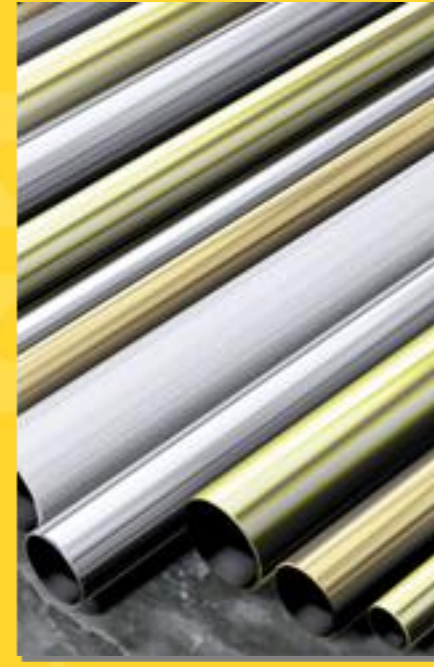


Railing Systems



Brass and Stainless Steel Fittings,
Tubing, and Extrusions

Railing Systems | Overview

Railing Components:

- ➔ Tubing
- ➔ Connectors
- ➔ Brackets
- ➔ Flanges
- ➔ End Treatments

The **Building Blocks** of Railing Systems

Railing Components | Materials & Finishes

➔ Solid Brass

➔ Polished Finish

➔ Stainless Steel (304 Alloy)

➔ Satin Finish

➔ Polished Finish



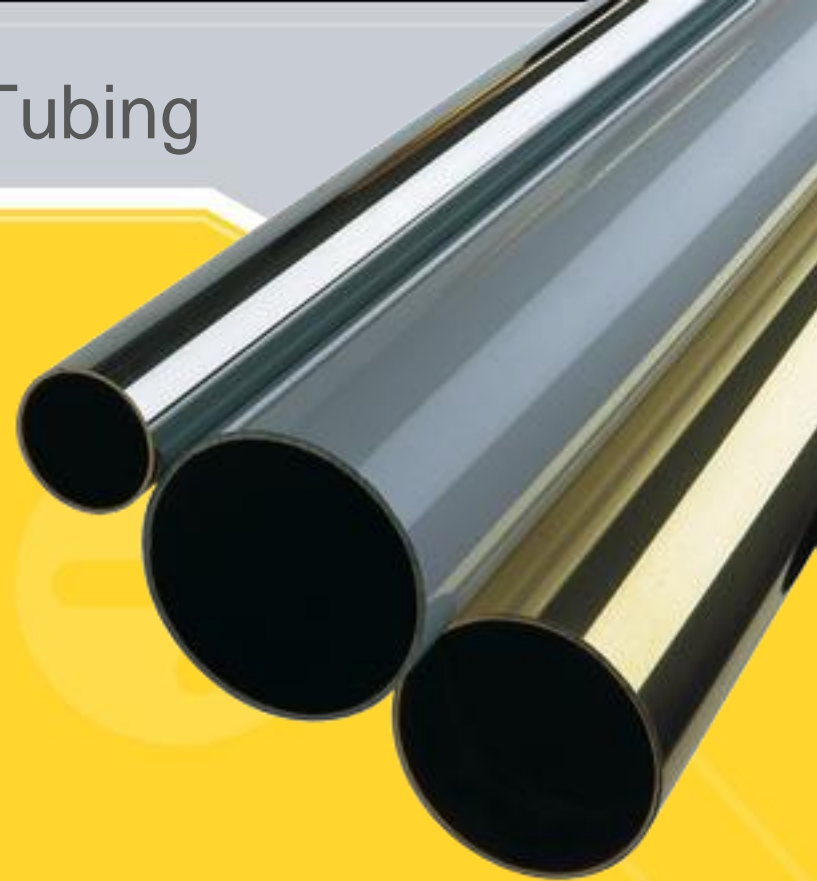
Railing Components | Tubing

➤ Standard Sizes:

- 1" tubing
- 1-1/2" tubing (Lido Retail)
- 2 inch tubing



➤ **Standard tubing thickness is 18 gauge (.050 in.) to fit with Lido components**



Railing Components | Tubing

➔ Tubing Splice

- ➔ Available for 1" - 3" tubing
- ➔ Use with Lido Weld®



➔ Steel Sleeve

- ➔ Primarily used for free standing rails
- ➔ Use for reinforcing tube for superior strength
- ➔ Wall thickness makes it possible for sleeve to be threaded



Railing Components | Brackets

- **Attaches railing to wall or floor**
- **Most brackets are female-type or Saddle-type**
- **Designed to fit many applications**
- **Includes all mounting screws**



