

**TABLE OF CONTENTS**

<b>Technical Information</b> . . . . .	<b>Section 1</b> . . . . .	<b>Pages</b> . . . . .	<b>3 - 24</b>
Descriptions & Selection . . . . .			3 - 8
Materials & Construction . . . . .			9 - 11
Corrosion Resistance, Design Loading & Deflection . . . . .			12 - 20
Electrical Equipment & Grounding . . . . .			20 - 21
Formulas & Calculations . . . . .			22 - 24
<b>Profiles of Side Rails, Rungs, Bottoms &amp; Rung Options</b> . . . . .	<b>Section 2</b> . . . . .	<b>Pages</b> . . . . .	<b>25 - 31</b>
Side Rail Profiles. . . . .			26 - 28
Rung Profiles. . . . .			29
Bottom Profiles . . . . .			29
Rung Options . . . . .			30
Electrical Properties . . . . .			31
<b>I-Beam Ladder Load Tables</b> . . . . .	<b>Section 3</b> . . . . .	<b>Pages</b> . . . . .	<b>33 - 41</b>
4.5" - 8" High Ladder Load Tables . . . . .			34 - 41
<b>I-Beam Ventilated Bottom Trough Load Tables</b> . . . . .	<b>Section 4</b> . . . . .	<b>Pages</b> . . . . .	<b>43 - 49</b>
4.5" - 7" High Ventilated Bottom Trough Load Tables . . . . .			44 - 49
<b>I-Beam Solid Bottom Trough Load Tables</b> . . . . .	<b>Section 5</b> . . . . .	<b>Pages</b> . . . . .	<b>51 - 57</b>
4.5" - 7" High Solid Bottom Trough Load Tables . . . . .			52 - 57
<b>I-Beam Fittings</b> . . . . .	<b>Section 6</b> . . . . .	<b>Pages</b> . . . . .	<b>59 - 70</b>
I-Beam Fitting Charts . . . . .			60 - 61
Part Numbers for All I-Beam Fittings . . . . .			62 - 70
<b>Accessories &amp; Supports</b> . . . . .	<b>Section 7</b> . . . . .	<b>Pages</b> . . . . .	<b>71 - 79</b>
Splice Connectors . . . . .			72
Splices, Dropouts, End Plates & Box Connectors. . . . .			73
Separators . . . . .			74
Hold Down Clamps & Expansion Guides. . . . .			74 - 75
Hanger Clips & Trapeze Supports. . . . .			75 - 76
Wall Penetration Sleeves. . . . .			77
Mid-Span Splices/Quarter-Span Expansion Splices. . . . .			78 - 79
<b>Engineered Cable Tray</b> . . . . .	<b>Section 8</b> . . . . .	<b>Pages</b> . . . . .	<b>81 - 86</b>
Square Fittings . . . . .			82
Large Radius Fittings . . . . .			82
Cut-To-Length Tray . . . . .			83
Factory-Installed Splices. . . . .			83
Pre-Punched Ground Holes . . . . .			83
Factory-Installed Separators . . . . .			83
Drop-In Rung Modules . . . . .			84
Stadium Tray. . . . .			85
Walkable Covers. . . . .			86

## TABLE OF CONTENTS

<b>Covers &amp; Cover Accessories</b> . . . . .	<b>Section 9</b> . . . .	<b>Pages</b> . . . 87 - 115
Cover Charts . . . . .		88
Covers for Straights . . . . .		89 - 90
Cover Charts for Fittings . . . . .		92
Covers for Fittings . . . . .		93 - 110
Cover Clamps, Cover Splices & Cover End Caps . . . . .		111 - 115
<b>Accessories &amp; Support Materials</b> . . . . .	<b>Section 10</b> . . . .	<b>Pages</b> . . 117 - 156
Splices & Connectors . . . . .		118 - 121
Box Connectors, Wall Penetration Sleeves, End Plates & Dropouts . . . . .		122 - 123
Bonding Jumpers & Ground Clamps . . . . .		124 - 126
Separators, Mini Trim, Hold Downs & Hangers . . . . .		127 - 135
Trapeze Supports, Hanger Rods, Beam Clamps & Z-Brackets . . . . .		136 - 144
Wall Brackets, Strut & Strut Hardware . . . . .		145 - 151
C-Port Roof Blocks . . . . .		152 - 156
<b>Installation Details &amp; Sample Specifications</b> . . . . .	<b>Section 11</b> . . . .	<b>Pages</b> . . 157 - 169
Standard Splice Plate Installation Detail . . . . .		158
Expansion Splice Installation Detail . . . . .		158
Vertical Hinge Installation Detail . . . . .		159
Horizontal Hinge Installation Detail . . . . .		159
Hold Down Clamp Installation Detail . . . . .		160
AHDEC & SHDEC Universal Hold Down & Expansion Detail . . . . .		160
Hanger Clip Installation Detail . . . . .		161
SRZ Support Installation Detail . . . . .		161
SRSA Support Angle Installation Detail . . . . .		162
ASC-U & SSC-U Structural Connector Installation Detail . . . . .		162
Ground Clamp Installation Details . . . . .		163
Bar Style Cover Clamp Installation Detail . . . . .		164
RCC Style Raised Cover Clamp Installation Detail . . . . .		164
SH-VU Vertical Hanger Installation Detail . . . . .		165
Vertical Tray Support & Wall Penetration Sleeve Detail . . . . .		165
Wall Penetration Sleeve Installation Detail . . . . .		166
Sample Specification for I-Beam Ladder . . . . .		167
Sample Specification for I-Beam Trough . . . . .		168 - 169
<b>Fitting Layout Dimensions</b> . . . . .	<b>Section 12</b> . . . .	<b>Pages</b> . . 171 - 219
Layout Dimensions For All Tray ( <i>Except I6 &amp; I8</i> ) . . . . .		171 - 196
Layout Dimensions For All I6 & I8 . . . . .		197 - 219
<b>Index</b> . . . . .	<b>Index</b> . . . . .	<b>Pages</b> . . 220 - 223



