

# FAIR HOUSING ACT (1998) & ANSI 117.1 2009 ACCESSIBLE SPECIFICATIONS (ALL ACCESSIBLE UNITS)

## DWELLING UNITS - TYPE B

## GENERAL SITE AND BUILDING ELEMENTS

**1004.11.3.2 Option B.** One of each type of fixture provided shall comply with Section 1004.11.3.2. The accessible fixtures that shall be in a single toilet/bathing area, such as travel between fixtures does not require travel through other parts of the unit.

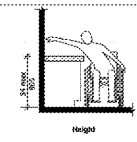
**1004.11.3.3.** Only one toilet and bathroom area is required to be accessible and provide the clearances when the Option B bathroom provisions are selected. Other bathrooms in the unit do not need to have accessibility related clearances, but must have blocking in the walls for the future installation of grab bars (Section 1004.11.3.1), see commentary, Sections 1004.11 and 1004.11.1.1, Exception 1, for bathrooms that may be exempt from the accessibility requirements.

### OPTION B BATHROOMS

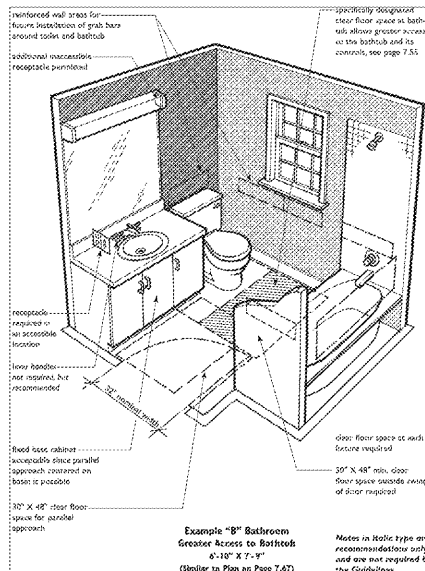
**1004.11.3.3.1 Lavatory.** Lavatories shall comply with Sections 1004.11.3.1.1 and 1004.11.3.2.1.1.

**1004.11.3.2.1.1 Height.** The front of the lavatory shall be 34 inches (865 mm) maximum above the floor, measured to the higher of the rim or counter surface.

The clear floor space requirement for Option A and Option B lavatories is the same; however, Option B has an additional height requirement. In Option B bathrooms the lavatory is limited to a 18-inch (457 mm) maximum height. Figure 1004.11.3.2.1.1. This 24-inch (605 mm) height requirement corresponds to the height allowed by Section 405.3, although the Type B unit lavatory is allowed to use a parallel approach instead of a forward approach (Section 1004.11.3.1.1).



### OPTION B LAVS



### OPTION B BATHROOM EXAMPLE

**\*\* SEE OPTION A TOILET CLEARANCE NOTES AND DIAGRAMS \*\***

**1004.11.3.2.2 Water Closet.** The water closet shall comply with Section 1004.11.3.1.2.

The water closet requirements for a Type B unit are the same for Option A and Option B bathrooms (see Section 1004.11.3.1.2).

### OPTION B TOILETS

**1004.11.3.2.3 Bathing Fixtures.** The accessible bathing fixture shall be a bathtub complying with Section 1004.11.3.2.3.1 or a shower compartment complying with Section 1004.11.3.2.3.2.

Only one bathing fixture must have clearances in a Type B unit. Option B bathroom. The designer may elect to use either a bathtub or a shower. When both a bathtub and a shower are installed in the same room, only one must meet the clearance requirements. In this particular instance, the Option B bathroom is less restrictive than the Option A bathroom. See the discussion with Section 1004.11.3.1.5 to understand the difference and why the Option B bathroom only requires one bathing fixture.

Because of the reinforcement requirements in Section 1004.11.1.1, reinforcement would be required in any walls constructed around any bathing fixture. This reinforcement would apply to both a bathtub and a shower where they are installed in the same bathroom area.

### BATHING FIXTURES

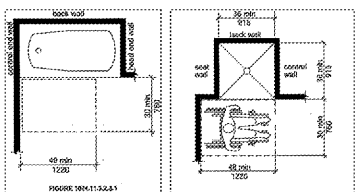
**1004.11.3.2.3.1 Bathtub.** A clearances 48 inches (1220 mm) minimum in length measured perpendicular from the corner end of the bathtub, and 30 inches (760 mm) minimum in width shall be provided in front of bathtubs.

