

SEP 13 1994

STATE OF MINNESOTA  
DEPARTMENT OF ADMINISTRATION  
BUILDING CODES AND STANDARDS DIVISION

In the Matter of the Proposed  
Adoption of Amendments to  
Chapters 1300, 1305, and 1365  
of the Minnesota State Building Code

STATEMENT OF NEED  
AND REASONABLENESS

I. Introduction

The Commissioner of the Minnesota Department of Administration proposed to adopt amendments to chapters of the Minnesota State Building Code entitled 1300, Code Administration; 1305, Adoption of the Uniform Building Code by Reference; 1365, Appendix on Snow Loads. In addition to substantive changes, reorganization and grammatical changes are proposed to improve clarity and to conform with current style requirements.

The present Minnesota State Building Code Rules, 1990 printing effective July 16, 1990, includes Minnesota Rules 1300.0100 to 1300.3100; 1305.0100 to 1305.7100 which includes adoption by reference of the 1988 edition of the Uniform Building Code as promulgated by the International Conference of Building Officials in Whittier, California; and 1365.0200 to 1365.0800. The proposed rules contain certain amendments to the Minnesota State Building Code and includes adoption by reference of the 1994 edition of the Uniform Building Code (UBC).

The department began the present rule notification process on July 8, 1991 publishing a note in the State Register (16 S.R. 68) soliciting opinions and information from the public on the rules regarding the Minnesota State Building Code.

II. Statement of Agency's Statutory Authority

The commissioner's authority to adopt the rule amendments is set forth in Minnesota Statute 16B.61 subdivision 1, which states:

Subdivision 1. Adoption of code. Subject to sections 16B.59 to 16B.73, the commissioner shall by rule establish a code of standards for the construction, reconstruction, alteration, and repair of state-owned buildings, governing matters of structural materials, design and construction, fire protection sanitation, and safety. The

code must conform insofar as practicable to model building codes generally accepted and in use throughout the United States. In the preparation of the code, consideration must be given to the existing statewide specialty codes presently in use in the state. Model codes with necessary modifications and statewide specialty codes may be adopted by reference. The code must be based on the application of scientific principles, approved tests, and professional judgement. To the extent possible, the code must be adopted in terms of desired results instead of the means of achieving those results, avoiding wherever possible the incorporation of particular methods or materials. To that end the code must encourage the use of new methods and new materials. Except as otherwise provided in sections 16B.59 to 16B.73, the commissioner shall administer and enforce the provisions of those sections.

### III. Statement of Need

It is necessary to adopt the 1994 edition of the Uniform Building Code in order to remain in keeping with the legislative intent of Minnesota Statute 16B.61 subdivision 1 to "... conform insofar as practicable to model building codes generally accepted and in use throughout the United States." The 1994 edition incorporates revisions to the 1988 edition that are needed to address changes in technology, materials, and methods of construction. In addition, the 1994 Uniform Building Code has been totally restructured and renumbered in order to align with the other two model building codes in use throughout the United States. Therefore, it is necessary that all of the present Minnesota amendments either be renumbered and retitled accordingly or repealed.

Various elements of the proposed rules are to be repealed, revised, or contain an entirely new rewrite or section. In order to reduce confusion in locating one of the wide variety of amendments to the UBC currently found in Chapter 1305, much of the material is being reorganized into various separate chapters of Minnesota Rule. In addition, many amendments in chapter 1305 are being relocated because the subject of some of the amendments is not dealt with in the UBC and is, therefore, more appropriately addressed in a separate chapter of Minnesota Rules. Others are relocated simply to reduce the number of amendments to the UBC. It is hoped this reorganization will make it easier for the user to locate those amendments that are particular to either the UBC or state of Minnesota and enable the division to adopt future editions of the UBC more quickly and efficiently without the usual task of modifying existing amendments.

These proposed changes in the rule are needed to produce a current building code that best governs the safe and efficient design and use of buildings being constructed and remodeled in Minnesota. The need and reasonableness of each rule will be discussed in part IV.

### IV. Statement of Reasonableness

Minnesota Statutes Chapter 14 requires the agency to make an affirmative presentation of facts establishing the reasonableness of the proposed rules. This means that the agency must set forth the reasons for its proposal, and the reasons must not be arbitrary or capricious. However, to the extent that need and reasonableness are separate, need has come to mean that a problem exists which requires administrative attention, and reasonableness means that the solution proposed by the department is appropriate. The reasonableness of the proposed rule is discussed below.

A. Reasonableness of the Rules as a Whole

The proposed rules are reasonable because they adopt by reference the 1994 Uniform Building Code (UBC), a "model code" that is widely used throughout parts of the mid and western United States. This fulfills the legislative directive of Minnesota Statute 16B.61 subdivision 1 referenced in the Statement of Need in part III. The proposed amendments are also reasonable because many incorporate items that may not be addressed in the UBC but are otherwise required by Minnesota Statute, other state agency rules or determined necessary by the commissioner. The reasonableness of each rule is discussed below.