## INTRODUCTION

Decade after decade, for over 60 years, MP Husky continues to be the trusted and proven name in Cable Tray. With more systems installed in more industries and environments than any other manufacturer, you can rest assured MP Husky has the experience and capability to meet your most demanding requirements. As we begin another decade, MP Husky is stronger than ever and positioned to lead the industry with the latest innovations, eco-friendly products, and engineering and manufacturing technologies. Our focus continues to remain on providing unmatched customer support, investing in our people, protecting the environment, and providing the most technologically advanced and engineered systems.

**MPHusky - Engineered to Support Powerful Reputations.**

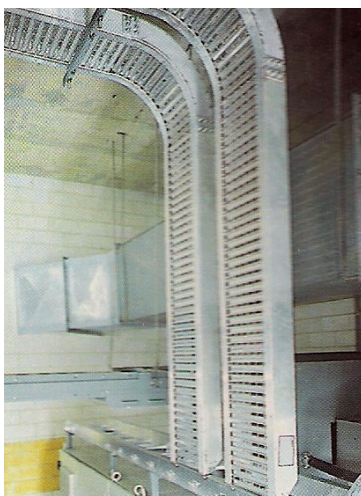
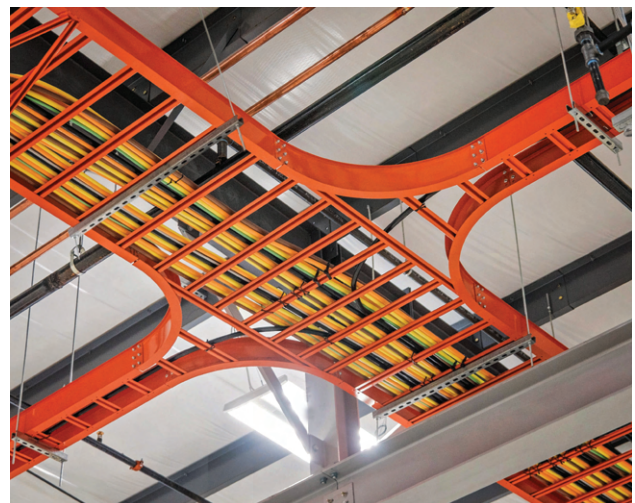


## DESCRIPTION & SELECTION

Cable tray systems provide rigid structural support for cables in a variety of commercial and industrial applications. The basic styles of cable tray are: Ladder, Trough, Wire Basket, EMI, Pan, and Channel. For a more comprehensive description of the construction and utilization of these types of tray, see the appropriate catalogs and brochures for the products.

### Husky Ladder

Ladder consists of two longitudinal side members connected by individual transverse members. It is intended for use primarily for power cable or control cable support and excels in heavy loading and longer span applications. It is available in I-Beam, Flange-In, and Flange-Out designs.



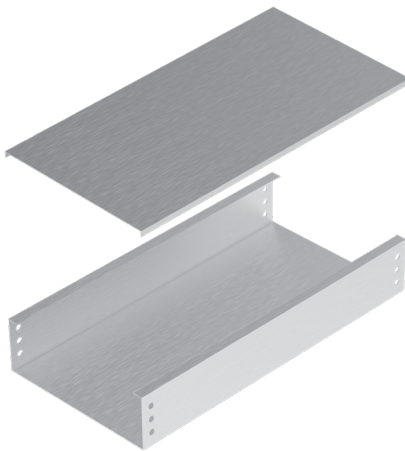
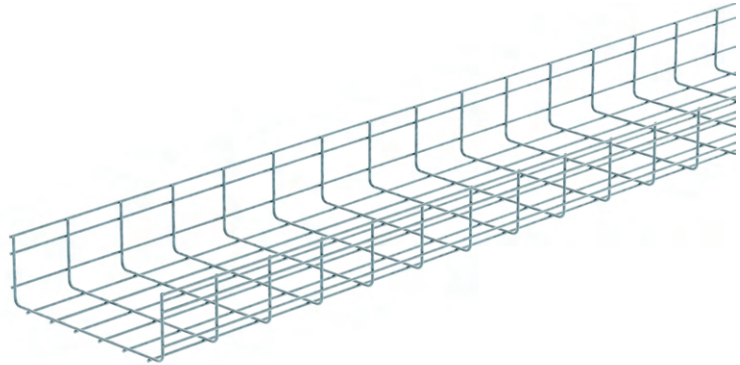
### Husky Trough

Husky Trough can be ventilated or non-ventilated. Ventilated trough has a slotted corrugated, perforated bottom or 4" rung spacing. Solid bottom trough has a corrugated, 06C corrugated or F04 flat sheet bottom.

## DESCRIPTION & SELECTION

### Husky Wire Basket

Wire basket is a wire mesh cable tray system that utilizes high mechanical strength steel wire that is welded into a 2" x 4" grid system. Wire basket is typically used to carry data communication and fiber optic cables, with a huge degree of flexibility during installation due to capability and ease of fabricating fittings in the field.

