2. Provide a large bedside table for water, a lamp, and other items needed during the night.
3. Have a lamp with a push-button base switch on the bedside table.
4. Have a telephone within reach of the bed.

Poor fire protection
1. Have one outside door or a window (at least 24 inches wide and no more than 36 inches above the floor) in the bedroom in case of fire. There should be some method of entrance from the outside for assistance in a fire.
2. Install a smoke detector in the hall near the bedroom area. This is a must. If you are a heavy sleeper or hard-of-hearing, install the detector inside the bedroom.

Color
Walls too dark, not enough contrast, and glare
1. Paint window walls a light color and sunlit walls a darker shade.
2. Use light colors on the wall wherever light levels are low.
3. Use glareless flat paints throughout the house.
4. Paint treads and risers in a stairway in contrasting colors with the lightest color on the tread.
2. Mount grab bars that will withstand 400 pounds of pressure above the tub or in the shower 40 inches from the floor.

3. Put a portable grab bar on the edge of the tub.

4. Do not use bathtub or shower soap dishes that protrude from the wall.

5. Do not place the bathtub under a window, as it will make falls in the tub more hazardous and cleaning and adjusting the window more difficult.

6. Mount a sturdy grab bar 28 to 32 inches high next to the toilet.

7. Secure towel bars to wall studs so they can be used as a grab bar in an emergency.

8. Do not use glass towel bars.

**Poor water control**

1. Use a pressure sensitive automatic mixing valve in the shower or tub to prevent scalding.

2. Install faucets that are easy to grip and turn.

3. Place shower and tub faucets within easy reach both from the outside and after stepping in.

4. Do not place the mixing valve directly under the shower head.

**Bedroom**

**Too small**

1. Allow enough room around the bed for making it and for dressing.

2. Try to arrange your bedroom to provide enough space to permit nursing care. Ideally, a bedroom should be at least 12 by 14 feet.

**Night hazards**

1. Make access to the bathroom from the bedroom short, direct, lighted, and clear of furniture.
UNSAFE CONDITIONS
and what to do about them

Lighting
Not enough light, uneven illumination, and glare.

1. Increase bulb wattage. More light everywhere is necessary; you need about twice the level as for young people. Make sure, however, you do not exceed the maximum wattage each fixture can handle. That information is usually on the fixture.

2. Admit as much sunlight as possible, using blinds to control glare.

3. Install more outlets throughout the home for lamps. Lamps create less glare than ceiling lights. More outlets may mean adding extra circuits to avoid electrical overload.

4. Cover bare light bulbs with globes or shades that are white or light colored.

5. Install light fixtures inside closets and storage areas.

6. Provide local lighting for specific tasks like sewing, reading, or for hobbies.

7. Install lights over the sink, work counters, and the range in the kitchen.

8. Provide light at the medicine cabinet.

9. Be sure any light fixture you buy has the UL label.


Dark, dangerous stairs

1. Place lights in stairways so that all steps are visible.

2. Install light switches at the top and bottom of stairs.

3. Provide ample outdoor lighting for steps, walks, driveways, and entryways.

5. Don’t use small pans on large burners.

6. Be sure handles are firmly attached to pans and always keep them turned away from the front edge of the stove.

Safety Habits

1. Don’t wear loose sleeved garments while cooking.

2. Wipe up spills immediately. New no-wax floors are especially slippery when wet. Use a sponge mop to avoid bending.

3. Keep a large quantity of baking soda at hand to put out grease fires. Never use water on grease.

4. Don’t overload kitchen circuits or use extension cords for appliances.

Bathroom

Too small, poorly located

1. Make your bathroom large enough for a wheelchair or for a second person to assist.

2. Locate the bathroom as close to your bedroom as possible.

Slips and falls

1. Provide a nonskid bottom and a built-in seat for your tub or shower.
Kitchen

Poor range location, fire and burn hazards
1. Locate a gas range away from curtains and windows that open.
2. Choose a range with front switches. Front switches are safer and easier to use than switches on the back splash.
3. Make range controls easy to read by color-coding or touch-coding them with paint and sand.
4. Be sure the elements on your electric stove glow when on or have indicator lights.
5. Choose an oven at waist level to minimize bending.
6. Install a hood and exhaust fan above the range for adequate ventilation.
7. Consider buying a gas range with an electric ignition to eliminate the possibility of an explosion or asphyxiation and to save gas.

