

A user guide to combined regulations of the  
**U. S. FAIR HOUSING AMENDMENTS ACT of 1988**  
and **CALIFORNIA DISABLED ACCESS REGULATIONS**  
for multi-family housing and condominium dwelling units.



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**A  
GUIDE  
TO  
\*CALIFORNIA  
MULTI-FAMILY  
DISABLED  
ACCESS  
REGULATIONS**

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Compiled & Edited by  
**California Building Officials**



and

**California Department of Housing & Community Development**

July 1993

## **\* CALIFORNIA**

**"CALIFORNIA MULTIFAMILY DISABLED ACCESS REGULATIONS" are applicable to privately-funded multifamily and condominium projects. For information or clarification of the regulations, contact:**

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**Disabled access regulations for public buildings and publicly-funded living accommodations, hotels and motels are promulgated under separate regulations. For information or clarification, contact:**

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***"A guide to California Multifamily Disabled Access Regulations"***

**FIRST EDITION  
July 1993**

**DEPARTMENT OF HOUSING AND COMMUNITY DEVELOPMENT****DIVISION OF CODES AND STANDARDS**

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June 24, 1993

California Building Officials  
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Dear Building Officials:

The Department of Housing and Community Development, Division of Codes and Standards, has reviewed the document entitled "A guide to California Multifamily Disabled Access Regulations". I have found the document to be consistent with proper implementation and enforcement of the Department's regulations.

The user's guide provides an explanation of the technical regulations that should aid in the understanding of the access requirements for persons with disabilities. The users of the guide should benefit by the inclusion of the technical regulations contained in the appendix.

Sincerely

A handwritten signature in black ink, appearing to read "M. E. King". The signature is fluid and cursive, written over a horizontal line.

M. E. (Ed) King  
Chief, Housing Standards

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## *Preface*

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California Building Officials in conjunction with California Department of Housing and Community Development is proud to present the first edition of "*A Guide to California Multifamily Disabled Access Regulations*".

This document, "*A Guide to California Multifamily Disabled Access Regulations*," has been prepared as an explanation and illustration of state regulations that govern the design and construction of multifamily dwellings for individuals with mobility and sensory impairments. The users of this document should be aware that the contents and illustrations are a paraphrasing of the regulations and are intended only as an aid to understanding the regulations. California Department of Housing and Community Development which promulgated these regulations can provide further clarifications and assistance.

"*A Guide to California Multifamily Disabled Access Regulations*" would not have been possible without the expertise and assistance of California Building Officials, California Department of Housing and Community Development, California Department of Rehabilitation, California Building Industry Association, The American Institute of Architects California Council, and various support organizations for persons with disabilities. Their efforts are a tribute to the ability of diverse groups to jointly solve a common problem.

The CALBO Board of Directors would like to thank the CALBO AD-HOC Committee for their invaluable efforts in developing this publication:

Donald Clark, CBO, City of Kingsburg  
Pete Guisasola, CBO, City of Rocklin  
Reggie Meigs, CBO, Solano County  
Neil Rains, AIA, CBO, City and County of San Francisco

With special thanks to Mrs. Lillie Mozaffari, P.E., Sacramento County Building Department, for her assistance in editing and paraphrasing and to Marvin F. Nunes, Designer, Computer Graphics, Fresno, for his outstanding efforts in producing the graphics and illustrations.

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## *Background and Purpose of the Adaptability/Accessibility Regulations*

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The adaptability/accessibility regulations were developed by the California Department of Housing and Community Development (HCD) in conjunction with the Department of Rehabilitation, California Building Officials (CALBO), California Building Industry Association (CBIA), American Institute of Architects California Council (AIACC), disabled access advocacy organizations and individuals in order to provide for the safety and welfare of persons with disabilities and visitors of apartment buildings, condominiums and time share units. The adopted state regulations require minimum adaptations for newly constructed, privately-funded apartment buildings having three or more units, condominium buildings containing four or more dwelling units and privately-funded shelters intended for occupancy as a residence for homeless persons. These regulations are published in California Building, Plumbing and Electrical Codes (Title 24, California Code of Regulations). The technical regulations are contained in the Appendix of this document.

An adaptable building is one that is accessible in terms of entry and circulation, and, therefore, can be adapted to meet specific needs of a disabled person for items such as grab bars, repositionable counter tops, etc. Rather than requiring only a small number of completely accessible units, the new regulations require multifamily buildings, unless specifically exempted, be adaptable to meet the needs of mobility and sensory impaired persons.

The first regulations governed newly constructed, privately-funded apartment houses only and became effective September 15, 1984 at the state level and effective at the local level (upon adoption) on or after September 15, 1984, or by default on September 15, 1985, unless a given project had received prior approval from the responsible local governmental agency and a permit to construct had been applied for prior to March 15, 1985. The regulations addressed apartment access and usability through barrier-free designs and adaptability of specific building elements unique to the special needs of persons with physical and sensory disabilities.

Meeting these needs is an appropriate acknowledgement of dramatic medical and social changes which have affected the disabled. The adaptability concept recognizes that able-bodied people may become severely disabled, either permanently or temporarily. This consideration is especially important for the elderly, for whom having an adaptable dwelling unit may mean the difference between staying in their familiar environment, or relocating and perhaps becoming institutionalized. Rental housing adaptability regulations help provide an important part of that independence. Today, through these many changes, individuals with mobility and sensory impairments have the opportunity to work and live independently.



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# *History*

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In 1968, the Office of the State Architect was directed by legislation to adopt building regulations in hotels, motels and in certain public buildings to address the needs of the physically disabled community.

In 1978, the Commission of Housing and Community Development was approached by various members of the disabled community and was asked to adopt regulations for privately-funded buildings not covered by the prior legislation. After consultation with and cooperation from the building industry and various physically disabled groups, the Department of Housing and Community Development (HCD) submitted draft regulations to the Commission of Housing and Community Development in 1980.

The Commission of Housing and Community Development appointed an ad hoc committee to work with interest groups in reviewing the draft disabled adaptability regulations prepared by HCD. The committee held five meetings, solicited technical advice from local building officials, contractors, builders, the Department of Rehabilitation and representatives of the disabled constituency.

The Commission held seven public hearings in 1980, at which HCD staff presented cost data and technical information. After months of input, the draft regulations were refined and formally adopted by HCD on August 10, 1982.

On December 9, 1982, the State Building Standards Commission approved the adaptability and accessibility regulations for apartment houses (with a cost cap of \$1,000 per applicable unit). However, the Commission requested that HCD further study the issue of demand and need before considering application of the standards to condominiums.

In 1983, the California Building Industry Association formally requested the State Building Standards Commission to reconsider the approval of the regulations in order to address industry concerns relating to the cost of construction and the applicability requirements which were based on the number of persons with physical disabilities in California.

Numerous negotiating sessions were conducted between various representatives of the disabled community, the California Building Industry Association and the Director of the Department of Housing and Community Development. Due to the good faith efforts of these groups, the negotiating sessions resulted in amendments to the applicability of the regulations and were approved by the State Building Standards Commission on December 19, 1983.

\* the cost cap reduced from \$1,000 to \$600 per applicable unit;

\* an apartment house three or four dwelling units located on a single lot was exempted.

The intention of the adaptability regulations is to provide safe and usable housing to individuals with a variety of disabling conditions and special needs. The regulations successfully fulfill this purpose by including standards that will benefit individuals with all types of mobility impairments and activity limitations. For example, the installation of backing of bathroom walls is required for future installation of grab bars. This requirement allows cane, crutch, and wheelchair users added support for transferring onto the water closet. The additional clear floor space in both the bathroom and kitchen allows for movement with wheelchairs. Visual alarms, text telephones, contrasting colors on signage and braille markings on elevators aid the sensory impaired.

In August 1986, due to the large amount of concern expressed by the Building Officials, building industry, and disabled community on the proposed regulations, the Director of the Department of Housing and Community Development appointed a Disabled Access Advisory Committee. The Committee was asked to study the elements HCD had identified that appeared to be causing the concerns and provide input to HCD on the proposed amendments.

On January 20, 1989, the Building Standards Commission approved amendments to the regulations. These regulations were effective at the state level July 1, 1989 and effective at the local level January 1, 1990.

The major items approved by the Commission were:

1. The cost cap was repealed.
2. Five percent of all apartment dwellings on the building site were to comply fully with the access and adaptability regulations.
3. All other accessible units would be required to provide twelve (12) mandatory features.

On March 13, 1991, the housing provisions of the Federal Fair Housing Amendments Act of 1988 (HR1158), hereinafter referred to as the ACT, became effective in all state, city and county jurisdictions that had not adopted regulations equal to or more stringent than the ACT.

The California Building Industry Association petitioned HCD to adopt the Federal regulations and combine into one document the more stringent requirements with the existing State regulations. One comprehensive document would reduce the confusion that existed due to the myriad of documents on disabled access and the substantial monetary penalties that could be imposed on designers and developers.

In May 1991, the Director of HCD once again appointed a Disabled Access Advisory Committee to review and compile a document with regulations that incorporated both State and Federal requirements. The Committee was composed of representatives from the Department of Rehabilitation, Independent Housing Services, Inc., California Building

Industry Association, California Council of American Institute of Architects and California Building Officials.

On August 29, 1991, the California Building Standards Commission (CBSB) approved emergency regulations with an effective date of January 1, 1992. However, California Building Officials petitioned the Department to postpone implementation of the regulations until July 1, 1992, to provide the local jurisdictions sufficient opportunity to train their personnel on the requirements of the emergency regulations. After due consideration, HCD concluded that it was appropriate to postpone the implementation until April 15, 1992.

On December 10, 1991, CSBC approved a repeal of the August 29, 1991 regulations and approved a new emergency regulation package with an effective date of April 15, 1992.

On October 30, 1992, following extensive testimony, CBSC tabled the formal regulation adoption and directed the Department to meet with interested parties in an attempt to resolve expressed concerns relating to "Accessible Route of Travel".

On November 12, 1992, Department representatives met with representatives of the disabled community, California Building Officials, California Building Industry Association, the design profession and California Building Standards Commission. An Agreement was reached.

On December 9, 1992, CBSC approved the formal regulation adoption with an effective date of July 15, 1993.

# **Part I**

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## ***Effective use of the Guide***

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### **Introduction:**

*Part I will describe key aspects of a project and the order in which the user should review a proposed design. Applicability of the regulations is based on a clear delineation and understanding of these criteria.*

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# *Effective Use of the Guide*

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## *Introductory Note:*

The regulations apply to apartment buildings of **three** or more units, condominium buildings of **four** or more units, dormitories, and homeless shelters. They do not apply to multistory dwelling units such as townhouses, unless an elevator is provided. It is important to note that many factors will affect the application of these regulations. Such factors include, the number and location of building entrances, whether or not the building has been provided with an elevator, the location and topography of the project site, the layout of buildings, parking areas and common use areas.

*Effective use of this Guide requires that you follow the steps listed below to determine applicability of the regulations.*

- 1. Determine the type of multifamily units** - Are the units single story or multi-story? Are they apartments, condominiums, dormitories or homeless shelters?
- 2. Determine the number of units in each building** - Review for the minimum number of dwelling units needed to trigger application. Note, these regulations apply on a building by building basis.
- 3. Determine the type of building entrance (multiple or single)** - The type of building entrance will have an effect on the number of units to be made accessible and adaptable.
- 4. Does the building contain an elevator?** - Buildings with elevators will normally require accessibility to all dwelling units.
- 5. Locate all qualifying ground floors** - Units located on ground floors will normally be required to be accessible and adaptable. The location of all ground floors is critical in determining the level of access. Buildings can have one or more ground floors.
- 6. Identify all common use areas and facilities** - Common use areas and facilities are required to be accessible.
- 7. Determine the percentage of units required to be adaptable** - The regulations will determine the minimum number of units to be accessible and adaptable. This will vary on many different factors.

**8. Review the site test / impracticality criteria** - A determining factor for applicability is the location and topography of the building site.

**9. Determine all required accessible routes** - Accessible routes are required to buildings, parking areas, common use areas and facilities, bus stops, and public sidewalks.

**10. Review the site improvements** - common use areas and routes for detailed accessibility requirements.

**11. Review all buildings** - for detailed accessibility requirements.

**12. Review all adaptable dwelling units** - for detailed accessibility requirements.

## **Part II**

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### ***Definitions***

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#### **Introduction:**

*Part II contains definitions that are critical to understanding various aspects of the regulations. Many common words and phrases have special meanings pertaining only to the regulations. It is important for the user to become familiar with the meanings of all key terms.*

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# *Definitions*

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- 3102(b) **ACCESSIBLE** for covered multifamily dwellings is the public or common-use areas of the building that can be approached, entered and used by individuals with physical disabilities. The phrase "readily accessible to and usable by" is synonymous with accessible.
- 3102(c) **ACCESSIBLE ROUTE OF TRAVEL** is a continuous unobstructed path connecting all accessible elements and spaces in an accessible building or facility that can be negotiated by a person with a severe disability using a wheelchair, and that is also safe for and usable by people with other disabilities.
- 3102(d) **ACCESSIBILITY** is the combination of various elements in a building or area which allows access, circulation and the full use of the building and facilities by persons with physical disabilities.
- 3102(f) **ADAPTABLE DWELLING UNIT** is a dwelling unit in a building with a building entrance on an accessible route designed in such a manner that the public and common-use areas are readily accessible to and usable by disabled persons, and all doors are designed sufficiently wide to allow passage into and within all premises by physically disabled persons in wheelchairs as required by this code.
- 402(q) **APARTMENT HOUSE** is any building or portion thereof which contains three or more apartment dwelling units.
- APARTMENT** - See "Dwelling Unit".
- 3102(h) **ASSISTIVE DEVICE** is an aid, tool or instrument used by a person with disabilities to assist in activities of daily living. Examples of assistive devices include tongs, knob-turners and oven-rack pusher/pullers.
- 3102(i) **BATHROOM** is a room which includes a water closet (toilet), lavatory (sink), and bathtub or shower. It does not include single-fixture facilities or those with only a water closet and lavatory. It does include a compartmented bathroom. A compartmented bathroom is one in which the fixtures are distributed among interconnected rooms. A compartmented bathroom is considered a single unit and is subject to the requirements for bathrooms for disabled persons.



- 3102(j) **BUILDING ENTRANCE ON AN ACCESSIBLE ROUTE** is an accessible entrance to a building that is connected by an accessible route to public transportation stops, to parking or passenger loading zones, or to public streets or sidewalks, if available.
- 404(c) **C.C.R.** means the California Code of Regulations.
- CLEAR (WIDTH OR SPACE)** is a two-dimensional or three-dimensional unobstructed area.
- 3102(k) **COMMON-USE AREAS** for covered multifamily dwellings are rooms, spaces or elements inside or outside of a building, that are made available for the use of residents of a building or the guests thereof. These area include, but are not limited to, hallways, lounges, lobbies, laundry rooms, refuse rooms, mail rooms, recreational areas and passageways between buildings.
- 3102(l) **COVERED MULTIFAMILY DWELLINGS** are all dwelling units in buildings consisting of three or more privately-funded dwelling units, or condominiums consisting of four or more dwelling units, if such buildings have one or more elevators; and all ground-floor dwelling units in other buildings consisting of three or more dwelling units, or condominiums consisting of four or more dwelling units. Dwelling units within a single structure separated by firewalls do not constitute separate buildings.
- CROSS SLOPE** is a slope that is perpendicular to the direction of travel.
- 3102(m) **CURB CUT** is an interruption of a curb, at a pedestrian way, which separates surfaces that are substantially at the same elevation.
- 3102(n) **CURB RAMP** is a sloping pedestrian way, intended for pedestrian traffic, which provides access between a walk or sidewalk to a surface located above or below an adjacent curb face.
- 405(i) **DIRECTIONAL SIGN** is a publicly-displayed notice which indicates by use of words or symbols a recommended direction or route of travel.
- 3102(o) **DWELLING UNIT** is a single unit of residence for a household of one or more persons. Examples of dwelling units covered by these regulations include condominiums, an apartment unit within an apartment building and other types of dwellings in which sleeping accommodations are provided but toilet or cooking facilities are shared by occupants of more than one room or portion of the dwelling. Examples of the latter include dormitory rooms and sleeping accommodations in shelters intended for occupancy as a residence for homeless persons.
- 406(f) **ENFORCING AGENCY** shall mean the designated department or agency as specified by statute.

- 407(b) **FACILITY** is a building, structure, room, site, complex, or any portion thereof, that is built, altered, improved or developed to serve a particular purpose.
- 408(d) **GRAB BAR** is a bar for the purpose of being grasped by the hand for support.
- 408(e) **GRADE (ADJACENT GROUND ELEVATION)** is the lowest point of elevation of the finished surface of the ground, paving or sidewalk within the area between the building and property line or, when the property line is more than 5 feet from the building and the line 5 feet from the building.
- 3102(p) **GROUND FLOOR** is the floor of a building with a building entrance on an accessible route. A building may have one or more ground floors. Where the first floor containing dwelling units in a building is above grade, all units on that floor must be served by a building entrance on an accessible route. This floor will be considered to be a ground floor.
- 410(c) **INTERNATIONAL SYMBOL OF ACCESSIBILITY** is that symbol adopted by Rehabilitation International's 11th World Congress for the purpose of indicating that buildings and facilities are accessible to the physically disabled.
- 3102(q) **KICK PLATE** is an abrasion-resistant plate affixed to the bottom portion of a door to prevent a trap condition and protect its surface.
- 413(h) **LEVEL AREA** is a specified surface that does not have a slope in any direction exceeding 1/4-inch in one foot from the horizontal (2.083 percent gradient).
- 3102(r) **LIFT, SPECIAL ACCESS** - See "Special Access Lifts".
- 413(h) **LIVING ACCOMMODATIONS** are any privately or publicly-funded building or portion thereof having three or more apartments as defined in the U.B.C.
- 3102(s) **MULTISTORY DWELLING UNIT** is a dwelling unit with finished living space located on one floor and the floor or floors immediately above or below.
- 3102(t) **NEWLY CONSTRUCTED** is a building that has never before been used or occupied for any purpose.
- 416(a) **OCCUPANCY** is the purpose for which a building, or part thereof, is used or intended to be used.
- 417(b) **PASSAGE DOOR** is a door other than an exit door through which persons may traverse.

- 417(c) **PASSENGER ELEVATOR** See definition of "Elevator", Chapter 51, Title 24, C.C.R.
- 417(d) **PATH OF TRAVEL** is a passage that may consist of walks and sidewalks, curb ramps, pedestrian ramps, lobbies, corridors, elevators, other improved areas, or a necessary combination thereof, that provides free and unobstructed access to and egress from a particular area or location for pedestrians and/or wheelchair users.
- 417(e) **PEDESTRIAN** is an individual who moves in walking areas with or without the use of walking assistive devices such as crutches, leg braces, wheelchairs, etc.
- 417(g) **PEDESTRIAN RAMP** is a sloping path of travel intended for pedestrian traffic and as differentiated from a curb ramp.
- 417(k) **PERMANENT** shall mean facilities which are intended to be used for periods longer than those designated in this code under the definition of "temporary".
- 3102(v) **PEOPLE WITH PHYSICAL DISABILITIES** means, with respect to a person, a physical or mental impairment which substantially limits one or more major life activities, a record of such an impairment, or being regarded as having such an impairment. This term does not include current, illegal use of or addiction to a controlled substance. For the purposes of these guidelines, an individual shall not be considered to have a physical disability solely because that individual is a transvestite. As used in this definition, "physical or mental impairment" includes:
1. Impairments which affect ambulation due to cerebral palsy, poliomyelitis, spinal cord injury, amputation, arthritis, cardiac and pulmonary conditions and other conditions or diseases which reduce mobility, including aging. Any physiological disorder or condition, cosmetic disfigurement, or anatomical loss affecting one or more of the following body systems; neurological; musculoskeletal; special sense organs; respiratory, including speech organs; cardiovascular; reproductive, digestive; genito-urinary; hemic and lymphatic; skin; and endocrine; or
  2. Any mental or psychological disorder, such as mental retardation, organic brain syndrome, emotional or mental illness, and specific learning disabilities. The term "physical or mental impairment" includes, but is not limited to, such diseases and conditions as orthopedic, visual, speech and hearing impairments, cerebral palsy, autism, epilepsy, muscular dystrophy, multiple sclerosis, cancer, heart disease, diabetes, human immunodeficiency, virus infection, mental

retardation, emotional illness, drug addiction (other than addiction caused by current, illegal use of a controlled substance) and alcoholism. These guidelines are designed to make units accessible or adaptable for people with physical disabilities.

3. "Major life activities" means functions such as caring for one's self, performing manual tasks, walking, seeing, hearing, speaking, breathing, learning and working.
4. "Has a record of such an impairment" means has a history of, or has been misclassified as having a mental or physical impairment that substantially limits one or more major life activities.
5. "Is regarded as having an impairment" means:
  - A. The person has a physical or mental impairment that does not substantially limit one or more major life activities but that is treated by another person as constituting such a limitation; or
  - B. The person has a physical or mental impairment that substantially limits one or more major life activities only as a result of the attitudes of others toward such impairment; or
  - C. The person has none of the impairments defined in paragraph 1 of this definition but is treated by another person as having such impairment.

- 3102(w) **POWDER ROOM** is a room containing only a water closet (toilet) and lavatory (sink).
- 417(t) **PRIMARY ENTRANCE** shall mean any entrance to a facility which has substantial pedestrian traffic to any specific major function of the facility.
- 3102(z) **PUBLIC-USE AREAS** are interior or exterior rooms or spaces of a building that are made available to the general public. Public use may be provided at a building that is privately or publicly owned.
- 3102(aa) **RAMP** See "pedestrian ramp" or "curb ramp".
- 419(b) **REASONABLE PORTION** shall mean that segment of a building, facility, area, space or condition which would normally be necessary if the activity therein is to be accessible by the disabled.
- 419(c) **RECOMMEND** does not require mandatory acceptance, but identifies a suggested action which shall be considered for the purpose of providing a greater degree of accessibility to the physical disabled.

- 419(h) **RISER** is that upright portion of a step in a stair.
- 420(a) **SANITARY FACILITY** is any single unit or a combination of water closets, urinals, lavatories, bathtubs or showers, together with the room or space in which they are housed.
- 420(h) **SHOULD** See "recommend".
- 3102(b) **SLOPE** is, for the purpose of privately-funded covered multifamily buildings of three or more dwelling units, the relative steepness of the land between two points and is calculated as follows: The horizontal distance and elevation change between the two points (e.g., an entrance and a passenger loading zone) are determined from a topographical map. The difference in elevation is divided by the distance and the resulting fraction is multiplied by 100 to obtain the percentage. For example, if a principle entrance is raised 1 foot higher than the passenger loading zone, then the slope is  $1/10 \times 100 = 10\%$ .
- 420(n) **SPECIAL ACCESS LIFT** is a hoisting and lowering mechanism equipped with a car, platform or support which serves two landings of a building or structure and is designed to carry a passenger or passengers and/or luggage or other material a vertical distance as may be allowed.
- STRIKE EDGE** is the latched side of the door.
- SWING EDGE** is the hinged side of the door.
- 421(a) **TEMPORARY** shall mean buildings and facilities intended for use at one location for not more than one year and seats intended for use at one location for not more than 90 days.
- 421(d) **TREAD** is the horizontal surface of a step in a stair
- 3102(c) **TOWNHOUSE** is a multistory dwelling unit.
- 422(a) **U.B.C.** shall mean the 1991 Edition of the Uniform Building Code as published by the International Conference of Building Officials.
- 3102(d) **VEHICULAR OR PEDESTRIAN ARRIVAL POINTS** are public or resident parking areas, public transportation stops, passenger loading zones and public streets or sidewalks.
- 424(b) **WALK** is a surfaced pedestrian way not located contiguous to a street used by the public (see definition for sidewalk).
- WATER CLOSET** is a toilet.

- 3102(e) **WHEELCHAIR** is a chair mounted on wheels to be propelled by its occupant manually or with the aid of electric power, of a size and configuration conforming to the recognized standard models of the trade.
- 3102(ff) **WHEELCHAIR OCCUPANT OR WHEELCHAIR USER** is an individual who, due to a physical impairment or disability, utilizes a wheelchair for mobility.

# *Part III*

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## *Applicability*

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### **Introduction:**

*Part III will guide the user through the "applicability maze" with clear descriptions and figures to aid in understanding. One of the most rigorous aspects of the regulations is in determining applicability.*

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# *Applicability of the Regulations*

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## *General*

110(8)            **General.** Access and adaptability requirements apply to newly constructed, privately funded, multifamily dwelling units as follows:

1.     Apartment buildings having three or more dwelling units.
2.     Condominium buildings having four or more dwelling units.
3.     Shelters for homeless persons.
4.     Dormitories and other type of dwellings containing sleeping accommodations with common toilet or cooking facilities.

**Note:** For hotels, motels, and publicly funded housing projects, refer to the Office of the State Architect.

## *Existing Multifamily Dwellings*

110(8)            **General.** Existing multifamily dwellings are exempt from the regulations.

## *Additions, alterations, and repairs*

110(8)            **General.** The regulations do not apply to the repair, rehabilitation or additions to existing apartment houses, condominiums or time share units.

**Exception**            **Dwelling units added to existing units shall comply if the added unit triggers compliance by total number of units. Existing units remain exempt.**

**Exception**            **The conversion of nonresidential buildings into apartments, condominiums, time share units, shelters for homeless persons, dormitories and other types of dwellings containing sleeping accommodations with common toilet or cooking facilities shall comply with the regulations.**



## Application to Buildings

110(8)

**General.** The regulations apply on a building by building basis. Each building containing the required number of dwelling units within a project must be evaluated individually. For buildings containing a mix of multistory and single story units, it is required to include all units when determining applicability, however, only the single story units are required to be accessible and adaptable. See Figure 3.1

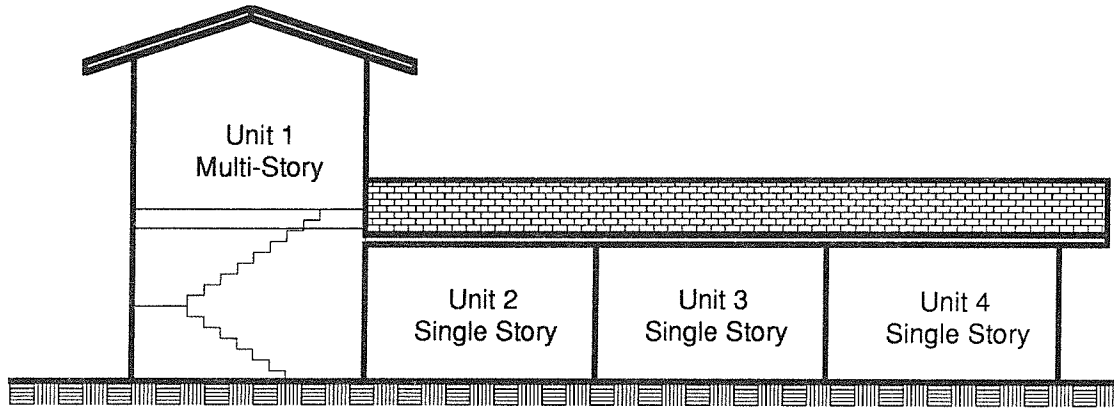


Fig. 3.1 In the above 4 unit Multifamily building, units 2,3,& 4 must comply. The Multi story unit ( Unit #1) is exempt.

## Units with Firewall Separations

3102.1 def.  
"covered multi-family building"

**General.** Attached units, row housing or units within a single structure which are separated by required fire-resistive construction, do not constitute separate buildings for the purposes of the regulations. This includes many types of planned unit developments such as zero lot line construction, consisting of R-3 occupancies that may be intended for individual ownership. (see definition of "covered multifamily dwellings"). These units are considered to be multifamily dwellings and are required to be accessible and adaptable. See Figure 3.2

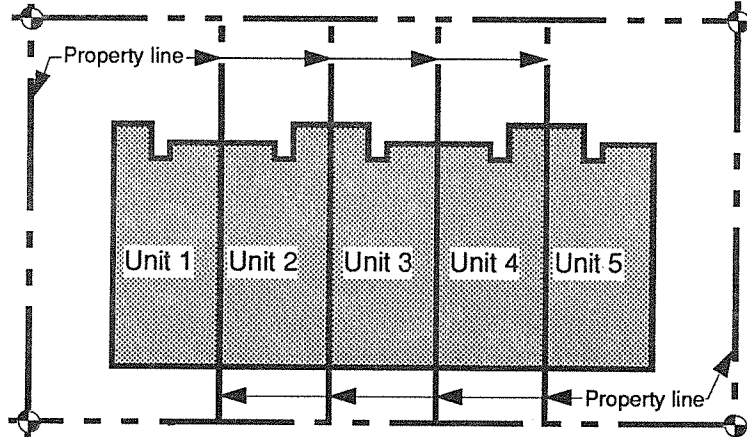


Fig. 3.2 Single story units separated by firewalls or property lines (as depicted above) shall comply.

## Multistory Dwelling Units

3103(a.1)8.1  
Exception 6

**General.** The regulations do not apply to multi-story dwelling units such as Townhouses. Multi-story dwelling units are units that contain finished living space above or below a floor (see definition of "multistory dwelling unit"). See Figure 3.1

**Exception**

When a story of a multistory dwelling unit is served by a building elevator, such story shall be accessible and shall contain an accessible and adaptable bathroom or powder room. See figure 3.3

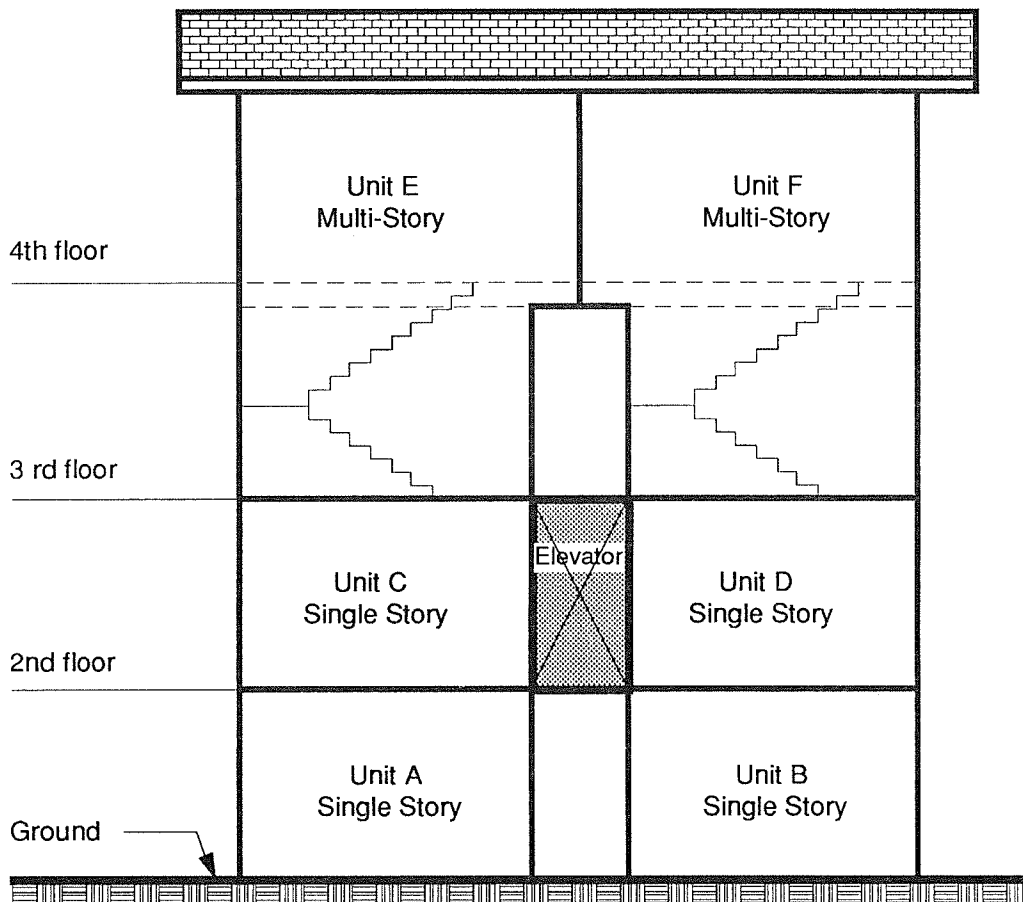


Fig 3.3 In this example, the elevator serves the ground floor and floors 2 & 3. Units A, B, C & D are required to be accessible and adaptable. Units E & F shall be provided with an accessible bathroom or powder room on the floor served by the elevator.