Flush Center Post



Saddle Post



Handrail Bracket



Combination Bracket

Railing Components | Connectors

➔ **Two basic types of connectors:**



Ball fitting
(female-type connector)



Flush fitting
(male-type connector)

Railing Components | Connectors

➔ Ball Fitting

(female-type connector)

➔ Easy to build

- ➔ Can use tubing that has an uneven end cut
- ➔ No need for precise tubing measurement
- ➔ Can use tubing with any wall thickness
- ➔ Angle Collars allow tubing to be attached at any angle



➔ Flush Fitting

(male-type connector)

➔ Contemporary Look

- ➔ Requires square end cut and precisely measured tube
- ➔ Must use tubing with .050 in. wall thickness
- ➔ 1' connector area vs. competitors 1/2" to 3/4"
- ➔ Perpendicular Collars allow tubing to be attached at any angle



Railing Components | Modular Handrails

- **Presents a consistent appearance throughout entire project**
- **Create a variety of handrail and short rail systems using a modular approach**



Bracket Stem



Handrail Saddle



Post Saddle



Bracket Mounting Plate



Glass Mounting Back Plate

Railing Components | Flanges

Flanges have 2 critical measurements:

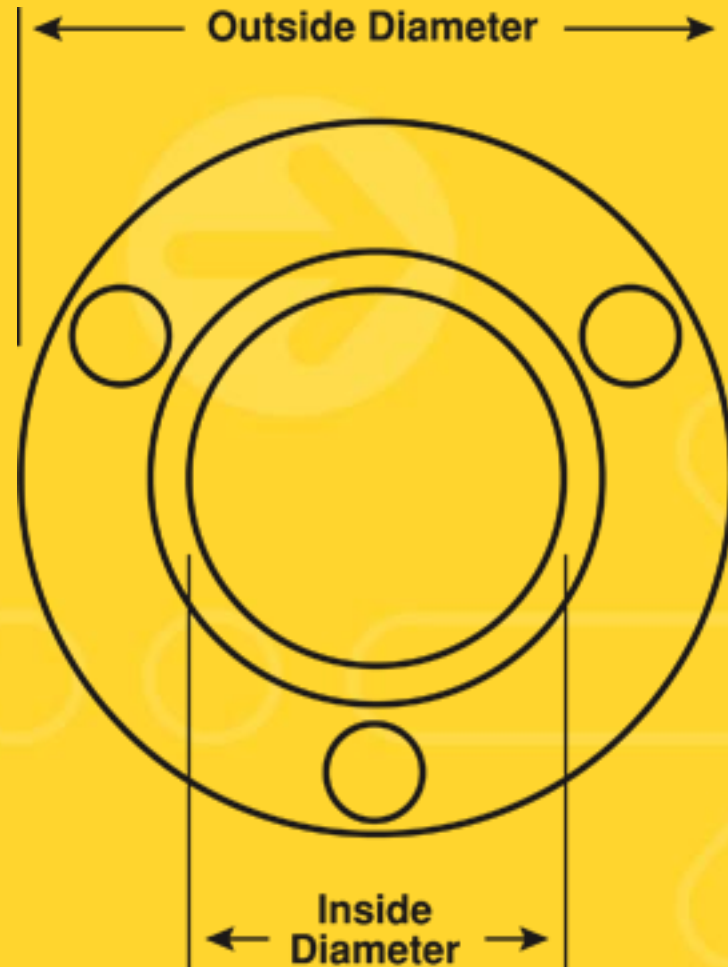
➔ **Outside Diameter**

➔ Determines how much "real estate" flange covers

➔ **Inside Diameter**

➔ Determines what size tubing must be used

Includes all mounting screws



Railing Components | Flanges

➤ Round Flange

- Larger outer diameter provides greater structural strength

➤ Cut Flange

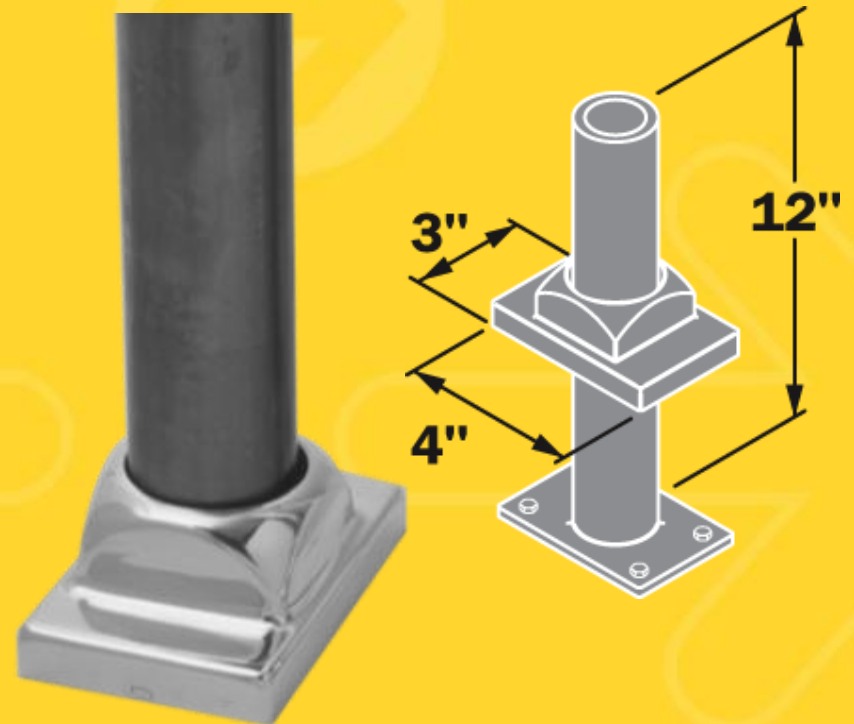
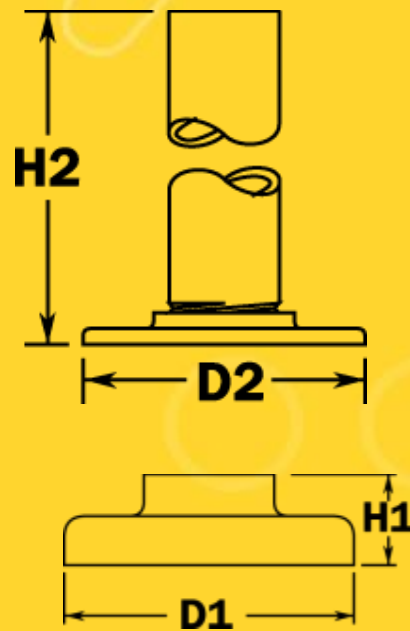
- Use in applications where surface space is limited such as Short Rail installations



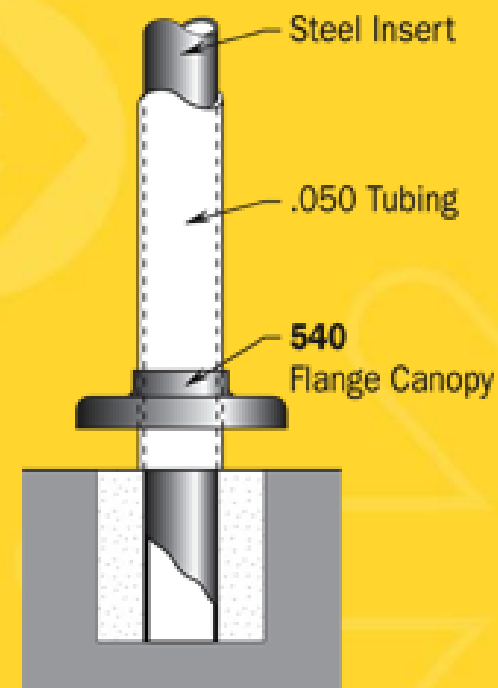
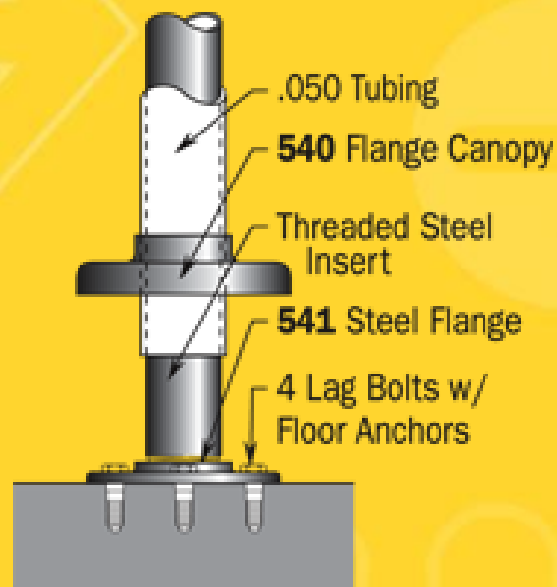
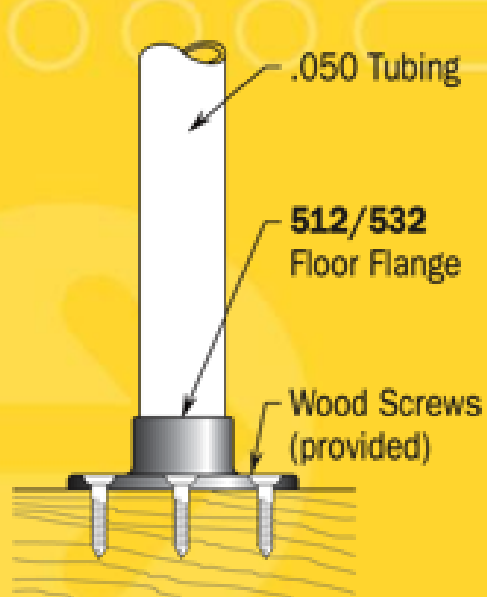
Railing Components | Flanges