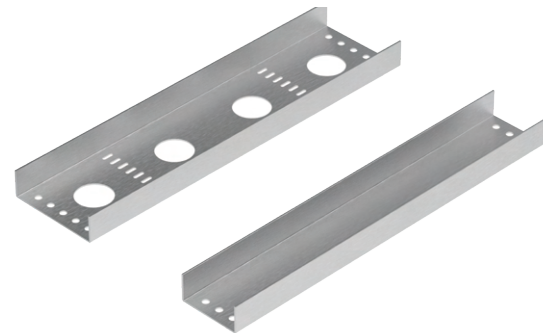


### Husky Pan Tray

Husky Way straight sections are one piece formed pan that provides a smooth flat bottom and a fill depth that is almost the same as the outside height of the tray. With a cover it provides complete protection for your cables (*cover sold separately*).

### Husky Channel

Channel is a one piece support with either ventilated or solid bottom sections. These sections are used with power cables, multiple control, or signal circuit cables. Channel is often used to make drops from the primary cable tray to equipment below such as motors, etc. Ventilated channel has slots for cable ties.



### Husky EMI Tray

Electromagnetic Interference protection enclosures are completely contained and used to protect sensitive cables from interference caused by electrostatic and electromagnetic fields as well as plane wave radiation and cross talk.

## LOADING

Cable tray is used in a wide variety of applications and under widely varying conditions, it is important to gain an understanding of material specifications and structural design, and apply that knowledge when selecting trays and specifying fittings, parts, and accessories. Some of the considerations are:

### 1. NEMA Class / CSA Class

Using the charts on the next page, determine the correct class of tray as it relates to the desired loading capacity per foot and support span. The weight of the cable and at what span it will be supported need to be known also.

### 2. Material

MP Husky cable tray is available in aluminum, stainless steel, hot dip galvanized after fabrication steel, pre-galvanized steel, galvanized steel, and fiberglass.

### 3. Tray Depth

The depths of tray available range from 2" to 10".

### 4. Tray Width

The standard widths available are 6", 9", 12", 18", 24", 30", and 36" (many other widths available in wire basket tray).

### 5. Tray Type

The seven types of tray available are: Ladder (Flange-In, Flange-Out, and I-Beam), Trough (Flange-In and I-Beam), Channel, Fiberglass, Pan Tray, EMI, and Wire Basket. Ladder tray is available with either 6", 9", 12", or 18" rung spacing; both Channel and Trough are available with either solid (non-ventilated bottom) or ventilated bottom.

### 6. Radius of Fittings

The standard radii for fittings are 12", 18", 24", 36", or 48" and are designed in the style and material to match any tray selection.

## NEMA LOAD CLASSIFICATION

The National Electrical Manufacturers Association (NEMA) has standardized the classification of cable tray based on the load to be carried per foot, and the distance between span supports. The load per foot should include not only the cable, but also additional load factors for wind, snow, ice, etc. For more information on loading, see page 6 in this section.



LOADING

*MP Husky manufactures Cable Tray in accordance with NEMA Standards NEMA VE-1 and CSA C22.2 No. 126.1*

NEMA Load Classification		
NEMA Class	Support Span ft (m)	Load lbs/ft (kg/m)
5AA	5 (1.5)	25 (37)
5A	5 (1.5)	50 (74)
8AA	8 (2.4)	25 (37)
8A	8 (2.4)	50 (74)
8B	8 (2.4)	75 (112)
8C	8 (2.4)	100 (149)
10AA	10 (3.0)	25 (37)
10A	10 (3.0)	50 (74)
12AA	12 (3.7)	25 (37)
12A	12 (3.7)	50 (74)
12B	12 (3.7)	75 (112)
12C	12 (3.7)	100 (149)
16A	16 (4.9)	50 (74)
16B	16 (4.9)	75 (112)
16C	16 (4.9)	100 (149)
20AA	20 (6.0)	25 (37)
20A	20 (6.0)	50 (74)
20B	20 (6.0)	75 (112)
20C	20 (6.0)	100 (149)



**MP Husky is a charter member of NEMA and the Cable Tray Institute.**

National Electrical Manufacturers Association

**NEMA**  
Setting Standards for Excellence  
Member

Cable Tray Institute

**CT**  
Member

CSA Load Classification		
Maximum Design Load For Maximum Associated Support Spacing		
Class	Load (lbs/ft)	Support Span (ft)
A	25	10
C	65	10
D	45/120	20/10
E	75/200	20/10

CSA Load Classification		
Maximum Design Load For Maximum Associated Support Spacing		
Class	Load (kg/m)	Support Span (m)
A	37	3
C	97	3
D	67/179	6/3
E	112/298	6/3

## OUR QUALITY POLICY

MP Husky is committed to producing only the highest quality products that meet or exceed our customers' expectations and requirements. Our goal is to achieve 100% customer satisfaction by delivering the best products and services. We will achieve this individually and corporately through tested and proven processes and controls, in our Quality Systems, with a constant focus and effort on continuous improvement.