B. Reasonableness of Individual Rules

1. Minnesota Building Code, chapter 1300

1300.2050 Title

It is necessary in this first rule part of the first chapter of the Code, that the reader comprehend what constitutes the Minnesota State Building Code. This is reasonable because the language is patterned after previous rule part 1300.1200 which is being repealed while the second sentence of 1300.1200 is being more appropriately located in part 1300.2100 subpart 2, application.

1300.2100 Purpose and Application

Subpart 1. Purpose. Because this chapter will now contain technical requirements apart from the administration of the code, it is necessary that this be reflected in the purpose. Because the legislature has added 16B.75 regarding the Interstate Compact on Industrialized/Modular Buildings, the statutory reference is extended to 16B.75.

Subpart 2. Application. The last sentence added to this part was

taken from 1300.1200 and changed to reference only chapter 1 of the UBC. This is reasonable because chapters 1, 2, and 3 have been consolidated into chapter 1 of the 1994 Uniform Building Code. The language added to the first sentence is necessary to clarify that there are areas in the state where the code does not apply due to the referendum referenced in Minnesota Statutes 16B.72 and municipalities under a 2500 population in 16B.73.

#### 1300.2400 Definitions

Subpart 2a. Adult day care center. This definition is needed in the building code because Department of Human Services rules part 9555.9730 identifies what types of adult day care centers constitute the classifications of Group E Division 3 and Group I occupancies as defined in the Uniform Building Code. The rule is reasonable because the occupancy classifications are compatible with the Uniform Building Code and consistent among these agency rules.

Subpart 3a. Balcony, Exterior Residential . This definition is necessary to distinguish a residential balcony from a residential deck as now identified in Table 16-A of the Uniform Building Code. This is needed to address the different live load requirements for each. It is reasonable because the size limitation is consistent with ANSI/ASCE standard 7-88 and the height limitation is consistent with the threshold for a guardrail as identified in section 509 of the Uniform Building Code.

Subpart 6. Code. It is necessary that this subpart be updated in order to reference the titles of new chapters being added to the code and new titles being given to some existing chapters. This is reasonable because all of the chapters of the code constitute the code and, therefore, must be included and identified.

Subpart 6a. Deck, Residential. This definition is both needed and reasonable for the same reasons given in subpart 3a. See comment to 3a.

Subpart 7a. Family day care home.

Subpart 7b. Group family day care home. These definitions are derived from Minnesota Statute 16B.61 subdivision 3(e) and Chapter 9502 of Minnesota Rules. They need to be identified in the state building code in order to assist the building official in correctly classifying these uses. The definitions are reasonable as

they are compatible with the definitions in the Minnesota Uniform Fire Code and Chapter 9502 of the Department of Human Services rules.

Subpart 8a. Manufactured Home. This definition is needed to ensure that manufactured homes will be afforded the same fire protection as conventional site-built homes should they be placed next to a dissimilar use, such as a garage. The definition is reasonable because the requirement that they be considered Group R, Division 3 occupancies is compatible with that required in the Uniform Building Code for site-built single family dwellings and the definition referenced in Minnesota Statute 327.31 subdivision 3.

Subpart 10. Municipality. It is necessary that this definition be changed to include "state licensed facilities" because the definition has been changed accordingly in Minnesota Statute 16B.60 Subdivision 3 during the 1994 legislative session.

Subpart 10a. Recyclable materials.

Subpart 10b. Recycling. These definitions are relocated from part 1305.1370. This is reasonable because the subject of recycling is not dealt with in the UBC. See comment in Statement of Need.

Subpart 10c. Supervised living facility. The definitions of "supervised living facility" are being relocated from part 1305.1400. This is reasonable because this type of facility is not specifically regulated in the UBC. See comment in Statement of Need.

The definitions of "class A-1", "class A-2", and "class B" have been modified and expanded to include the corresponding occupancy designations of the UBC referenced in the rule parts stated below. It is necessary to consolidate these classifications here so that there is no confusion as to the correct occupancy classification of these Minnesota licensed facilities. This is reasonable because the occupancy classifications have been established by Minnesota rule parts 4665.0500, 1305.2500, and 1305.3400 and Minnesota Statute 144.50 Subdivision 6.

It is necessary that the definitions of "class B-1", "B-2" and "B-3" be added to the rule in order to correlate with the occupancy classifications of Minnesota Statute 144.50 subdivision 6 and

144A.48 subdivision 6 and eliminate confusion over their proper UBC occupancy classification. This is reasonable because the rule is based on Minnesota statutes.

Subpart 11. State building official. It is necessary to change the definition of state building inspector to state building official because the statutory reference in chapter 16B changed during the 1994 legislative session.