## Units with Basements/Attics

3102(s) def.  
"multistory  
dwelling unit"

**General.** If a basement or attic is part of the finished living space within a dwelling unit, it shall be considered as a multistory dwelling unit. See Figure 3.4

**Exception**

**If the basement or attic space is not finished, the dwelling unit will not be considered a multistory dwelling unit, however, the unfinished space would not be required to comply with the regulations.**

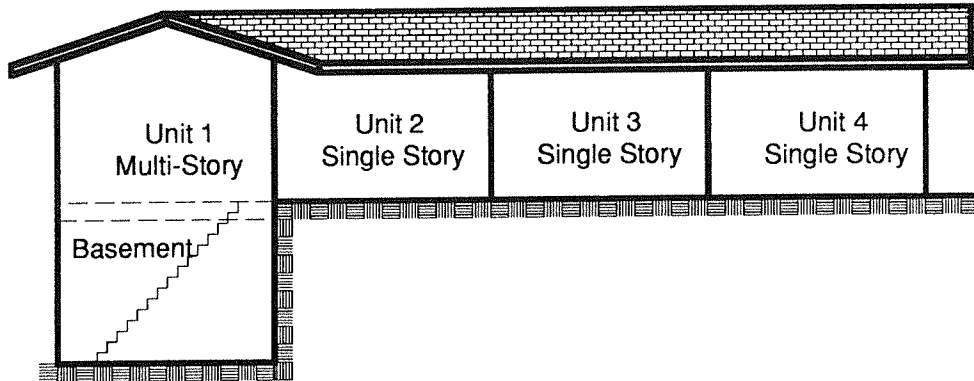


Fig 3.4 In the above 4 unit multifamily building, units 2,3,&4 shall comply. Unit 1 is an exempt multistory unit unless the basement is unfinished.

## Ground Floors

3102(p) def.  
"ground floor"

**General.** The regulations apply to units on ground floors. Ground floors are any floors containing a building entrance on an accessible route. Buildings can have one or more ground floors. The first floor above grade, containing dwelling units is always a ground floor unless specifically exempted. In an elevator building, all units on floors served by such elevators shall be subject to the regulations (see definition of "ground floor"). See Figure 3.5

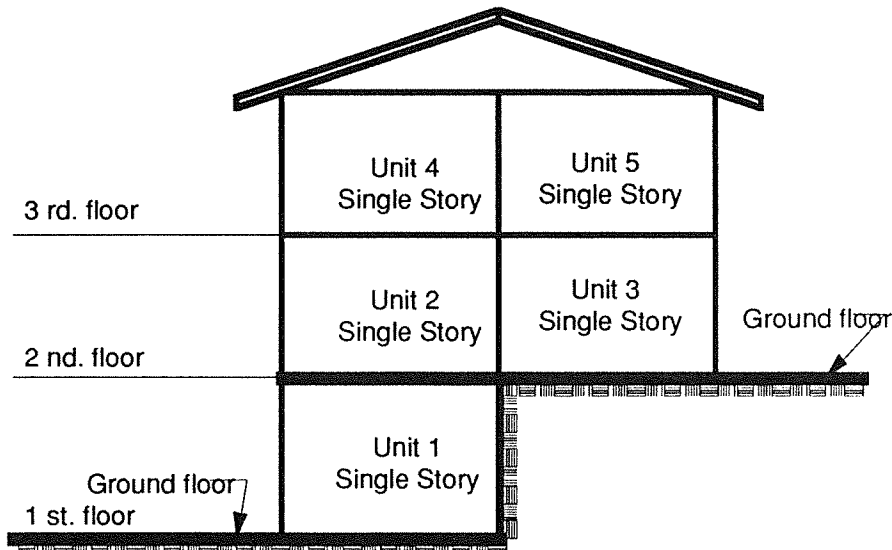


Fig 3.5 In this example, units 1,2 & 3 shall comply, units 4 & 5 are exempt.

## Floors above Grade

3102(p) def.  
"ground floor"

**General.** When the first floor containing dwelling units is a floor above grade, all units on that floor are considered ground floor units and shall be accessible and adaptable. See Figures 3.6, 7 and 8.

**NOTE:**

**When the dwelling unit(s) are located above a private garage serving the unit(s), the dwelling unit(s) are normally considered multistory and would be exempt from the regulations.**

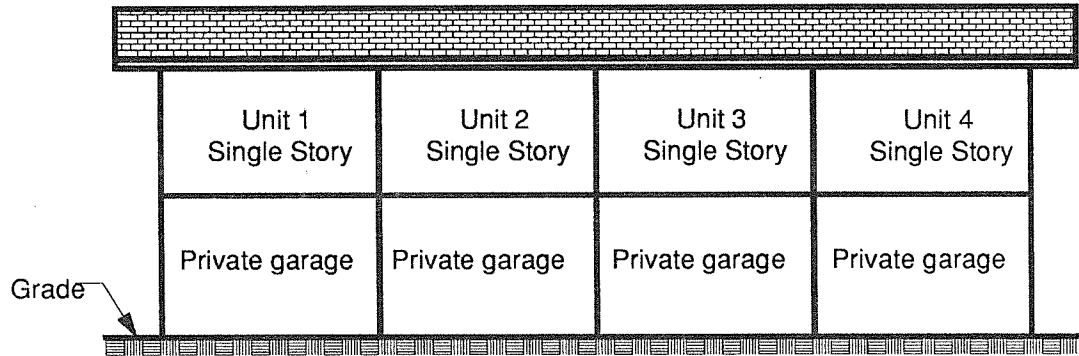


Fig. 3.6 Units 1,2,3 & 4 are considered multistory dwelling units (Carriage units) and are exempt.

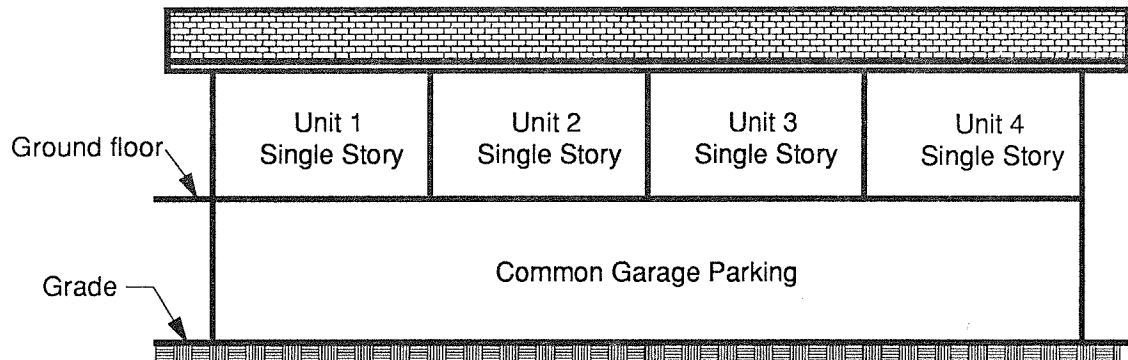


Fig. 3.7 Units 1,2,3 & 4 are considered ground floor units and shall be accessible and adaptable.

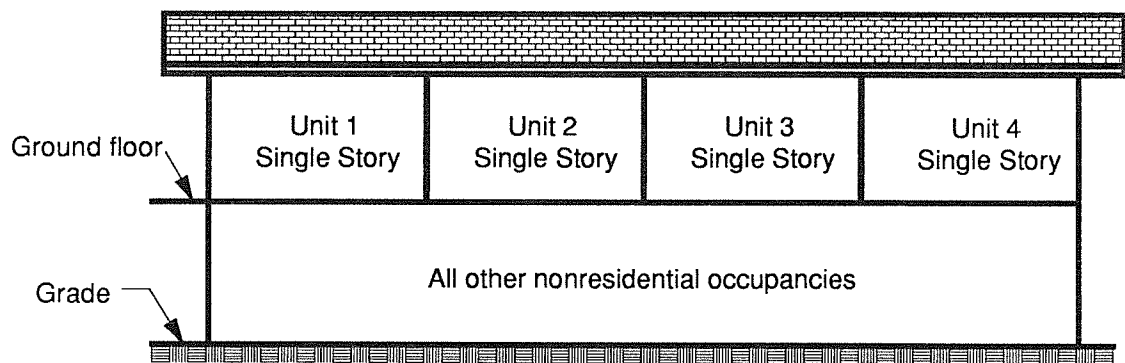


Fig. 3.8 Units 1,2,3 & 4 are considered ground floor units and shall be accessible and adaptable.

# Buildings with Elevators

3103(b)3.1.C.

**General.** All floors and units within buildings containing elevators shall be accessible and adaptable ( See Figure 3.9). Buildings containing elevators shall be designed to provide at least one accessible entrance regardless of the terrain or unusual characteristics of the site.

**Exception**

**When an elevator is provided only as a means to create an accessible route to a ground floor, only those units on the ground floor are subject to the regulations. See Figure 3.10**

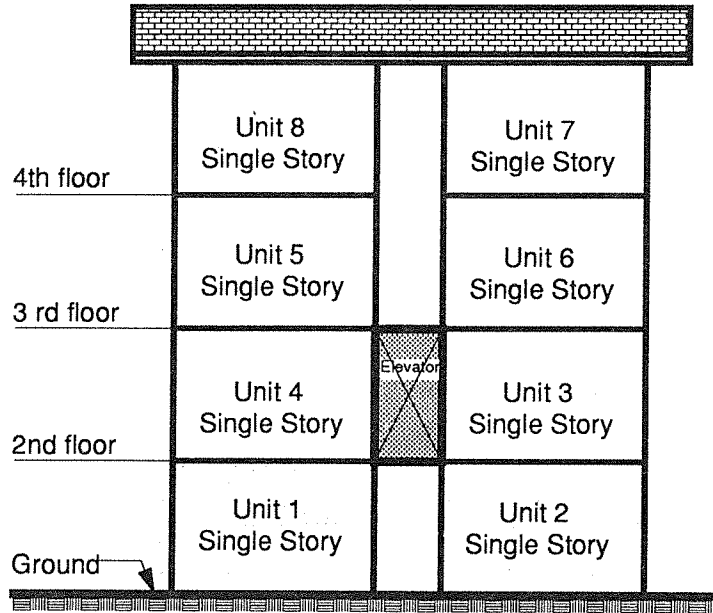


Fig 3.9 Within elevator buildings, all dwelling units shall be accessible and adaptable.

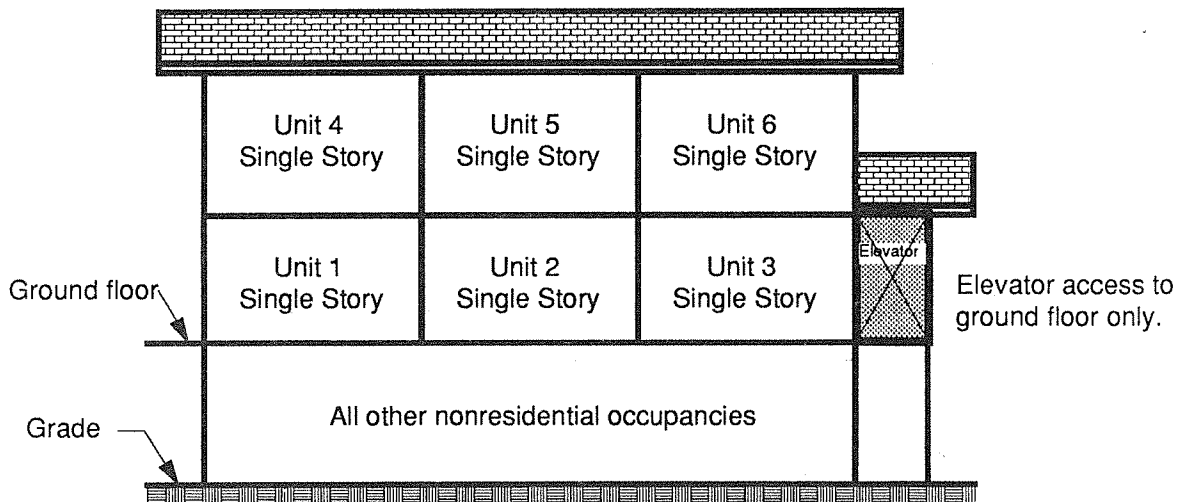


Fig. 3.10 Units 1,2 & 3 shall be accessible and adaptable when elevator provides access to the ground floor. This building is not considered an elevator building, therefore units 4, 5 & 6 are exempt.

3103(b)2.1.E. **Multistory dwelling units in elevator buildings.** When multistory dwelling units are located in buildings with elevators, the story or stories of the unit served by the elevator shall be accessible and is required to have at least one bathroom or powder room usable to a person in a wheelchair. (See Figure 3.3)

3103(b)3.1.D. **Elevator connecting parking area to ground floor.** When an elevator connects a common use parking area for tenants and guests to the ground floor, all dwelling units on the ground floor and at least one of each type of common use area shall be accessible and adaptable. This is required regardless of site considerations.

## ***Non-Elevator Buildings***

110(8) **General.** The percentage of ground floor units in non-elevator buildings that are required to be accessible and adaptable is determined by using Table 31-6. To effectively use this table, determine if the building has a common entrance or multiple entrances.

Table 31-6

**A.** For buildings with a common (lobby) entrance, all ground floor units must be accessible and adaptable unless the exemptions of site tests 1 or 3 are applicable (see Figures 4.3 and 4.5, Site Tests). However, at least 20% of the exempted ground floor units shall be adaptable, and all remaining ground floor units shall comply with the features listed below and in section 110 (8), unless further exempted by site test 3. (See figure 4.1)

**B.** For all other buildings, including buildings with multiple entrances, all ground floor units shall be accessible and adaptable unless the exemptions of site tests 1, 2 or 3 are applicable (see Figures 4.3, 4.4, 4.5 and Table 31-6, site tests). However, at least 20% of all ground floor units shall be accessible and adaptable, and all remaining ground floor units shall comply with the features listed below and in section 110 (8), unless further exempted by site test 3. (See figure 4.2)

### ***Features:***

- A. Grab bar reinforcement*
- B. 32-inch clear door and interior opening width*
- C. Lever hardware*
- D. Door signal devices*
- E. Clear space by doors*
- F. Minimum 15-inch water closet seat height*
- G. Electrical receptacle outlet height*
- H. Lighting and environmental control height*
- I. Faucet controls*
- J. Water closet, bathtub and lavatory space requirements*
- K. Removable cabinets under kitchen sink counter area*

## ***Elevated Walkways***

3103(b)3.1.F.      **General.** When an elevated walkway connects a building entrance with a vehicular or pedestrian arrival point, and that walkway has a slope not exceeding ten percent, then the building is subject to the regulations regardless of the site condition.

## ***Common Areas with Sloping Terrain***

3103(b)3.1.G.      **General.** When the slope of the finished grade between dwelling units and the public or common use areas exceeds 1:12, or where other physical barriers or legal constraints exist which are outside the control of the owner, an acceptable alternative for providing access is via a vehicular route. Accessible parking spaces shall be provided as necessary at such facilities.

## ***Private Garages***

**General.** Private garages serving adaptable dwelling units that are accessible from the dwelling units shall be accessible. The garage car entrance door may be used.

## ***Public or Common Use Areas***

**General.** All public and common use areas that serve adaptable dwelling units shall be accessible. This includes recreation buildings, pools, trails, walks, playgrounds, parking areas and other amenities.

# *Part IV*

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## *Site Impracticality*

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### **Introduction:**

*Part IV describes how site conditions affect the project design. Difficult sites such as sloping terrain, flood zones and costal high hazard areas may be eligible for certain exemptions. Included are samples of "Site Test" evaluations.*



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# ***Site Applicability and Development Requirements***

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## ***General***

3103            **General.** When multifamily and condominium buildings are required to be accessible or adaptable, site facilities shall also be accessible including, but not limited to:

- Street curb ramps
- Parking facilities and parking structures
- Route of travel from public way to the building(s)
- Walks and sidewalks
- Building entrances
- Swimming pools, spas and hot tubs
- Recreational facilities
- Public use areas
- Route or routes of travel between buildings

## ***Group M Occupancy Buildings***

3103(a.1)7.1        **General.** Group M, Division 1, private garages serving adaptable dwelling units that are accessible from the dwelling units shall be accessible. The garage car entrance door may be used.

## ***Multifamily Buildings without Elevators***

**Single Building With Common (Lobby) Entrance:** All ground-floor units in non-elevator buildings must be adaptable and on an accessible route unless an accessible route is not required by SITE TEST NO. 1 or SITE TEST NO. 3. However, twenty percent (20%) of the ground-floor dwelling units that are not required to have an accessible route shall be adaptable. Remaining ground-floor units shall comply with the features listed in Section 110(8) unless exempted by SITE TEST NO.3 (See Figure 4.1)

**All Other Sites Including Single Building or Buildings With Multiple Entrances:** All ground-floor units in non-elevator buildings must be adaptable and on an accessible route(s) unless an accessible route(s) is not required as determined by SITE TEST NO.1, SITE TEST NO. 2, or SITE TEST NO. 3. However, a minimum of twenty percent (20%) of the ground-floor dwelling units are required

to have an accessible route and shall be adaptable. Remaining ground-floor dwelling units shall comply with the features listed in Section 110(8) unless exempted by SITE TEST NO. 3. (See Figure 4.2)

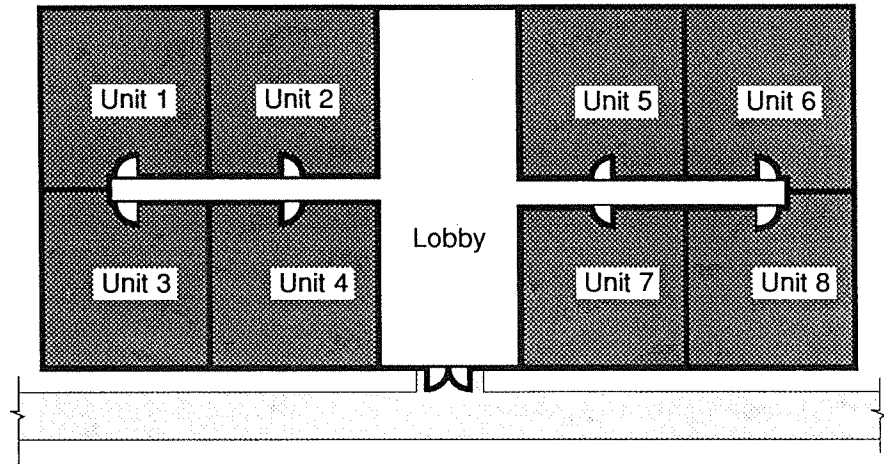


Fig. 4.1 Lobby Building

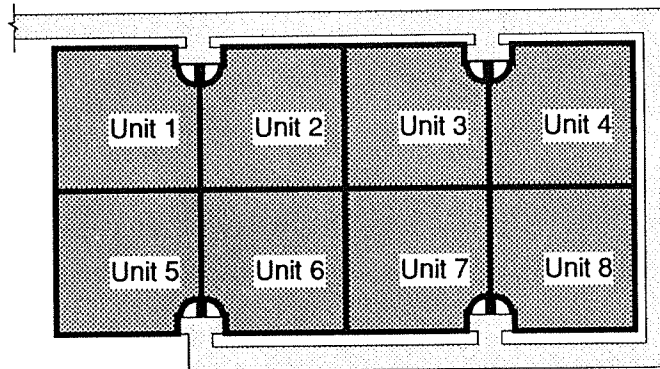


Fig. 4.2 Garden Apartment

## ***Multifamily Buildings with Elevators***

**General.** Multifamily buildings with elevators shall be designed and constructed on an accessible route regardless of terrain or unusual site conditions.

### ***Building Entrances and Accessible Routes***

**Separate Ground-Floor Entrances.** When a ground-floor unit of a building has a separate entrance or entrances, each such ground-floor unit shall be served by an accessible route and entrance.

#### **Exception**

**A unit or units where the terrain or unusual characteristics of the site prohibit the provision of an accessible route to the entrance of that unit need not be provided with an accessible route or entrance. (See Site Tests)**

**Multiple Building Entrances.** In a building containing multiple entrances, only one entrance is required to be accessible to any one ground floor.

#### **Exception**

**When an individual dwelling unit has a separate exterior entrance, or where the building contains clusters of dwelling units with each cluster sharing a different exterior entrance, more than one entrance may be required to be accessible, as determined by an analysis of the site. In every case, the accessible entrance shall be on an accessible route to the covered dwelling units it serves. (See figure 4.2)**

### ***Site Tests***

**General.** Certain multifamily dwelling projects may be partially exempt from the regulations due to steeply sloping terrain, or because of unusual site characteristics. These "Site Test" exemptions apply only to nonelevator buildings, unless the elevator is provided only as a means of creating an accessible route to a ground floor.

#### **SITE TEST NO. 1 (Individual Building Test)**

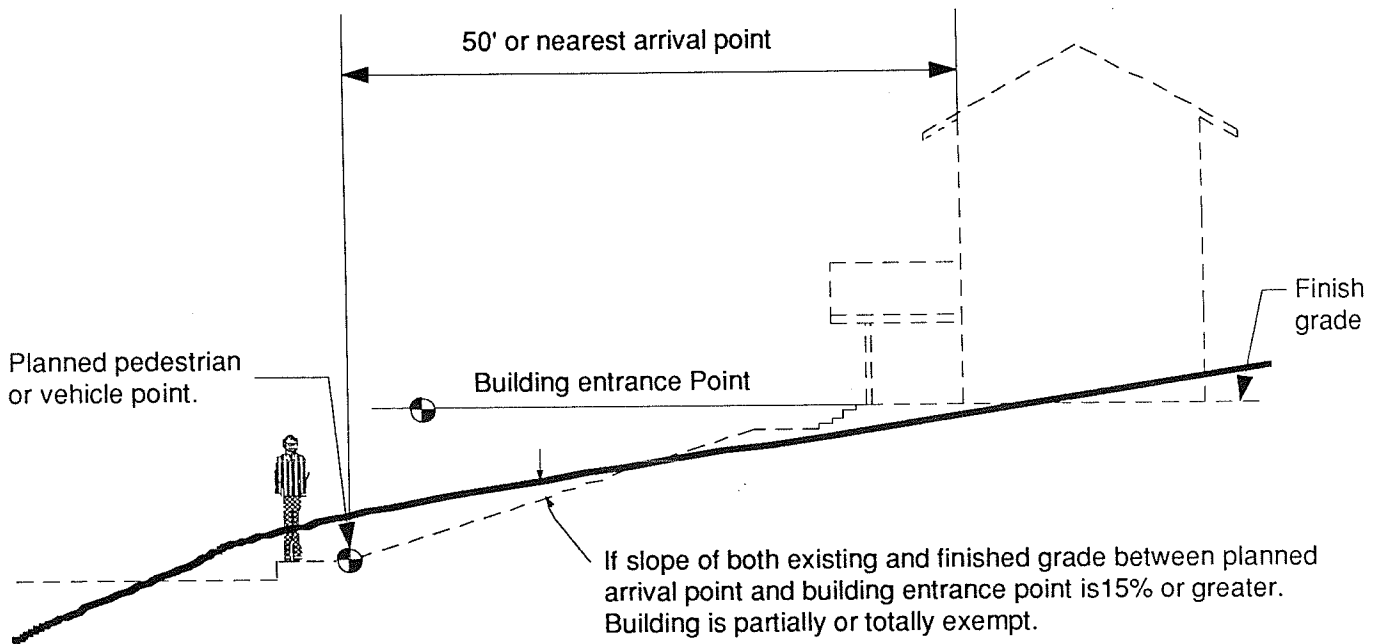
Use this test when the terrain of the site slopes more than 15% between vehicular or pedestrian arrival points and the building entrance. This test applies to both the undisturbed, and finished grade. (See figure 4.3)

#### **SITE TEST NO. 2 (Site Analysis Test)**

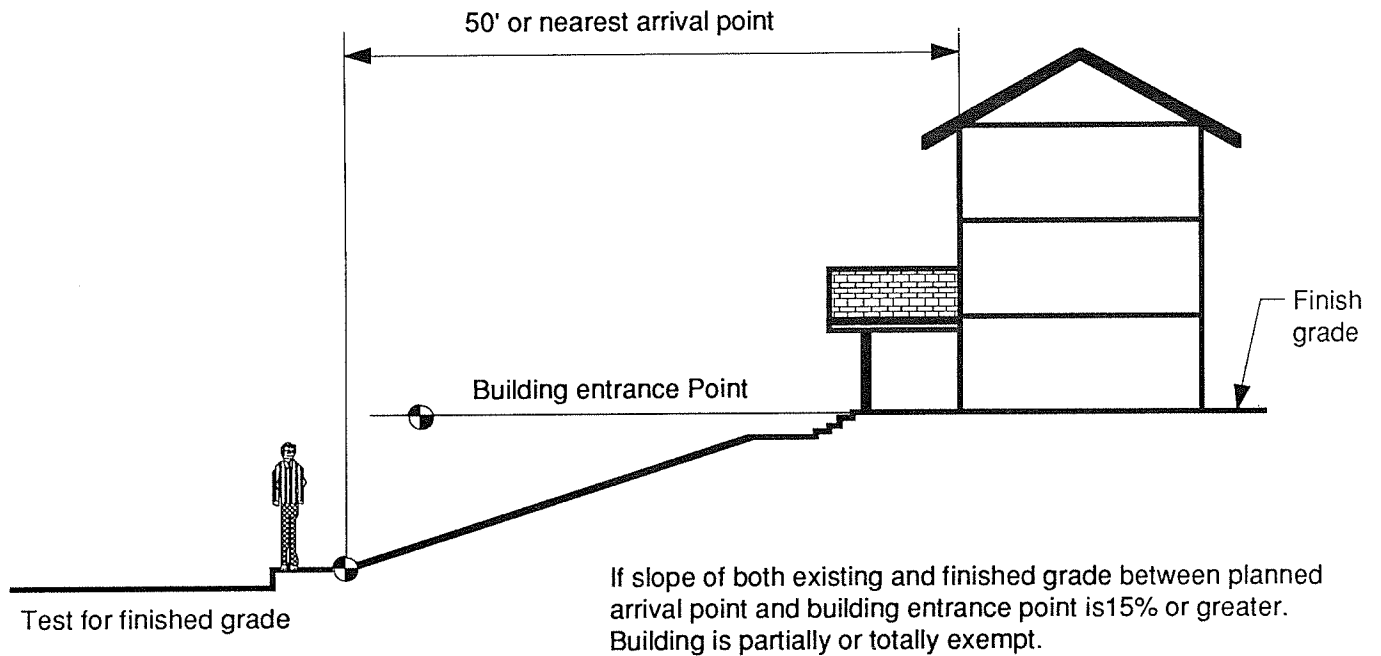
Use this test when the undisturbed site slopes more than 10%. The number of ground floor units required to be accessible is based on the percentage of the site that does not exceed the slope criteria. **Note: Buildings with a common lobby entrance cannot use this test. (See figure 4.4)**

#### **SITE TEST NO. 3 (Unusual Characteristics Test)**

Use this test for sites located in a Federally Designated Flood Plain or Coastal High-Hazard area and sites subject to other similar requirements of law. (See figure 4.5)



Test for natural grade



Test for finished grade

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**Figure 4.3 SITE TEST NO. 1 - Individual Building Test**

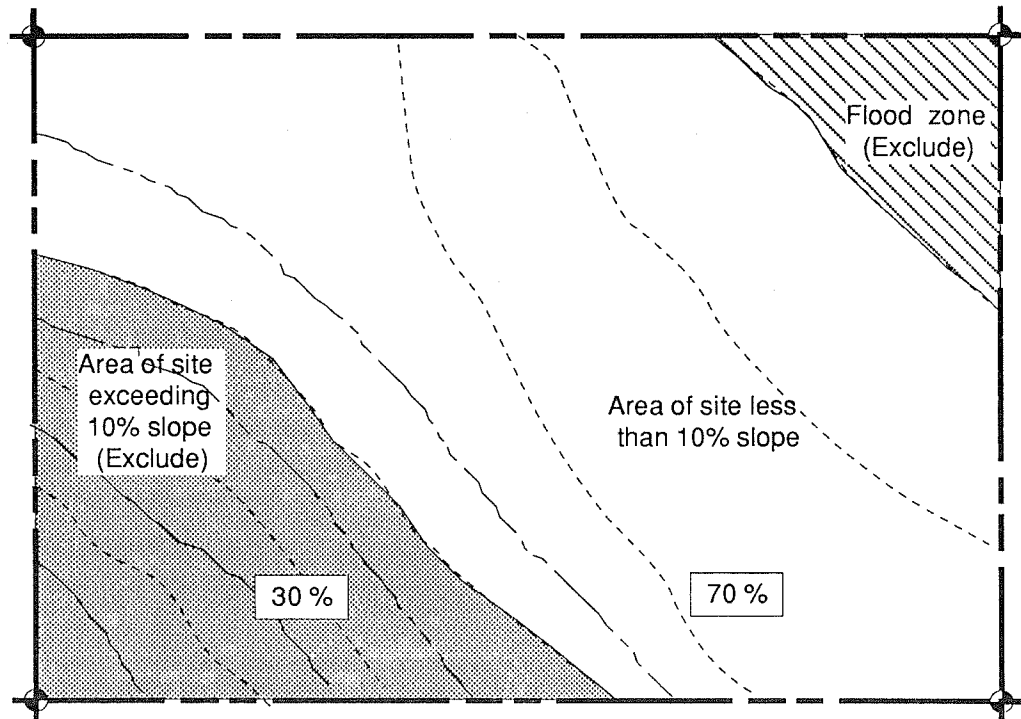
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**NOTES:**

1. **TERRAIN SLOPE:** Use Site Test 1 only if the site has terrain over fifteen percent (15%) slope.
  2. If there are no vehicular or pedestrian arrival points within 50' of the planned entrance, the slope for purposes of test no. 1 will be measured to the closest vehicular or pedestrian arrival point.
-

3. For purposes of the regulations, vehicular or pedestrian arrival points include public or resident parking areas; public transportation stops; passenger loading zones; and public streets or sidewalks. To determine site impracticality, the slope would be measured at ground level from the point of the planned entrance on a straight line to (i) each vehicular or pedestrian arrival point that is within 50 feet of the planned entrance, or (ii) if there are no vehicular or pedestrian arrival points within the specified area, the vehicular or pedestrian arrival point closest to the planned entrance. In the case of sidewalks, the closest point to the entrance will be where a public sidewalk entering the site intersects with the walk to the entrance. In the case of resident parking areas, the closest point to the planned entrance will be measured from the entry point to the parking area that is located closest to the planned entrance.
4. **SINGLE BUILDING WITH COMMON (LOBBY) ENTRANCE:** If the multifamily building is a single building with a common (lobby) entrance, at least twenty percent (20%) of the ground-floor dwelling units must be adaptable even though the building is not required to be on an accessible route. Furthermore, the remaining eighty percent (80%) of ground-floor units must comply with the features listed in Section 110(8) of the regulations (see page 19) unless the building is exempted by Site Test 3, Unusual Characteristics Test.
5. **SINGLE BUILDING WITH MULTIPLE ENTRANCES AND ALL OTHER SITES:** Unless exempted by Site Test 1, Site Test 2, or Site Test 3, all ground-floor units in non-elevator buildings must be adaptable and on an accessible route. A minimum of twenty percent (20%) of ground-floor dwelling units, however, are required to have an accessible route and shall be adaptable regardless of Site Test 1 results. Furthermore, the remaining eighty percent (80%) of ground-floor units must comply with the features listed in Section 110(8) of the regulations (see page 19) unless the building is exempted by Site Test 3, Unusual Characteristics Test.
6. **ELEVATOR CONNECTING PARKING AREA WITH DWELLING UNITS ON THE GROUND FLOOR:** Regardless of Site Test results, an accessible entrance on an accessible route is practical when there is an elevator connecting the parking area with the dwelling units on a ground floor. In this case, those dwelling units on the ground floor served by an elevator, and at least one of each type of public-and common-use areas, would be subject to the requirements.
7. **ELEVATED WALKWAYS:** When an elevated walkway connects a building entrance with a vehicular or pedestrian arrival point, and that walkway has a slope not exceeding ten percent (10%), then the building is subject to the regulations regardless of site conditions.
8. **COMMON AREAS WITH SLOPING TERRAIN:** When the slope of the finished grade between the dwelling units and the public or common use area exceeds 1:12, or where other physical barriers or legal constraints exist which are outside the control of the owner, an acceptable alternative for providing access is via a vehicular route. Accessible parking spaces shall be provided as necessary at such facilities.
9. **ELEVATOR TO GROUND FLOOR ONLY:** Where a building elevator is provided only as a means of creating an accessible route to dwelling units on a ground floor, the building is not considered an elevator building for purposes of the regulations; hence, only the ground-floor dwelling units would be covered.
10. **ELEVATOR BUILDINGS:** Notes 1 through 9 above apply to non-elevator buildings. Covered multifamily dwellings with elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route, regardless of terrain or unusual characteristics of the site.