Item	Standards
MP Husky Quality Program	<ul style="list-style-type: none"> <li>• ANSI / ASQC Q9001-2000 (ISO 9001 Compliant)</li> <li>• ASME NQA-1-2008 - 2009A</li> <li>• ANSI N45.2</li> </ul>
Manufacturing Standards	<ul style="list-style-type: none"> <li>• National Electric Code</li> <li>• National Electrical Manufacturers Association VE-1</li> <li>• Canadian Standards Association</li> <li>• American Welding Society</li> <li>• American Society for Testing and Materials</li> </ul>
Certification	<ul style="list-style-type: none"> <li>• <b>CSA Certified</b></li> <li>• UL Classified for use as an equipment ground conductor</li> </ul>
Load Test Standards	<ul style="list-style-type: none"> <li>• NEMA VE-1/CSA Tray Standards</li> </ul>
Cable Tray Manufacturing Standard	<ul style="list-style-type: none"> <li>• NEMA VE-1/CSA Tray Standards</li> </ul>
Cable Tray Installation Standard	<ul style="list-style-type: none"> <li>• NEMA VE-2 Cable Tray Installation Guidelines</li> </ul>
Grounding	<ul style="list-style-type: none"> <li>• NEMA</li> <li>• UL</li> <li>• CSA</li> <li>• NEC</li> </ul>
Welding	<ul style="list-style-type: none"> <li>• AWS D1.1 (American Welding Society Structural Welding Code: Steel)</li> <li>• AWS D1.2 (American Welding Society Structural Welding Code: Aluminum)</li> <li>• AWS D1.3 (American Welding Society Sheet Less than 3/16" Welding Code: Steel)</li> <li>• AWS C1.1/ANSI (American Welding Society Recommended Practices for Resistance Welding)</li> <li>• ASME QW 100.1 American Society of Mechanical Engineers</li> <li>• Welding Procedure Specifications (Procedure Qualifications Record)</li> <li>• Certified Welding Inspector</li> <li>• AWS Certified Welders</li> </ul>
Nuclear	<ul style="list-style-type: none"> <li>• ASME NQA-1 QUALITY ASSURANCE PROGRAM</li> <li>• NUPIC</li> </ul>

## NUCLEAR PROGRAM

MP Husky is audited in conformance with 10 CFR50 Appendix B - Nuclear Standards by the U.S. Nuclear Regulatory Commission. Appendix B to Part 50 - Quality Assurance Criteria for Nuclear Power Plants and Fuel Processing Plants. This appendix establishes quality assurance requirements for the design, manufacture, construction and operation of those structures, systems, and components. The pertinent requirements of this appendix apply to all activities affecting the safety related functions of those structures, systems, and components; these activities include designing, purchasing, fabricating, handling, shipping, storing, cleaning, erecting, installing, inspecting, testing, operating, maintaining, repairing, refueling, and modifying.



- We have and continue to serve over thirty nuclear plants around the world
- MP Husky has been compliant for over 45 years
- We are the ONLY cable tray manufacturer to be 10 CFR50 Appendix B compliant
- We are audited every three years by members of the Nuclear Procurement Issues Committee using the Nuclear Procurement Issues Committee Audit Checklist (NUPIC Audit Checklist)
- The scope of the audit is to ensure that our Quality Assurance Program (QAP) is compliant with ANSI N45.2 and 10 CFR50 Appendix B

## Nuclear Clients & Partners

Duke Energy  
 Duquesne Light & Power  
 Florida Power & Light  
 Cincinnati Gas & Electric Company  
 Gulf States Utilities  
 PA Power & Light Company  
 Consumer Power Company  
 Long Island Lighting Company  
 Illinois Power Company  
 WA Public Power Supply Systems  
 Commission Fed De Electricidad Mex  
 Carolina Power & Light Company  
 Texas Utilities  
 Florida Power & Light Company  
 Iowa Electric & Power Company  
 Louisiana Power & Light Company  
 Northern States Power Company  
 Taiwan Power Company  
 Public Service Electric & Gas  
 Puerto Rico Water Res.

Pacific Gas & Electric  
 SCANA  
 Southern California Edison  
 Southern Nuclear (Southern Company)  
 Wisconsin Public Service  
 Detroit Edison  
 Baltimore Gas & Electric Company  
 National Power Corporation  
 Public Service of New Hampshire  
 Florida Power Corporation  
 Cleveland Electric Illuminating  
 Boston Edison Company  
 Georgia Power Company  
 Houston Lighting & Power Company  
 Jersey Central Power & Light  
 Mississippi Power & Light Company  
 Ohio Edison Company  
 Power Authority of State of New York  
 Public Service of Indiana Inc.  
 Public Service Company of Oklahoma  
 Tennessee Valley Authority (TVA)

## MATERIALS & CONSTRUCTION

Cable tray systems are commonly fabricated from a corrosion resistant metal or from a metal with a corrosion resistant finish. The selection of the proper material is essentially an economic consideration.

Every cable tray installation places requirements on the mechanical properties of the material from which it is fabricated. These properties influence the spacing frequency of supporting members, and the ease of installation. The selection of the material may also be dependent upon electrical (conductivity), physical (appearance), or chemical (corrosion resistance) properties, according to the demands of the specific installation. Although there are numerous metals available that can satisfy the basic requirements, certain wrought aluminum alloys and low carbon steels meet these requirements most economically.



### Wrought Aluminum Alloys

Pure aluminum is soft and ductile. However, most commercial uses require greater strength than pure aluminum

affords. This strength is achieved by the addition of other elements to produce alloys which singly, or in combination, imparts strength to the metal. These alloys have been classified into seven categories according to their chemical composition, and have been given numerical designations (1000 through 7000) by the Aluminum Association for each series of alloy. In addition to alloying the pure aluminum, further strengthening is possible by heat treating or cold working (non-heat-treatable alloys).