Subpart 11a. State Licensed Facilities. It is necessary that this definition be added here because it has been added to Minnesota Statute 16B.60 subdivision 11 as well as to the definition of Municipality in Minnesota Statute 16B.60 subdivision 3. This occurred during the 1994 legislative session.

Subpart 14. Uniform Building Code. UBC is changed to Uniform Building Code because the Uniform Building Code is the term used in this chapter. Reference to the specific adopted edition is now tied to the adoption by reference in part 1305.0010.

Subpart 15. Ventilation. This definition is needed because the word is used frequently throughout the code. It is reasonable because it is identical to the definition already incorporated in chapter 7670 and the referenced standard, ASHRAE 62-89.

#### 1300.2600 Application for Appeal

Subpart 1. Form of request. Striking the word "working" is necessary to align this rule part with the authorizing Minnesota Statute, 16B.67, which states that an appeal may be made within 180 days, meaning calendar days.

#### 1300.2700 State Surcharge Fees

#### 1300.2800 Minnesota State Building Code Information and Assistance

References to state building inspector have been changed to state building official. See comment to part 1300.2400 subpart 11.

#### 1300.2900 Optional Administration

Subpart 1. This material is being deleted in order to eliminate

confusion and duplication over what constitutes the Minnesota State Building Code since 1300.2400 subpart 6 already defines the composition of the state building code. Part 1300.2900 exists only to identify which chapters of the code are optional for those municipalities that have adopted the code.

Subpart 2. Item A currently exists as an optional appendix chapter to the Uniform Building Code as identified in part 1305.6905. It is being relocated to a separate chapter of Minnesota Rules because it is a Minnesota amendment and has nothing to do with the Uniform Building Code. This is necessary to reduce confusion over its application as an optional adoptable chapter of the Minnesota State Building Code and not part of the sprinkler requirements of the UBC.

#### 1300.3900 Restroom Facilities in Public Accommodations

Minnesota Statute 16B.615(1994) requires the commissioner to adopt rules to implement the law requiring a ratio of water closets for women to the total of water closets for men of at least three to two. With the incorporation of a new plumbing fixture schedule in part 1305.0020, this minimum ratio is achieved with a ratio closer to three to one for most of the assembly occupancies described.

#### 1300.4100; Space for Commuter Vans

As this subject is not regulated by the UBC, it is being relocated from 1305.2000. Because some of these facilities are designed without consideration given to the height necessary to accommodate these types of vehicles, it is necessary that the vertical clearance be identified consistent with that required in the Americans with Disabilities Act.

#### 1300.4300 Roof Covering -- Severe Climate

This part is being relocated from parts 1305.5710, 1305.5720, 1305.5730, and 1305.5740. It is necessary to reduce this duplication of amendments by organizing them here in a single reference apart from an amendment to the UBC. See comment in second paragraph of Statement of Need. This is reasonable because there will be no change in the scope or application of the requirement.

### 1300.4500: Roof Access

This rule is being relocated from part 1305.1750 as part of an overall effort to remove amendments to the UBC in areas that the UBC does not regulate. This is reasonable as it allows the reader to more easily distinguish this requirement as a Minnesota code provision. A few modifications to the rule were necessary to correct references to the Uniform Building Code and the Minnesota State Mechanical Code. The requirements have been labeled here as paragraphs A, B and C. Paragraphs A and B are identical to that previously located in Minnesota Rule 1305.1750 except for the code references.

Paragraph "C" deletes the specific standards for installation previously found in 1305.1750, and instead refers to the appropriate mechanical and electrical codes. The change eliminates conflict between these provisions.

### 1300.4700 Recycling Space

This part is necessary in order to satisfy the provision of Minnesota Statute 16B.61 Subdivision 3a that requires the code to mandate suitable space for the separation, collection, and temporary storage of recyclable materials.

The research and drafting of the language was accomplished through a voluntary joint effort between representatives from the Association of Recycling Managers (ARM), including Jean Buckley of the City of Bloomington, Andy Costellano of the City of Minneapolis, Fred Patch, Building Official for the City of Brooklyn Park, and Ann Bernstein and Bill Dunn of the Minnesota Office of Waste Management (OWM). The team offers this proposal with the belief that it provides reasonable guidelines for the minimum amount of space needed for storage of recyclable materials in various types of buildings.

The space requirements were based on primary research on space needs in local buildings, as well as research into other state and local government guidelines for recycling space allocation. This research is detailed in the following paragraphs.

The primary research on space needs in local buildings was performed by recycling managers who surveyed building owners



and managers of organizations with successful recycling programs. A variety of organizations were consulted, including large and small office buildings, apartment buildings, a hotel, various eating establishments, retail malls, a theater, grocery store, and warehouse, and public buildings such as a school, library, and a sports stadium (the Metrodome). The results were used to provide guidelines for the development of the final numbers provided in the enclosed proposal. The team recognizes that the surveyed buildings do not constitute a representative sample of buildings in Minnesota, but agrees that they provide examples of successful use of space for recycling.