**NOTE: Items 5 through 10 above are applicable to all Site Tests**



In the above example, the total buildable site (excluding flood zone & excessive slope area) is equal to 70%. Therefore 70% of the total dwelling units shall be accessible.

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**Figure 4.4 SITE TEST NO. 2 - Site Analysis Test**

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**NOTES:**

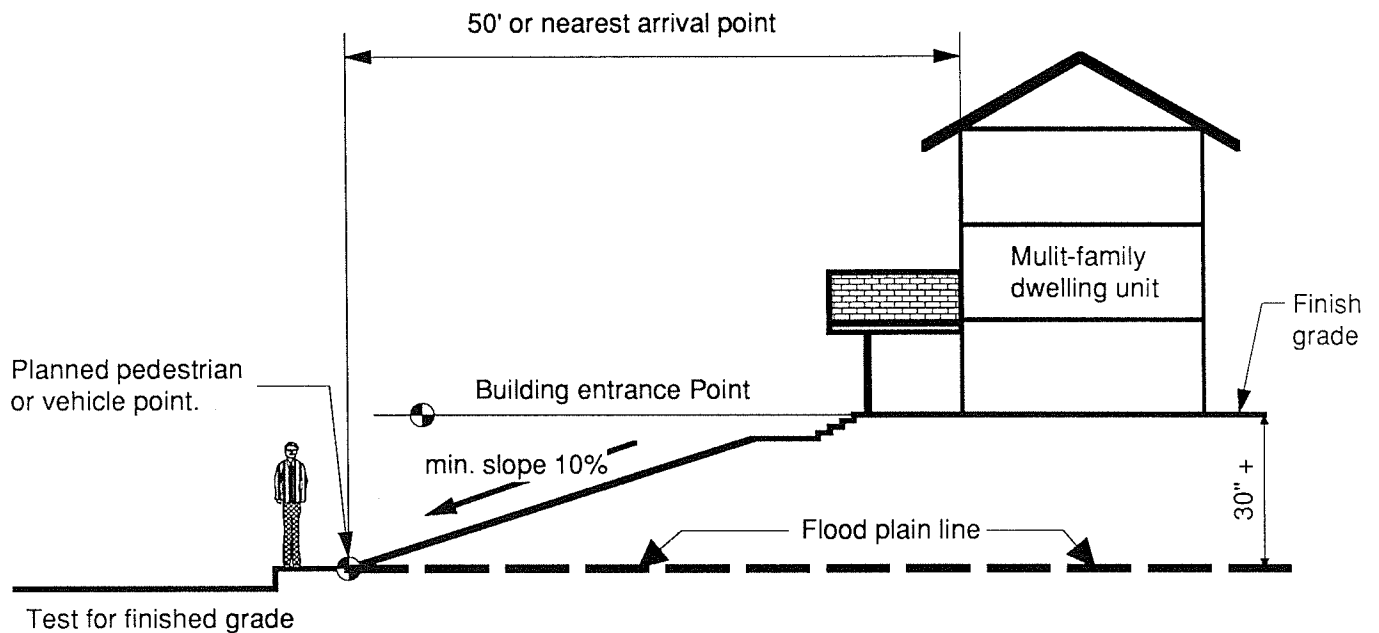
1. **TERRAIN SLOPE:** Use Site Test 2 only if the site has terrain over ten percent (10%) slope. Do not use this test if the building has a common lobby entrance.
2. **REQUIRED TOPOGRAPHIC ANALYSIS:** Use of Site Test 2 requires a topographic survey with 2' contour intervals and certified by a licensed architect, civil engineer or structural engineer, surveyor, or landscape architect.

3. **MULTIPLE BUILDINGS SITE OR A SITE WITH A SINGLE BUILDING WITH MULTIPLE ENTRANCES:** These sites are not required to have an accessible route under the following conditions:
- (A) Calculate the percentage of the total buildable area of the undisturbed site with natural grade less than 10 percent slope. The analysis of the existing slope (before grading) shall be done on a topographic survey with 2-foot contour intervals with slope determination made between each successive interval. The accuracy of the slope analysis shall be certified by a licensed engineer, landscape architect, architect or surveyor.
  - (B) Determine the requirement of providing an accessible route to planned multifamily dwellings based on the topography of the existing natural terrain. The minimum percentage of ground-floor units required on an accessible route shall equal the percentage of the total buildable area (not restricted-use areas) of the undisturbed site with an existing natural grade of less than 10 percent slope.
  - (C) In addition to the percentage established in paragraph (B), all ground-floor units in a building, or ground-floor units served by a particular entrance, shall be made accessible if the entrance to the units is on an accessible route with a slope between the planned entrance and a pedestrian or vehicular arrival point not exceeding 8.33 percent.

Unless exempted by Site Test 1, Site Test 2 or Site Test 3, all ground-floor units in non-elevator buildings shall be adaptable and on an accessible route. A minimum of twenty percent (20%) of ground-floor dwelling units, however, are required to have an accessible route and shall be adaptable regardless of Site Test 2 results.

4. **ELEVATED WALKWAYS:** When an elevated walkway connects a building entrance with a vehicular or pedestrian arrival point, and that walkway has a slope not exceeding ten percent (10%), then the building is subject to the regulations regardless of site condition.
5. **COMMON AREAS WITH SLOPING TERRAIN:** When the slope of the finished grade between the dwelling units and the public or common-use areas exceeds 1:12, or when other physical barriers or legal constraints exist which are outside the control of the owner, an acceptable alternative for providing access is via a vehicular route. Accessible parking spaces shall be provided as necessary at such facilities.
6. **ELEVATOR TO GROUND FLOOR ONLY:** Where a building elevator is provided only as a means of creating an accessible route to dwelling units on a ground floor, the building is not considered an elevator building for purposes of the regulations; hence, only the ground-floor dwelling units would be covered.
7. **ELEVATOR BUILDINGS:** The above notes apply to non-elevator buildings. Covered multifamily dwellings with elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route, regardless of terrain or unusual characteristics of the site.

NOTE: See additional notes 5 through 10 on Site 1 (see page 26)



**Figure 4.5 SITE TEST NO. 3 - Unusual Characteristics Test**

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**NOTES:**

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1. **TERRAIN SLOPE AND BUILDING CONFIGURATION:** Use Site Test 3 for sites located in federally designated flood plains or costal high-hazard areas and/or sites subject to other similar requirements of law or code that the lowest floor must be raised to a specified level at or above the base flood elevation.
2. An accessible route to a building entrance is impractical due to unusual characteristics of the site when:
  - (A) The original site characteristics result in a difference in finished grade elevation exceeding thirty inches (30") and ten percent (10%) measured between an entrance and all vehicular or pedestrian arrival points within 50' of the planned entrance; or
  - (B) If there are no vehicular or pedestrian arrival points within 50' of the planned entrance, the unusual characteristics result in a difference in finished grade elevation exceeding 30" and 10% measured between an entrance and the closest vehicular or pedestrian arrival point.

NOTE: See additional notes 4 through 10 on Site Test 1 (see page 26)



# *Part V*

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## *Outside the Multifamily Building*

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### **Introduction:**

*Part V will focus on the requirements for specific areas and features located outside the multifamily building. This will consist primarily of site related issues and includes; parking areas, accessible routes of travel, recreation and common use areas, and ramps.*

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# *Outside the Multifamily Building*

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## *Curb Ramps*

- 3106(d)1. **General.** Curb ramps shall be constructed at each corner of street intersections and where a pedestrian way crosses a curb. The preferred and recommended location for curb ramps is in the center of the crosswalk of each street corner. Where it is necessary to locate a curb ramp in the center of the curb return and the street surfaces are marked to identify pedestrian crosswalks, the lower end of the curb ramp shall terminate with such crosswalk areas.
- 3106(d)2. **Width of Curb Ramps.** Curb ramps shall be a minimum of 4 feet in width and shall lie, generally, in a single-sloped plane, with a minimum of surface warping and cross slope.
- 3106(d)3. **Slope of Curb Ramps.** The slope of curb ramps shall not exceed 1 vertical to 12 horizontal (8.33 percent). Transitions from ramps to walks, gutters, or streets shall be flush and free of abrupt changes, except that curb ramps shall comply with subparagraph 5 below. The slope of the fanned or flared sides of curb ramps shall not exceed 1 vertical to 8 horizontal (12 percent). If a curb ramp is located where pedestrians must walk across the ramp, then it shall have flared sides; the maximum slope of the flare shall be 1:10 (10 percent). Curb ramps may be used where pedestrians would not normally walk across the ramp.
- 3106(d)4. **Level Landing.** A level 4 feet deep shall be provided at the upper end of each curb ramp over its full width to permit safe egress from the ramp surface, or the slope of the fanned or flared sides of the curb ramp shall not exceed 1 vertical to 12 horizontal (8.33 percent).
- 3106(d)5. **Beveled Lip.** The lower end of each curb ramp shall have a 1/2-inch lip beveled at 45 degrees.
- 3106(d)6. **Finish.** The surface of each curb ramp and its flared sides shall be stable, firm and slip resistant and shall be of contrasting finish from that of the adjacent sidewalk.
- 3106(d)7. **Detectable Warnings.** A curb ramp shall have a detectable warning that extends the full width and depth of the curb ramp when the ramp slope is less than 1 vertical to 15 horizontal (6.66 percent). Detectable warnings shall consist of raised truncated domes with a diameter of

nominal 0.9 inches, a height of nominal 0.2 inches and a center-to-center spacing of nominal 2.35 inches and shall contrast visually with adjoining surfaces, either light-on-dark or dark-on-light. Warning surfaces shall be of the color yellow conforming to Federal Color No.33538, as shown in Table V of Standard No. 595A. Where the color value contrast between the yellow warning and the main walking surface is less than 70 percent, a 1-inch wide black strip shall separate the yellow warning from the main walking surface. Contrast shall be determined by:

Contrast= $[(B1-B2/B1) \times 100\%]$  where B1 = light reflectance value (LRV) of the lighter area and B2 = light reflectance value (LRV) of the darker area]. The material used to provide contrast shall be an integral part of the walking surface. The domes may be constructed in a variety of methods, including cast in place, stamped or may be part of a prefabricated surface treatment.

3106(d)8. **Obstructions.** Curb ramps shall be located or protected to prevent their obstruction by parked cars. Built-up curb ramps shall be located so that they do not project into vehicular traffic lanes.

3106(d)9. **Diagonal Curb Ramps.** If diagonal (or corner type) curb ramps have returned curbs or other well-defined edges, such edges shall be parallel to the direction of pedestrian flow. The bottom of diagonal curb ramps shall have 48 inches minimum clear space. If diagonal curb ramps are provided at marked crossings, the 48-inch clear space shall be within the markings. If diagonal curb ramps have flared sides, they shall also have at least a 24-inch-long segment of straight curb located on each side of the curb ramp and within the marked crossing.

## ***Parking Facilities***

3107(a) **Accessible Parking Required.** Accessible parking spaces shall be located on the shortest possible accessible route of travel to an accessible building entrance. In facilities with multiple accessible building entrances with adjacent parking, accessible parking spaces shall be dispersed and located near the accessible entrances. When practical, the accessible route of travel shall not cross lanes for vehicular traffic. When crossing vehicle traffic lanes is necessary, the route of travel shall be designated and marked as a crosswalk.

Each lot or parking structure where parking is provided for clients, guests, employees or residents shall provide accessible parking as required by this Section. In separate parking structures or lots that do not serve a particular building, parking spaces for physically disabled people shall be located on the shortest possible circulation route to an accessible pedestrian entrance of the parking facility.

If assigned parking is provided at privately-funded building sites, designated accessible parking at the dwelling unit shall be provided on request of residents with physical disabilities on the same terms and with the full range of choices (e.g., surface parking or garage) provided for other residents, with accessible parking on a route accessible to wheelchairs for at least 2 percent of the covered dwelling units. Signage is not required. When visitor parking is provided, a minimum of 5 percent parking shall provide access to grade-level entrances of multifamily dwellings and accessible parking facilities (e.g., swimming pools) that serve accessible buildings. Visitor parking spaces shall be provided with signage. Such sign shall not be blocked from view by a vehicle parked in the space.

3107(b) **Parking Structures.** All entrances to and vertical clearances within parking structures shall have a minimum vertical clearance of 8 feet 2 inches where required for accessibility to parking spaces for persons with physical disabilities.

3107(b)  
**Exception** **Privately-funded garages are exempt from the 8-foot 2-inch minimum height requirement. Covered parking spaces and parking spaces in common areas shall provide a minimum of 8 feet 2 inches vertical clearance.**

3107(b.1) Passenger parking spaces shall not be considered to be passenger loading zones.

3107.1(e) **Signs.** Every parking space required by this Section shall be identified by a sign, centered between 3 feet and 5 feet above the parking surface, at the head of the parking space. The sign shall include the international symbol of accessibility and state RESERVED, or equivalent language.

An additional sign shall also be posted in a conspicuous place at each entrance to off-street parking facilities, or immediately adjacent to and visible from each stall or space. The sign shall not be less than 17 inches by 22 inches in size with lettering not less than 1 inch in height, which clearly and conspicuously states the following:

**"Unauthorized vehicles parked in designated handicapped spaces not displaying distinguishing placards or license plates issued for physically disabled persons may be towed away at owner's expense. Towed vehicles may be reclaimed at ----- or by telephoning -----."**

In addition to the above requirements, the surface of each accessible parking space or stall shall have a surface identification duplicating either of the following schemes:

1. By outlining or painting the stall or space in blue and outlining on the ground in the stall or space in white or suitable contrasting color

a profile view depicting a wheelchair with occupant; or,

2. By outlining a profile view of a wheelchair with occupant in white on blue background. The profile view shall be located so that it is visible to a traffic enforcement officer when a vehicle is properly parked in the space and shall be 36 inches high by 36 inches wide.

3107(c) **Design and Construction.** Parking spaces shall be designed and constructed in accordance with this Section.

3107(d) **Parking Space Size.** Parking spaces for persons with physical disabilities shall be located on the shortest possible route to an accessible entrance and shall be sized as follows:

3107(d)1. Where single spaces are provided, they shall be 14 feet wide and outlined to provide a 9-foot parking area and a 5-foot loading and unloading access aisle on the passenger side of the vehicle. When more than one space is provided in lieu of providing a 14-foot wide space for each parking space, two spaces can be provided within a 23-foot wide area lined to provide a 9-foot parking area on each side of a 5-foot loading and unloading access aisle in the center. The minimum length of each parking space shall be 18 feet. (See figure 5.1)

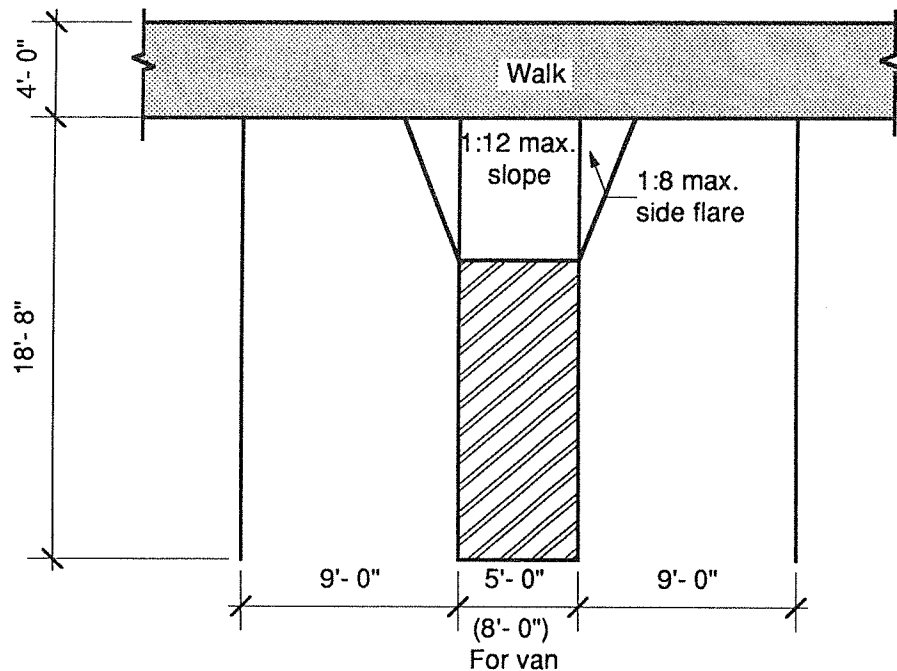


Fig. 5.1 Two space parking

- 3107(d)2. One in every eight accessible spaces, but not less than one, shall be served by an access aisle 96 inches wide minimum, and shall be designated van accessible as required by 3107(d)1. All such spaces may be grouped on one level of a parking structure.
- 3107(d)3. **Arrangement of Parking Spaces.** In each parking area, a bumper or curb shall be provided and located to prevent encroachment of cars over the required walkways. Also, the space shall be so located that people with physical disabilities are not compelled to wheel or walk behind parked cars other than their own. Pedestrian ways which are accessible to people with physical disabilities shall be provided from each such [parking space to related facilities, including curb cuts or ramps as needed. Ramps shall not encroach into any parking space.
- 3107(d)3.  
Exception 1 **Ramps located at the front of parking spaces for people with physical disabilities may encroach into the length of such spaces when such encroachment does not limit a person with physical disabilities capability to leave or enter their vehicle, thus providing equivalent facilitation.**
- 3107(d)3.  
Exception 3 **Parking spaces may be provided which would require a person with physical disabilities to wheel or walk behind other that accessible parking spaces when the enforcing agency determines that compliance with these regulations or providing equivalent facilitation would create an unreasonable hardship.**
- 3107(d)4. **Slope of Parking Spaces.** Surface slopes of accessible parking spaces shall be the minimum possible and shall not exceed 1/4 inch per foot (2.083 percent gradient) in any direction.

## ***Private Garages***

- 3103(a.1)7.1 Private garages which serve a privately-funded single-dwelling unit is an accessible garage if the person with a disability can exit the dwelling unit's accessible entry door and enter the garage from the driveway.

## ***Signs***

- 3106(c) At every primary public entrance and at every major junction along or leading to an accessible route of travel, there shall be a sign displaying the international symbol of accessibility. Signs shall indicate the direction to accessible building entrances and facilities.

## ***Accessible Route of Travel***

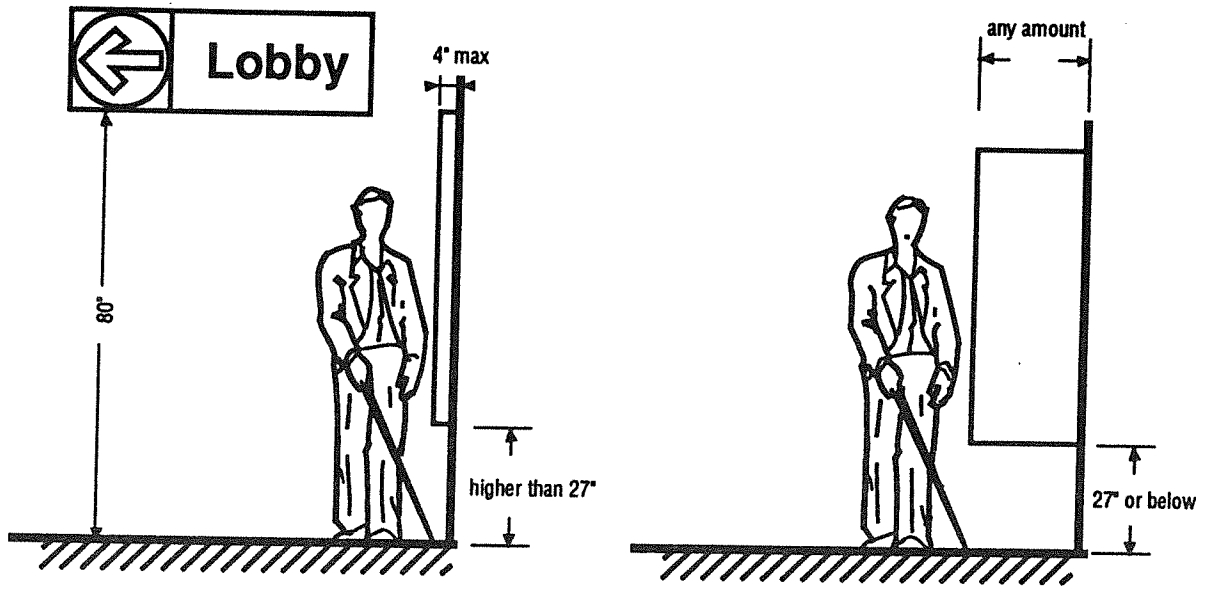
- 3106(a)            **General.** When more than one building or facility is located on a site, accessible routes of travel shall be provided between buildings and accessible site facilities. The accessible route of travel shall be the most practical direct route between accessible building entrances, accessible site facilities, and the accessible entrance to the site.
- 3103.1(b)2.1.A.    When a building, or portion of a building is required to be accessible or adaptable, an accessible route of travel must be provided to all portions of the building, to accessible building entrances and between the building and the public way.
- Except within an individual dwelling unit, an accessible route of travel shall not pass through kitchens, storage rooms, rest rooms, closets or other spaces used for similar purposes.
- At least one accessible route within the boundary of the site shall be provided from public transportation stops, accessible parking and accessible passenger loading zones, and public streets or sidewalks to the accessible building entrance they serve. The accessible route shall, to the maximum extent feasible, coincide with the route for the general public.
- At least one accessible route shall connect accessible buildings, facilities, elements and spaces that are on the same site. At least one accessible route shall connect accessible building or facility entrances with all accessible spaces and elements and with all accessible dwelling units within the building or facility.
- An accessible route shall connect at least one accessible entrance of each accessible dwelling unit with those exterior and interior spaces and facilities that serve the accessible dwelling unit.
- 3103(a.1)8.1      **Group R Occupancies.** Public-use and common-use areas serving adaptable dwelling units shall be accessible.
- 3105(d.1)4.1      **Swimming Pools.** Swimming pools required to be accessible to persons with physical disabilities shall comply with the provisions of Section A-3103(a)2.D.3.
- 3103.1(b)2.1.B.    Where more than one route of travel is provided, all routes shall be accessible.
- 3103.1(b)2.1.B.    **Where provided, all elevators shall be accessible.**
- 3103.1(b)2.1.C.    All walks and other spaces that are part of an accessible route shall provide a minimum clear width of 48 inches, except at doors.

- 3103.1(b)2.1.C. **Exception** **Privately-funded covered multifamily dwelling units shall provide a minimum clear width of 36 inches, except at doors.**
- 3103.1(b)2.1.E. When the first floor containing dwelling units is a floor above grade, all units on that floor must be served by an accessible route.
- 3103.1(b)2.1.E. **In multistory dwelling units, i.e., townhouse-type construction, access is not required for buildings without elevators. In multistory dwelling units in buildings with elevators, the story of the unit that is served by the building elevator is the primary entry to the unit. The primary floor must contain a bathroom or powder room usable to a person in a wheelchair.**
- 3103.1(b)2.1.E.1. Access must be provided to elements listed in Section A-3103(a)2.D.3, participation areas. Toilet facilities serving common-use areas shall comply with the requirements for public facilities contained in this part.
- 3103.1(b)2.1.F. Walks, halls, corridors, passageways, aisles, or other circulation spaces shall have 80 inches minimum clear headroom. If vertical clearance of an area adjoining an accessible route is reduced to less than 80 inches nominal dimension, a guardrail or other barrier having its leading edge at or below 27 inches above the finished floor shall be provided (See Figures 5.2, 5.3, and 5.4)
- 3103.1(b)2.1.G. If an accessible route has changes in level greater than 1/2 inch, then a curb ramp, ramp, elevator, or platform lift shall be provided. Stairs shall not be considered a part of an accessible route.
- 3103.1(b)2.1.H. Accessible routes serving any accessible space or element shall also serve as a means of egress for emergencies or connect to an accessible place of refuge. Such accessible routes and places of refuge shall comply with the requirements established by the enforcement authority having jurisdiction.

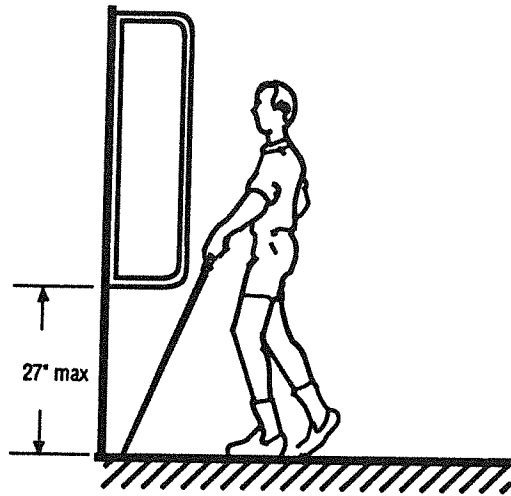
## ***Walks and Sidewalks***

- 3324(a) **Continuous Surface.** An abrupt change in elevation, or an obstacle protruding into a walk or sidewalk can be an insurmountable barrier for the disabled. Accessible walks and sidewalks must have a continuous common surface, uninterrupted by steps or abrupt changes in level over 1/2 inch. The walks must be at least 48 inches wide. But if right-of-way restrictions, natural barriers, or other existing conditions





(a)  
Walking Parallel to a Wall



(b)  
Walking Perpendicular to a Wall

Figures 5.2, 5.3 and 5.4 Protruding Objects

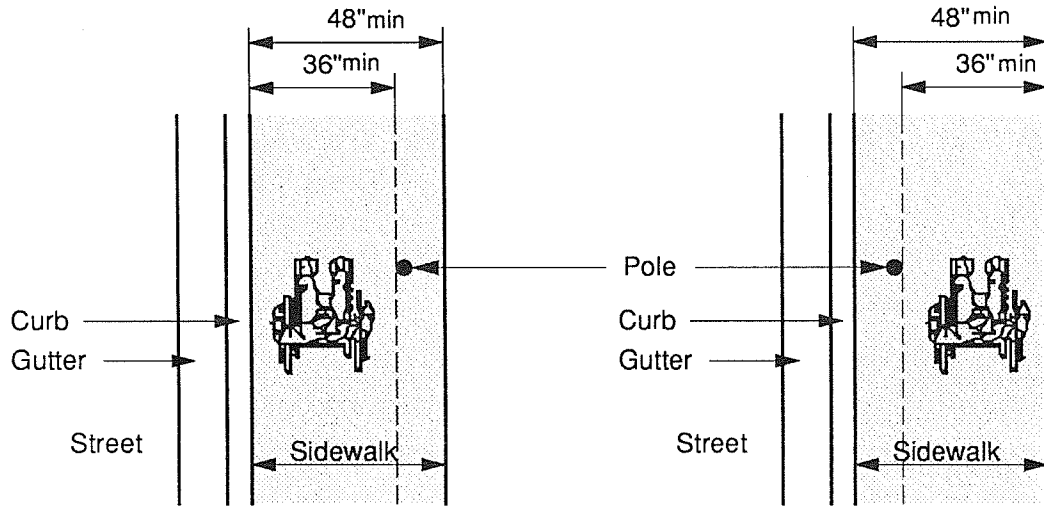


Fig. 5.5 Walkway width

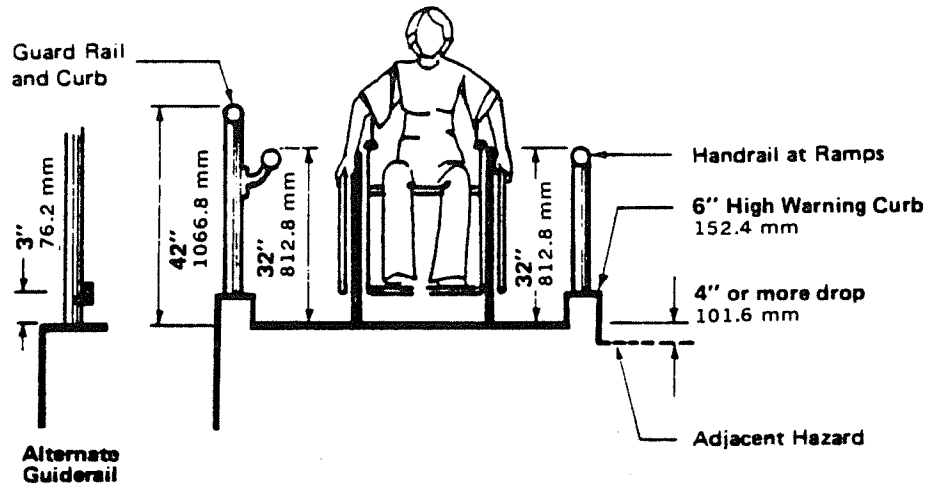


Fig. 5.6 Walkway Width

make compliance with the 48-inch requirement an unreasonable hardship, the enforcement agency may reduce the walk's width to a minimum of 36 inches. (See Figures 5.5 and 5.6)

3324(a)3. **Exception 2** Sidewalks serving individual dwelling units in privately-funded covered multifamily buildings may be reduced to 36 inches in clear width. All other sidewalks shall be a minimum of 48 inches in clear width.

