunswick, NJ  
Permit No. 157

**DATED MATERIAL  
PLEASE EXPEDITE**