Research was conducted to determine if other states have passed similar legislation requiring building space to be allocated for recycling purposes. No other states were found to have laws directly requiring buildings to allocate space for recycling, or laws specifying the amount of space to be allocated.

A California law requires cities and counties to adopt ordinances which establish space requirements for recycling in development projects, and declares that an ordinance developed by the California Integrated Waste Management Board (CIWMB) took effect on September 1, 1993, for communities that do not adopt an ordinance by then. According to CIWMB staff, however, the California model ordinance will not contain specific space requirements, but rather will use a performance-based measure which would be effectively the same as Minnesota's current law. We did obtain ordinances from several California counties and cities that require specific amounts of space to be allocated for recycling. A comparison of these ordinances showed that the space requirements vary widely in approach and amount of space required. When compared with the space requirements proposed for Minnesota, the figures proposed for Minnesota seem to fall within the low end of the range.

There does not appear to be a consensus of opinion regarding the "correct" amount of space needed for recycling. Most agree that the amount of space needed will vary according to individual circumstances of building usage and availability of recycling opportunities. In the absence of exhaustive research, the team has proposed minimum space requirements we consider to be reasonable.

### 1300.4900 Special Egress Devices -- Group E Occupancies

This rule part is needed because security within public schools has become a major concern to many school districts, both from a property preservation point of view, but more importantly, a personal physical safety point of view for the students and faculty. The public is demanding and expects that protection provided them in schools should include some level of security, and this is being supported by numerous court decisions. As a means to achieve this goal, access control systems are currently being installed in thousands of buildings. However, these access control systems are being installed in violation of the code as they prevent required means of egress. Therefore, it is necessary that the code allows for provision of an adequate level of security without jeopardizing the egress capabilities of the occupants. We believe the proposed amendments clearly provide a higher level of safety than the alternative of uncontrolled, unregulated or unenforced locked doors used in a means of egress. It is better to regulate a safe means of locking to provide an adequate level of security desired by school districts than the alternate method of unregulated locking arrangements.

These subparts are patterned after revised Proposal (Log #247) to the 1994 Life Safety Code (NFPA 101 Chapter 5-2.1.6) and the 1993 Minnesota Uniform Fire Code, Appendix II-H "Standards for Egress-Control Devices in Educational Occupancies." Additional requirements have been added so that the language is consistent with the requirements of Section 1004.5 of the 1994 Uniform Building Code. The following were also used in the development of the proposed amendments: "Fire in Minnesota 1992.", "Guidelines for Locked Patient Areas in Health Care Facilities," State Fire Marshal Division, Department of Public Safety, and letters this division received from design professionals. Developing language based on these documents is reasonable since they are recognized standards that protect life safety in situations of fire and panic.

### 1300.5100 Use of Buildings by Lower Grades

It is necessary that this rule part be included as part of the code because Minnesota Statute 123.36 subdivision 15 now specifically regulates the use of buildings by lower grades and states in paragraph (d) that it "supercede(s) any contrary provisions of the

state fire code or state building code and rules relating to those codes must be amended by the state agencies having jurisdiction of them." Since section 305.2.3 of the UBC does not address the use of buildings by lower grades in this way, it is necessary to include the new rule part in order to implement the statute. This is reasonable because the applicable language is an extract from the referenced statute.

#### 1300.5300 Corridor Construction

This rule part is being titled, renumbered, and relocated from part 1305.5900 in order to distinguish the provision as a requirement of the state building code and not an amendment to the UBC. Only the occupancy group designations have been changed to reflect the corresponding designations in the 1994 UBC.

#### 1300.5500 Footing Depth for Frost Protection

This section has been titled, renumbered, and reorganized from part 1305.5400 so that the rule will stand alone as a provision of the state building code instead of an amendment to the UBC. This is needed to clearly distinguish the provision as a Minnesota requirement and reduce potential conflict with future changes in the language of section 1806 of the UBC. It is reasonable because the intent of the current requirement does not change as the first paragraph of the existing rule remains in the UBC while the rest of the material is located in this new rule part.

#### 1300.5700 Radial Ice on Open Frame Towers

This section is being relocated from part 1305.4800 because this subject is not specifically regulated in the UBC. No changes in the language have been made.

#### 1300.5900 Automatic Garage Door Opening Systems

This rule part is required to be included in the code by Minnesota Statute 16B.61 subdivision 3(k). It is reasonable to simply reference the specific requirements located in Minnesota Statute sections 325F.82 and 325F.83 instead of repeating them. The specific statutory requirements will be reprinted into the supplemental/informational pages of the state building code.