**Heat-Treatable Alloys**—the initial strength of alloys in this group is enhanced by the addition of such alloying elements as copper, magnesium, zinc and silicon, and are designated as 2000, 6000, and 7000 series. Since these alloys individually, or in various combinations, show increasing solid solubility in aluminum with increasing temperature, it is possible to subject them to thermal treatments which will yield pronounced strengthening.

**Non-Heat-Treatable Alloys**—the initial strength of alloys in this group depends upon the hardening effect of elements such as manganese, silicon, iron, and magnesium, individually or in various combinations.

The non-heat-treatable alloys are designated as 1000,

3000, 4000, and 5000 series. As these alloys are work-hardenable, further strengthening is made possible by various degrees of cold working, denoted by the “H” series of tempers. Alloys containing sizeable amounts of magnesium, when supplied in strain-hardened tempers, are regularly given a final elevated temperature “stabilizing” to ensure stability of properties.

In determining the proper aluminum alloy for structural applications, such as ventilated cable tray systems, the design engineer should recognize the advantages inherent in using alloys that are heat-treatable and advantages of being able to fabricate the structure from materials possessing known minimum values of yield strength.

Cable tray products are most widely formed from the 6000 series alloys. Alloys in this group contain silicon and magnesium in approximate proportions to form magnesium silicide, which makes the alloys capable of being heat-treated. Major alloys in this series are 6061 and 6063, which are among the most versatile of the heat-treatable alloys. Though not as strong as most 2000 or 7000 alloys, the magnesium-silicon or (magnesium silicide) alloys possess good formability and corrosion resistance.

Basic structural members of aluminum cable tray systems can be made from 6063-T6 aluminum extrusions, a material that meets the requirements of the majority of installations and is economical. The 6063-T6 alloy has adequate strength and good corrosion resistance. It is light weight, maintenance free and because of the non-magnetic properties of aluminum, keeps electrical losses to a minimum.

**MP Husky manufactures Cable Tray in accordance with the latest edition of NEMA Standards Publication VE-1 and CSA Standard C22.2 No. 126.1.**



## MATERIALS & CONSTRUCTION

### Steel

Steel cable trays are used principally in environments that are relatively free from corrosive attack. The most widely used corrosion resistant finish for steel trays is hot dip galvanized after fabrication. The main advantages of using steel in cable tray fabrication is its high strength and low cost. Its disadvantages include increased structural weight, poor corrosion resistance, and low electrical conductivity.

The idea that all steels are the same, except for its chemical disposition is false. Carbon steels may be produced with chemical compositions (carbon, manganese, phosphorus, sulfur, and silicon) within the specified limits of a given grade and still have characteristics that are widely dissimilar. Each grade and quality variation has a useful place, depending upon the end use and the methods of fabrication.

Basic components of steel cable trays are normally fabricated from either hot-rolled or cold-rolled steel strips of commercial quality. Steels in this category are ASTM A1011 CS Type B (formerly ASTM A569) and ASTM A1008 CS Type B (formerly A366). Pre-galvanized steel and Galvannealed steel conform to ASTM A653 (formerly ASTM A525).

### Stainless Steel

Today, hundreds of different alloy combinations exist for the endless variety of applications that utilize stainless and heat-resisting steels. The primary elements added to obtain the various properties required in stainless include chromium, nickel, manganese, silicon, molybdenum, and the stabilizing elements of titanium, columbium, and tantalum.

Stainless steel contains at least ten percent chromium, along with other elements, to develop specific properties. Depending on the quality of the elements present in a stainless alloy, it will have a metallurgical structure that will be characteristic of the basic stainless steel groups. Metallurgists refer to these groups as the martensitic, ferritic, austenitic, and precipitation hardening stainless steels. All standard austenitic alloys are given numbers in the 200 and 300 series, while the martensitic and ferritic alloys are numbered in the 400 series. MP Husky offers cable trays and accessories in the 316 series. This austenitic alloy is remarkable in several aspects. Unlike

the other two classes, 316 contains nickel in quantities from 4 to 22 percent, while the percentage of carbon is kept relatively low. When chromium is increased for improved corrosion resistance, nickel must also be increased to retain the austenitic structure.

316 Stainless Steel has molybdenum added to improve corrosion resistance and high temperature strength. The carbon content is also lowered to improve welding performance.



**If your job calls for stainless steel, please contact the MP Husky factory for assistance in determining the correct system for your specific application.**



## MATERIALS & CONSTRUCTION

### Typical Applications include:

#### Type 304

- Beer barrels
- Chemical equipment
- Coal hopper linings
- Cooling coils
- Cryogenic vessels and components
- Dairy equipment
- Evaporators
- Food handling equipment
- Milking machines
- Nuclear vessels and components
- Oil well filter screens
- Pressure vessels
- Sanitary fittings and valves
- Shipping drums
- Still tubes
- Textile dyeing equipment
- Hypodermic needles
- Feedwater tubing