Protruding counters, cabinets, and tables
1. Select cabinets, counter tops, and tables with rounded edges.
2. Avoid cabinet doors which extend beyond the edge of the work counter.
3. Have enough counter space—at least 12 inches—on either side of cooking top for pan handles to extend without being knocked off.
4. Don’t use cabinets over the range or refrigerator.

Improper utensils
1. Don’t use heavy, oversized utensils. Pots and pans should have insulated handles and be lightweight and easily managed.
2. Use pans that are balanced. An unbalanced pan is one that has a handle so heavy it tips over when the pan is empty or near empty.
3. Use a sharp knife to chop foods. Dull knives slip and are hard to handle.
4. Avoid stacking heavy or unlike utensils.

Unlighted path from bedroom to bath
1. Buy nightlights for bedroom and bathroom.
2. Install a lamp or wall switch near the bed.
3. Get luminous plate covers for wall switches.

Wiring

Insufficient wiring
1. Consult an electrician and have him add circuits, if necessary, so there is adequate wiring to carry all your appliances without overload. Electrical use in most homes today requires wiring for a minimum of 150 amps.
2. Have enough outlets so that extension cords and multiple plug-ins are not necessary.

Inconvenient wiring
1. Install outlets 28 to 30 inches above the floor and out from behind furniture.
2. Locate switches at all entrances to a room and at both ends of a long hallway to ensure safe walking.
3. Install a circuit breaker panel instead of a fuse box. It’s easier to restore electricity when the lights go out, and the chances of shock are smaller with a circuit breaker.
Unsafe wiring

1. Know the type of wiring in your home. If you have aluminum rather than copper wiring, be alert to overheating at terminal connections (outlets, switches, outlet boxes, panel boxes). Equipment conversion kits made especially for aluminum wiring are available for outlets and lighting equipment.

2. Cap over outlets in bathroom that are within reach of the tub or shower.

3. Make sure the outlets to major appliances (ranges, dishwashers, dryers) and all lights and outlets in the garage or patio are grounded.

4. As further protection against shock, use a ground fault interrupter (GFI) in laundry rooms, bathrooms, or outdoors—wherever water and electrical equipment can come into contact. GFI's can be portable, wired into separate outlets, or wired into the circuit breaker panel.

Utilities

Unsafe heating

1. Beware of floor furnaces. Heels can catch in grids, causing falls, and fire from a furnace in a central hall can block your escape.

2. Provide central heat, if possible, with a furnace in an enclosed room with combustion air from outside. Central heat should eliminate drafts and the need for using dangerous space heaters.

3. Have your furnace serviced every year. Make sure the service representative relights the furnace pilot, cleans the filters, and checks the flues, vents, and ducts.

4. Store fuel outside.

5. Place shields around hot radiators.

6. Have a good screen on your fireplace.

7. Set the thermostat on the water heater no higher than 120 degrees to prevent scalding (unless you own a dishwasher, which requires 140 degrees).

“UFAC” tag on new furniture which assures flame-resistant construction materials.

Storage

Out of reach, unhandy

1. Set shelves between hip and eye level within easy reach.

2. Place kitchen and closet shelves no higher than 6 feet.

3. Store items most frequently used where they are easily reached.

4. Store items near the area where you use them.

5. Install cupboard doors and drawers that operate smoothly and easily. Sliding doors are easiest to operate.

6. Replace shelves in base cabinets with vertical pull-out racks and drawers, if possible.

Not enough, poorly organized

1. Provide enough storage space to keep items off the floor and steps. This is a major cause of falls.

2. Store medicines for external use away from internal medicines.

3. Store household cleaners and insecticides away from food and out of the reach of children.
Furniture

Unsturdy
1. Use chairs and sofas that will remain firm and not slide when leaned against.
2. Discard tables that are not stable. Pedestal tables and some drop-leaf tables, when extended, tend to tip if someone leans on the edge.
3. Be sure small pieces of furniture are stable enough to bear a person’s weight.
4. Provide extra support for moving around the bedroom by using a bed with a sturdy footboard.