## 2. Adoption of the Uniform Building Code, Chapter 1305

### 1305.0010 Adoption of the Uniform Building Code by reference

The change in the year and chapter numbers of the UBC are needed to reflect the correct edition and new chapter range of the Uniform Building Code (UBC) proposed for adoption. A specific range of rule numbers is proposed to more accurately reflect that all but the first two rule parts consist of amendments to the UBC. This means that the last four digits of each rule part number corresponds to the particular amended section of the UBC. This part replaces part 1305.0100.

In addition, the adoption by reference of the UBC is qualified due to the amendments needed in chapter 1305 and the provisions cited in chapters 1300 and 1365 of Minnesota Rule.

### 1305.0020 Appendix Chapters

The title of this rule part is changed from part 1305.0150 to clarify its purpose of identifying required and optional appendix chapters. Because the chapter numbers changed in the 1994 UBC, it is necessary to renumber the referenced appendices accordingly.

Subpart 1. Two new required appendix chapters have been added. Appendix chapter 3 division I, Detention and Correction Facilities, is needed to better regulate detention and correction facilities. Current code provisions do not adequately address the life-safety needs of this specialized type of facility. The provisions are reasonable because they have been amended where necessary in part 1305.4031 to correlate with the rules of Minnesota's Department of Corrections. Appendix chapter 29, Minimum Plumbing Fixtures, is needed to replace part 1305.1795 that is being repealed. Current provisions of 1305.1795 do not provide an adequate minimum number of fixtures in some occupancies such as those in public assembly facilities. The provisions in this appendix chapter will satisfy the new statutory requirement ratio referenced in proposed part 1300.3900 for water closets in areas of public accommodation. The proposed rule is reasonable because it provides a realistic minimum number of required plumbing fixtures in all occupancies that is based on established national standards.

Subpart 2. The reference in Part B, Special Fire Suppression Systems, is being relocated from current rule part 1305.0150 to Minnesota rule part 1300.2900 subpart 2.A. in order to clarify its application as an optional chapter of the Minnesota State Building Code and not the Uniform Building Code.

Current provisions in the main body of the code adequately address the installation of new roof coverings applied to new buildings. However, "reroofing" is not specifically regulated. Therefore, it is necessary that appendix chapter 15, "reroofing", be added as an option for those primarily aging cities to use in regulating the application of new roof coverings onto existing buildings. Appendix chapter 15 sufficiently regulates this subject in conjunction with the roof covering provisions in chapter 15 of the main body of the code.

#### 1305.0102 Section 102 Unsafe Buildings or Structures

The only change from previous rule part 1305.0400 is that all of the UBC language is being dropped from the rule. This is reasonable because the material omitted from part 1305.0400 will still appear in the UBC while the state amendment appears in this rule part exactly as it is written in 1305.0400.

#### 1305.0103 Section 103 Violations

This is the same as previous rule part 1305.0600. Only the rule number and title have changed.

#### 1305.0105 Section 105 Board of Appeals

This is the same as previous rule part 1305.0500. Only the rule number and title have changed.

#### 1305.0106; Section 106.2 Work Exempt from Building Permit

This is the same as previous rule part 1305.0700. Only the rule number and title have been changed.

#### 1305.0107; Section 107.3 Plan Review Fees

The reference in UBC section 107.3 to Table 1-A is being omitted because section 107.1 allows, in lieu of Table 1-A, local

governments to adopt their own fee schedule. The exception has been added here to allow local governments to charge less than 65 percent for a plan review fee when their administrative cost of residential plan review is typically less. This is reasonable because the code has by Minnesota rule permitted local government to establish their own permit fee schedules. In addition, it is not uncommon that certain prevalent housing types built in much of greater Minnesota require significantly less time to plan review than what is recovered through the required plan review fee.

1305.0108: Section 108.5 Required Inspections

The major change from previous rule part 1305.0900 is that all of the UBC language is being dropped from the rule. This should make it clear to the reader that only three specific required inspections are being added or modified. This is reasonable because the material omitted from part 1305.0900 will still appear in section 108 of the UBC.

1305.0109: Section 109 Certificate of Occupancy

This material is being reorganized from part 1305.1000 in order to make it clear to the reader that only the exception portion of this UBC section is being amended. This is reasonable because the material omitted from previous rule part 1305.1000 will still appear in section 109 of the UBC. It was necessary to add manufactured homes to the exception because they are single family homes as are Group R Division 3 occupancies, but are not specifically included in the R-3 category by definition.

1305.0301: Table 3-A Description of Occupancies by Group and Division

It is necessary that the appropriate references of this section be redesignated according to the 1994 UBC. The material omitted from previous rule part 1305.1500 is being relocated to the more appropriate definition section of 1300.2400. These changes are reasonable because the provisions will be current and easier for the reader to access.