3324(a)1. If the slope of a sidewalk is less than 6 percent, the surface must be at least as slip resistant as a medium-salted finish.

3324(a)2. When the slope is 6 percent or greater, the surface shall be slip resistant.

3324(a)3. Surface cross slopes (slopes in a direction other than the direction of travel) are not to exceed 1/4-inch per foot except when the enforcing agency finds that local conditions make the requirement an unreasonable hardship. In that case, the cross slope may be increased to a maximum of 1/2-inch per foot for distances not over 20 feet.

3324(b) Walks, sidewalks, and pedestrian ways shall be free of gratings whenever possible. If there are gratings, grid openings are to be no more than 1/2 inch in the direction of traffic flow.

3324(c) When the slope in the direction of travel of any walk exceeds 5 percent, it must comply with the provisions of pedestrian ramps.

3324(d) Level changes not exceeding 1/4 inch can be vertical. Greater level changes are to be beveled with a slope of no more than 50 percent.

3324(e) Walks to a covered multifamily building must provide a level area not less than 60 inches by 60 inches where a door or gate swings toward the walk, and not less than 48 inches wide by 44 deep where a door or gate swings away from the walk. These areas must extend 24 inches beyond the side of the strike edge of a door or gate that swings toward the walk.

3324(f) All walks with continuous slopes may not extend over 400 feet without providing a level area 5 feet in length.

3325(a) Except between a walk or sidewalk and an adjacent street or driveway, abrupt changes in level, exceeding 4 inches in a vertical dimension, (such as at planters or fountains located in or adjacent to walks, sidewalks, or other pedestrian ways) are to be identified by warning curbs projecting at least 6 inches above the walk or sidewalk.

No curb is required if: (1) the slope of the walk is 5 percent or less; (2) a handrail is provided; or (3) no adjacent hazard exists such as a drop-off.

3325(b) The bottom of an obstruction overhanging a pedestrian way must be at least 80 inches above the walkway.

## ***Ramps***

Note: See Ramp Dimensions, Figures 5.7, 5.8, 5.9 and 5.10

3307(a.1) Any path of travel is considered a ramp if its slope is greater than 5 percent (1:20). The slope of a ramp cannot exceed 8.33 percent (1:12).

3307(c.1)3. Outdoor ramps and their approaches shall be designed and constructed so that water will not accumulate on walking surfaces.

3307(g) Surfaces of ramps with a slope of less than 6 percent shall be at least as slip resistant as a medium-salted finish. Surfaces with a slope of 6 percent or greater must be slip resistant.

3307(e.1) Continuous, full-length handrails are to be placed on each side of the ramp if the slope exceeds 8.33 percent (1:12). The handrails are to extend in the direction of the ramp not less than 12 inches beyond the top and bottom of the ramp, and the ends are to be returned. The handrails must be 30 to 34 inches above the ramp surface. The size and spacing requirements for ramp handrails are the same for stairway handrails.

3307(e.1)  
**Exception 5** Multifamily buildings that are required to provide ramps for persons with physical disabilities, must have handrails if the slope exceeds 1-foot rise in 20 feet of horizontal run (1:20).

Note: See Section 3306(i.1) for handrail dimensions.

3307(e.1)1.  
**Exception 5** Ramps that require handrails and that serve one individual dwelling unit may have one handrail on the open side if the ramp is open on one side only.

3307(h.1)1.and 2.  
3307(d.1)9. If the side of the ramp surface has a vertical drop exceeding 4 inches that is not bounded by a wall or fence, there shall be a curb at least 2 inches high, or a wheelguide rail 2 to 4 inches high on each side of the ramp.

3307(b.1) Ramp width must be at least as wide as stairways.

3307(b)2. Pedestrian ramps leading to primary apartment entrances serving 300 or more occupants need a minimum clear width of 60 inches. If the building serves 51 to 299 occupants, the minimum clear width is 48 inches. If the building serves 50 occupants or less, ramps serving the primary entrance are to have a minimum clear width of 36 inches.

- 3307(d.1)1. Landings are to be provided at the top and bottom of each ramp. Intermediate landings are to be provided at intervals not exceeding 30 inches of vertical rise, and at each change of direction. Landings are not considered in determining the maximum horizontal distance of each ramp.
- 3307(d.1)2. **Exception** **In privately-funded multifamily buildings, the top landings must be not less than 60 inches wide and shall have a length of not less than 44 inches in the direction of ramp run. The top landing width shall extend a minimum of 24 inches past the strike edge of the door.**
- 3307(d.1)3.and 4. If a door or gate swings onto a landing, it cannot reduce the length of the landing in the direction the ramp runs to less than 42 inches and shall not reduce the required width by more than 3-1/2 inches when doors are fully opened. The required width of the landing must extend 24 inches past the strike edge of the door or gate for exterior ramps and 18 inches for interior ramps.
- 3307(d.1)6. Bottom and intermediate landings at a change of direction over 30 degrees must be at least 72 inches as measured in the direction of the ramp to accommodate the handrail extension.
- 3307(d.1)7. Intermediate landings are to be at least 60 inches, measured in the direction of the ramp.

Examples of Ramp Dimensions		
Slope	Maximum Rise (inches)	Maximum Horizontal Projection (feet)
1:12	30	30
1:15	30	37.5
1:16	30	40
1:20	30	50

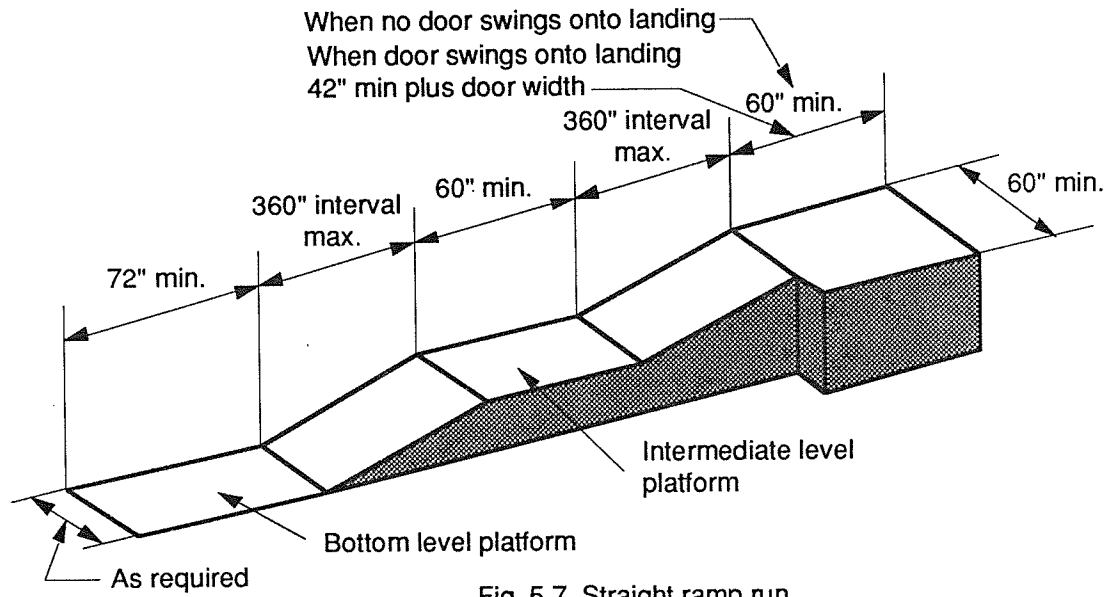


Fig. 5.7 Straight ramp run

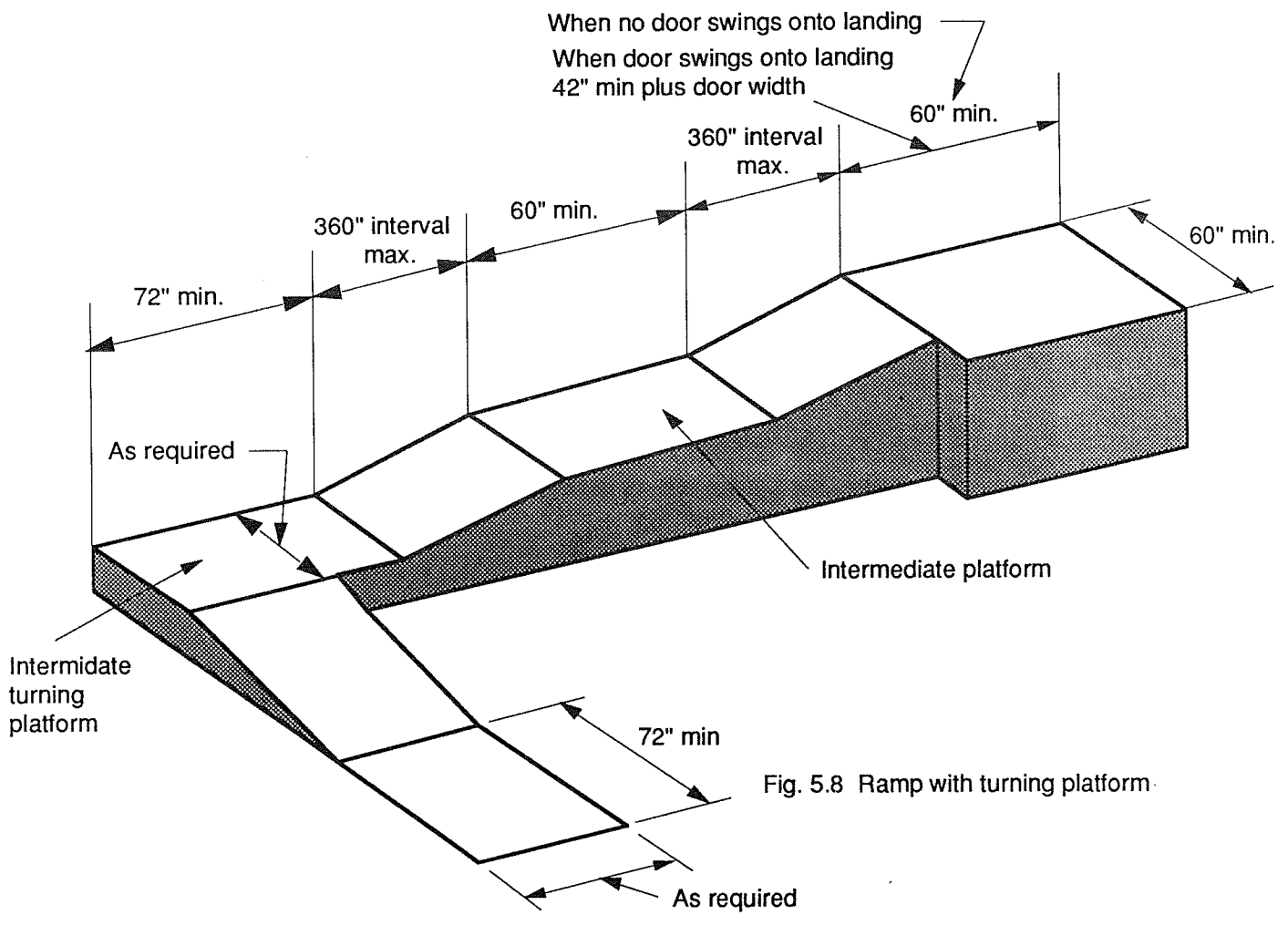


Fig. 5.8 Ramp with turning platform

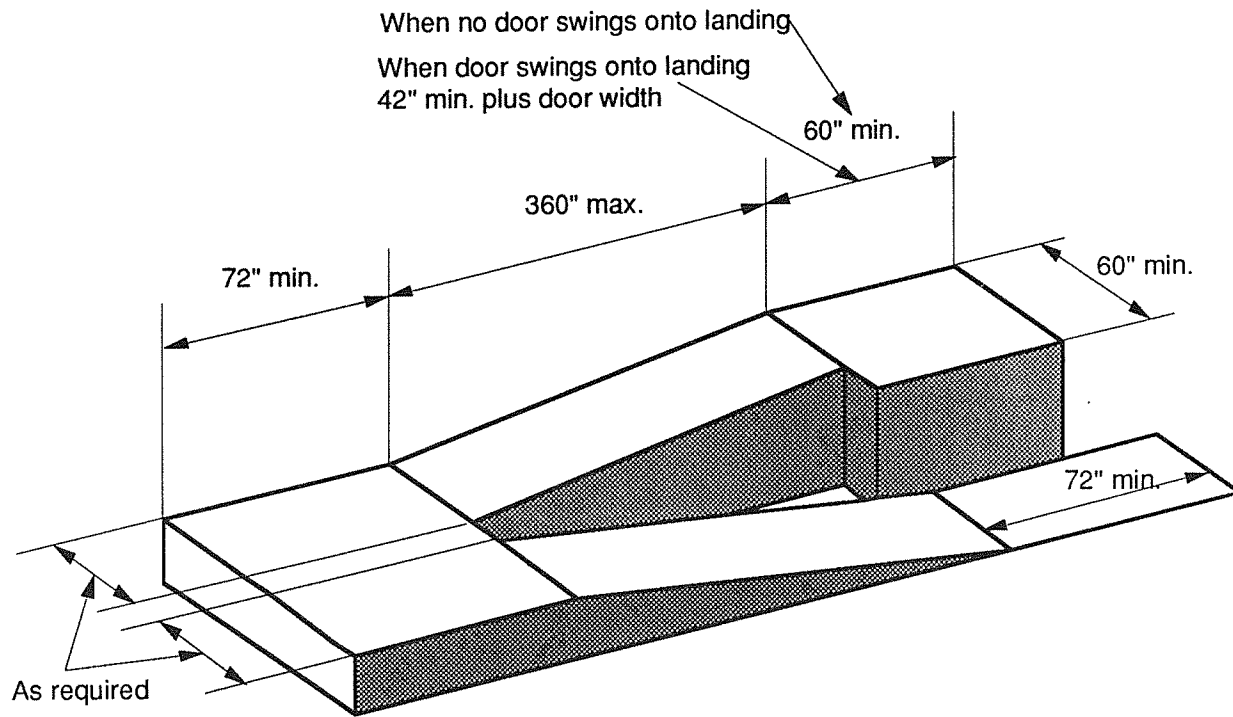


Fig. 5.9 Ramp with intermediate switch-back platform

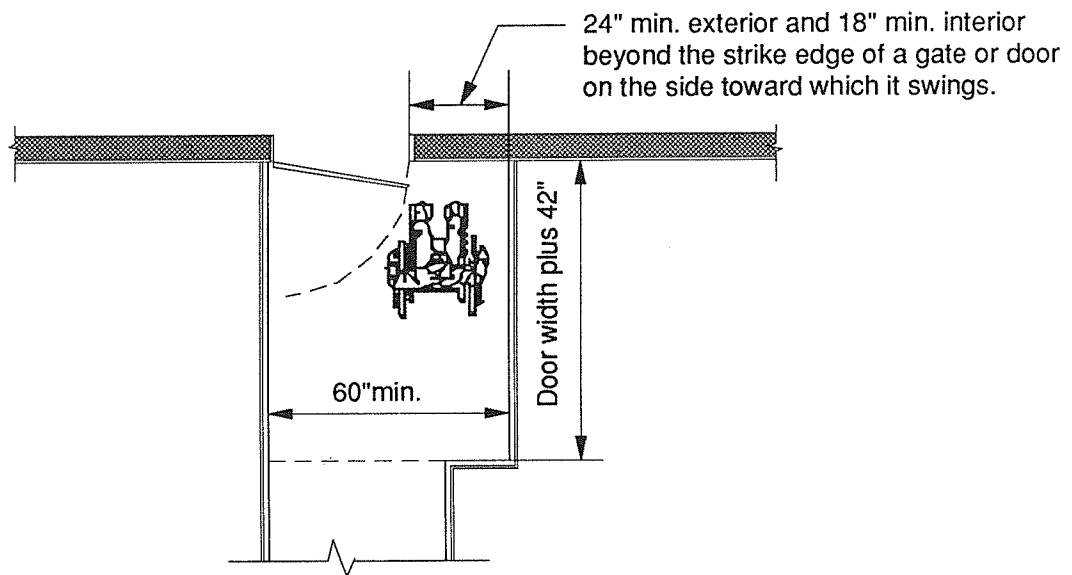


Fig. 5.10 Ramp landing at doorway

## ***Stairways***

- 3306(s)1. Stairway treads must be slip resistant with smooth, rounded or beveled edges, and no abrupt edges at the nose. The upper approach and the lower tread to each stairway and all stairway treads outside a building are to be marked by a strip of clearly contrasting color, at least 2 inches wide (a painted strip is acceptable). The strip is to be placed parallel to and not more than one inch from the nose of the step or landing. The strip material must be at least as slip resistant as the other stair treads.
- 3306(s)2.and 3. The nosing should not project more than 1-1/2 inches past the face of the riser below, and the risers must be solid.
- 3306(s)3.  
**Exception 3** **In covered multifamily buildings, open risers are not permitted on accessible routes.**
- 3306(j.1)  
**Exception 3** **Stairways must have handrails on both sides. Private stairways 30 inches or less in height may have handrails on one side only.**
- 3306(j.1)  
**Exception 2** **Stairways serving one dwelling unit in a multifamily building are allowed to have only one handrail; but if the stairway is open on one or both sides, handrails are to be provided on the open side(s).**
- 3306(j.1)1. Other stairways must have handrails on both sides. A stairway more than 88 inches wide must have at least one intermediate handrail for each 88 inches of required width. Intermediate handrails shall be spaced at approximately equal intervals within the width of the stairway and continuous for the entire length.
- 3306(j.1)2. Handrails must be continuous for the full length of the stairway. The handrail must be 30 to 34 inches above the nosing of the treads, and must extend in the direction of the stair run for at least 12 inches beyond the top nosing and 12 inches plus the tread width beyond the bottom nosing. The handrail must be returned or end in newel posts or safety terminals. If the extension of the handrail in the direction of the stair run creates a hazard, the extension must be made at right angles to the face of the returning wall. Where the stairs are continuous from landing to landing, the inner rail must be continuous, but need not extend into the landing.
- 3306(j.1)2.E.  
**Exception** **In covered multifamily buildings, the clear space between the handrail and the wall shall be 1-1/2 inches. Handrails may be located in a recess if the recess is a maximum of 3 inches deep and extends at least 18 inches above the top of the rail (See Figure 5.11).**



3306(j.1)2.F.  
Exception 3

The rail's handgrip must be between 1-1/4 to 1-1/2 inches wide or the shape must provide an equivalent smooth gripping surface (See Figure 5.12)

3306(j.1)2.F.  
Exception 4

Surfaces of handrails and walls adjacent to the handrail must be free of any sharp or abrasive elements. Edges must have a minimum radius of 1/8 inch.

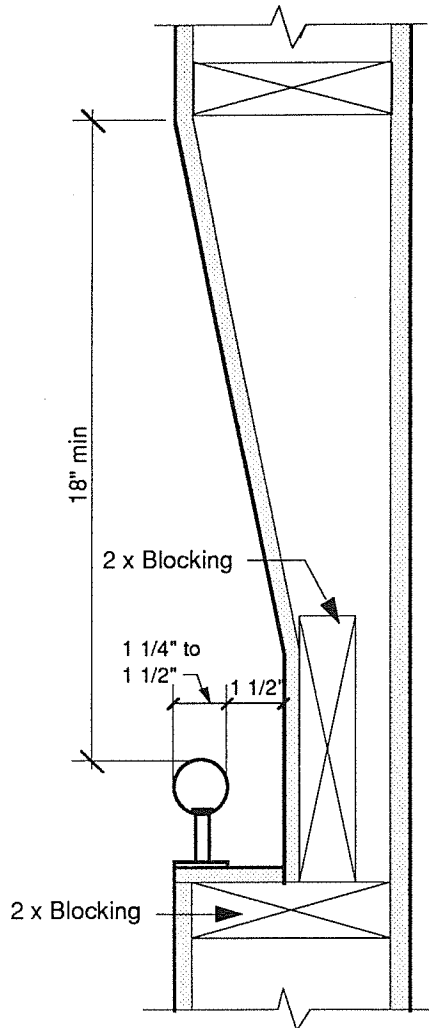


Fig. 5.11 Recessed handrail

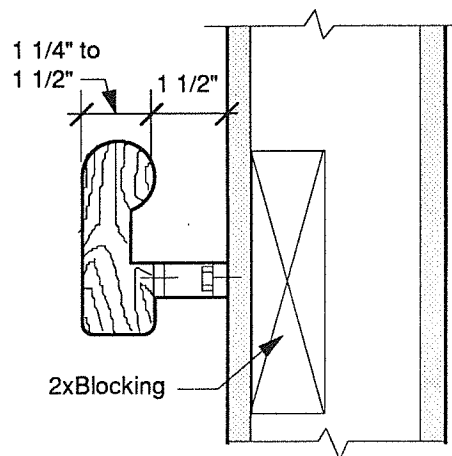


Fig. 5.12 Size and spacing of handrails

## ***Primary Entry Access***

- 3301(h)1.and 2. Applicable primary entrances to buildings are to be accessible to the physically disabled. If the primary entrances are temporarily not accessible to the disabled or their use is restricted, the entrances which are being substituted must be made accessible to and usable by people with physical disabilities.
- 3103(a.1)8.1  
Exception 6 **Multistory-dwelling units in nonelevator buildings are not subject to these requirements because, in such cases, there is no ground-floor dwelling unit.**
- 3103.1(b)3.1.A. **Separate Ground-Floor Entrances.** When a ground-floor unit of a building has a separate entrance, each such ground-floor unit shall be served by an accessible route, except for any unit where the terrain or unusual characteristics of the site prohibit the provision of an accessible route to the entrance of that unit.
- 3103.1(b)3.1.B. **Multiple Entrances.** Only one entrance to privately-funded multifamily buildings is required to be accessible to any one ground floor of a building, except in cases where an individual dwelling unit has a separate exterior entrance, or where the building contains clusters of dwelling units, with each cluster sharing a different exterior entrance. In these cases, more than one entrance may be required to be accessible, as determined by analysis of the site. In every case, the accessible entrance shall be on an accessible route to the covered dwelling units it serves.
- 3103.1(b)3.1.C. **Site Impracticality.** Covered multifamily dwellings with elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route, regardless of terrain or unusual characteristics of the site. Covered multifamily dwellings without elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route unless terrain or unusual characteristics of the site prevent an accessible route based on the conditions listed below.
- 3103.1(b)3.1.D. Regardless of site considerations described in Table 31-6, an accessible entrance on an accessible route is practical when there is an elevator connecting the parking area with the dwelling units on a ground floor. (in this case, those dwelling units on the ground floor served by an elevator, and at least one of each type of public- and common-use areas, would be subject to these requirements.)
- 3103.1(b)3.1.E. If the building elevator is provided as a means of access to dwelling units other than dwelling units on a ground floor, then the building is an elevator building which is a covered multifamily dwelling, and the elevator in that building must provide accessibility to all dwelling units in the building, regardless of the slope of the natural terrain; or

- 3103.1(b)3.1.F. An elevated walkway is planned between a building entrance and a vehicular or pedestrian arrival point and the planned walkway has a slope no greater than 10 percent (1:10).
- 3103.1(b)3.1.G. If the slope of the finished grade between covered multifamily dwellings and a public- or common-use facility (including parking) exceeds 1:12, or where other physical barriers (natural or manmade) or legal restrictions, all of which are outside the control of the owner, prevent the installation of an accessible pedestrian route, an acceptable alternative is to provide access via a vehicular route, when necessary site provisions such as parking spaces and curb ramps are provided at the public- or common-use facility.
- 3103.1(a)8.C.(5)a. **Door Signal Devices.** Every primary entrance to a dwelling unit, in buildings containing three or more dwelling units, shall be provided with a door buzzer, bell, chime, or equivalent installation mounted a maximum of 48 inches above the floor, connected to permanent wiring.
- 3304(i.1)1.  
**Exception 2** At the primary entry door to dwelling units in covered multifamily buildings, with direct exterior access, outside landing surfaces constructed of impervious materials such as concrete, brick or flagstone, shall be no more than 1/2 inch below the floor level of the dwelling unit.
- 3304(i.1)2.B.  
**Exception 2** The floor or landing immediately outside the entry may be sloped up to 1/8-inch per foot (12 inches), in the direction away from the primary entrance of the dwelling unit for drainage.

### ***Wheelchair Obstacles***

- 3301(h)3. Recessed doormats must be adequately anchored to prevent interference with wheelchair traffic (See Figure 5.13)
- 3304(f)1. Every required exit must be large enough to permit the installation of a door at least 3-feet wide and 6-feet 8-inches high. Exit doors shall open at least 90 degrees and provide a clear width of at least 32 inches.

### ***Level Floor or Landing***

- 3304(i.1)2.A. A level, clear area is to be created on each side of an exit door. The area should be at least 60 inches in the direction of the door swing, and 44 inches in the opposite direction of the door swing, as measured at right angles to the door in its closed position (See Figure 5.14)
- 3304(i.1)2.C. The width of the level area on the side to which the door swings shall extend 24 inches past the strike edge of the door for exterior doors and 18 inches past the strike edge for interior doors (See Figure 5.14)

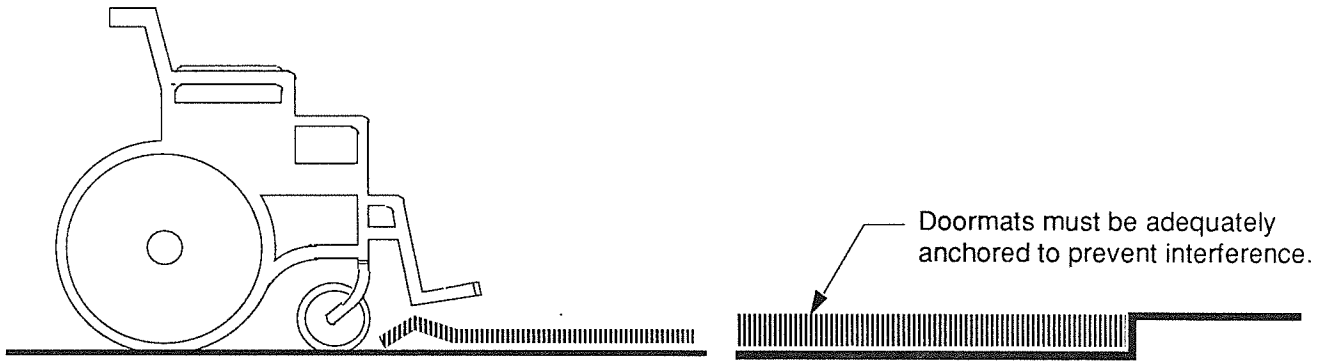


Fig. 5.13 Wheelchair obstacles

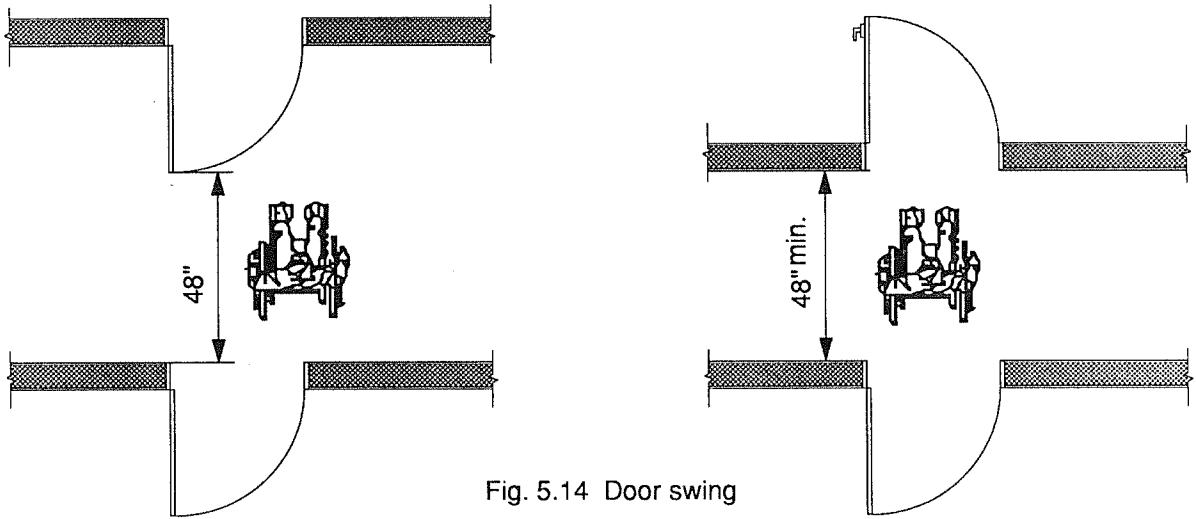


Fig. 5.14 Door swing

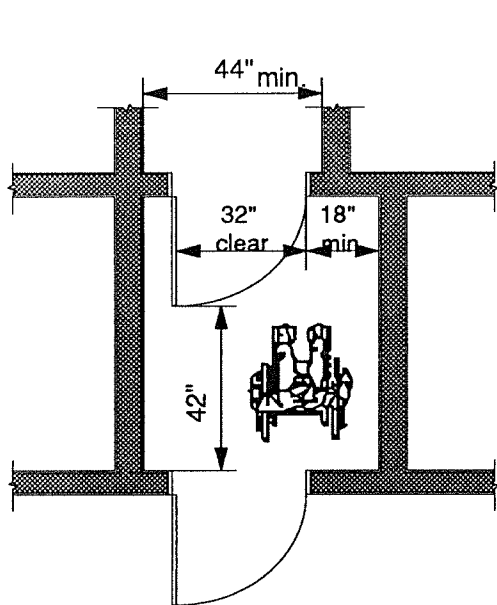


Fig. 5.15 Vestibule

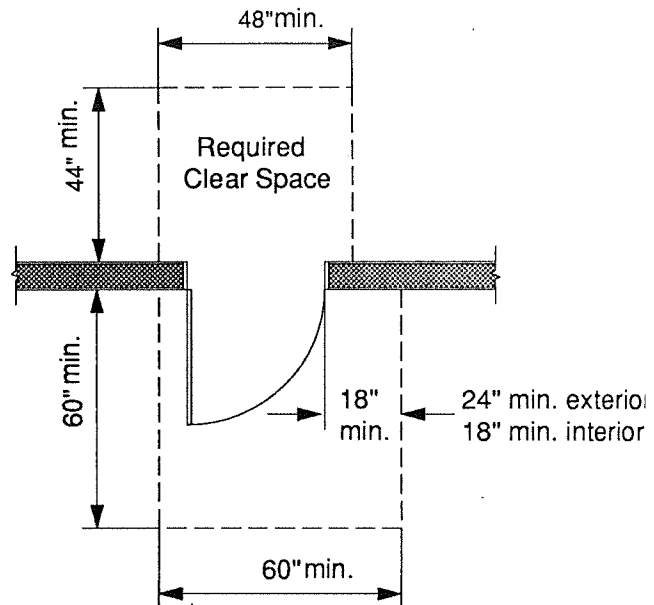


Fig. 5.16 Door clearances

3304(i.1)2.A. **Exceptions 2 and 3** In covered multifamily-dwelling units, private garages and sheds, where a door opens over a landing, the landing should be as long as the door width. Screen doors and storm doors may swing over stairs. The landing does not have to be as long as the screen doors and storm doors, but should be as long as the door width.