Protruding
1. Look for tables, chests, and desks that have rounded edges.
2. Don’t use rockers that protrude or tip. Platform rockers are best.

Too bulky and heavy
1. Use furniture that is lightweight enough to move for cleaning.
2. Be sure the bottom surface of heavy furniture is high enough off the floor to allow for cleaning underneath to prevent physical strain from moving furniture.
3. Place glider tips or casters that do not slide too easily on heavy pieces.
4. Allow enough space around furniture for easy movement. Crowded, cluttered rooms cause falls.

Poor design
1. Buy chairs that are the right height to avoid cutting off circulation when both feet are flat on the floor.
2. Use chairs with arms that extend far enough forward to provide leverage when sitting down or getting up.
3. Avoid chairs and sofas that are so low that they cause difficulty in getting up and down.
4. Use flame-resistant upholstery fabric and any other material used to furnish a home. Look for the gold and black

8. Be sure gas heating appliances carry the AGA label, are vented to the outside, and are inspected periodically. Older people have a less intense sense of smell and may not detect a gas leak.

Inconvenient location
1. Place laundry facilities on the same floor level as the main living area.
2. Add telephone extensions at your bedside and in several other convenient areas of the house.

Doors and Windows

Poor security
1. Install solid core wood doors at all exterior entrances.
2. Install good deadbolt locks on exterior doors and keep keys inside close to the doorways.
3. Secure windows on the ground floor with easily removable metal pins. Keyed window locks mounted on the frame with screws cannot resist crowbar force and may cause panic in an emergency if the keys cannot be found quickly.
Inadequate fire protection, poor escape exits
1. Put solid core doors on bedrooms for extra protection. Bedroom doors must then be closed at night.
2. Provide an outside door, at least 32 inches wide, to any bedroom occupied by a person in a wheelchair.
3. Have a window in each room for easy escape in case of fire. It should be no more than 36 inches above the floor and at least 24 x 30 inches in size.

Awkward, dangerous
1. Replace swinging doors if they swing too fast.
2. Move hinges so that doors do not open into the line of traffic or over a flight of stairs.
3. Make sure interior doors have latches with safety releases that can be opened from either side.
4. Choose screens and windows that are removable from the inside for cleaning.
5. Install crank windows in hard-to-reach places, such as over a bathtub.

Floors
Uneven surfaces
1. Eliminate one-step elevations. A ramp is better. Ramps should rise no more than 2 inches per 12 inches. Erect a handrail or bannister with the ramp.
2. Remove interior door thresholds.
3. Place tracks at the top of sliding closet doors, not at the bottom.
4. Fasten down all carpet edges so they lie flat.
5. Lay wall-to-wall carpet, if possible, so there are no exposed edges.

Slippery surfaces
1. Get rid of throw rugs. If used, they should have nonskid backings.
2. Use nonskid floor coverings: unwaxed vinyl, unglazed ceramic tile, cork.

Stairs
Hazardous indoor steps
1. Keep living, sleeping, and work area on the same level, if possible.
2. Put up handrails on both sides of steps.
3. Have at least three risers for any change in floor level.
4. Build steps to be uniform. The best dimensions are: risers, 6 inches; tread depth, 12 inches; tread width, at least 40 inches.
5. Cover treads with a nonslip surface.
6. Avoid overhanging treads which catch toes and heels.
7. Allow at least 40 inches between a door at the top of a stairway and the top step.

Hazardous outdoor steps
1. Give steps, patios, and walks a rough finish so they are not slippery when wet.
2. Provide a 5-foot square area with a roof between outdoor steps and the door, if possible.
3. Place downspouts away from steps and walk so water and ice cannot accumulate on walkways.
4. Put gutters on sloping roofs above entrances.