The main difference between the Option A and Option B bathrooms is at the tub. A 36-inch by 48-inch (915 mm by 1220 mm) clear floor space must be provided perpendicular to the tub. To ensure access to the controls, the clear floor space must be recessed from the end with the controls. There are no options for a water closet or lavatory to overlap this clear floor space. See Figure 1004.11.3.2.3.1 and Commentary Figure C1004.11.3.2.3.1.

**1004.11.3.2.3.2 Shower Compartment.** A shower compartment shall comply with Section 1004.11.3.1.3.3.

The requirements for showers in Option B bathrooms are the same as those for Option A bathrooms (see Section 1004.11.3.1.3.3).

### BATHTUB AND SHOWER



### OPTION B BATHTUBS AND SHOWERS

**1004.12 Kitchens and kitchenettes.** Kitchens and kitchenettes shall comply with Section 1004.12.

The layout of the Type B unit kitchen or kitchenette is considered to be usable by a person using a wheelchair. Consideration must be given for wheelchair access to the general kitchen area, and appliances. The Type B unit kitchen does not include access of the access requirements found in Type A units, such as adaptability for floor approach at the counter work surface, or a turning space within the room. A side approach to the kitchen sink is permitted. Type B and Type A units are similar in their requirements for clearances in the kitchen and approach to the appliances. If a designer chooses to use some of the Type A unit requirements for kitchens, the higher level of accessibility that results would exceed the Type B unit requirements.

### KITCHENS

**\*\* SEE KITCHEN CLEARANCE DIAGRAMS AT TYPE A UNITS \*\***

### CLEARANCE

**1004.12.1.1 Minimum Clearance.** Clearance between all opposing base cabinets, counter tops, appliances, or walls within kitchen work areas shall be 40 inches (1015 mm) minimum.

### U-SHAPED KITCHENS

In kitchens with counters, appliances, or cabinets on three contiguous sides, clearance between all opposing base cabinets, countertops, appliances, or walls within kitchen work areas shall be 60 inches (1525 mm) minimum.

**1004.12.2 Clear Floor Space.** Clear floor space at appliances shall comply with Sections 1004.12.2 and 305.3.

**1004.12.2.1 Sink.** A clear floor space, positioned for a parallel approach to the sink, shall be provided. The clear floor space shall be centered on the sink bowl.

**EXCEPTION:** A sink with a forward approach complying with Section 1003.12.4.1.

**1004.12.2.2 Dishwasher.** A clear floor space, positioned for a parallel or forward approach to the dishwasher, shall be provided. The dishwasher clear floor space shall not obstruct the clear floor space for the dishwasher.

**1004.12.2.3 Cooktop.** Cooktops shall comply with Section 1004.12.2.3.

**1004.12.2.3.1 Approach.** A clear floor space, positioned for a parallel or forward approach to the cooktop, shall be provided.

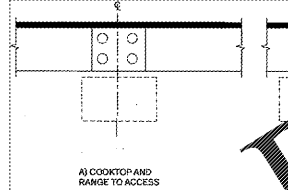
**1004.12.2.3.2 Forward approach.** Where the clear floor space is positioned for a forward approach, the clear floor space shall be centered on the cooktop.

**1004.12.2.3.3 Parallel approach.** Where the clear floor space is positioned for a parallel approach, the clear floor space shall be centered on the cooktop.

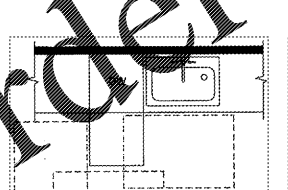
**1004.12.2.4 Oven.** A clear floor space, positioned for a parallel or forward approach to the oven shall be provided. The oven door in the open position shall not obstruct the clear floor space for the oven.

**1004.12.2.5 Refrigerator/Freezer.** A clear floor space, positioned for a parallel approach to the refrigerator/freezer, shall be provided. The centerline of the clear floor space shall be within 24 inches (610 mm) maximum from the centerline of the appliance.

**1004.12.2.6 Trash Compactor.** A clear floor space, positioned for a parallel or forward approach to the trash compactor, shall be provided.



### RANGE



### DISHWASHER

### SINK

### REFRIGERATOR

**402.1 General.** Accessible routes shall comply with Section 402.

Accessible routes must comply with all of the provisions of Section 402 to provide an acceptable degree of accessibility to the elements they serve. See the requirements in Section 402.2 for components that make up accessible routes.