3304(i.1)2.B. **Exception 1** In each covered unit of multifamily buildings, the level area must be 44 inches long both in the direction and opposite the direction, of the door swing, as measured perpendicular to the door in its closed position.

3304(i.1)2.D. The space between two consecutive door openings in a vestibule, serving other than a required exit stairway, must have at least 48 inches of clear space from any door opening into the vestibule when the door is positioned at 90 degrees from its closed position (See Figure 5.15). Doors in a series must swing either in the same direction or away from the space between the doors (See Figure 5.16).

### ***Type of Lock or Latch***

3304(c) Exit doors must open from the inside without a key or any special knowledge or effort. **Exit doors from buildings or rooms serving 10 or fewer occupants may have a night latch, dead bolt, or security chain, as long as the doors can still be opened from the inside without a key, special knowledge or effort. In addition, these devices are not to be mounted more than 48 inches above the floor.** Manually operated edge bolts, surface-mounted flush bolts and surface bolts are prohibited. When exit doors are used in pairs and automatic flush bolts are used, the door leaf with the flush bolt must have no doorknob or surface-mounted hardware. The unlatching of any leaf must not require more than one operation.

3304(c.1) Hand activated door opening hardware is to be between 30 and 44 inches above the floor. Latching and locking doors that are hand activated and in a path of travel shall have lever-type hardware, panic bars, push-pull activating bars, or other hardware that provides passage without grasping the hardware. Doors to individual units must operate similarly, except that when the bolt and unlatching operation is performed with a key from the corridor or exterior side of the door, large bow keys (2-inch full bow or 1-1/4-inch half bow) must be provided instead of lever-type hardware on the corridor side. Separate dead-lock activation on the room side of corridor doors must have a level handle or large thumb turn in an easily reached location.

## ***Hardware***

- 3304(d) Exit door hardware needs to be an approved type tested in accordance with the requirements of U.B.C. Standard No. 33-4.
- 3304(i.2)1. Maximum effort to operate doors must not exceed 8.5 pounds for exterior doors and 5 pounds for interior doors. This maximum effort is measured as the amount of push or pull applied at right angles to hinged doors and at the center plane of sliding or folding doors. Compensating devices or automatic door openers may be used to meet these standards. When fire doors are required, the maximum effort to operate the door may be increased up to 15 pounds.

## ***Construction***

- 3304(i.3) The bottom 10 inches of all doors, except automatic and sliding doors, must have a smooth, uninterrupted surface to allow the door to be opened by a wheelchair footrest without catching on or trapping the wheelchair (See Figure 5.17)

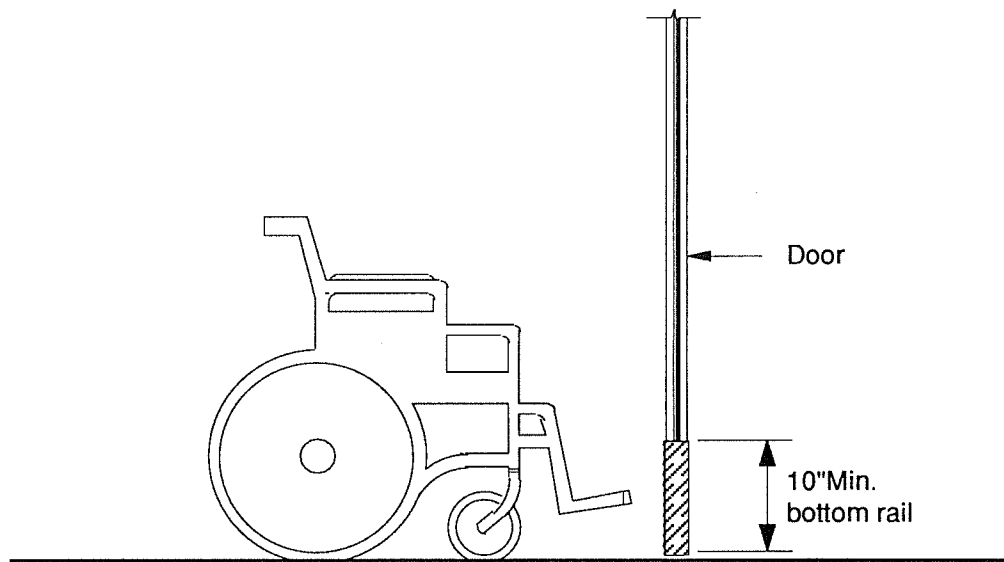


Fig. 5.17 Door construction

# Part VI

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## *Inside the Building*

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### **Introduction:**

*Part VI will describe the required features needed in relation to the building that houses multifamily dwelling units. Included are requirements for elevators, water fountains and telephones.*

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## *Inside the Building*

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### *Corridors*

- 3305(b)1. Every corridor serving 10 or more occupants must be at least 44 inches wide (See Figure 6.1)
- 3305(b)2.D.  
Exception 3 **All corridors within privately-funded multifamily dwelling units are to be at least 36 inches wide.**
- 3305(b)2. Corridors over 200 feet long require:
- A. A minimum clear width of 60 inches (See Figure 6.2); or
  - B. At a central location, a wheelchair turning or passing alcove that is at least 60 inches by 60 inches (See Figure 6.3); or
  - C. At a central location, an intervening cross or tee corridor, at least 44 inches wide (See Figure 6.4); or
  - D. An openable door at a central location.

Note: See Figures 6.1, 6.2, 6.3, and 6.4

### *Elevators*

If elevators are installed in privately-funded multifamily buildings, they must comply with the requirements of Chapter 51 of this building code as amended.

### *Water Fountains*

- 3105(d.1)1. On any floor where water fountains are provided, at least one fountain shall be accessible. Drinking fountains shall comply with the provisions of Section 1507, California Plumbing Code, Title 24, California Code of Regulations.



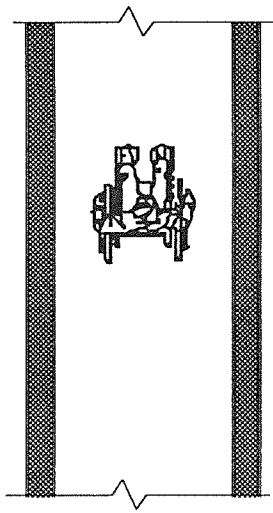


Fig. 6.1 Corridor

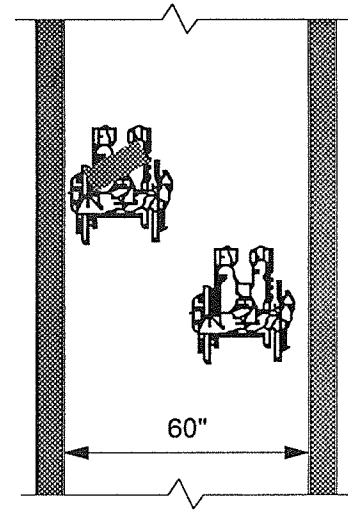


Fig. 6.2 Corridor over 200 feet

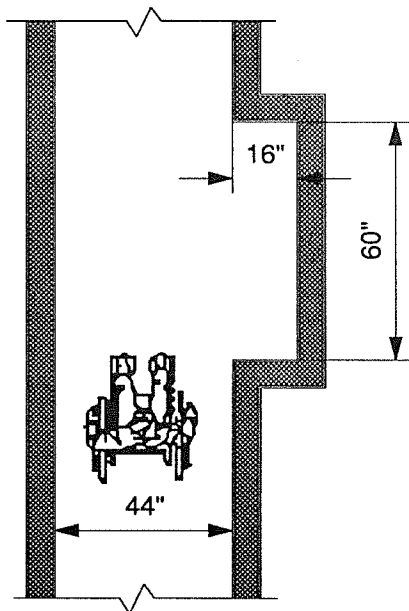


Fig. 6.3 Passing Alcove

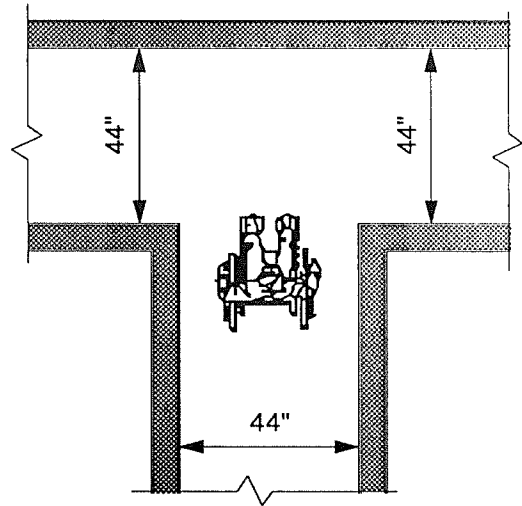


Fig. 6.4 Intervening cross

1507(a.1)

If provided in covered multifamily buildings, drinking fountains and water coolers shall be on an accessible route. Wall-mounted and post-mounted cantilevered drinking fountains and water coolers shall have a clear knee space between the bottom of the apron and floor or ground at least 27 inches high, 30 inches wide and 17 to 19 inches deep. Such units shall also have a minimum clear floor space 30 inches by 48 inches to allow a person in a wheelchair to approach the unit facing forward (See Figure 6.5)

1507(b.1)

The spout shall provide a flow of water at least 4 inches high so as to allow the insertion of a cup or glass under the flow of water. The force required to activate controls shall be no greater than 5 lbf.

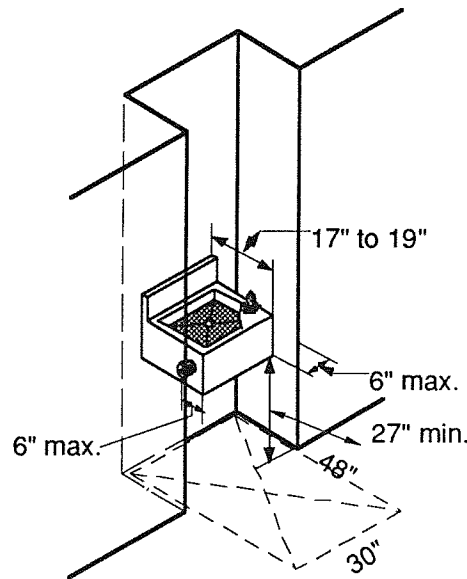


Fig. 6.5 Alcove installation

## ***Telephones***

3105(d.1)2.1.

On floors where public telephones are provided, at least one telephone shall be accessible. On any floor where two or more banks of multiple telephones are provided, at least one telephone in each bank shall be accessible.

3105(d.1)2.1.A.

**General.** If public telephone are provided, they shall comply with this section.

3105(d.1)2.1.B.

**Clear Floor Ground Space.** A clear floor or ground space at least 30 inches x 48 inches that allows either a forward or parallel approach by a person using a wheelchair shall be provide at telephones.

- 3105(d.1)2.1.C. **Size and Approach.** The minimum clear floor ground space required to accommodate a single, stationary wheelchair and occupant is 30 inches by 48 inches. The minimum clear floor or ground space for wheelchairs may be positioned for forward or parallel approach to an object. Clear floor or ground space for wheelchairs may be part of the knee space required under some objects.
- 3105(d.1)2.1.D. **Relationship of Maneuvering Clearances to Wheelchair Spaces.** One full unobstructed side of the clear floor or ground space for a wheelchair shall adjoin another wheelchair clear floor space. If a clear floor space is located in an alcove or otherwise confined on all or part of three sides, additional maneuvering clearances shall be provided.
- 3105(d.1)2.1.E. **Floor Surfaces of Wheelchair Spaces.** Floor surfaces of wheelchair spaces shall conform to Figure 6.6. Bases, enclosures and fixed seats shall not impede approaches to telephones by people who use wheelchairs.
- 3105(d.1)2.1.F. **Mounting Height.** The highest operable part of the telephone shall be within the reach ranges specified in Figure 6.6. Telephones mounted diagonally in a corner that require wheelchair users to reach diagonally shall have the highest operable part no higher than 54 inches above the floor.

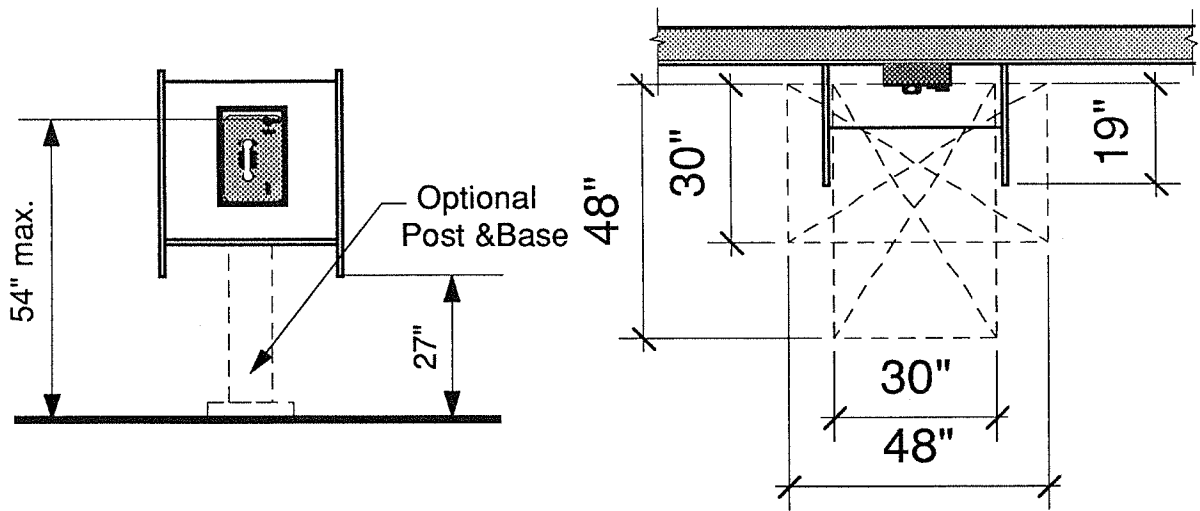


Fig. 6.6 Telephone

- 3105(d.1)2.1.G. **Enclosures.** If telephone enclosures are provided, they may overhang the clear floor space required in subsections B, C, and D with the following limits:
- 3105(d.1)2.1.G.i. **Side Reach Possible.** The overhang shall be no greater than 19 inches. The height of the lowest overhanging part shall be equal to or greater than 27 inches (See Figure 6.6)
- 3105(d.1)2.1.G.ii. **Full-Height Enclosures.** Entrances to full-height enclosures shall be 30 inches minimum.
- 3105(d.1)2.1.G.iii. **Forward Reach Required.** If the overhang is greater than 12 inches, then the clear width of the enclosure shall be 30 inches minimum; if the clear width of the enclosure is less than 30 inches, then the height of the lowest overhanging part shall be equal to or greater than 27 inches (See Figure 6.6)
- 3105(d.1)2.1.H. **Equipment for Hearing Impaired People.** Telephones shall be equipped with a receiver that generates a magnetic field in the area of the receiver cap. A reasonable number of the public telephones provided, but always at least one on each floor or in each bank, whichever is more, in a building or facility, shall be equipped with a volume control. Such telephones shall be capable of a minimum of 12 dba and a maximum of 18 dba above normal. If an automatic reset is provided, 18 dba may be exceeded. Public telephones with volume control shall be hearing aid compatible and shall be identified by a sign containing a depiction of a telephone handset with radiating sound waves.
- 3105(d.1)2.1.I.A. **Text Telephones.** If a total of four or more public pay telephones are provided at the interior and exterior of a site, and if at least one of the total is in an interior location, then at least one interior public text telephone shall be provided.
- 3105(d.1)2.1.J. **Controls.** Telephones shall have push-button controls where service for such equipment is available.
- 3105(d.1)2.1.K. **Cord Length.** The cord from the telephone to the handset shall be at least 29 inches long.
- 3105(d.1)2.1.L. **Telephone Books.** If telephone books are provided, they shall be located in a position that complies with the reach ranges in Figures 31-5C and D.

## ***Laundry Rooms***

- 3105(f) If clothes washing machines and clothes dryers are provided in covered multifamily buildings or dwelling units, at least one of each type of

appliance shall be provided in each laundry area, except that laundry rooms serving multifamily dwellings are not required to have front-loading clothes washers. Where front loading clothes washers are not provided, management shall provide assistive devices, on request, if necessary to permit a resident to use a top-loading clothes washer.

## *Signs*

3105(e.1) All accessible toilet and bathing facilities, except within an adaptable dwelling unit or within an accessible patient or guest room, shall be identified by the international symbol of accessibility.

## *Part VII*

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### *Inside the Dwelling Unit*

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#### **Introduction:**

*Part VII will describe the features within the multifamily unit. Included are requirements for accessible entrances, kitchens, bathrooms and hallways. The user will gain a clear understanding of "adaptability" versus full accessibility. Also covered are plumbing and electrical requirements.*

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## *Inside the Dwelling Unit*

---

### *General*

3105(a.1) **General.** When buildings are required to be accessible, building facilities (telephones, drinking fountains, bathrooms, kitchens, etc.) must be accessible to persons with physical disabilities. Where specific floors of a building are required to be accessible, the requirements shall apply only to the facilities located on accessible floors.

3103.1(b)5.1 Dwelling units shall be considered adaptable when they comply with the appropriate provisions of adaptability contained in Section 3105 and Chapter 33.

### *Doors*

3105(a.1) **Exception** Every entry, opening or passage door of the covered dwelling unit must provide a minimum of 32 inches nominal clear space between the face of the door and the stop, when the door is in the 90 degree open position. A 34-inch door is acceptable. A standard 6-foot sliding patio door assembly is acceptable.

3304(i.1)2.C **Interior Doors.** All interior doors shall have a level area on the side to which the door swings, extending 18 inches past the strike edge of the door.

3304(c.1) Interior passage doors shall have hardware centered, between 30 inches and 44 inches, above the floor and shall be operable with a single effort by lever type hardware.

3304(j) **Landings at the Interior Passage Doors.** Interior passage doors shall have landings on each side of the door. The length of landings shall be a minimum of 36 inches in the direction of travel. The minimum width of landings shall be not less than the width of the door plus the required strike side clearance.

### *Hallways*

3103.1(b)2.1.C. **Exception** General. Hallways within dwelling units shall be a minimum of 36 inches in width.

## ***Flooring***

- 3105(g) If carpet or carpet tile is used in a common-use area on a ground floor surface, it shall have firm backing or no backing. The maximum pile height shall be 1/2 inch. Exposed edges of carpet shall be fastened to floor surfaces and have trim along the entire length of the exposed edge. Carpet edge trim shall comply with the requirements for changes in level.

## ***Switches***

- 380-8(c.1) The center of the grip of the operating handle of switches used to control light switches, thermostats and other environmental controls shall be located no higher than 48 inches, and no lower than 15 inches, above the floor. If the reach is over an obstruction (for example, a kitchen base cabinet) between 20 and 25 inches in depth, the maximum height is reduced to 44 inches for forward approach, or 46 inches for side approach, provided the obstruction is no more than 24 inches in depth. Obstruction may not extend more than 25 inches from the wall beneath a control.

Other controls are acceptable provided that comparable controls that perform the same function are provided within the same area and are accessible.

## ***Electrical Outlets***

- 210-7 The center of 15-, 20-, and 30-ampere electrical outlets must be installed no higher than 48 inches, and no lower than 15 inches above the floor. This requirement does not apply to electrical outlets installed as a part of permanently install baseboard heaters, outlets required in areas adjacent to sliding panels or walls, or other electrical convenience floor outlets. The requirement also does not apply to baseboard electrical outlets used in movable partitions, or in walls with windows.

If the reach is over an obstruction (for example, a kitchen base cabinet) between 20 and 25 inches in depth, the maximum height is reduced to 44 inches for forward approach, or 46 inches for side approach, provided the obstruction is no more than 24 inches in depth. Obstructions may not extend more than 25 inches from the wall beneath the receptacle.

Other outlets are acceptable provided that comparable outlets, that perform the same functions, are provided within the same area and are accessible.



## ***Kitchens***

3105(d.1)3.1. Kitchens within adaptable dwelling units shall be accessible. (See figures 7.1 & 7.2)

3105(d.1)3.1.  
**Exception** **In privately-funded multifamily dwelling units, U-shaped kitchens with cabinets, appliances or fixtures on three walls shall be designed and constructed to provide a minimum clear space of 60 inches between cabinet fronts, appliances or fixtures to allow a parallel approach, or base cabinets shall be removable at that location, to a height of 27 inches above the floor to permit a forward approach. Base cabinets directly under the kitchen sink counter area, including toeboard and shelving, must be removable without special knowledge or tools, to provide clearance for a wheelchair. Flooring must be installed beneath such countertop. A minimum clear space of 48 inches must be provided for all other kitchen designs.**

3105(d.1)3.1.D. **Base Cabinets.** In dwelling units required to be accessible, base cabinets directly under the kitchen sink counter area, including toeboard and shelving, shall be removable without the use of specialized tools or specialized knowledge to provide clearance for a wheelchair. Finished flooring shall be provided on the floor beneath the countertop.

3105(d.1)3.1. A clear floor space at least 30 inches by 48 inches must be provided that allows a parallel approach by a person in a wheelchair at the range or cooktop and either a parallel or forward approach at the oven, dishwasher, refrigerator/freezer and trash compactor.

3105(d.1)3.1.C. **Lower Shelving.** Lower shelving and/or drawer space must be provided in the kitchen at a height of no more than 48 inches.

3105(d.1)3.1.B. **Countertops.** At least 30 inches of countertop must be provided for the kitchen sink. At least 30 inches shall be provided for a work space. Both the sink and work space counter areas shall be designed to enable repositioning to a minimum height of 28 inches. The sink and work surface counter area may be a single integral unit or separate components.

The sides and back of adjacent cabinets, which may become exposed to moisture or food handling when a countertop is lowered, are to be constructed of durable, nonabsorbent materials appropriate for such uses. Install finished flooring on the floor beneath such countertop.

**Note:** Plumbing shall be installed in a manner to permit repositioning of the sink and countertop.

3105(d.1)3.1.B.  
Exception 1

Five percent (5%) of the privately-funded apartment house dwelling units required to be accessible, must comply with the requirements for repositionable countertops. All other privately-funded covered multifamily dwelling units are exempt.

3105(d.1)3.1.B.  
Exception 2

Stone, cultured stone, and tiled countertops may be used without meeting the repositioning requirements.

3105(d.1)3.1.B.  
Exception 3

In privately-funded apartment house dwelling units, two 15-inch minimum width breadboards may be provided in lieu of the required 30 inches of countertop work surface.

1508

Kitchen sink faucet controls and operating mechanisms shall be operable with one hand and shall not require tight grasping, pinching or twisting of the wrist. The force required to activate controls shall be no greater than 5 lbf. Lever-operated, push-type, and electronically-controlled mechanisms are examples of acceptable designs. Self-closing valves are allowed if the faucet remains open for at least 10 seconds.

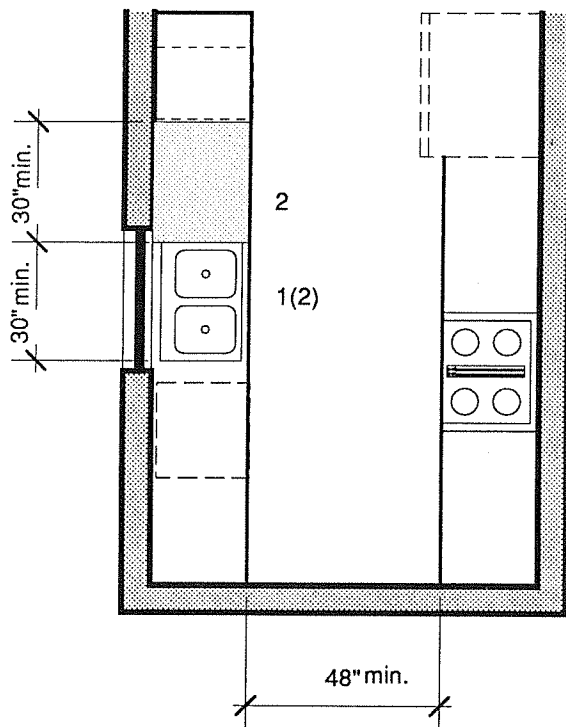


Fig. 7.1 Typical Kitchen  
1. Removable base cabinet with finish flooring beneath.  
2. 30" wide repositionable counter top work space and sink.

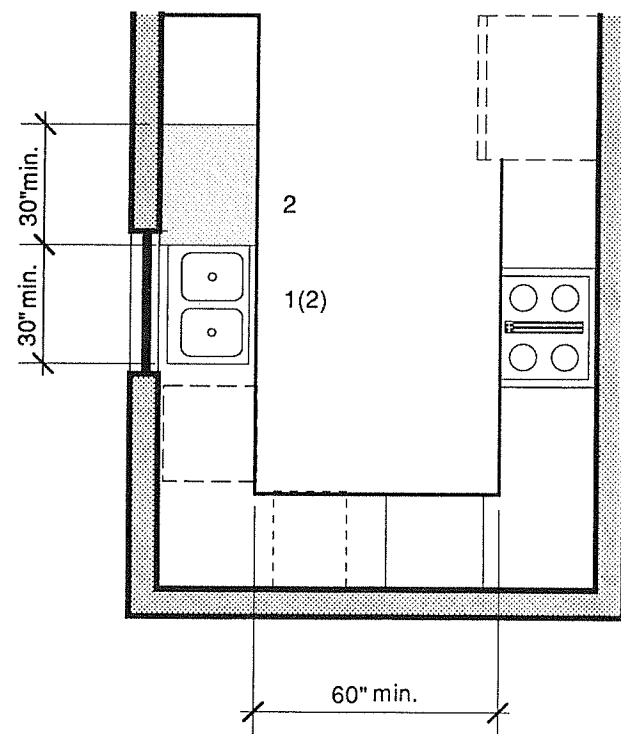
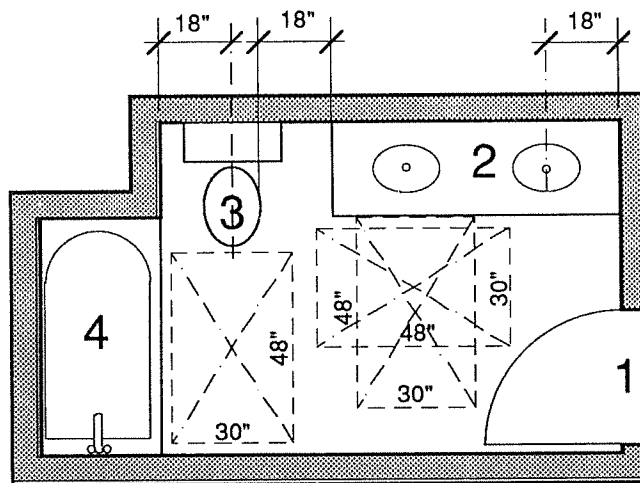


Fig. 7.2 U Shaped Kitchen  
1. Removable base cabinet with finish flooring beneath.  
2. 30" wide repositionable counter top work space and sink.

## ***Bathrooms***

- 3105(b.1)1. **Bathing Facilities.** See Tables 3105.1-1 and 3105.1-2 for complying bathrooms. (See figure 7.3)
- 3105(b.1)2. Only one bathroom in privately-funded accessible dwelling units need comply with the requirements for the physically disabled.
- 3105(b.1)3. If a developer desires to provide requirements for the physically disabled in all bathrooms, use Table 3105.1-1.
- 3105(b.1)4. If a developer desires to provide requirements for the physically disabled in only one bathroom, use Table 3105.1-2.
- Note: See figures 7.4, 7.5, and 7.6 for knee space below the vanity.
- 1504(b) Hot water and drain pipes under lavatories shall be insulated or otherwise covered. There shall be no sharp or abrasive surfaces under lavatories.
- 1504(c) Lavatory faucet controls and operating mechanisms shall be operable with one hand and shall not require tight grasping, pinching or twisting of the wrist. The force required to activate controls shall be no greater than 5 lbf. Lever-operated, push-type, and electronically-controlled mechanisms are examples of acceptable designs. Self-closing valves are allowed if the faucet remains open for at least 10 seconds.



Provide 30" x 48" clear space in front of:  
1. Door 2. Lav. 3. Water Closet 4. Tub

Fig. 7.3 Typical Bathroom

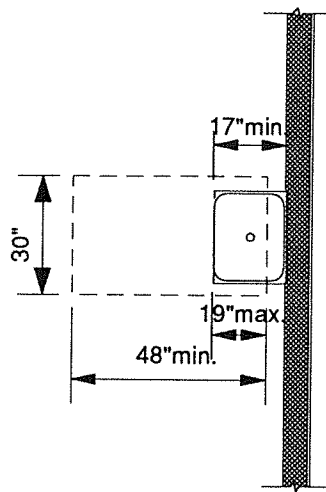


Fig. 7.4 Lavatory with knee space.

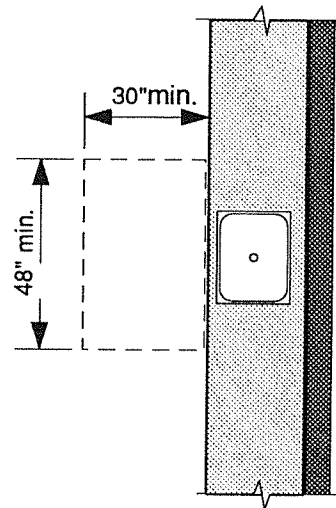


Fig. 7.5 Lavatory without knee space.

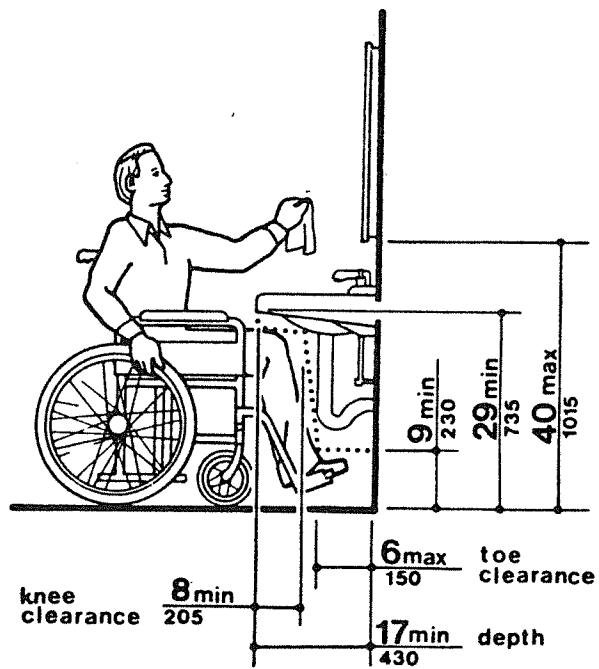


Fig. 7.6 Open Lavatory Clearance

# Toilet Facilities

3105(b.1)2.1. Water closets in bathrooms required to be accessible shall conform to the provisions of Section 1502, California Plumbing Code, Title 24, California Code of Regulations. The water closet can be located in a space 36 inches in clear width, as long as 48 inches of clear space is provided in front of the water closet. This space may include the maneuverable area under the lavatory. Water closet seats must be at least 15 inches above the floor (See Figure 7.7).