1305.0308: Group I Occupancies

Subpart 1. This section replaces previous rule part 1305.2500. It

is being changed to correct code references of the UBC which were changed and remove the term, "supervised living facility". As discussed under part 1305.0301, supervised living facilities will be defined and classified in part 1300.2400. In addition, division 1.2 is being added to this proposed rule because the subject matter is now included within this section of the UBC. This addition is reasonable because the language is taken directly from the UBC to address the many new outpatient surgery centers that are being constructed. Previous editions of the UBC have not adequately addressed this type of surgery facility.

Subpart 2. The original form of this rule, part 1305.2600, is being repealed because this section of the 1994 UBC has been modified and reformatted. Although this entire section of the UBC is reproduced here as Minnesota rule, we are proposing to change only the first and last sentences of the UBC text. These changes are reasonable because they are consistent with the text of the previous rule part 1305.2600 being repealed.

It is necessary to amend the first sentence so that the requirement for a smoke barrier applies to floor levels of all Group I occupancies which have an occupant load of 5 or more. This is reasonable because it applies the same as does the current rule, part 1305.2600, which is being repealed.

The last sentence of subpart 2 is also being added back in to remain consistent with the provisions of the current rule. Because the UBC now defines "smoke exhaust system", this term is more appropriate to use when describing the required system than the current, "ventilation system". In addition, it was necessary to define "openings to the exterior" as used in the current rule. Therefore, the proposed language is reasonable because it clearly defines operable or fixed windows as an alternate to the "smoke control system".

Subpart 3. It is necessary to delete the last sentence of this section because it conflicts with the established rules of the Department of Corrections and State Fire Marshal which permit the use of Class I carpet in certain restrained areas. This is reasonable because Minnesota Statute 241.021 subdivision 1(2), requires that state agencies ensure that their minimum standards are substantially the same as the other governing agencies. In addition, this division believes the proposed rule does not lessen needed fire protection.

1305.0405; Section 405 Stages and Platforms

It is necessary to amend this provision of the UBC by changing the "and" after the word "overhead" to "or" in order to correct a grammatical error in the UBC language. This is needed so that the many stages less than 50 feet in height that are being constructed with all of the curtains, drops, and stage effects, etc., are regulated as required for a legitimate stage.

1305.1019; Section 1019.6 Hardware, Group I Occupancies

This rule is needed because security within health-care facilities has become a major concern to facility owners, operators, licensing agencies, and patient's families, from a patient's personal safety point of view. The public is demanding and expects that protection provided them in a building should include some level of security, and this is being supported by numerous court decisions. As a means to achieve this goal, access control systems are currently being installed in thousands of buildings. However, these access control systems are being installed in violation of the code. Therefore, it is necessary that the code allows for provision of an adequate level of security without jeopardizing the egress capabilities of the occupants. We believe the proposed amendments clearly provide a higher level of safety than the alternative of uncontrolled, unregulated or unenforced locked doors used in a means of egress. It is better to regulate a safe means of locking to provide an adequate level of security desired by building owners and occupants than the alternate method of unregulated locking arrangements.

This rule is reasonable because it is patterned after the Minnesota State Fire Marshal's "Guidelines for Locked Patient Areas in Health Care Facilities". The proposal has been modified to be consistent with the wording and structure of the UBC and to provide the level of security desired by building owners per letters received from design professionals.

1305.1101; Chapter 11 Accessibility

It is necessary to delete the accessibility provisions of UBC Chapter 11 because accessibility for the disabled is regulated by chapter 1340 of Minnesota Rules.



#### 1305.1202; Section 1202.2 Ventilation

UBC Section 1202.2.4. It is necessary to amend the ventilation rate for H-4 occupancies because the requirement in the current code was found to be excessive. Prior to July 15, 1990 the ventilation rate was 3/4 cfm per square foot. When Minnesota adopted a new mechanical code on that date, the new ventilation rate prescribed by the code was 1 cfm per square foot. Experience has shown the increased ventilation rate to be excessive, both in terms of energy consumption and equipment costs. Therefore, it is reasonable that this rule part be included to reflect a minimum, satisfactory, and cost effective ventilation rate.

UBC Section 1202.2.7. Current Minnesota rule part 1300.1900 specifies the minimum required ventilation rate of 3/4 cfm per square foot for Group S division 3 (B-1) parking garages. Because the ventilation requirements of the UBC have been relocated and reformatted, therefore, eliminating UBC 705, it is necessary to repeal Minnesota rule part 1305.1900 that referred to it, yet retain the substance here. This is reasonable because the ventilation rate remains the same.

#### 1305.1506 Section 1506 Roof Drainage

The only substantive change from previous rule part 1305.5700, is replacing the term "roof drains" with "roof drain lines" as is now shown in the 1994 UBC. This was necessary to clarify that overflow drain lines must be independent from roof drain lines and not just from roof drains. These modifications are reasonable because now both the UBC and Minnesota rule are clarified to reflect the original intent. In order to make the amendment to the UBC easier to locate in rule, it was necessary and reasonable to delete the text in previous Minnesota Rule 1305.5700 that appears in the UBC.

