CITY OF RICHARDSON

BICYCLE
PARKING DESIGN MANUAL

JUNE 10, 2024

RICHARDSON
TEXAS

Safe and secure bicycle parking is a key amenity that encourages people to bike to work, school, or to run errands. The following bike parking design criteria is based on the Association of Pedestrian and Bicycle Professionals (APBP) *Bicycle Parking Guidelines* which can be reviewed for additional guidance.

Site Layout and Design

Bicycle parking should be located in areas where they are useful to the bicyclist while not impeding access. The following standards shall apply when determining the location of bicycle racks:

1. *Surfacing*. Where bicycle parking is located outside a building, the bicycle parking area shall consist of a hard surface material, such as concrete, asphalt pavement, pavers, or similar material with a slope no greater than three percent (3%).
2. *Access*. All bicycle parking areas shall have direct and accessible access to the public right-of-way and the primary building entrance that is free of obstructions and any barriers, such as curbs or stairs, which would require users to lift their bikes in order to access the bicycle parking area.
3. Bicycle parking layout shall not interfere with accessible paths of travel or accessible parking as required by the Americans with Disabilities Act of 1990, as amended.
4. All bicycle parking spaces shall be within the property lines. Spaces located within the public right-of-way must be approved by the Director of Development Services or designee.
5. *Spacing Between Bicycle Racks*. Proper layout of bicycle racks is essential to ensure that they will safely and conveniently accommodate the intended number of bicycles. Layout must follow these minimum dimensions (see Figure 1 for example):
    a) Distance to other Racks:
        i. Rack units aligned parallel to each other (side by side) must be at least 4 feet apart. This includes racks that are sold as multiple rack units attached together.
        ii. Rack units aligned end to end must be at least 8 feet apart.
    b) Distance from Wall:
        i. Rack units placed perpendicular to a wall must be at least 4 feet from the wall to the center of the rack.
        ii. Rack units parallel to a wall must be at least 3 feet from the rack to the wall.
    c) Distance from a Curb:
        i. Rack units placed perpendicular to the curb must be at least 4 feet from the curb to the center of the rack.
        ii. Rack units placed parallel to the curb must be at least 2 feet from the curb to the rack.
    d) Distance from a Pedestrian Aisle:
        i. Rack units perpendicular to a pedestrian aisle must be at least P4 feet from the center of the rack to the edge of the aisle and have at least a 5-foot-wide aisle.
        ii. Where 20 or more bicycle parking spaces are required, at least 5% of the spaces must be 10 feet long instead of 8 feet to allow space for tandems and trailers.
    e) Other Distances:
        i. Racks shall have a 6-foot minimum clearance from the edge of fire hydrants;
        ii. Racks shall have a 4-foot clearance from existing street furniture, including benches and light poles.

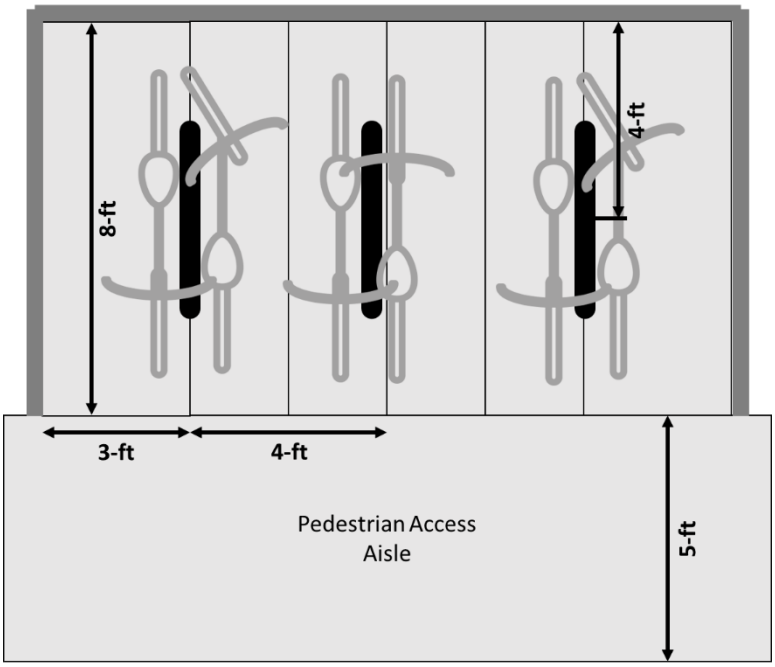

Figure 1

Location of Bicycle Parking

Bicycle parking should be located in areas where they are useful to the bicyclist while not impeding access. The following standards shall apply when determining the location of bicycle parking:

1. *Short-term bicycle parking*. Short-term bicycle parking shall be located outside a building within a convenient distance of, and clearly visible from, the main building entrance. Bicycle parking shall be located more than 100 feet from the main building entrance, as measured along a direct pedestrian access route. In locations that have multiple entrances, such as shopping areas, bicycle parking racks should be distributed near all major points of public entry.
2. *Long-term bicycle parking*. Long-term bicycle parking shall be located in covered and secured areas to protect from theft, vandalism and weather and shall only be accessible to intended users.
    a) *Location*. Long-term bicycle parking must be located within the building or in an area where the closest point is within 500 feet of the entrance.
    b) *Covered Spaces*. At least 50 percent of required long-term parking must be covered which can be provided inside buildings, under roof overhangs or awnings, in bicycle lockers, or within or under other structures. When automobile parking spaces are provided in a structured parking garage, all required long-term bicycle parking shall be located inside the garage on the ground floor or inside the building.
    c) *Security*. To provide security, long-term bicycle parking must be in at least one of the following locations:
        i. A lockable garage;
        ii. A restricted-access lockable room;
        iii. A lockable bicycle enclosure; or
        iv. A bicycle locker.

Bicycle Rack Specifications

Bicycle racks shall meet the following standards:

1. Racks must support a variety of bicycle sizes and frame shapes in at least two places to enable a stable position without damage to the wheels, frame, or components;
2. Racks must allow the bicycle frame and at least one wheel to be locked to the rack with a high security, U-shaped lock;
3. Racks shall be securely anchored to the ground; and
4. Racks shall be of a material that resists cutting, rusting, and bending or deformation (galvanized or stainless steel racks are recommended).
5. Examples of types of bicycle racks that do, and do not, meet these standards are shown in Figure 2. Decorative bicycle racks that enhance the sense of place and contribute to the character of the development are encouraged but are subject to approval by the Director of Development Services or designee.

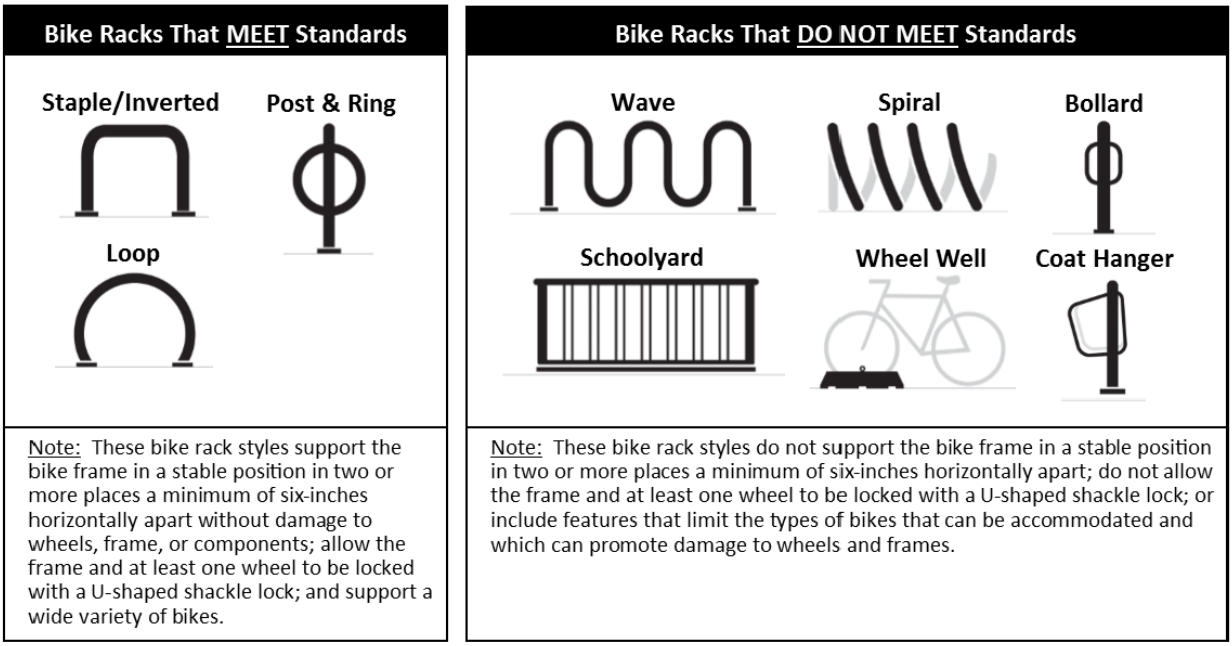

Figure 2