3105(b.1)2.1  
**Exception** In privately-funded multifamily dwelling units, the water closet may be located in a space 48 inches in clear width with 36 inches of clear space provided in front of the water closet.

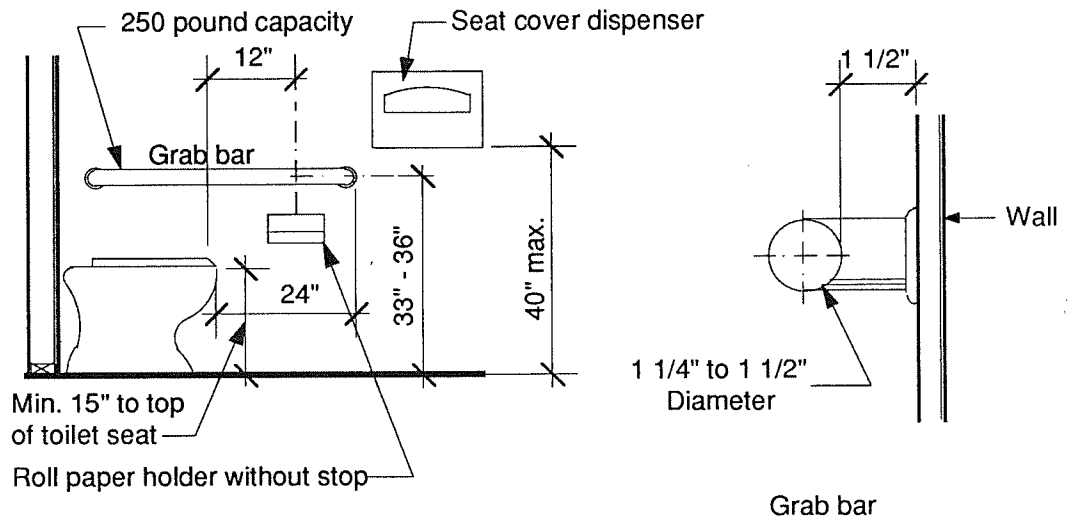


Fig. 7.7 Toilet facilities

## ***Lavatories, Mirrors and Towel Fixtures***

3105(b.1)3.1 At least one accessible lavatory shall be provided within any toilet facility. Where mirrors and towel fixtures are provided, at least one of each shall be accessible.

### ***Grab Bars***

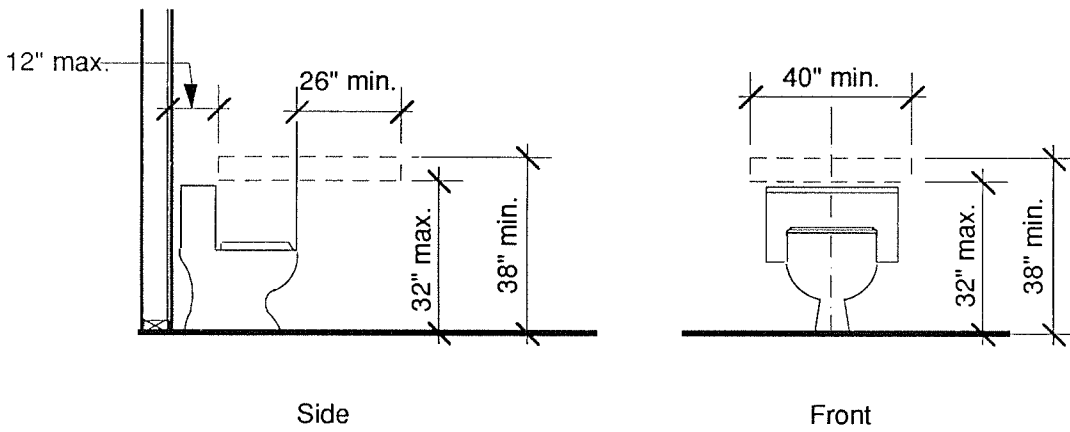
3105(b.1)4.1. **Fixtures in Adaptable Dwelling Units.** Grab bars need not be installed in either a bathing or toilet facility within an adaptable dwelling unit provided all structural reinforcements for future installation of grab bars are provided in the appropriate locations in the adjoining walls. The reinforcement shall be of sufficient length to permit the installation of grab bars as specified. The reinforced wall shall be capable of supporting a load of at least 250 pounds in conformance with this Section.

The structural strength of grab bars, tub and shower seats, fasteners, and mounting devices must withstand at least a 250-pound load.

3105(b.1)2.H(3)e Grab bars cannot rotate within their fittings.

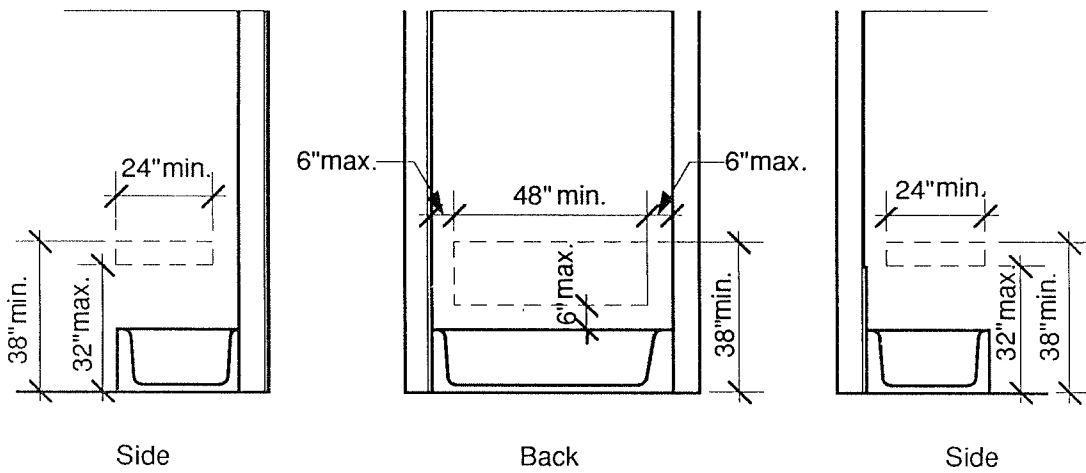
3105(b.1)2.H(4) A grab bar and any wall or surface adjacent to it must be free of any sharp or abrasive elements. Edges must have a minimum radius of 1/8 inch. Grab bar height shall be between 33 - 36 inches above the finished floor.

Note: See Figures 7.8, 7.9, and 7.10



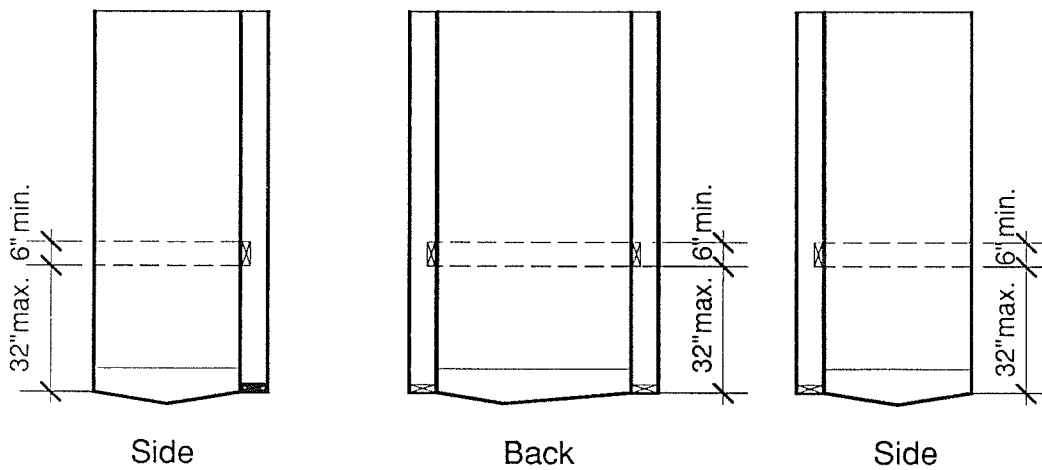
NOTE: Reinforced areas for installation of grab bars

Fig. 7.8 Water closets in adaptable bathrooms



NOTE: The area outlined in dashed lines represent locations for future installation of grab bars for typical fixture configurations.

Fig. 7.9 Location of grab bar reinforcements for adaptable bathtubs.



NOTE: The areas outlined in dashed lines represent locations for future installation of grab bars.

Fig. 7.10 Location of grab bar reinforcement for adaptable showers

3105(b.1)4.1A. **Toilet.** Where the toilet is not placed adjacent to a side wall, the bathroom shall have provisions for installation of floor-mounted, foldaway or similar alternative grab bars. Where the powder room (a room with a toilet and sink) is the only toilet facility located on an accessible level of a multistory dwelling unit, it shall comply with the requirement for reinforced walls for grab bars.

Where the toilet is placed adjacent to a side wall, reinforcement shall be installed on both sides or one side and the back. If reinforcement is installed at the back, it shall be installed between 32 inches and 38 inches above the floor. The grab bar reinforcement shall be a minimum of 6 inches nominal in height. The backing at the rear of the water closet shall be a minimum of 40 inches in length.

Reinforcement installed at the side of the toilet shall be installed 32 inches to 38 inches above the floor. The reinforcement shall be installed a maximum of 12 inches from the rear wall and shall extend a minimum of 26 inches in front of the water closet stool. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

3105(b.1)4.1B. **Bathtub.** A bathtub may be installed without surrounding walls provided reinforced area are provided for installation of floor-mounted grab bars.

Where a tub is installed with surrounding walls, grab bar reinforcement shall be installed on each end of the bathtub, 32 inches to 38 inches above the floor, extending a minimum of 24 inches aligned with the front edge of the bathtub toward the back wall of the bathtub. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

Grab bar reinforcement shall be installed on the back wall of the bathtub commencing a maximum of 6 inches above the bathtub rim and extending upward to a point a minimum of 38 inches above the floor. The grab bar backing shall be installed horizontally a length to permit the installation of a 48-inch grab bar with each end a maximum of 6 inches from the end walls of the bathtub. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

3105(b.1)4.1C. **Shower Stalls.** Glass-walled shower stalls shall provide reinforcement for installation of floor-mounted grab bars. Reinforcement for installation of ceiling-mounted grab bars is permitted.

Grab bar reinforcement shall be installed continuous in the walls of adaptable showers 32 inches to 38 inches above the floor. The grab bar reinforcement shall be a minimum of 6 inches in height.



***Appendix***

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**Introduction:**

*Part VIII includes a reprint of the text of the regulations as adopted by the California Building Standards Commission. The user is advised to reference this part often when reviewing any design. Any questions regarding interpretation of the regulations should be directed to the local Building Official and the Department of Housing and Community Development.*

# *Appendix*

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## **Regulations on Access and Adaptability for Persons with Physical Disabilities**

From Title 24, California Code of Regulations

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### **Chapter 1 Administration**

#### 110.8 HCD 1 - Department of Housing and Community Development.

Application - Hotels, motels, lodging houses, apartment houses, dwellings, employee housing, and factory-built housing.

Access and adaptability requirements for the physically disabled shall apply to all newly constructed privately-funded covered multifamily dwelling units in buildings having three or more dwelling units and privately-funded shelters intended for occupancy as residences for homeless persons. These regulations do not apply to buildings containing less than four condominium dwelling units. These regulations also do not apply to the repair of, rehabilitation of, or additions to privately-funded apartment houses, condominiums or time-share units.

Each building on a building site shall be considered separately when determining applicability of these regulations.

The percentage of ground-floor dwelling units in nonelevator buildings required to be adaptable and on an accessible route shall be determined by the use of Table 31-6. All other ground-floor dwelling units, in nonelevator buildings, shall be made to comply with the following requirements:

- A. Grab bar reinforcement [3105(b.1)4.1].
- B. Thirty-two inch clear door and interior opening width [3105(a.1) Exception]
- C. Lever hardware [3304(c.1)].
- D. Door signal devices [3103.1(a)8C(5)a.].
- E. Clear space by doors [3304(i.1)2.C.; Tables 3105.1-1 & 3105.1-2;].
- F. Minimum 15-inch water closet seat height [3105(b.1)2.1].
- G. Electrical receptacle outlet height [Article 210-7(g.1), California Electrical Code, Title 24, Part 3].
- H. Lighting and environmental control height [Article 380-8(c.1), California Electrical Code, Title 24, Part 3].
- I. Faucet controls [1504(c), California Plumbing Code, Title 24, Part 5].
- J. Water closet, bathtub and lavatory minimum space requirements [3105(b.1)2.1 and Table 3105.1-2 (Items 5 and 12)].

K. Removable cabinets under the kitchen sink counter area [3105(d.1)3.1D].

NOTE: For specific requirements and exceptions, see Chapters 5, 12, 31A, 33, 51, and State Chapter 71.

Enforcing Agency - Local building department or the Department of Housing and Community Development.

Authority Cited - Health and Safety Code Sections 17921, 50558 and 50559.

Reference - Health and Safety Code Sections 17000 through 17060, 17910 through 17990, 50558 and 50559.

## **CHAPTER 31 ACCESSIBILITY**

NOTE: This is a new chapter.

### ***SCOPE***

Section 3101(a). **General.**

Buildings or portions of buildings shall be accessible to persons with disabilities as required by this chapter.

### ***DEFINITIONS***

Section 3102. For the purposes of this chapter certain terms are defined as follows:

- 3102(b) **ACCESSIBLE** for covered multifamily dwellings is the public- or common-use areas of the building that can be approached, entered and used by individuals with physical disabilities. The phrase "readily accessible to and usable by" is synonymous with accessible.
- 3102(c) **ACCESSIBLE ROUTE OF TRAVEL** is a continuous unobstructed path connecting all accessible elements and spaces in an accessible building or facility that can be negotiated by a person with a severe disability using a wheelchair, and that is also safe for and usable by people with other disabilities.
- 3102(d) **ACCESSIBILITY** is the combination of various elements in a building or area which allows access, circulation and the full use of the building and facilities by persons with physical disabilities.

- 3102(f) **ADAPTABLE DWELLING UNIT** is a dwelling unit in a building with a building entrance on an accessible route designed in such a manner that the public- and common-use areas are readily accessible to and usable by disabled persons, and all doors are designed sufficiently wide to allow passage into and within all premises by physically disabled persons in wheelchairs as required by this code.
- 3102(h) **ASSISTIVE DEVICE** is an aid, tool, or instrument used by persons with disabilities to assist in activities of daily living. Examples of assistive devices include tongs, knob-turners, and oven-rack pusher/pullers.
- 3102(i) **BATHROOM** is, for the purposes of this chapter, a room which includes a water closet (toilet), lavatory (sink), and bathtub or shower. It does not include single-fixture facilities or those with only a water closet and lavatory. It does include a compartmented bathroom. A compartmented bathroom is one in which the fixtures are distributed among interconnected rooms. A compartmented bathroom is considered a single unit and is subject to the requirements for bathrooms for disabled persons.
- 3102(j) **BUILDING ENTRANCE ON AN ACCESSIBLE ROUTE** is an accessible entrance to a building that is connected by an accessible route to public transportation stops, to parking or passenger loading zones, or to public streets or sidewalks, if available.
- 3102(k) **COMMON-USE AREAS** for covered multifamily dwellings are rooms, spaces or elements inside or outside of a building that are made available for the use of residents of a building or the guests thereof. These areas include, but are not limited to, hallways, lounges, lobbies, laundry rooms, refuse rooms, mail rooms, recreational areas and passageways between buildings.
- 3102(l) **COVERED MULTIFAMILY DWELLINGS** are all dwelling units in buildings consisting of three or more privately-funded dwelling units if such buildings have one or more elevators; and all ground-floor dwelling units in other buildings consisting of three or more dwelling units. Dwelling units within a single structure separated by firewalls do not constitute separate buildings.
- 3102(m) **CURB CUT** is an interruption of a curb at a pedestrian way, which separates surfaces that are substantially at the same elevation.
- 3102(n) **CURB RAMP** is a sloping pedestrian way, intended for pedestrian traffic, which provides access between a walk or sidewalk to a surface located above or below an adjacent curb face.

- 3102(o) **DWELLING UNIT** is a single unit of residence for a household of one or more persons. Examples of dwelling units covered by these regulations include condominiums, an apartment unit within an apartment building, and other types of dwellings in which sleeping accommodations are provided but toileting or cooking facilities are shared by occupants of more than one room or portion of the dwelling. Examples of the latter include dormitory rooms and sleeping accommodations in shelters intended for occupancy as residences for homeless persons.
- 3102(p) **GROUND FLOOR** is the floor of a building with a building entrance on an accessible route. A building may have one or more ground floors. Where the first floor containing dwelling units in a building is above grade, all units on that floor must be served by a building entrance on an accessible route. This floor will be considered to be a ground floor.
- 3102(q) **KICK PLATE** is an abrasion-resistant plate affixed to the bottom portion of a door to prevent a trap condition and protect its surface.
- 3102(r) **LIFT, SPECIAL ACCESS.** See "special access lifts."
- 3102(s) **MULTISTORY DWELLING UNIT** is a dwelling unit with finished living space located on one floor and the floor or floors immediately above or below it.
- 3102(t) **NEWLY CONSTRUCTED** is a building that has never before been used or occupied for any purpose.
- 3102(v) **PERSONS WITH PHYSICAL DISABILITIES** means, as with respect to a person, a physical or mental impairment which substantially limits one or more major life activities; a record of such an impairment; or being regarded as having such an impairment. This term does not include current, illegal use of or addiction to a controlled substance. For purposes of these guidelines, an individual shall not be considered to have a physical disability solely because that individual is a transvestite. As used in this definition "physical or mental impairment" includes:
1. Impairments which affect ambulation due to cerebral palsy, poliomyelitis, spinal cord injury, amputation, arthritis, cardiac and pulmonary conditions, and other conditions or diseases which reduce mobility, including aging. Any physiological disorder or condition, cosmetic disfigurement, or anatomical loss affecting one or more of the following body systems: neurological; musculoskeletal; special sense organs; respiratory, including speech organs; cardiovascular; reproductive; digestive; genito-urinary; hemic and lymphatic; skin; and endocrine; or

2. Any mental or psychological disorder, such as mental retardation, organic brain syndrome, emotional or mental illness, and specific learning disabilities. The term "physical or mental impairment" includes, but is not limited to, such diseases and conditions as orthopedic, visual, speech and hearing impairments; cerebral palsy, autism, epilepsy, muscular dystrophy, multiple sclerosis, cancer, heart disease, diabetes, human immunodeficiency virus infection, mental retardation, emotional illness; drug addiction (other than addiction caused by current, illegal use of a controlled substance) and alcoholism. These guidelines are designed to make units accessible or adaptable for people with physical disabilities.

3. "Major life activities" means functions such as caring for one's self, performing manual tasks, walking, seeing, hearing, speaking, breathing, learning and working.

4. "Has a record of such an impairment" means has a history of, or has been misclassified as having, a mental or physical impairment that substantially limits one or more major life activities.

5. "Is regarded as having an impairment" means:

A. The person has a physical or mental impairment that does not substantially limit one or more major life activities but that is treated by another person as constituting such a limitation;

B. The person has a physical or mental impairment that substantially limits one or more major life activities only as a result of the attitudes of others toward such impairment; or

C. The person has none of the impairments defined in paragraph 1 of this definition but is treated by another person as having such impairment.

3102(w) **POWDER ROOM** is a room containing only a water closet (toilet) and lavatory (sink).

3102(z) **PUBLIC-USE AREAS** are interior or exterior rooms or spaces of a building that are made available to the general public. Public use may be provided at a building that is privately or publicly owned.

3102(aa) **RAMP.** See "pedestrian ramp" or "curb ramp."

3102(bb) **SLOPE** is, for the purpose of privately-funded covered multifamily buildings of three or more dwelling units, the relative steepness of the land between two points and is calculated as follows: The horizontal distance and elevation change between the two points (e.g., an entrance and a passenger loading zone) are determined from a topographical map. The difference in elevation is divided by the distance and the resulting fraction is multiplied by 100 to obtain the percentage. For example, if a principal entrance is 10 feet from a passenger loading zone, and the principal entrance is raised 1 foot higher than the passenger loading zone, then the slope is  $1/10 \times 100 = 10$  percent.

- 3102(cc) **TOWNHOUSE** is a multistory dwelling unit.
- 3102(dd) **VEHICULAR OR PEDESTRIAN ARRIVAL POINTS** are public or resident parking areas, public transportation stops, passenger loading zones, and public streets or sidewalks.
- 3102(ee) **WHEELCHAIR** is a chair mounted on wheels to be propelled by its occupant manually or with the aid of electric power, of a size and configuration conforming to the recognized standard models of the trade.
- 3102(ff) **WHEELCHAIR OCCUPANT OR WHEELCHAIR USER** is an individual who, due to a physical impairment or disability, utilizes a wheelchair for mobility.

### ***BUILDING ACCESSIBILITY***

- 3103(a.1) **Where Required. 1. General.** Accessibility to buildings or portions of buildings shall be provided for all occupancy classifications except as modified by this chapter.
- 3103(a.1)7.1 **Group M Occupancies. A.** Group M, Division 1, private garages which are accessory to dwelling units required to be adaptable shall be accessible.
- EXCEPTION:** A private garage which serve a privately-funded single dwelling unit is an accessible garage if the person with a disability can exit the dwelling unit's accessible entry door and enter the garage from the driveway.
- 3103(a.1)8.1 **Group R Occupancies.** In California, Group R Occupancies shall be accessible as provided in this chapter. Public-use and common-use areas serving adaptable dwelling units shall be accessible.
- NOTE:** Exceptions 1 through 4 do not apply.
- EXCEPTION 6:** Multistory-dwelling units in nonelevator buildings are not subject to these requirements because, in such cases, there is no ground-floor unit.
- 3103.1(a)8C(5)a. **Door Signal Devices.** Every primary entrance to a dwelling unit in buildings containing three or more dwellings units shall be provided with a door buzzer, bell, chime or equivalent installation, mounted a maximum of 48 inches above the floor, connected to permanent wiring.
- A-3103(a)2.D.(3)d. **Participation Areas. d.** Swimming pool deck areas must be accessible and an assisting device provided to assist persons with disabilities in gaining entry into the pool.

3103.1(b)1.1

**Design and Construction. 1. General.** When accessibility is required by this chapter, it shall be designed and constructed as provided in Chapters 31, 33 and 51.

3103.1(b)2.1

**Accessible Route of Travel.**

A. When a building, or portion of a building, is required to be accessible or adaptable, an accessible route of travel shall be provided to all portions of the building, to accessible building entrances and between the building and the public way. Except within an individual dwelling unit, an accessible route of travel shall not pass through kitchens, storage rooms, rest rooms, closets or other spaces used for similar purposes. At least one accessible route within the boundary of the site shall be provided from public transportation stops, accessible parking and accessible passenger loading zones, and public streets or sidewalks to the accessible building entrance they serve. The accessible route shall, to the maximum extent feasible, coincide with the route for the general public. At least one accessible route shall connect accessible buildings, facilities, elements and spaces that are on the same site. At least one accessible route shall connect accessible building or facility entrances with all accessible spaces and elements and with all accessible dwelling units within the building or facility. An accessible route shall connect at least one accessible entrance of each accessible dwelling unit with those exterior and interior spaces and facilities that serve the accessible dwelling unit.

B. Where more than one route of travel is provided, all routes shall be accessible.

**Exception:** Where an elevator is provided for vertical access, only one elevator is required. Where more than one elevator is provided, all elevators shall be accessible.

C. All walks, halls, corridors, aisles, and other spaces that are part of an accessible route shall provide a minimum clear width of 48 inches except at doors.

**EXCEPTION:** Privately-funded covered multifamily dwelling units shall provide a minimum clear width of 36 inches, except at doors.

D. Sidewalks shall be a minimum of 48 inches in clear width.

**EXCEPTION:** For sidewalks serving individual dwelling units in privately-funded covered multifamily buildings see Section 3324(a)3, Exception 2.

E. When the first floor containing dwelling units is a floor above grade, all units must be served by an accessible route.



**EXCEPTION:** In multistory dwelling units, i.e., townhouse-type construction, access is not required for buildings without elevators. In multistory dwelling units in buildings with elevators, the story of the unit that is served by the building elevator is the primary entry to the unit. The primary floor shall contain a bathroom or powder room usable to a person in a wheelchair.

E.1 Access shall be provided to elements listed in Section A-3103(a)2.D.(3)d, participation areas.

F. Walks, halls, corridors, passageways, aisles, or other circulation spaces shall have 80 inches minimum clear headroom. If vertical clearance of an area adjoining an accessible route is reduced to less than 80 inches nominal dimension, a guardrail or other barrier having its leading edge at or below 27 inches above the finished floor shall be provided.

G. If an accessible route has changes in level greater than 1/2 inch, then a curb ramp, ramp, elevator, or platform lift shall be provided. Stairs shall not be part of an accessible route.

H. Accessible routes serving any accessible space or element shall also serve as a means of egress for emergencies or connect to an accessible place of refuge. Such accessible routes and places of refuge shall comply with the requirements established by the enforcement authority having jurisdiction.

3103.1(b)3.1

**Primary Entry Access.** Covered multifamily buildings shall comply with Table 31-6.

**A. Separate Ground-Floor Unit Entrances.** When a ground floor unit of a building has a separate entrance, each such ground-floor unit shall be served by an accessible route, except for any unit where the terrain or unusual characteristics of the site prohibit the provision of an accessible route to the entrance of that unit.

**B. Multiple Entrances.** Only one entrance to privately-funded multifamily buildings is required to be accessible to any one ground floor of a building, except in cases where an individual dwelling unit has a separate exterior entrance or where the building contains clusters of dwelling units with each cluster sharing a different exterior entrance. In these cases, more than one entrance may be required to be accessible, as determined by analysis of the site. In every case, the accessible entrance shall be on an accessible route to the covered dwelling units it serves.

C. **Site Impracticality.** Covered multifamily dwellings with elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route, regardless of terrain or unusual characteristics of the site. Covered multifamily dwellings without elevators shall be designed and constructed to provide at least one accessible entrance on an accessible route unless terrain or unusual characteristics of the site prevent an accessible route based on the conditions listed below.

D. Regardless of site considerations described in Table 31-6, an accessible entrance on an accessible route is practical when there is an elevator connecting the parking area with the dwelling units on a ground floor. (In this case, those dwelling units on the ground floor served by an elevator, and at least one of each type of public- and common-use areas, would be subject to these requirements.)

E. If the building elevator is provided as a means of access to dwelling units other than dwelling units on a ground floor, then the building is an elevator building which is a covered multifamily dwelling, and the elevator in that building must provide accessibility to all dwelling units in the building, regardless of the slope of the natural terrain; or

F. An elevated walkway is planned between a building entrance and a vehicular or pedestrian arrival point, and the planned walkway has a slope no greater than 10 percent (1:10).

G. If the slope of the finished grade between covered multifamily dwellings and a public- or common-use facility (including parking) exceeds 1:12, or where other physical barriers (natural or manmade) or legal restrictions, all of which are outside the control of the owner, prevent the installation of an accessible pedestrian route, an acceptable alternative is to provide access via a vehicular route, provided necessary site provisions such as parking spaces and curb ramps are provided at the public- or common-use facility.

3103.1(b)4.1

**Signs.** Use Section 3106(c).

3103.1(b)5.1

**Adaptable Dwelling Units.** Dwelling units shall be considered adaptable when they comply with the appropriate provisions of adaptability contained in Section 3105 and Chapter 33.

## ***FACILITY ACCESSIBILITY***

3105(a.1)

**General.** When buildings are required to be accessible, building facilities shall be accessible as provided in this section. Where specific floors of a building are required to be accessible, the requirements shall apply only to the facilities located on accessible floors. Doors and openings shall comply with the requirements of Chapter 33.

**EXCEPTION:** In privately-funded covered multifamily dwelling units, except for primary entrance and required exits, doors and openings within units shall provide a minimum of 32 inches nominal clear space, measured between the face of the door and the stop, when the door is in the 90-degree open position to permit the passage of a disabled person in a wheelchair. A 34-inch door is acceptable. The nominal 32-inch clear opening provided by a standard 6-foot sliding patio door assembly is acceptable. Site access to the primary entry shall be as provided for in this section.

3105(b.1)

### **Bathing and Toilet Facilities.**

1. Bathing Facilities. See Tables 3105.1-1 and 3105.1-2 for complying bathrooms.
2. Only one bathroom in privately-funded accessible dwelling units need comply with the requirements for the physically disabled.
3. If a developer desires to provide requirements for the physically disabled in all bathrooms, use Table 3105.1-1.
4. If a developer desires to provide requirements for the physically disabled in only one bathroom, use Table 3105.1-2.

TABLE 3105.1-1-1

USE THIS TABLE WHEN ALL BATHROOMS ARE COMPLYING BATHROOMS

1. Bathroom entrance doorways shall have an 18-inch clear space to the side of the strike edge of the door on the swing side of the door.
2. Sufficient maneuvering space shall be provided for a person using a wheelchair or other mobility aid to enter and close the door, use the fixtures, reopen the door and exit. Doors may swing into the clear space at any fixture if the maneuvering space is provided. Maneuvering spaces may include any kneespace or toespace available below bathroom fixtures.
3. Where the door swings into the bathroom, there shall be a clear space (approximately 30 inches by 48 inches) within the room to position a wheelchair or other mobility aid clear of the path of the door as it is closed and to permit use of fixtures.
4. There shall be a minimum clear space 48 inches parallel by 30 inches perpendicular to the side of a bathtub or bathtub-shower combination (measured from the foot of the bathtub) to provide for the maneuvering of a wheelchair and transfer to and from the bathing facilities, which may include the maneuverable area under the lavatory.  
**EXCEPTION:** Prior to July 1, 1994, condominium dwelling units may provide a minimum clear space 30 inches parallel by 48 inches perpendicular to the side of a bathtub or bathtub-shower combination.
- 4.1 A shower spray unit is not required in bathtubs.
5. When a shower stall is provided in a privately-funded accessible dwelling unit, at least one shower stall shall measure at least 42 inches wide by 48 inches deep with an entrance opening of at least 36 inches. When a threshold (a recessed drop) is used, it shall be a maximum of 1/2 inch in height and have a beveled or sloped angle not exceeding 45 percent from the horizontal. Maximum slope of the shower floor shall be 1/2 inch per foot in any direction and shall slope toward the rear to a drain located within 6 inches of the rear wall. The floor surfaces shall be of Carborundum or grit-faced tile or of material providing equivalent slip resistance.