#### 1305.1614; Section 1614 Wind Design Definitions

Minnesota's Structural Advisory Committee determined that no part of Minnesota would fall into the exposure "D" category. Therefore, it is necessary that this exposure factor be deleted in order to prevent any misapplication. Exposures "B" and "C" comprehensively represent the wind exposures throughout the state, so "D" is unnecessary.

1305.1616: Section 1616 Basic Wind Speed

The second sentence of this amendment in part 1305.4800 is omitted because the information is already contained within section 1615 of the UBC. The last sentence is being deleted in order to defer to the language of UBC section 1622. These modifications are needed to reduce confusion in the rule as to what is being amended.

1305.1623: Section 1623 Occupancy Categories

This is the same as previous rule part 1305.4850. Only the rule number and title have changed.

1305.1704: Section 1704 Prefabricated Construction

It is necessary to delete this section of the 1994 UBC because prefabricated construction in Minnesota is regulated by Minnesota rule chapters 1360 and 1361.

1305.1907: Section 1907 Corrosive Environments

This is the same as previous rule part 1305.5340. Only the rule number and title have changed.

1305.1918: Section 1918 Prestressed Concrete

Minnesota Rule parts 1305.5360 and 1305.5380 are being titled, renumbered and reorganized in order to align with the format of UBC section 1918.14. No other changes from parts 1305.5360 and 1305.5380.

1305.1928: Table 19-A-8 Corrosion Preventive Coating

This is the same as previous rule part 1305.5385. Only the rule number and title have changed.

1305.2109: Section 2109 Empirical Design of Masonry

This is a new rule that is needed to recognize a commonly used design method for masonry construction currently permitted by the UBC. Section 2109 of the 1994 UBC has been changed to now only apply in areas where the design wind speed is less than 80

mph. This amendment to permit its application is reasonable because the current provisions have been used successfully in Minnesota for many years with a design wind speed of 80 mph.

1305.2326; Section 2326 Blocking

This is the same as previous rule part 1305.5320. Only the rule number and title have changed.

1305.3001; Chapter 30 Elevators, Dumbwaiters, Escalators, and Moving Walks

It is necessary to delete this section of the UBC because elevators and other similar devices are regulated by Minnesota Rules 1305.5100 through 1305.5118, now proposed for chapter 1307.

1305.4313; Appendix Chapter 3 Division I - Detention and Correctional Facilities

These proposed amendments are needed to maintain the intent of smoke control within Group I, Division 3 occupancies while recognizing that practical difficulties are involved in meeting the strict letter of the code in the climatic conditions encountered in Minnesota (i.e. the requirement that smoke management provide for 100% supply to all floors with returns closed in all zones adjacent to zone of smoke generation at not less than eight air changes per hour). We believe the intent of the UBC requirement for smoke management was for the multi-tiered cell complex only. Appendix chapter 3 (1991 Appendix chapter 10) was developed to allow the use of a multi-tiered cell design in I-3 occupancies. Previously the code would not allow levels to be open to each other in an I-3 unless designed under the provisions of an atrium or mezzanine. The physics associated with smoke development, spread and control in a multi-tiered open cell block is similar to that of an atrium. Like the provisions for an atrium; the proposed amendments recognize that a multi-tiered cell area requires the more restrictive smoke-management system, while the adjacent areas require only smoke exhaust. These amendments are reasonable and were developed in consultation within the State Fire Marshal's office and the Minnesota Department of Corrections.

The following publications were also used in the development of

the proposed amendments:

"New Correction Facilities." NFPA 101-Life Safety Code Handbook 1991.

"Smoke Control Systems." NFPA 92A, 1992.

"Alternate Approaches to Life Safety." NFPA 101M, 1992.

"Chapter 57-Smoke Control." Uniform Building Code, 1992 Supplement.

"Fire Safety in Correctional Facilities - 1981." U.S. Department of Justice.

1305.4332; Appendix Chapter 3 Division III - One and Two Family Dwelling Code

This is the same as previous rule part 1305.6901. Only the rule number and title have changed.

1305.4429; Appendix Chapter 29 - Minimum Plumbing Fixtures

Exception 1 is being amended from the UBC in order to permit the building official the authority to determine whether or not an adjustment to the ratio is really warranted. Essentially the word "shall" is replaced with the word "may". This is reasonable because it restores the authority of the building official to administer the code in this area which is consistent with section 104 of the code. Exception 2 is necessary because studies done by the division show that an excessive amount of fixtures may result if 50 square feet per occupant is used to determine the occupant load for schools or their auditoriums. Also see comment under part 1305.0020.

1305.7100 Special Provisions for the City of Rochester

This rule is amended in order to reference the applicable provisions of the 1994 edition of the UBC, its corresponding occupancy designations, and numbering system.