#### Type 316

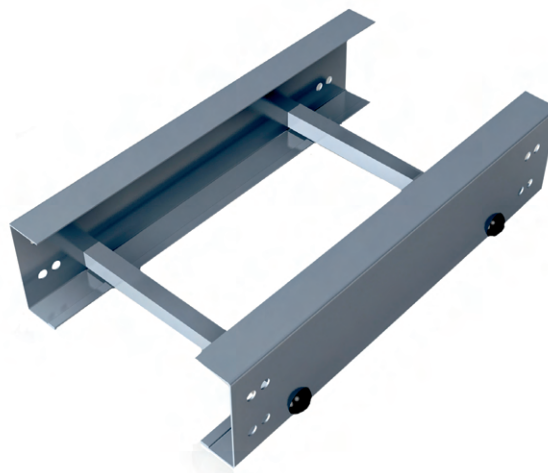
- Chemical processing equipment
- Chemical storage and transportation tanks
- Food processing equipment
- Steam cooking kettles
- Oil refining equipment
- Paper pulp digesters and evaporators
- Petroleum refining equipment
- Pharmaceutical processing equipment
- Scrubbers for environmental control
- Soap and photographic handling equipment
- General applications in textile industry

### Fiberglass

MP Husky's Fiberglass Cable Tray systems are manufactured from glass fiber-reinforced plastic shapes and provide the load capacity of steel, plus the inherent characteristics afforded by our Pultrusion Technology: non-conductive, non-magnetic, and corrosion resistant. Although light in weight, the strength to weight ratio surpasses that of equivalent steel products. MP Husky's Fiberglass Tray will not rust, nor does it ever require painting. It is available in both polyester and vinyl ester resin systems, manufactured to meet ASTM E-84, Class 1 Flame Rating and self-extinguishing requirements of

ASTM D-635. MP Husky's Fiberglass Cable Tray comes in gray or blue (polyester resin) and beige (vinyl ester resin) but is available in custom colors upon request.

For more than 40 years, MP Husky's Fiberglass Cable Tray systems have been tested and proven in the harsh environment of the offshore oil and gas industry. Our tray has stood up to the test of being exposed to the corrosive conditions inherent in petroleum products, plus the daily punishment of exposure to wind, weather, and salt water.



**MP Husky's  
Fiberglass Cable Tray  
is the perfect choice  
for harsh environments.**

## CORROSION RESISTANCE

The underlying causes of corrosion are the same for all metals, all stemming from electrochemical phenomena. But the ways which the corrosion manifests itself are characteristic of each particular metal. Steel corrodes in the atmosphere with the formation of rust, which develops very rapidly on unprotected surfaces. In a clean atmosphere, aluminum slowly develops a white or silver gray patina.

Aluminum surfaces weather by a characteristic of pitting and corrosion rates are often assessed by measuring the depth of the pits. The rate of pitting falls off after the first year or two, moving gradually to a standstill.

The strong, heat-treatable alloys of aluminum, with copper as one of the chief alloy elements, or certain fully heat-treated alloys with magnesium and silicon as major alloying elements, may manifest another type of attack, intercrystalline in nature, which may cause more pronounced loss of strength if allowed to continue. Such materials may require protection by painting, cladding, or metal spraying, depending on the environment.

Several characteristic modes of corrosive attack may be distinguished as follows:

**Simple Chemical Attack**—the solution of a metal by an acid is an obvious example of simple chemical attack. Simple chemical attack occurs when sulfides are in contact with steel or copper. Ordinarily, aluminum is not subject to such attack. A classic example of such chemical attack is sludge retaining rain water in the bottom of guttering. In this case, a corrosive solution is held in constant contact with the metal, and rapid attack may follow.

**Electrochemical Corrosion**—Accelerated corrosion of a metal through contact with another metal in moist or wet conditions is known as bimetallic or electrolytic corrosion. This corrosion is due to the action of a simple voltaic cell. The presence of a conducting solution is essential to this phenomenon but the presence of dissimilar metals is not essential provided that a difference of potential exists.

For any pair of contacting metals in the following Galvanic Potential list, the one listed higher is anodic and will corrode when in the presence of saline water or atmosphere. In addition to the nature of the two metals, the extent of galvanic attack depends upon many other factors that include:

- Concentration of the electrolyte, which determines its electrical resistance
- Nature of ions present in the electrolyte
- Polarization effects
- Effect of stable surface films on the metal
- Relative areas of anode and cathode
- The physical nature of the corrosion product
- Temperature variations

Each of these factors can influence the total resistance of the circuit. The following Galvanic Potential list is a compilation of solution potentials of metals and alloys with respect to a calomel electrode. This list provides an initial guide to the possible effects of bimetallic contact.

The corrosive nature of sea water and coastal environments is partly due to the low electrical resistance of salt solution. Similarly, the bad effects of industrial atmospheres on metals arise largely from the sulphur compounds and sulphurous and sulfuric acids, which are largely formed as a result of burning coal, that dissolve in the moisture in the air or rain as it falls, or in films of condensed water on the metal.

The extent and type of moisture is an important factor in determining the severity of galvanic attack. For indoor service, where wetting is infrequent, galvanic corrosion normally is no problem. Outdoors, attack may be relatively rapid in sea coast and industrial environments, where contamination, hence conductivity of rain and condensed moisture is high.

Several general rules can be applied in selecting metal combinations for use in corrosive environments. These include:

- Select metals as close together in the galvanic series as possible.
- For the anodic protection of steel, metals above steel in the series should be selected, or the steel should be galvanized or have some form of coating.
- Avoid combinations having a smaller area of the more anodic metal than of the cathodic, to avoid excessive current density on the anodic areas.
- Insulate dissimilar metals wherever possible to minimize galvanic corrosion.