TABLE 3105.1-1 CONTINUED

Doors and panels of shower and bathtub enclosures shall be substantially constructed from approved, shatter-resistant materials. Hinged shower doors shall open outward. Glazing used in doors and panels of shower and bathtub enclosures shall be fully tempered, laminated safety glass or approved plastic. When glass is used, it shall have minimum thickness of not less than 1/8 inch when fully tempered, or 1/4 inch when laminated, and shall pass the test requirements of U.B.C. Standard No. 54-2. Plastics used in doors and panels of showers and bathtub enclosures shall be of a shatter-resistant type.

6. Walls must be reinforced to support grab bars as required by Section 3105(b.1)4.1.
7. Space requirements for the installation of water closets shall be as specified in Section 3105(b.1)2.1.
8. Structural reinforcements for future grab bar installation shall be as specified in Section 3105(b.1)4.1.

If Table 3105.1-2 is used, all other bathrooms and powder rooms within the dwelling unit shall be on an accessible route with usable entry doors.

TABLE 3105.1-2

USE THIS TABLE WHEN ONLY ONE COMPLYING BATHROOM IS PROVIDED

1. Bathroom entrance doorways shall have an 18-inch clear space to the side of the strike edge of the door on the swing side of the door.
2. Sufficient maneuvering space shall be provided for a person using a wheelchair or other mobility aid to enter and close the door, use the fixtures, reopen the door and exit. Doors may swing into the clear space at any fixture if the maneuvering space is provided. Maneuvering spaces may include any kneespace or toespace available below bathroom fixtures.
3. Where the door swings into the bathroom, there shall be a clear space (approximately 30 inches by 48 inches) within the room to position a wheelchair or other mobility aid clear of the path of the door as it is closed and to permit use of fixtures.
4. Where the door swings out, a clear space is provided within the bathroom for a person using a wheelchair or other mobility aid to position the wheelchair such that the person is allowed use of fixtures. There also shall be clear space to allow persons using wheelchairs to reopen the door to exit.
5. There shall be a minimum clear space 48 inches parallel by 30 inches perpendicular to the side of a bathtub or bathtub-shower combination (measured from the foot of the bathtub) to provide for the maneuvering of a wheelchair and transfer to and from the bathing facilities, which may include the maneuverable area under the lavatory.
- 5.1 A shower spray unit is not required in bathtubs.
6. When a shower stall is provided in a privately-funded accessible dwelling unit, at least one shower stall shall measure at least 42 inches wide by 48 inches deep with an entrance opening of at least 36 inches. When a threshold (a recessed drop) is used, it shall be a maximum of 1/2 inch in height and have a beveled or sloped angle not exceeding 45 percent from the horizontal. Maximum slope of the shower floor shall be 1/2 inch per foot in any direction and shall slope toward the rear to a drain located within 6 inches of the rear wall. The floor surfaces shall be of Carborundum or grit-faced tile or of material providing equivalent slip resistance.

**TABLE 3105.1-2 CONTINUED**

Doors and panels of shower and bathtub enclosures shall be substantially constructed from approved, shatter-resistant materials. Hinged shower doors shall open outward. Glazing used in doors and panels of shower and bathtub enclosures shall be fully tempered, laminated safety glass or approved plastic. When glass is used, it shall have minimum thickness of not less than 1/8 inch when fully tempered, or 1/4 inch when laminated, and shall pass the test requirements of U.B.C. Standard No. 54-2. Plastics used in doors and panels of showers and bathtub enclosures shall be of a shatter-resistant type.

7. Walls must be reinforced to support grab bars as required by Section 3105(b.1)4.1.
8. Space requirements for the installation of water closets shall be as specified in Section 3105(b.1)2.1.
9. Structural reinforcements for future grab bar installation shall be as specified in Section 3105(b.1)4.1.
10. When both tub and shower fixtures are provided in the bathroom, at least one shall be made accessible. When two or more lavatories in a bathroom are provided, at least one shall be made accessible.
11. Toilets shall be located within bathrooms in a manner that permit a grab bar to be installed on one side of the fixture. In locations where toilets are adjacent to walls or bathtubs, the center line of the fixture shall be a minimum of 1 foot 6 inches from the obstacle. The other (nongrab bar) side of the toilet fixture shall be a minimum of 1 foot 6 inches from the finished surface of adjoining walls, vanities or from the edge of a lavatory.
12. Vanities and lavatories shall be installed with the center line of the fixture a minimum of 1 foot 6 inches horizontally from an adjoining wall or fixture. The top of the fixture rim shall be a maximum of 2 feet 10 inches above the finished floor. If kneespace is provided below the vanity, the bottom of the apron shall be at least 2 feet 5 inches above the floor. If provided, full kneespace shall be at least 1 foot 5 inches deep.

Cabinets under lavatories are acceptable provided the bathroom has space to allow a parallel approach by a person in a wheelchair. If a parallel approach is not possible within the space, any cabinets provided would have to be removable to afford the necessary knee clearance for forward approach.



3105(b.1)2.1

**Water Closets.** Water closets in bathrooms required to be accessible shall conform to the provisions of Section 1502, California Plumbing Code, Title 24, Part 5, California Code of Regulations. The water closet shall be located in a space a minimum of 36 inches in clear width with 48 inches minimum clear space provided in front of the water closet. This space may include maneuverable space under a lavatory, if provided, arranged so as not to impede access. The minimum height of water closet seats shall be 15 inches above the floor.

**EXCEPTION:** In privately-funded multifamily dwelling units, the water closet may be located in a space 48 inches in clear width with 36 inches of clear space provided in front of the water closet.

3105(b.1)3.1

**Lavatories, Mirrors and Towel Fixtures.** At least one accessible lavatory shall be provided within any toilet facility. Where mirrors and towel fixtures are provided at least one of each shall be accessible.

3105(b.1)4.1

**Fixtures In Adaptable Dwelling Units.** Grab bars need not be installed in either a bathing or toilet facility within an adaptable dwelling unit provided all structural reinforcements for future grab bar installation are provided in the appropriate locations in the adjoining walls. The reinforcement shall be of sufficient length to permit the installation of grab bars as specified. The reinforced wall shall be capable of supporting a load of at least 250 pounds.

**A. Toilet.** Where the toilet is not placed adjacent to a side wall, the bathroom shall have provisions for installation of floor-mounted, foldaway or similar alternative grab bars. Where the powder room (a room with a toilet and sink) is the only toilet facility located on an accessible level of a multistory dwelling unit, it shall comply with the requirement for reinforced walls for grab bars.

Where the toilet is placed adjacent to a side wall, reinforcement shall be installed on both sides or one side and the back. If reinforcement is installed at the back it shall be installed between 32 inches and 38 inches above the floor. The grab bar reinforcement shall be a minimum of 6 inches nominal in height. The backing shall be a minimum of 40 inches in length.

Reinforcement installed at the side of the toilet shall be installed 32 inches to 38 inches above the floor. The reinforcement shall be installed a maximum of 12 inches from the rear wall and shall extend a minimum of 26 inches in front of the water closet stool. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

**B. Bathtub.** A bathtub may be installed without surrounding walls provided reinforced areas are provided for installation of floor-mounted grab bars.

Where a tub is installed with surrounding walls, grab bar reinforcement shall be installed on each end of the bathtub, 32 inches to 38 inches above the floor, extending a minimum of 24 inches aligned with the front edge of the bathtub towards the back wall of the bathtub. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

Grab bar reinforcement shall be installed on the back wall of the bathtub commencing a maximum of 6 inches above the bathtub rim and extending upward to a point a minimum of 38 inches above the floor. The grab bar backing shall be installed horizontally a length to permit the installation of a 48-inch grab bar with each end a maximum of 6 inches from the end walls of the bathtub. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

**C. Shower Stalls.** Glass-walled shower stalls shall provide reinforcement for installation of floor-mounted grab bars. Reinforcement for installation of ceiling-mounted grab bars is permitted.

Grab bar reinforcement shall be installed continuous in the walls of adaptable showers 32 inches to 38 inches above the floor. The grab bar reinforcement shall be a minimum of 6 inches nominal in height.

3105(c.1) **Elevators.** Elevators shall be accessible.

**EXCEPTION:** Private elevators serving only one dwelling unit.

Elevators required to be accessible shall be designed and constructed to comply with Section 5103(d.1).

3105(d.1)1. **Other Building Components. Water/Drinking fountains.** On any floor where water/drinking fountains are provided, at least one fountain shall be accessible. Drinking fountains shall comply with the provisions of Section 1507, California Plumbing Code, Title 24, Part 5, California Code of Regulations.

3105(d.1)2.1 **Telephones.** On floors where public telephones are provided, at least one telephone shall be accessible. On any floor where two or more banks of multiple telephones are provided, at least one telephone in each bank shall be accessible.

**A. General.** If public telephones are provided, they shall comply with this section.

**B. Clear Floor Ground Space.** A clear floor or ground space at least 30 inches by 48 inches that allows either a forward or parallel approach by a person using a wheelchair shall be provided at telephones.

**C. Size and Approach.** The minimum clear floor ground space required to accommodate a single, stationary wheelchair and occupant is 30 inches by 48 inches. The minimum clear floor or ground space for wheelchairs may be positioned for forward or parallel approach to an object. Clear floor or ground space for wheelchairs may be part of the knee space required under some objects.

**D. Relationship of Maneuvering Clearances to Wheelchair Spaces.** One full unobstructed side of the clear floor or ground space for a wheelchair shall adjoin another wheelchair clear floor space. If a clear floor space is located in an alcove or otherwise confined on all or part of three sides, additional maneuvering clearances shall be provided.

**E. Floor Surfaces of Wheelchair Spaces.** Floor surfaces of wheelchair spaces shall conform to Figure 31-5D. Bases, enclosures and fixed seats shall not impede approaches to telephones by people who use wheelchairs.

**F. Mounting Height.** The highest operable part of the telephone shall be within the reach ranges specified in Figures 31-5 C & D. Telephones mounted diagonally in a corner that require wheelchair users to reach diagonally shall have the highest operable part no higher than 54 inches above the floor.

**G. Enclosures.** If telephone enclosures are provided, they may overhang the clear floor space required in subsections B., C., and D. with the following limits:

(i) **Side Reach Possible.** The overhang shall be no greater than 19 inches. The height of the lowest overhanging part shall be equal to or greater than 27 inches.

(ii) **Full-Height Enclosures.** Entrances to full-height enclosures shall be 30 inches minimum.

(iii) **Forward Reach Required.** If the overhang is greater than 12 inches, then the clear width of the enclosure shall be 30 inches minimum; If the clear width of the enclosure is less than 30 inches, then the height of the lowest overhanging part shall be equal to or greater than 27 inches.

**H. Equipment for Hearing Impaired People.** Telephones shall be equipped with a receiver that generates a magnetic field in the area of the receiver cap. A reasonable number of the public telephones provided, but always at least one on each floor or in each bank, whichever is more, in a building or facility, shall be equipped with a volume control. Such telephones shall be capable of a minimum of 12 dba and a maximum of 18 dba above normal. If an automatic reset is provided, 18 dba may be exceeded. Public telephones with volume control shall be hearing aid compatible and shall be identified by a sign containing a depiction of a telephone handset with radiating sound waves.

**I. Text Telephones.** If a total of four or more public pay telephones are provided at the interior and exterior of a site, and if at least one of the total is in an interior location, then at least one interior public text telephone shall be provided.

**J. Controls.** Telephones shall have push-button controls where service for such equipment is available.

**K. Cord Length.** The cord from the telephone to the handset shall be at least 29 inches long.

**L. Telephone Books.** If telephone books are provided, they shall be located in a position that complies with the reach ranges in Figures 31-5 C and D.

3105(d.1)3.1

**Kitchens.** Kitchens within adaptable dwelling units shall be accessible. Kitchens in covered multifamily dwelling units that are required to provide access to persons with physical disabilities shall have a clear floor space at least 30 inches by 48 inches that allows a parallel approach by a person in a wheelchair at the range or cooktop and either a parallel or forward approach at the oven, dishwasher, refrigerator/freezer and trash compactor.

**EXCEPTION:** In privately-funded multifamily dwelling units containing U-shaped kitchens with a range or cooktop at the base of the U, a 60-inch clear width between cabinet fronts, appliance or fixtures shall be provided to allow a parallel approach, or base cabinets shall be removable at that location to a height of 27 inches above the floor to allow knee space for a forward approach. Base cabinets directly under kitchen sink counter area, including toeboard and shelving, shall be removable, without the use of special tools or knowledge, to provide clearance for a wheelchair. Finished flooring shall be installed on the floor beneath such countertop. A minimum clear space of 48 inches shall be provided for all other kitchen designs.

**A. Kitchen Sink Faucet Controls.** Kitchen sink faucet controls shall comply with the provisions of Section 1508, California Plumbing Code, Title 24, Part 5, California Code of Regulations.

**B. Countertops.** A minimum linear length of 30 inches of countertop shall be provided for the kitchen sink, and a minimum linear length of 30 inches of countertop shall be provided for a work surface, both of which shall be designed to enable repositioning to a minimum height of 28 inches. The sink and work surface may be a single integral unit, or be separate components. The base cabinets directly under sink and work surface counter areas which are designed for repositioning shall be removable to provide clearance for a wheelchair.

**EXCEPTION 1:** Only 5 percent of the privately-funded apartment house dwelling units, that are required to be accessible, are required to comply with the requirements for repositionable countertops. All other privately-funded covered multifamily dwelling units are exempt.

**EXCEPTION 2:** Stone, cultured stone and tiled countertops may be used without meeting the repositioning requirements.

**EXCEPTION 3:** In privately-funded apartment houses, two 15-inch minimum width breadboards may be provided in lieu of the required 30 inches of countertop work surface.

The sides and back of adjacent cabinets, which may become exposed to moisture or food handling when a countertop is lowered, shall be constructed of durable, nonabsorbent materials appropriate for such uses. Finished flooring shall be installed on the floor beneath such countertop.

**C. Lower Shelving.** Lower shelving and/or drawer space shall be provided in the kitchen at a height of no more than 48 inches.

**D. Base Cabinets.** In dwelling units required to be accessible, base cabinets directly under the kitchen sink counter area, including toeboard and shelving, shall be removable without the use of specialized tools or specialized knowledge to provide clearance for a wheelchair. Finished flooring shall be provided on the floor beneath the countertop.

3105(d.1)4.1

**Swimming pools.** Swimming pools required to be accessible to persons with physical disabilities shall comply with the provisions of Section A-3103(a)2.D.(3)d.

- 3105(e.1)           **Signs.** All accessible toilet and bathing facilities shall be identified by the international symbol of accessibility. Signs need not be provided for facilities within an adaptable dwelling unit, or within an accessible patient or guest room.
- 3105(f)           **Laundry Rooms.** If clothes-washing machines and clothes dryers are provided in covered multifamily buildings or dwelling units, at least one of each type of appliance shall be provided in each laundry area, except that laundry rooms serving multifamily dwellings are not required to have front-loading clothes washers. Where front-loading clothes washers are not provided, management shall provide assistive devices, on request, if necessary to permit a resident to use a top-loading clothes washer.
- 3105(g)           **Flooring.** If carpet or carpet tile is used in a common-use area on a ground or floor surface, it shall have firm backing or no backing. The maximum pile height shall be 1/2 inch. Exposed edges of carpet shall be fastened to floor surfaces and have trim along the entire length of the exposed edge. Carpet edge trim shall comply with the requirements for changes in level.

## ***EXTERIOR ROUTES OF TRAVEL***

- 3106(a)           **General.** When more than one building or facility is located on a site, accessible routes of travel shall be provided between buildings and accessible site facilities. The accessible route of travel shall be the most practical direct route between accessible building entrances, accessible site facilities, and the accessible entrance to the site.
- 3106(b)           **Design and Construction.** Use the provisions of this Chapter and Chapter 33.
- 3106(c)           **Signs.** At every primary public entrance and at every major junction along or leading to an accessible route of travel, there shall be a sign displaying the international symbol of accessibility. Signs shall indicate the direction to accessible building entrances and facilities.
- 3106(d)           **Curb Ramps. 1. General.** Curb ramps shall be constructed at each corner of street intersections and where a pedestrian way crosses a curb. The preferred and recommended location for curb ramps is in the center of the crosswalk of each street corner. Where it is necessary to locate a curb ramp in the center of the curb return and the street surfaces are marked to identify pedestrian crosswalks, the lower end of the curb ramp shall terminate within such crosswalk areas. Curb ramps do not require handrails.

2. **Width of Curb Ramps.** Curb ramps shall be a minimum of 4 feet in width and shall lie, generally, in a single sloped plane, with a minimum of surface warping and cross slope.

3. **Slope of Curb Ramps.** The slope of curb ramps shall not exceed 1 vertical to 12 horizontal (8.33 percent). Transitions from ramps to walks, gutters, or streets shall be flush and free of abrupt changes, except that curb ramps shall comply with subparagraph 5 below. The slope of the fanned or flared sides of curb ramps shall not exceed 1 vertical to 8 horizontal (12 percent). If a curb ramp is located where pedestrians must walk across the ramp, then it shall have flared sides; the maximum slope of the flare shall be 1:10 (10 percent). Curb ramps with returned curbs may be used where pedestrians would not normally walk across the ramp.

4. **Level Landing.** A level landing 4 feet deep shall be provided at the upper end of each curb ramp over its full width to permit safe egress from the ramp surface, or the slope of the fanned or flared sides of the curb ramp shall not exceed one vertical to 12 horizontal (8.33 percent).

5. **Beveled Lip.** The lower end of each curb ramp shall have a 1/2-inch lip beveled at 45 degrees.

6. **Finish.** The surface of each curb ramp and its flared sides shall be stable, firm and slip-resistant and shall be of contrasting finish from that of the adjacent sidewalk.

7. **Detectable Warnings.** A curb ramp shall have a detectable warning that extends the full width and depth of the curb ramp when the ramp slope is less than 1 vertical to 15 horizontal (6.66 percent). Detectable warnings shall consist of raised truncated domes with a diameter of nominal 0.9 inches, a height of nominal 0.2 inches and a center-to-center spacing of nominal 2.35 inches and shall contrast visually with adjoining surfaces, either light-on-dark or dark-on-light. Warning surfaces shall be of the color yellow conforming to Federal Color No. 33538, as shown in Table V of Standard No. 595A. Where the color value contrast between the yellow warning and the main walking surface is less than 70 percent, a 1-inch-wide black strip shall separate the yellow warning from the main walking surface. Contrast shall be determined by:

Contrast=[(B1-B2/B1) X 100%] where B1=light reflectance value (LRV) of the lighter area and B2 = light reflectance value (LRV) of the darker area]. The material used to provide contrast shall be an integral part of the walking surface. The domes may be constructed in a variety of methods, including case in place or stamped, or they may be part of a prefabricated surface treatment.

8. **Obstructions.** Curb ramps shall be located or protected to prevent their obstruction by parked cars. Built-up curb ramps shall be located so that they do not project into vehicular traffic lanes.

9. **Diagonal Curb Ramps.** If diagonal (or corner type) curb ramps have returned curbs or other well-defined edges, such edges shall be parallel to the direction of pedestrian flow. The bottom of diagonal curb ramps shall have 48 inches minimum clear space as shown in fig. 71-4A(c) and (d). If diagonal curb ramps are provided at marked crossings, the 48-inch clear space shall be within the markings (see Figures 71-4A(c) and (d)). If diagonal curb ramps have flared sides, they shall also have at least a 24-inch-long segment of straight curb located on each side of the curb ramp and within the marked crossing (see Figure 71-4A(c)).

## ***PARKING FACILITIES***

3107(a)

**Accessible Parking Required.** Accessible parking spaces shall be located on the shortest possible accessible route of travel to an accessible building entrance. In facilities with multiple accessible building entrances with adjacent parking, accessible parking spaces shall be dispersed and located near the accessible entrances. When practical, the accessible route of travel shall not cross lanes for vehicular traffic. When crossing vehicle traffic lanes is necessary, the route of travel shall be designated and marked as a crosswalk.

Each lot or parking structure where parking is provided for clients, guests, employees or residents shall provide accessible parking as required by this section. In separate parking structures or lots that do not serve a particular building, parking spaces for physically disabled people shall be located on the shortest possible circulation route to an accessible pedestrian entrance of the parking facility.

If assigned parking is provided at privately-funded multifamily building sites, designated accessible parking at the dwelling unit shall be provided upon request of residents with physical disabilities on the same terms and with the full range of choices (e.g., surface parking or garage) provided for other residents, with accessible parking on a route accessible to wheelchairs for at least 2 percent of the covered dwelling units. Signage is not required. When visitor parking is provided, a minimum of 5 percent parking shall provide access to grade-level entrances of multifamily dwellings and accessible parking at facilities (e.g., swimming pools) that serve accessible buildings. Visitor parking spaces shall be provided with signage. Such sign shall not be blocked from view by a vehicle parked in the space.



3107(b) **Parking Structures.** All entrances to and vertical clearances within parking structures shall have a minimum vertical clearance of 8 feet 2 inches where required for accessibility to parking spaces for persons with physical disabilities.

**EXCEPTION:** Privately-funded garages are exempt from the 8-foot 2-inch minimum height requirement. Covered parking spaces and parking spaces in common areas shall provide a minimum of 8 feet 2 inches vertical clearance.

3107(b.1) Passenger parking spaces shall not be considered to be passenger loading zones.

3107(c) **Design and Construction.** When accessible parking spaces are required by this section, they shall be designed and constructed in accordance with the U.B.C.

3107(d) **Parking Space Size.** Parking spaces for persons with physical disabilities shall be located on the shortest possible route to an accessible entrance and shall be sized as follows:

1. Where single spaces are provided, they shall be 14 feet wide and outlined to provide a 9-foot parking area and a 5-foot loading and unloading access aisle on the passenger side of the vehicle. When more than one space is provided in lieu of providing a 14-foot-wide space for each parking space, two spaces can be provided within a 23-foot-wide area lined to provide a 9-foot parking area on each side of a 5-foot loading and unloading access aisle in the center. The minimum length of each parking space shall be 18 feet. An additional sign "Van-Accessible" shall be mounted below the symbol of accessibility.

**NOTE:** See Figure No. 71-1A.

2. One in every eight accessible spaces, but not less than one, shall be served by an access aisle 96 inches wide minimum, and shall be designated van accessible as required by 3107(d)1. All such spaces may be grouped on one level of a parking structure.

3. **Arrangement of Parking Spaces.** In each parking area, a bumper or curb shall be provided and located to prevent encroachment of cars over the required width of walkways. Also, the space shall be so located that people with physical disabilities are not compelled to wheel or walk behind parked cars other than their own. Pedestrian ways which are accessible to people with physical disabilities shall be provided from each such parking space to related facilities, including curb cuts or ramps as needed. Ramps shall not encroach into any parking space.

**EXCEPTION 1:** Ramps located at the front of parking spaces for people with physical disabilities may encroach into the length of such spaces when such encroachment does not limit a person with physical disabilities' capability to leave or enter their vehicle, thus providing equivalent facilitation.

**NOTE:** See Figures Nos. 71-1A, 71-1B and 71-1C.

**EXCEPTION 3:** Parking spaces may be provided which would require a person with physical disabilities to wheel or walk behind other than accessible parking spaces when the enforcing agency determines that compliance with these regulations or providing equivalent facilitation would create an unreasonable hardship.

**4. Slope of Parking Spaces.** Surface slopes of accessible parking spaces shall be the minimum possible and shall not exceed 1/4 inch per foot (2.083 percent gradient) in any direction.

3107(e)

**Signs.** Every parking space required by this section shall be identified by a sign, centered between 3 feet and 5 feet above the parking surface, at the head of the parking space. The sign shall include the international symbol of accessibility and state RESERVED, or equivalent language.

**NOTE:** For parking spaces at privately-funded covered multifamily buildings use Section 3107(a).

An additional sign shall also be posted in a conspicuous place at each entrance to off-street parking facilities or immediately adjacent to and visible from each stall or space. The sign shall be not less than 17 inches by 22 inches in size with lettering not less than 1 inch in height, which clearly and conspicuously states the following:

**"Unauthorized vehicles parked in designated handicapped spaces not displaying distinguishing placards or license plates issued for physically disabled persons may be towed away at owner's expense. Towed vehicles may be reclaimed at -----or by telephoning-----"**

In addition to the above requirements, the surface of each accessible parking space or stall shall have a surface identification duplicating either of the following schemes:

1. By outlining or painting the stall or space in blue and outlining on the ground in the stall or space in white or suitable contrasting color a profile view depicting a wheelchair with occupant; or,

2. By outlining a profile view of a wheelchair with occupant in white on blue background. The profile view shall be located so that it is visible to a traffic enforcement officer when a vehicle is properly parked in the space and shall be 36 inches high by 36 inches wide.

**NOTE:** See Figure 71-1A

**TABLE NO. 31-6**  
**REQUIREMENTS FOR ACCESSIBLE ROUTES IN**  
**COVERED BUILDINGS WITHOUT AN ELEVATOR**

(Provisions below do not apply to multiple-story dwelling units in privately-funded nonelevator buildings, i.e., townhouses)

<p><b>IF SINGLE BUILDING WITH COMMON (LOBBY) ENTRANCE</b></p> <p><b>USE ONLY THE FOLLOWING STEPS FOR DETERMINING REQUIRED ACCESS TO ADAPTABLE UNITS:</b></p> <ol style="list-style-type: none"> <li>1. All ground-floor units in nonelevator buildings must be adaptable and on an accessible route to comply with the requirements unless an accessible route is not required as determined by Test No. 1, Individual Building Test, or Test No. 3, Unusual Characteristics Test as described below. Twenty percent of the ground floor dwelling units that are not required to have an accessible route shall be adaptable. The remaining ground-floor dwelling units must comply with the features listed in Section 110(8) unless exempted by Test No. 3, Unusual Characteristics Test.</li> <li>2. You may use Individual Building Test No. 1 below only if site has terrain over 15 percent slope.</li> <li>3. You may use Unusual Characteristics Test No. 3, if applicable. See the test.</li> </ol>	<p><b>ALL OTHER SITES INCLUDING SINGLE BUILDING WITH MULTIPLE ENTRANCES</b></p> <p><b>USE ONLY THE FOLLOWING STEPS FOR DETERMINING REQUIRED ACCESS TO ADAPTABLE UNITS:</b></p> <ol style="list-style-type: none"> <li>1. All ground-floor units in nonelevator buildings must be adaptable and on an accessible route to comply with the requirements unless an accessible route is not required as determined by Test No. 1, Individual Building Test, or Test No. 2, Site Analysis Test, or Test No. 3, Unusual Characteristics Test as described below. A minimum of 20 percent of the ground-floor dwelling units are required to have an accessible route and shall be adaptable. The remaining ground-floor dwelling units must comply with the features listed in Section 110(8) unless exempted by Test No. 3, Unusual Characteristics Test.</li> <li>2. Use Individual Building Test No. 1 below only if site has terrain over 15 percent slope.</li> <li>3. Use Site Analysis Test No. 2 only if site has terrain over 10 percent slope.</li> <li>4. Use Unusual Characteristics Test No. 3, if applicable. See the test.</li> </ol>
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**PROVISIONS TO TESTS NOS. 1 AND 2.**

Where a building elevator is provided only as means of creating an accessible route to dwelling units on a ground floor, the building is not considered an elevator building for purposes of this code; hence, only the ground-floor dwelling units would be covered.

### TEST NO.1-INDIVIDUAL BUILDING TEST

It is not required by this code to provide an accessible route when the terrain of the site is such that:

- (A) The slopes of the undisturbed site measured between the planned entrance and all vehicular or pedestrian arrival points within 50 feet of the planned entrance exceed 15 percent; and
- (B) The slopes of the planned finished grade measured between the entrance and all vehicular or pedestrian arrival points within 50 feet of the planned entrance also exceed 15 percent.

If there are no vehicular or pedestrian arrival points within 50 feet of the planned entrance, the slope for the purposes of Test No. 1 will be measured to the closest vehicular or pedestrian arrival point.

For purposes of these requirements, vehicular or pedestrian arrival points include public or resident parking areas; public transportation stops; passenger loading zones; and public streets or sidewalks. To determine site impracticality, the slope would be measured at ground level from the point of the planned entrance on a straight line to (i) each vehicular or pedestrian arrival point that is within 50 feet of the planned entrance, or (ii) if there are no vehicular or pedestrian arrival points within the specified area, the vehicular or pedestrian arrival point closest to the planned entrance. In the case of sidewalks, the closest point to the entrance will be where a public sidewalk entering the site intersects with the walk to the entrance. In the case of resident parking areas, the closest point to the planned entrance will be measured from the entry point to the parking area that is located closest to the planned entrance.

### TEST NO. 2-SITE ANALYSIS TEST

For a site having multiple buildings, or a site with a single building with multiple entrances, it is not required to provide an accessible route under the following conditions:

- (A) Calculate the percentage of the total buildable area of the undisturbed site with a natural grade less than 10 percent slope. The analysis of the existing slope (before grading) shall be done on a topographic survey with 2-foot contour intervals with slope determination made between each successive interval. The accuracy of the slope analysis shall be certified by a licensed engineer, landscape architect, architect or surveyor.
- (B) Determine the requirement of providing an accessible route to planned multifamily dwellings based on the topography of the existing natural terrain. The minimum percentage of ground-floor units required on an accessible route shall equal the percentage of the total buildable area (not restricted-use areas) of the undisturbed site with an existing natural grade of less than 10 percent slope.
- (C) In addition to the percentage established in paragraph (B), all ground-floor units in a building, or ground-floor units served by a particular entrance, shall be made accessible if the entrance to the units is on an accessible route with a slope between the planned entrance and a pedestrian or vehicular arrival point not exceeding 8.33 percent.

### TEST NO. 3-UNUSUAL CHARACTERISTICS TEST

Unusual characteristics include sites located in a federally designated floodplain or coastal high-hazard area and sites subject to other similar requirements of law or code that the lowest floor or the lowest structural member of the lowest floor must be raised to a specified level at or above the base flood elevation. An accessible route to a building entrance is impractical due to unusual characteristics of the site when:

- (A) The original site characteristics result in a difference in finished grade elevation exceeding 30 inches and 10 percent measured between an entrance and all vehicular or pedestrian arrival points within 50 feet of the planned entrance; or
- (B) If there are no vehicular or pedestrian arrival points within 50 feet of the planned entrance, the unusual characteristics result in a difference in finished grade elevation exceeding 30 inches and 10 percent measured between an entrance and the closest vehicular or pedestrian arrival point.

## CHAPTER 33 EXITS

- 3301(h)1. **Entrances.** All primary entrances to buildings and facilities shall be made accessible to people with physical disabilities.
- 3301(h)2. **Temporary Restrictions.** During periods of partial or restricted use of a building or facility, the entrances used for primary access shall be accessible to and usable by physically handicapped persons/people with physical disabilities.
- 3301(h)3. **Recessed Doormats.** Recessed doormats shall be adequately anchored to prevent interference with wheelchair traffic.
- 3304(c) **Type of Lock or Latch.** Exit doors shall be openable from the inside without the use of a key or any special knowledge or effort.

**EXCEPTION 2.** Exit doors from buildings or rooms, individual dwelling units; Group R, Division 3 congregate residences; and guest rooms of Group R Occupancies having an occupant load of 10 or less may be provided with a night latch, dead bolt or security chain, provided such devices are openable from the inside without the use of a key or tool, special knowledge or effort and mounted at a height not to exceed 48 inches above the finished floor.