3. Optional Fire Protection Systems, Chapter 1306

1306.0100 Special Fire Protection Systems - Optional

Previous rule part 1305.6905 is being relocated to a separate

chapter of Minnesota Rule in order to identify it as an optional chapter of the state building code and not an amendment to the UBC. The only changes are as follows.

**Subpart 3 Requirements.** In order to clear up some confusion as to whether area separation walls create separate buildings for the purposes of this chapter, it was necessary to add an additional sentence. This is reasonable because the provision is consistent with the original intent that buildings are viewed in this section in their entirety, irrespective of area separation walls. In addition, the occupancy group designations have been changed to reflect the corresponding designations in the 1994 UBC. Previous item 11 is being deleted because Section 904.2.5.2 requires that H-4 occupancies over 3000 square feet be sprinklered. Items previously numbered as 12 and 13 are consolidated into new item 11 in order to reduce duplication of text and improve clarity. The deletion of text relating to alternate fire protection designs and the extent of protection required within apartment units, is deleted because this subject is dealt with in section 904.1.2 exception 3 of the 1994 UBC. This is reasonable because the UBC standard referenced in exception 3 provides protection similar to that inferred in the language being deleted.

**Subpart 4 Standard.** The existing rule does not describe the standard to which automatic sprinkler systems required by this section must be installed. Therefore, it is both necessary and reasonable that the appropriate standard, referred to in UBC section 904, be referenced here.

Jurisdictions that adopt these optional provisions often are faced with a dilemma when a building, required to be sprinklered by this section, is to be constructed in an area without a public water supply. Therefore, it is necessary that the provision be added to ensure that a valid, alternate source of water is provided to supply the fire-sprinkler system. This is reasonable because it will now be clear to the reader that there is no exception to providing an appropriate on-site source of water supply to the sprinkler system when the system is required to be installed by this section.

**Subpart 5 Substitute construction.** There has been confusion over whether a sprinkler system required by this section may satisfy UBC Section 508 for substitution of one-hour fire-resistive construction. This new provision is necessary to clarify that the

substitution is permissible because the qualifier in 508, "When ... not required throughout a building by other sections of this code", refers only to the UBC and not this optional chapter of the Minnesota State Building Code.

#### 4. Basic Snow Loads, Chapter 1365

##### 1365.0050 Scope

Because the snow load requirements are being consolidated into one chapter as described in 1365.0100, it is necessary to add this part in order to outline its application. The last sentence has essentially been relocated from part 1305.4700 exception 1.

##### 1365.0100; Basic Snow Loads

This material is relocated from Minnesota rule part 1305.4700 to chapter 1365 in order to consolidate all of the snow load requirements into one chapter and clarify when provisions for snow slide-off and drifting are applicable. This is reasonable because it results in a reduction of duplicated code provisions and does not change the intent of current rule.

##### 1365.0200 Variations of Snow Loads

It is necessary to delete the reference to the UBC because the basic snow loads are now all contained within newly proposed part 1365.0100.

##### 1365.0300 Calculating Increases or Decreases

The word "increase" is being deleted because this subpart only deals with decreases.

#### V. Small Business Considerations

Minnesota Statute 14.115, subdivision 2 (1988) requires the department, when proposing rules which may affect small businesses, to consider the following methods for reducing the impact on small businesses;

- (a) the establishment of less stringent compliance or reporting requirements for small businesses;

- (b) the establishment of less stringent schedules or deadlines for compliance or reporting requirements for small businesses;
- (c) the consolidation or simplification of compliance or reporting requirements for small businesses;
- (d) the establishment of performance standards for small businesses to replace design or operational standards required in rule; and
- (e) the exemption of small businesses from any or all requirements of the rule.

The division has evaluated the effect of the proposed rules on small businesses and has considered each of the methods listed above for reducing the impact of the rules on small businesses. The adoption of these rule amendments may have some effect on small businesses in Minnesota.

Since these rules contain no scheduling, deadline, or reporting requirements, items (a), (b), and (c) are not applicable.

These rules are performance based for all uses, not just for small businesses as identified in item (d).

Item (e) is not applicable as Minnesota Statute 16B.59 requires the commissioner of administration to administer a state code of building construction which will provide basic and uniform performance standards for all residents of the state.

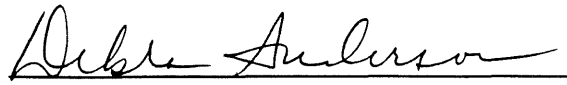
#### VI. Fiscal Impact

Minnesota Statutes, section 14.11, subdivision 1, does not apply because adoption of these rules will not result in additional spending by local public bodies in excess of \$100,000 per year for the first two years following adoption of the rules.

#### VII. Conclusion

Based on the foregoing, the proposed amendments to Minnesota Rule 1300, 1305, 1306, and 1365 are both needed and reasonable.

Date: 8-18-94, 1994

  
DebraRae Anderson, Commissioner  
Department of Administration