## CORROSION RESISTANCE

### Galvanic Potential

#### Corroded End (*Anodic or Least Noble*)

- Magnesium
- Magnesium Alloys
- Zinc
- Galvanized Steel or Galvanized Iron
- Aluminum Alloy 5052-H
- Aluminum Alloy 3004-S
- Aluminum Alloy 3003-S
- Aluminum Alloy 1100-S
- Aluminum Alloy 6053-T
- Alclad
- Cadmium
- Aluminum Alloy 2117-T
- Aluminum Alloy 2017-T
- Aluminum Alloy 2024-T
- Mild Steel
- Wrought Iron
- Cast Iron
- Nickel Cast Iron
- Lead-Tin Solders
- Lead
- Tin
- Brass
- Copper
- Bronze
- Copper-Nickel Alloys
- Monel
- Silver Solder
- Nickel
- Inconel
- Chromium Iron
- 18-8 Stainless Steel
- Type 304 Stainless Steel (passive)
- Type 316 Stainless Steel (passive)
- Hastelloy C
- Silver
- Graphite
- Gold
- Platinum

#### Protected End (*Cathodic or Most Noble*)

### Aluminum Alloys

The corrosion resistance of aluminum alloys is due to the surface presence of a very thin protective film of aluminum oxide that has strong self healing properties when damaged. The oxide film begins to form on the surface of the bare metal immediately after exposure to air. The film grows rapidly for several days, then slowly until it reaches a thickness of approximately 0.0000002". Corrosion of aluminum can only occur when the oxide film is damaged or removed and conditions prevent its formation.

Substances that may come in contact with aluminum can be divided into three groups:

**Substances that attack the oxide film** These include the majority of strong alkalis, mercurial compounds, and most strong acids.

**Substances that cause localized breakdown of the oxide film (pitting)** Aluminum is suitable only under certain conditions, such as some natural fresh waters and aqueous solutions containing traces of mercury, copper, or other heavy metals.

#### Substances that do not attack the oxide film

The majority of substances fall in this group, including many industrial chemicals.

The majority of aluminum installations provide satisfactory service, free from corrosion, and only in exceptional cases do problems occur. When problems do occur, they can be attributed to one or more of the following causes:

- Wrong choice of alloy
- Exposure conditions
- A bimetallic joint that causes galvanic corrosion
- Crevices
- Unwise location of the aluminum assembly, resulting in deposition corrosion
- Contact with aggressive chemicals

Among the heat-treatable alloys, the 6000 series has adequate resistance to industrial and marine atmospheres.

With the exception of certain corrosive chemicals, no corrosion at all will occur if water is not present. Thus, indoor installations that are not in contact with water or installations that are maintained in dry conditions will not corrode.

## CORROSION RESISTANCE

### Steel with Zinc Coatings

In order to determine the performance of different types of zinc coatings in a corrosive environment, data from various atmospheric tests is collected and reviewed by American Society of Testing Materials. From the results of these tests, the following conclusions can be made:

**The corrosion rate of zinc** on galvanized sheets is practically linear in industrial or rural atmospheres, and in a marine atmosphere that is polluted with industrial contaminants. In these atmospheres, a sheet with double the weight of coating than that of another sheet can be expected to last twice as long before rusting of the base metal occurs.

**The composition of the base metals** has no measurable effect on the life of zinc coatings. However, the composition of the base metals is the major factor in the years to perforation.

**The corrosion rate of zinc** varies more with the type of atmosphere (marine or industrial) than does that of steel or iron.

**The chloride content of sea air** apparently has an accelerating effect on the corrosion of zinc coating.

**Rainfall removes about 75% of the corrosion products** from zinc surfaces, if the results of tests in rural, industrial, and marine exposures are averaged together. The residual corrosion products remaining on the surface become basic in character and exert a retarding influence on corrosion. In highly industrialized or polluted atmospheres, this basic film may not exist, leading to the more rapid attack experienced in these atmospheres.

**Indoor atmospheres** Variations in humidity and temperature indoors are somewhat less extreme and there is no rainfall indoors to dissolve and remove soluble corrosion products. The general assumption is that zinc coating of the same thickness has five times greater protective life when placed indoors rather than outdoors in the same locality.

**The indoor corrosion of zinc** may be severe when moisture condensation is frequent and air circulation is restricted. This effect is particularly bad in humid, tropical locations with nightly condensation.

These conclusions indicate zinc coatings will have an acceptable service life expectancy regardless of how the end point of failure is defined. It should be noted that whenever maintenance, such as painting, is neglected, it is unreasonable to expect galvanized steel to last indefinitely.

### Finishes

Cable trays fabricated of steel can be protected from corrosion by coating with another metal using one of the following methods:

- **Continuous Hot-Rolled Galvanizing**

*ASTM Designation Specifications for Zinc Coated (Galvanized) Iron or Steel Sheets, Coils, and Cut Lengths*—This process applies a zinc coating to sheet steel prior to fabrication of the product (pre-galvanized cable tray) by passing the metal downward through a molten ammonium chloride flux bath, and then into the zinc and out again by means of rolls.

The MP Husky standard zinc coating designation is G90, which has an average zinc coating weight of 1.25 ounces per square foot of steel for an average coating on both surfaces of 1.06 mils.

- **Galvannealed**

*ASTM Designation ASTM A653 CS Type B Standard Specification for Steel Sheet, Zinc Iron Alloy Coated (Galvannealed) by the Hot-Dip Process*—This process applies a zinc coating to sheet steel prior to fabrication of the product by passing the metal downward through a molten ammonium chloride flux bath, and then into the zinc and out again by means of rolls. After galvanizing the material is further annealed to a gray dull matte finish that has excellent paint adhesion properties.