### ACCESSIBLE ROUTES

**402.2 Components.** Accessible routes shall consist of one or more of the following components: walking surfaces with a slope not steeper than 1:20, doors and doorways, ramps, curb ramps, excluding the flared sides, elevators, and platform lifts. All components of an accessible route shall comply with the applicable portions of this standard.

This section identifies the various types of architectural elements that contribute to an accessible route. In effect, any surface that a person can travel using a wheelchair to reach an accessible element can be a part of an accessible route if it complies with the provisions of Chapter 4, Chapter 4 includes provisions for the elements listed as part of the accessible route (see Commentary Figure C402.2).

By the definition for ramps in Section 106.5, any walking surface that slopes at 1:20 (1 inch rise to 20 inches of run) or less is considered a sloped walkway. Walking surfaces that slope from 1:20 up to 1:12 (1 inch rise to 12 inches of run) are considered to be accessible ramps (Section 405) or curb ramps (Section 406).

Although sidewalks may have elements that could be a concern for persons with mobility impairments, they are not considered accessible routes.

**403 Walking Surfaces.** Walking surfaces that are a part of an accessible route shall comply with Section 403.

**403.1 General.** Walking surfaces that are a part of an accessible route shall comply with Section 403.

**403.2 Slope.** The running slope of walking surfaces shall not be steeper than 1:20. The cross slope of a walking surface shall not be steeper than 1:48.

The slope of an accessible route is an important factor that affects the usability of such routes by people with mobility impairments. This section correlates with Section 405 by limiting the slope of a "walking surface" to a maximum slope of 1:20. Therefore, any portion of an accessible route with a slope steeper than 1:20 is considered a ramp that must comply with the provisions of Section 405.

Controlling the cross slope of an accessible route is important to provide a reasonably level surface across the direction of travel. Excessive cross slopes could affect the balance of a person who uses a walking aid while navigating on the accessible route and also cause considerable difficulty for people in wheelchairs. In most cases, excessive cross slopes are hazardous and unsafe. They can cause the person using a wheelchair to lose control and veer to the side.

**403.3 Clear Width at 180 Degree Turn.** Where an accessible route makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

**EXCEPTION:** Section 403.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**403.4 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

**EXCEPTION:** Section 403.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**403.5 Clear Width at 180 Degree Turn.** Where an accessible route makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.6 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

**EXCEPTION:** Section 403.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**403.7 Clear Width at 180 Degree Turn.** Where an accessible route makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.8 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.9 Clear Width at 180 Degree Turn.** Where an accessible route makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.10 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.12 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.14 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**EXCEPTION:** Section 403.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**403.16 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.18 Clear Width at 90 Degree Turn.** Where an accessible route makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**403.21 Clear Width at 180 Degree Turn.** Where an accessible route makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**EXCEPTION:** Section 403.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**404 Ramps.** Ramps shall comply with Section 404.

**404.1 General.** Ramps shall comply with Section 404.

**404.2 Slope.** The running slope of ramps shall not be steeper than 1:20. The cross slope of a ramp shall not be steeper than 1:48.

The slope of a ramp is an important factor that affects the usability of such ramps by people with mobility impairments. This section correlates with Section 405 by limiting the slope of a "ramp" to a maximum slope of 1:20. Therefore, any portion of a ramp with a slope steeper than 1:20 is considered a ramp that must comply with the provisions of Section 405.

Controlling the cross slope of a ramp is important to provide a reasonably level surface across the direction of travel. Excessive cross slopes could affect the balance of a person who uses a walking aid while navigating on the accessible route and also cause considerable difficulty for people in wheelchairs. In most cases, excessive cross slopes are hazardous and unsafe. They can cause the person using a wheelchair to lose control and veer to the side.

**404.3 Clear Width at 180 Degree Turn.** Where a ramp makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

**EXCEPTION:** Section 404.5.1 shall apply where the clear width during the turn is 60 inches (1525 mm) minimum.

**404.4 Clear Width at 90 Degree Turn.** Where a ramp makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**404.12 Clear Width at 90 Degree Turn.** Where a ramp makes a 90 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm) minimum, approaching the turn, 48 inches (1220 mm) minimum during the turn, and 42 inches (1065 mm) minimum leaving the turn.

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**404.21 Clear Width at 180 Degree Turn.** Where a ramp makes a 180 degree turn around an object that is less than 48 inches (1220 mm) in width, the clear width shall be 42 inches (1065 mm)