➤ Flange and Canopy

- Used for heavy-duty applications
- Steel flange or plate is bolted to surface and then covered with outer canopy



Railing Components | Mounting Solutions



Railing Components | End Treatments

A decorative and functional finishing touch for any railing system
(male-type connector)

- ➔ **Flush End Caps**
- ➔ **Ball Finials**
- ➔ **Decorative Scrolls**
- ➔ **Wall Returns**



Railing Components |

- ➔ Full line of Brass and Stainless Steel 1-inch fittings and tubing
- ➔ Perfect for:
 - ➔ Short Rail
 - ➔ Curtain Rods
 - ➔ Towel Bars
 - ➔ Door Handles



What can I build?

- ➔ **Handrails**
- ➔ **Footrails**
- ➔ **Guard Rails**
- ➔ **Booth Dividers**
- ➔ **Almost Anything!**

Railing Systems | Handrail Application

Components:

➔ **Tubing**

➔ **Brackets**

- ➔ Curved (for metal tubing)
- ➔ Flat (for wood rods)

➔ **Connector**

- ➔ Has to be flush fitting

➔ **End Treatments**

- ➔ Scroll Finial (606)
- ➔ Wall Return (608)



Railing Systems | Handrail Application



Railing Systems | Handrail Application

Building Code Requirements



Railing Systems | Short Rail Application

Designed to project a short distance from the mounting surface

Typical installations include:

- ➔ **Handrails**
- ➔ **Door Pulls**
- ➔ **Curtain Rods**
- ➔ **Chair Guard Rails**



Railing Systems | Short Rail Application



Railing Systems | Arm Rail & Footrail Application

Components:

➔ **Tubing**

- ➔ 1" - 2" diameter

➔ **Brackets**

- ➔ Numerous designs

➔ **Connector**

- ➔ Flush fitting
- ➔ Ball fitting
- ➔ Angles (90°, 135°)

➔ **Flanges**

- ➔ To connect to wall or floor

➔ **End Treatments**

- ➔ Ball Finials
- ➔ End Caps



Railing Systems | Arm Rail & Footrail Application



Railing Systems | Guard Rail & Stair Rail

Components:

➔ **Tubing**

- ➔ 1-1/2" and 2" diameter

➔ **Connector**

- ➔ Flush fitting
- ➔ Ball fitting
- ➔ Glass Clips

➔ **Flanges**

- ➔ To connect to wall or floor

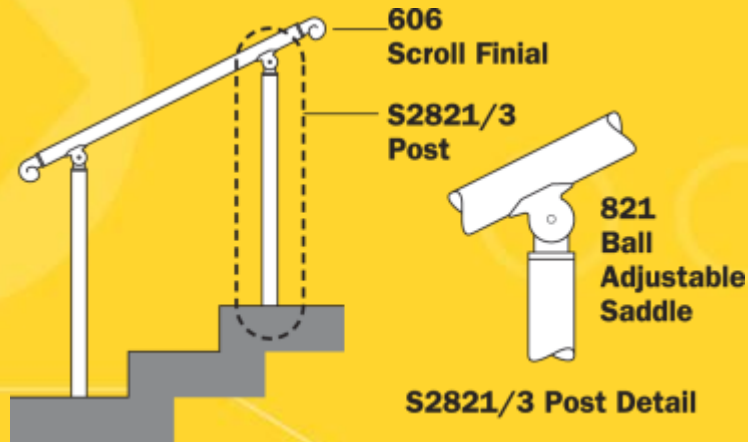
➔ **End Treatments**

- ➔ Ball Finials
- ➔ End Caps



Railing Systems | Free Standing Rails

- Used as a transition handrail between split levels
- Use of individual components requires precise measurements



Railing Systems | Free Standing Rails