Manually operated edge- or surface-mounted flush bolts and surface bolts are prohibited. When exit doors are used in pairs and approved automatic flush bolts are used, the door leaf having the automatic flush bolts shall have no doorknob or surface-mounted hardware. The unlatching of any leaf shall not require more than one operation.

- 3304(c) **EXCEPTION 1:** Group R, Division 3 Occupancies.
- 3304(c.1) Hand-activated door-opening hardware shall be centered between 30 inches and 44 inches above the floor. Latching and locking doors that are hand activated and which are in a path of travel, shall be operable with a single effort by lever-type hardware, panic bars, push-pull activating bars, or other hardware designed to provide passage without requiring the ability to grasp the opening hardware. Locked exit doors shall operate as above in egress direction. Doors to individual hotel or motel units shall operate similarly, except that when bolt and unlatching operation is key operated from corridor or exterior side of unit door, large bow keys 2 inches (full bow) or 1/4 inches (half bow) shall be provided in lieu of lever-type hardware on the corridor side. Separate dead-lock activation on room side of corridor doors in hotels or motels shall have lever handle or large thumb turn in an easily reached location.

3304(f) **Width and Heights. 1. Door Size.**

Every required exit doorway shall be of a size as to permit the installation of a door not less than 3 feet in width and not less than 6 feet, 8 inches in height. When installed in exit doorways, exit doors shall be capable of opening at least 90 degrees and shall be so mounted that the clear width of the exitway is not less than 32 inches. In computing the exit width, the net dimension of the exitway shall be used.

3304(i.1)1. **Thresholds.** The floor or landing shall not be more than 1/2 inch lower than the threshold of the doorway.

Change in level between 1/4 inch and 1/2 inch shall be beveled with a slope no greater than 1:2. Changes in level greater than 1/2 inch shall be accomplished by means of a ramp.

**NOTE:** See Section 3307.

**EXCEPTION 2.** At the primary entry door to dwelling units in covered multifamily buildings, with direct exterior access, outside landing surfaces constructed of impervious materials such as concrete, brick or flagstone, shall be no more than 1/2 inch below the floor level of the interior of the dwelling unit.

3304(i.1)2. **Level Floor or Landing.**

A. There shall be a level and clear area on each side of an exit door and 44 inches where the door swings away from the level and clear area. The level area shall have a length of at least 60 inches in the direction of door swing as measured at right angles to the plane of the door in its closed position.

**EXCEPTION 1.** In Group R, Division 3 Occupancies and within individual units of Group R, Division 1 Occupancies, a door may open on the top step of a flight of stairs or an exterior landing, provided the door does not swing over the top step or exterior landing and the landing is not more than 7 1/2 inches below the floor level.

**EXCEPTION 2.** In Group R, Division 3 Occupancies, screen doors and storm doors may swing over stairs or steps.

**EXCEPTION 3.** In Group R, Division 3 Occupancies and private garages and sheds where a door opens over a landing, the landing shall have a length equal to the width of the door.

B. The floor or landing on each side of an exit door shall be level. The level area shall have a length in the direction of door swing of at least 60 inches and the length opposite the direction of door swing of 44 inches as measured at right angles to the plane of the door in its closed position.

**EXCEPTION 1.** In Group R Occupancies, the level area shall have a length both in the direction of door swing and opposite the direction of door swing of 44 inches as measured at right angles to the plane of the door in its closed position.

**EXCEPTION 2.** In buildings containing covered multifamily dwelling units, the floor or landing immediately outside the entry may be sloped up to 1/8 inch per foot (12 inches) in the direction away from the primary entrance of the dwelling unit for drainage.

C. The width of the level area on the side to which the door swings shall extend 24 inches past the strike edge of the door for exterior doors and 18 inches past the strike edge for interior doors.

**Note:** See Tables 3105.1-1 and 3105.1-2 for bathrooms that are required to be accessible.

D. The space between two consecutive door openings in a vestibule, serving other than a required exit stairway shall provide a minimum of 48 inches of clear space from any door opening into such vestibule when the door is positioned at an angle of 90 degrees from its closed position. Doors in a series shall swing either in the same direction or away from the space between the doors.

3304(i.2)

**Hardware.**

1. Effort to operate doors. Maximum effort to operate doors shall not exceed 8 1/2 pounds for exterior doors and 5 pounds for interior doors, such pull or push effort being applied at right angles to hinged doors and at the center plane of sliding or folding doors. Compensating devices or automatic door operators may be utilized to meet the above standards. When fire doors are required, the maximum effort to operate the door may be increased not to exceed 15 pounds.

3304(i.3)

**Construction.**

The bottom 10 inches of all doors except automatic and sliding shall have a smooth, uninterrupted surface to allow the door to be opened by a wheelchair footrest without creating a trap or hazardous condition.

3305(b)

**Width 1. Corridor widths.** The minimum corridor width shall be determined as specified in Section 3303(b), but shall not be less than 44 inches, except as specified herein. Corridors serving an occupant load of 49 or less shall not be less than 36 inches in width. For special requirements for Groups E and I Occupancies, see Sections 3318 and 3320.

2. Corridors over 200 feet. Corridors that exceed 200 feet in length shall:

A. Have minimum clear width of 60 inches; or

B. Have, at a central location, a 60-inch by 60-inch-minimum wheelchair turning space or passing alcove; or



C. Have, at a central location, an intervening cross or tee corridor a minimum of 44 inches in width; or

D. Have, at a central location, an openable door.

3305(b)2.D. **EXCEPTION 3.** All corridors within privately-funded multifamily dwelling units shall be at least 36 inches wide.

3305(f) **Changes in Elevation.** When a corridor or exterior exit balcony is accessible to the handicapped, changes in elevation of the floor shall be made by means of a ramp, except as provided for door by Section 3304(i).

**EXCEPTION 1.** Changes in elevation in covered multifamily dwellings shall comply with this provision. Except as provided at the primary entrance, thresholds at exterior doors, including sliding door tracks, shall be no higher than 3/4 inch. Thresholds and changes in level at these locations shall be beveled with a slope no greater than 1:2.

**EXCEPTION 2.** Exterior deck, patio, or balcony surfaces shall be no more than 4 inches below the floor level of the interior of the dwelling unit. Change in level greater than 1/2 inch shall be accomplished by means of a ramp.

3306(i.1)1. **Required handrails.** Stairways shall have handrails on each side, and every stairway required to be more than 88 inches in width shall be provided with not less than one intermediate handrail for each 88 inches of required width. Intermediate handrails shall be spaced approximately equally across with the entire width of the stairway.

**Exceptions:** 1. Stairways 44 inches or less in width may have one handrail except that such stairways open on one or both sides shall have handrails provided on the open side or sides.

2. Stairways serving one individual dwelling unit in Group R, Division 1 or 3 Occupancies may have one handrail, except that stairways open on one or both sides shall have handrails on the open side or sides.

3. Private stairways 30 inches or less in height may have handrails on one side only.

4. Stairways having three risers or less and stairways giving access to portable work stands less than 30 inches high are not required to have handrails.

5. Stairways less than 30 inches in width are permitted to have single rails.

6. The provisions of Section 3306(i.1) shall not apply to existing, privately-funded covered multifamily buildings.

3306(i.1)2. **Handrail configuration.** A. Handrails shall be 30 to 34 inches above the nosing of the treads.

B. Handrails shall extend a minimum of 12 inches beyond the top nosing and 12 inches, plus the tread width, beyond the bottom nosing.

C. Ends shall be returned or shall terminate in newel posts or safety terminals.

D. Where the extension of the handrail in the direction of the stair run would create a hazard, the termination of the extension shall be made wither rounded or returned smoothly to floor, wall or post. Where the stairs are continuous from landing to landing, the inner rail shall be continuous and need not extend out into the landing.

E. Handrails projecting from a wall shall have a space of not less then 1 1/2 inches between the wall and the handrail.

3306(i.1)2.E. **EXCEPTION.** In covered multifamily buildings, the clear space between the handrail and the wall shall be 1-1/2 inches. Handrails may be located in a recess if the recess is a maximum of 3 inches deep and extends at least 18 inches above the top of the rail.

F. The handgrip portion of handrails shall not be less than 1 1/4 inches or more than 2 inches in cross-sectional dimension or the shape shall provide an equivalent gripping surface. The handgrip portion of handrails shall have a smooth surface with no sharp corners.

3306(i.1)2.F. **EXCEPTION 3.** In covered multifamily buildings, the diameter or width of the gripping surface of a handrail shall be 1-1/4 inches to 1-1/2 inches or shaped to provide an equivalent gripping surface.

3306(i.1)2.F. **EXCEPTION 4.** In covered multifamily buildings, any wall or other surface adjacent to the handrail shall be free of any sharp or abrasive elements. Edges shall have a minimum radius of 1/8 inch.

3306(q) **Striping for the Visually impaired.** The upper approach and the lower tread of each stair shall be marked by a strip of clearly contrasting color at least 2 inches wide placed parallel to and not more than 1 inch from the nose of the step or landing to alert the visually impaired. The strip shall be of material that is at least as slip resistant as the other treads of the stair.

Where stairways occur outside a building, the upper approach and all treads shall be marked by a strip of clearly contrasting color at least 2 inches wide and placed parallel to and not more than 1 inch from the nose of the step or landing to alert the visually impaired. The strip shall be of a material that is at least as resistant as the other treads of the stair. A painted strip shall be acceptable.

3306(r) **Treads, Nosings and Risers. 1. Treads.** All tread surfaces shall be slip resistant.

A. All tread surfaces shall be slip resistant.

Treads shall have smooth, rounded or chamfered exposed edges, and no abrupt edges at the nosing (lower front edge).

2. **Nosing.** Nosing shall not project more than 1 1/2 inches past the face of the riser below.

3. **Risers.** Risers shall be sufficiently solid to prevent the passage of objects larger than 0.50 inch.

**EXCEPTION 3.** In covered multifamily buildings, open risers are not permitted on accessible routes.

3307(c.1)1. The maximum slope of a ramp that serves any exitway, provides access for persons with physical disabilities or is in the path of travel shall be 1-foot rise in 12 feet of horizontal.

3307(c.1) 2. The cross slope of ramp surfaces shall be no greater than 1:50.

3307(c.1) 3. Outdoor ramps and their approaches shall be designed and constructed so that water will not accumulate on walking surfaces.

3307(d.1) **Landings.** Ramp landings shall be installed as follows:

3307(d.1)1. **Location of Landings.**

Landings shall be provided at the top and bottom of each ramp. Intermediate landings shall be provided at intervals not exceeding 30 inches of vertical rise and at each change of direction. Landings are not considered in determining the maximum horizontal distance of each ramp.

3307(d.1)2. **Size of Top Landings.**

Top landings shall be not less than 60 inches wide and shall have a length of not less than 60 inches in the direction of ramp run.

**EXCEPTION:** In privately-funded multifamily buildings, the top landings shall not be less than 60 inches wide and shall have a length of not less than 44 inches in the direction of ramp run. The top landing width shall extend a minimum of 24 inches past the strike edge of the door.

3307(d.1)3. **Encroachment of Doors.**

Doors in any position shall not reduce the minimum dimension of the ramp landing to less than 42 inches and shall not reduce the required width by more than 3-1/2 inches when fully open.

3307(d.1)4. **Strike Edge Extension.**

The width of the landing shall extend 24 inches past the strike edge of any door or gate for exterior ramps and 18 inches past the strike edge for interior ramps.

- 3307(d.1)5. **Landing Width.** At bottom and intermediate landings, the width shall be at least the same as required for ramps.
- 3307(d.1)6. **Change of Direction.** Intermediate and bottom landings at a change of direction in excess of 30 degrees shall have a dimension in the direction of ramp run of not less than 72 inches to accommodate the handrail extension.
- 3307(d.1)7. **Other Intermediate Landings.** Other intermediate landings shall have a dimension in the direction of ramp run of not less than 60 inches.
- 3307(d.1)8. For existing ramps or ramps not covered by Section 3307(d.1), landings shall be provided as set forth in Section 3307(d.1).
- 3307(d.1)9. **Hazards.** Required ramps shall have a curb at least 2 inches high, or a wheel guide rail 2 to 4 inches high on each side of the ramp landing that has a vertical drop exceeding 4 inches and that is not bounded by a wall or fence.
- 3307(e.1) Handrails are required on ramps that provide handicap/physically disabled access if slope exceeds 1-foot rise in 15 feet of horizontal. Handrails shall be placed on each side of each ramp, shall be continuous the full length of the ramp, shall be 30 inches to 34 inches above the ramp surface, shall extend a minimum of 1 foot beyond the top and bottom of the ramp, and the ends shall be returned. Handrails projecting from a wall shall have a space of not less than 1 1/2 inches between the wall and the handrail. The grip portion shall not be less than 1 1/4 inches or more than 2 inches in cross-sectional dimension. or the shape shall provide an equivalent gripping surface and all surfaces shall be smooth with no sharp corners.

**EXCEPTION 2.** Ramps that require handrails and that serve one individual dwelling unit in Group R, Division 1 or 3 Occupancies may have one handrail except that such ramps open on one or both sides shall have handrails provided on the open side or sides.

**EXCEPTION 5.** Multifamily buildings that are required to provide ramps for persons with physical disabilities shall have handrails if the slope exceeds 1 foot of rise in 20 feet of horizontal run (1:20).

3324 **Walks and Sidewalks.** (a) Walks and sidewalks subject to these regulations shall have a continuous common surface, not interrupted by steps or by abrupt changes in level exceeding 1/2 inch [see Subsection (c) below], and shall be a minimum of 48 inches in width. Surfaces shall be slip resistant as follows:

1. **Slopes less than 6 percent.** Surfaces with a slope of less than 6 percent gradient shall be at least as slip resistant as that described as a medium salted finish.
2. **Slopes 6 percent or greater.** Surfaces with a slope of 6 percent gradient shall be slip resistant.

**3. Surface cross slopes.** Surface cross slopes shall not exceed 1/4 inch per foot except when the enforcing agency finds that due to local conditions it creates an unreasonable hardship, the cross slope shall be increased to a maximum of 1/2 inch per foot for distances not to exceed 20 feet.

**EXCEPTION 2.** Sidewalks serving individual dwelling units in privately-funded covered multifamily buildings may be reduced to 36 inches in clear width. All other sidewalks shall be a minimum of 48 inches in clear width.

**(b) Gratings.** Walks, sidewalks and pedestrian ways shall be free of gratings whenever possible. For gratings located in the surface of any of these areas, grid openings in gratings shall be limited to 1/2 inch in the direction of traffic flow.

**Exceptions:** 1. Where the enforcing agency determines that compliance with this section would create an unreasonable hardship, an exception may be granted when equivalent facilitation is provided.

2. This section shall not apply in those conditions where, due to legal or physical constraints, the site of the project will not allow compliance with these building standards or equivalent facilitation without creating an unreasonable hardship. See Section 110(10)

**(c) Five Percent Gradient.** When the slope in the direction of travel of any walk exceeds 1 vertical to 20 horizontal, (5 percent gradient) it shall comply with the provisions of Section 3307, Pedestrian Ramps.

**(d) Changes in Level.** Abrupt changes in level along any accessible route shall not exceed 1/2 inch. When changes in level do occur, they shall be beveled with a slope no greater than 1:2, except that level changes not exceeding 1/4 inch may be vertical.

When changes in levels greater than 1/2 inch are necessary, they shall comply with the requirements for curb ramps.

**NOTE:** See Section 7103.

**(e) Level Areas.** Walks shall be provided with a level area not less than 60 inches by 60 inches at a door or gate that swings toward the walk, and not less than 48 inches wide by 44 inches deep at a door or gate that swings away from the walk.

Such walks shall extend 24 inches to the side of the strike edge of a door or gate that swings toward the walk. (For example, see Figure No. 33-2.)

**(f) Walks with Continuous Gradients.** All walks with continuous gradients shall have level areas at least 5 feet in length at intervals of at least every 400 feet.

3325(a)

**Warning Curbs.** Abrupt changes in level, except between a walk or sidewalk and an adjacent street or driveway, exceeding 4 inches in a vertical dimension, such as at planters or fountains located in or adjacent to walks, sidewalks or other pedestrian ways, shall be identified by curbs projecting at least 6 inches in height above the walk or sidewalk surface to warn the blind of a potential drop-off.

When a guardrail or handrail is provided, no curb is required when a guide rail is provided centered 3 inches plus or minus one inch above the surface of the walk or sidewalk, the walk is 5 percent or less gradient or no adjacent hazard exists.

**(b) Overhanging Obstructions.** Any obstruction that overhangs a pedestrian's way shall be a minimum of 80 inches above the walking surface as measured from the bottom of the obstruction. Where a guy support is used parallel to a path of travel, including, but not limited to, sidewalks, a guy brace, sidewalk guy or similar device shall be used to prevent an overhanging obstruction as defined (see Figure No. 33-4B).

**CHAPTER 51**  
**ELEVATORS, DUMBWAITERS, ESCALATORS**  
**AND MOVING WALKS**

5103(d.1)            **Size of Cab and Control Locations and Requirements for Accommodation of People with Disabilities.**

In buildings two or more stories in height, where accessibility is required by OSA/ACS, and passenger elevators are provided, they shall comply with the following requirements:

**EXCEPTION 1.** When the enforcing agency determines that compliance with any regulation under this section would create an unreasonable hardship, an exception to such regulation shall be granted when equivalent facilitation is provided.

**EXCEPTION 2.** These provisions shall not apply to existing buildings when legal or physical constraints will not allow compliance with these regulations or equivalent facilitation without creating an unreasonable hardship. See Section 110(10).

5103(d.1)1.            **Operation and Leveling.** The elevator shall be automatic and be provided with a self-leveling feature that will automatically bring the car to the floor landings with a tolerance of plus or minus 1/2 inch under normal loading and unloading conditions. This self-leveling shall, within its zone, be entirely automatic and independent of the operating device and shall correct the overtravel or undertravel. The car shall also be maintained approximately level with the landing, irrespective of load.

5103(d.1)2.            **Door Operation.** Power-operated horizontally sliding car and hoistway doors open and closed by automatic means shall be provided.

5103(d.1)3.            **Door Size.** Minimum clear width for elevator doors shall be 36 inches.

**EXCEPTION:** When approved by the building official, the minimum door width may be reduced to 32 inches where it can be demonstrated that a person using a wheelchair can enter and operate the elevator.

5103(d.1)4.            **Car Inside.** The car inside shall allow for the turning of a wheelchair. The minimum clear distance between walls or between wall and door, excluding return panels, shall not be less than 68 inches by 54 inches. The minimum distance from wall to return panel shall not be less than 51 inches.

**EXCEPTION:** Passenger elevators in buildings other than those listed in Section 5103(d), serving an occupant load of less than 50 shall have a minimum inside car platform of 4 feet 6 inches wide by 4 feet 6 inches deep from the rear wall to the inside face of the door. Other dimensions may be substituted where it can be demonstrated that a wheelchair can enter or turn around within the elevator cab.

5103(d.1)4.A.

Elevator floor buttons shall be within 4 feet 6 inches of the car floor. Except for photoelectric tube bypass switches, the emergency controls, including the emergency stop and alarm shall be grouped in or adjacent to the bottom of the panel and shall be no lower than 2 feet 11 inches from the floor. For multiple controls only, one set must comply with these height requirements. The emergency telephone handset shall be positioned no higher than 4 feet above the floor, and the handset cord shall be a minimum of 2 feet 5 inches in length.

5103(d.1)4.B.

Identification for the visually impaired shall be as follows:

Passenger elevator car controls shall have a minimum dimension of 3/4 inch and shall be raised 1/8 plus or minus 1/32 above the surrounding surface. Control buttons shall be illuminated, shall have square shoulders, and shall be activated by a mechanical motion that is detectable. All control buttons shall be designated by a 5/8-inch minimum, Arabic numeral, standard alphabet character, or standard symbol immediately to the left of the control button. A Braille symbol shall be located immediately below the numeral, character or symbol. A minimum clear space of 3/8 inch or other suitable means of separation shall be provided between rows of control buttons.

**NOTE:** See figure No. 51-B.

The raised characters shall be white on a black background. Controls and emergency equipment identified by raised symbols shall include, but not be limited to, door open, door close, alarm bell, emergency stop and telephone.

5103(d.1)5.

**Handrails.** A handrail shall be provided on one wall of the car, preferably the rear. The rails shall be smooth and the inside surface at least 1/2-inch clear of the walls at a nominal height of 32 inches from the floor.

Nominal =  $\pm$  1 inch.

**NOTE:** Thirty-two inches required to reduce interference with car controls where lowest button is centered at 35 inches above floor.



- 5103(d.1)6. Call operation buttons shall be within 3 feet 6 inches of the floor. Buttons shall be a minimum of 3/4 inch in size and shall be raised 1/8 plus or minus 1/32 inch above the surround surface. Visual indication shall be provided to show each call registered and extinguished when answered.
- 5103(d.1)7. **Hall lantern.** A visual and audible signal shall be provided at each hoistway entrance indicating to the prospective passenger the car answering the call and its direction of travel as follows:
- A. The visual signal for each direction shall be a minimum of 2 1/2 inches high by 2 1/2 inches wide, and visible from the proximity of the hall call button.
  - B. The audible signal shall sound once for the up direction and twice for the down direction or of a configuration which distinguishes between up and down elevator travel.
  - C. The center line of the fixture shall be located a minimum of 6 feet (72 inches) in height from the lobby floor.
  - D. The use of in-car lanterns, located in or on the car doorjamb, visible from the proximity of the hall call buttons and conforming to the above requirements shall or will be acceptable.
  - E. The use of arrow shapes are preferred for visible signals.
- 5103(d.1)8. Passenger elevator landing jambs on all elevator floors shall have the number of the floor on which the jamb is located designated by raised Arabic numerals which are a minimum of 2 inches in height and raised Braille symbols which conform to Section 3105(e)3 (below) located approximately 5 feet above the floor on the jamb panels on both sides of the door so that they are visible from within the elevator. Raised Braille symbols shall be placed directly to the left of the corresponding raised Arabic numerals. The raised characters shall be on a contrasting background.
- OSA 3105(e)3. Braille Symbols:** Contracted Grade 2 Braille shall be used wherever Braille symbols are specifically required in other portions of these standards. Dots shall be 1/10 inch on centers in each cell with 2/10 inch space between cells. Dots shall be raised a minimum of 1/40 inch above the background.
- 5103(d.1)9. **Location.** Passenger elevators shall be located near a major path of travel and provisions shall be made to assure that they remain accessible and usable at all times the building is occupied.

## ***Special Elevators***

### **5107(a) Special Access (Wheelchair) Lifts.**

Special access wheelchair lifts may be provided between levels, in lieu of passenger elevator, when the vertical distance between landings, structural elevators, structural design and safeguards are as allowed by the State of California, Department of Industrial Relations, Division of Occupational Safety and Health. Special access wheelchair lifts shall conform with all regular and special requirements of the State of California, Department of Industrial Relations, Division of Occupational Safety and Health, as they may be specifically approved by them.

**NOTE:** See Section 3001(c)(13), Part 7, of this code for wheelchair lifts which have a rise of not more than 5 feet.

- 5107(a)1. The lift platform or support shall be of sufficient size to accommodate large motorized wheelchairs and shall have a rated capacity of not less than 400 pounds and a weight safety factor of not less than 5 based on the rated load.
- 5107(a)2. The rated speed of the platform shall not exceed 200 feet per minute and the operating control shall be the constant pressure type designed so that it can be easily operated by a handicapped person/people with physical disabilities. A push bar control designated for use by handicapped/physically disabled persons or a control that provides equal usability shall be provided.
- 5107(a)3. The lift assembly shall be securely supported to maintain the platform in a level position and to prevent the loosening or displacement of any portion of the unit. All portions of the lift machinery shall be protected from intrusion of water.
- 5107(a)4. Enclosures shall be provided for the platform wheelchair supports and lift which provides a reasonable degree of safety for handicapped persons/people with physical disabilities using the lift and others exposed to the lift, except as provided in subsection (a)7. Provide installation with safety devices that may be required per subsections (a) 5, 6 and 7.
- 5107(a)5. The lift platform and the top landing shall be equipped with a locking device, door or gate 42 inches in height. The device, door or gate shall be equipped with both mechanical and electrical contacts which prevent operation of the platform unless they are properly closed.
- 5107(a)6. "Call-send" controls shall be provided at the top and bottom landing. When the platform and lift travel area are not enclosed, "call-send" controls shall be key locked or otherwise controlled as to use.

5107(a)7. When the enclosure required in subsection(a)4 is not provided, the underside of the lifting platform shall be equipped with a safety pan cover which will automatically shut off the lifting device should any obstruction under the platform interfere with its downward travel.

5107(a)8. A pit shall be provided to permit the platform to stop flush with the landing level or, in lieu of a pit, a ramp shall be provided which does not exceed 1 inch rise in 12 inches of horizontal run. The surface of the ramp shall have a nonskid surface.

**EXCEPTION:** If the horizontal run of the ramp does not exceed 12 inches, the maximum rise may be 2 1/2 inches.

5107(a)9. When the lift is hydraulically operated or is the electric-hydraulic type, releveling switches shall be provided to keep the platform level with the landing at which it has been parked.

**EXCEPTION 1: Existing Buildings.** The provisions of this section shall not apply to existing buildings when physical constraints will not allow compliance with these regulations or equivalent facilitation without creating an unreasonable hardship.

**NOTE:** See Section 110(10).

**EXCEPTION 2.** When the enforcing agency determines that compliance with any regulation under this section would create an unreasonable hardship, an exception to such regulation shall be granted when equivalent facilitation is provided.

5107(a)10. **Lift Access Landings.** There shall be a level and clear floor area or landing at each floor or level served by special-access lifts to allow safe access to and exiting from the lift platform.

**A. Landing Size.** In new construction, the minimum size of landings specified in this section shall be 60 inches by 60 inches. Other dimensions may be substituted where it can be demonstrated that a person using a wheelchair measuring 30 inches by 48 inches can enter and operate the lift safely.

**B. Relationship to the Path of Travel.** Level and clear floor areas or landings as specified in this section shall be part of "accessible route of travel" requirements. See Section 3102(c).

**PART 5, TITLE 24  
CALIFORNIA CODE OF REGULATIONS**

**STATUTORY AUTHORITY**

9. HCD/1 - Department of Housing and Community Development.

Application - Hotels, motels, lodging houses, apartment houses, dwellings, employee housing and factory-built housing.

Access and adaptability requirements for the physically disabled shall apply to all newly constructed privately-funded covered multifamily dwelling units in buildings having three or more dwelling units and privately-funded shelters intended for occupancy as a residence for homeless persons. These regulations do not apply to buildings containing less than four condominium dwelling units. These regulations do not apply to the repair, rehabilitation or additions to apartment houses, condominiums or time share units.

**NOTE:** For specific requirements and exceptions, see Part 2, Chapters 31, 33, and 51 as amended, California Building Code; Part 3, Articles 210-7(g) and 380-8(c), as amended, California Electrical Code and Chapter 15, as amended, of this Part, Title 24 California Code of Regulations.

Enforcing Agency - Local Building Department or the Department of Housing and Community Development.

Authority Cited - Health and Safety Code Sections 17921, 50558 and 50559.

Reference - Health and Safety Code Sections 17000 through 17060, 17910 through 17990, 50558 and 50559.

## PLUMBING CODE

9. HCD/1 - Department of Housing and Community Development.

Application - Hotels, motels, lodging houses, apartment houses, dwellings, employee housing and factory-built housing.

Access and adaptability requirements for the physically disabled shall apply to all newly constructed privately-funded covered multifamily dwelling units in buildings having three or more dwelling units and privately-funded shelters intended for occupancy as a residence for homeless persons. These regulations do not apply to buildings containing less than four condominium dwelling units. These regulations do not apply to the repair, rehabilitation or additions to apartment houses, condominiums or time share units.

**NOTE:** For specific requirements and exceptions, see Part 2, Chapters 31, 33, and 51 as amended, California Building Code; Part 3, Articles 210-7(g) and 380-8(c), as amended, California Electrical Code and Chapter 15, as amended, of this Part, Title 24 California Code of Regulations.

Enforcing Agency - Local Building Department or the Department of Housing and Community Development.

Authority Cited - Health and Safety Code Sections 17921, 50558 and 50559.

Reference - Health and Safety Code Sections 17000 through 17060, 17910 through 17990, 50558 and 50559.

- 1507(a.1) If provided in covered multifamily buildings, drinking fountains and water coolers shall be on an accessible route. Wall-mounted and post-mounted cantilevered drinking fountains and water coolers shall have a clear knee space a minimum of 30 inches in width and shall also have a minimum clear floor space 30 inches by 48 inches to allow a person in a wheelchair to approach the unit facing forward.
- 1507(b.1) The spout shall provide a flow of water at least 4 inches high so as to allow the insertion of a cup or glass under the flow of water. The force required to activate controls shall be no greater than 5 lbf.

## ELECTRICAL CODE

089-8(b)9. HCD 1 - Department of Housing and Community Development.

Application - Hotels, motels, lodging houses, apartment houses, dwellings, employee housing and factory-built housing.

Access and adaptability requirements for the physically disabled shall apply to all newly constructed privately-funded covered multifamily dwelling units in buildings having three or more dwelling units and privately-funded shelters intended for occupancy as a residence for homeless persons. These regulations do not apply to buildings containing less than four condominium dwelling units. These regulations also do not apply to the repair, rehabilitation or additions to apartment houses, condominiums or time share units.

**NOTE:** For specific requirements and exceptions, see Part 2, Chapters 31 and 51 as amended, California Building Code; Articles 210-7(g) and 380-8(c), as amended, of this Part and Part 5, Chapter 15, as amended, California Plumbing Code, Title 24, California Code of Regulations.

Enforcing Agency - Local Building Department or the Department of Housing and Community Development.

Authority Cited - Health and Safety Code Sections 17921 and 50558.

Reference - Health and Safety Code Sections 17000 through 17060, 17910 through 17990, 50558 and 50559.

210-7(g.1) When access for persons with physical disabilities is required in covered multifamily dwelling units, the center of receptacle outlets on branch circuit of 30 amperes or less shall be located no higher than 48 inches, and no lower than 15 inches, above the floor. If the reach is over an obstruction (for example, a kitchen base cabinet) between 20 and 25 inches in depth, the maximum height is reduced to 44 inches for forward approach, or 46 inches for side approach, provided the obstruction is no more than 24 inches in depth. Obstructions shall not extend more than 25 inches from the wall beneath the receptacle.

Outlets that do not satisfy these specifications are acceptable provided that comparable outlets, that perform the same functions, are provided within the same area and are accessible.

380-8(c.1) When access for people with physical disabilities is required in covered multifamily dwelling units, light switches, thermostats and other environmental controls shall be located no higher than 48 inches, and no lower than 15 inches, above the floor. If the reach is over an obstruction (for example, a kitchen base cabinet) between 20 and 25 inches in depth, the maximum height is reduced to 44 inches for forward approach, or 46 inches for side approach, provided the obstruction is no more than 24 inches in depth. Obstructions shall not extend more than 25 inches from the wall beneath a control.

Controls that do not satisfy these specifications are acceptable provided that comparable controls or outlets, that perform the same functions, are provided within the same area and are accessible.