The MP Husky standard Galvannealed coating designation is A60.

- **Hot Dipped Galvanizing After Forming**

*ASTM Designation A123 Specification for Zinc Coating (Hot Dip) on Assembled Steel Products*—This process is used to apply a zinc coating to an already fabricated product. The product is first cleaned in a caustic bath, then further cleaned by a pickling acid bath. The article is then thoroughly rinsed and dipped in a bath of molten zinc. The

## CORROSION RESISTANCE

nature and thickness of the coating depends largely on the immersion rate, temperature of the bath, immersion period, and withdrawal rate. The resulting coating consists of an outer layer of relatively pure zinc, and lower layers of iron-zinc compounds.

Generally, hot dip coatings are non-uniform, except on very simple shapes and are usually thickest at small recesses (unless these remain uncoated altogether). The advantage of this method is that the zinc applied is thicker than when applied by other processes. However, the protective characteristics of zinc coating under atmospheric conditions have been found to be equal, regardless of process: i.e. zinc coatings of the same weight have approximately the same service life.

- **Zinc-Plated**

*ASTM Designation B633*—Standard Specification for Electro-deposited Coatings of Zinc on Iron and Steel. Wire basket and many accessory and hardware items are Zinc-Plated for protection against corrosion.

- **Epoxy Coated**

Trays can be epoxy coated to provide protection against corrosive elements and chemicals. Epoxy is often used in combination with hot dip galvanizing to provide a two part protection against harsh environments.

- **Powder Coated**

Trays are powder coated for corrosion protection as well as just for appearance reasons. Trays can be powder coated in a variety of colors.

- **Anodized**

Aluminum trays are often anodized to provide corrosion protection. This process is often used on aluminum tray when used near salt water. Anodizing can also be used to provide a unique color appearance. However when an aluminum tray is anodized the electrical conductivity is reduced.



## DESIGN LOADING

This section presents guidelines for classification of design conditions with respect to weather factors, methods of determination and application of various types of loadings encountered, maximum allowable working stresses, and other pertinent considerations. This information will assist the designer in evaluating materials and product catalog information so that he/she can design a system that will achieve the desired strength and rigidity at the lowest possible installed cost.

### Load Classification

Loads on structures are usually divided into three types:

- **Dead loads** do not change their magnitude or their position during the life of the structure.
- **Live loads** that change their magnitude, their position and/or their direction during the life of the structure.
- **Dynamic loads** are caused by the motion of the live load or the movement of the structure.

Because of its general nature, this load classification can be used for any structure. However, for the purpose of establishing a practical load classification for cable tray system design, it is necessary to create additional subdivision, and provide a guide for assumption of specific loads. For cable tray system design, the three basic load types are also considered as follows:

#### Dead Loads

Since dead loads are the weight of the members that make up a tray or tray support, they have a known value. A summation of the weights of the individual members is all that is required to calculate the dead load.

#### Live Loads

In cable tray design, dynamic loads are considered to be as follows:

- **Design load** is the weight of cables, cable tray accessories, and sometimes workers (which vary in both magnitude and position). Cable-only design loads can be determined by adding the component weights of the system.

(Any provision for workers will require an assumption of magnitude and position for practical purposes, an assigned weight acting at mid-span of the tray).

- **Parasitic loads** such as ice, snow, wind, traction, and electromagnetic forces exist only because the tray exist. They are the most difficult to determine, and different assumptions can be made about their affect on the overall loadings. The following information will provide a general guide.

Three general degrees of loading due to weather conditions are recognized in the National Electrical Safety Code (NESC), and are designated as heavy, medium and light loading.

Values used in determining conductor loadings under these conditions for ice, wind, and temperature are given in **Table 1 (Degrees of Loading Due to Weather)**.

Table 1

Degrees of Loading Due to Weather National Electrical Safety Code Values			
Condition	Heavy	Med.	Light
Radial thickness of ice (in)	0.50	0.25	0.00
Horizontal wind pressure (lbs/sq ft)	4	4	9
Temperature (°F)	0	15	30

However, modifications of these values are necessary when applied to cable tray systems, since the NESC is concerned primarily with the construction of overhead supply and communication lines. Such modifications are as listed below:

- Ice Loading**—The NESC loading of 1/2" thickness is applied to both cables and cable tray. In applying loadings to interlocked armored cables, and bare stranded conductors or suspension cables, the coating of ice is considered as a hollow cylinder with an inside diameter equal to the outside diameter of the cable or strand. Ice is assumed to weigh 57 lbs per cubic foot.
- Snow Loading**—The NESC does not consider snow loading, and in general this also applies to cable tray systems. However, in the case of a solid cover on a tray, the minimum load of 5 lbs per square foot should be used for outdoor installations where snow is a factor.

DESIGN LOADING

- c. **Wind Loading**—The NESC loadings are modified as follows, in order to provide adequate protection against the maximum wind velocities encountered with consideration of the shapes of the various structures (not considered by NESC).

**Wind Velocity**—In the loading tables, wind means horizontal wind. Wind velocity will be considered to be true wind speed, corrected for instrumentation errors. Any variation of velocity with height is not considered; all structures will be under 100 feet in height, and 100% of the ground velocity is assumed to be adequate.

**Wind Loads**—The exteriors of all structures, with the exception of cylindrical structures, shall be loaded with a wind pressure normal to the surface having an intensity given by the formula:

$$W_p = C V_p$$

**Wp** = Wind Pressure in pounds per square foot

**C** = Coefficient depending upon the size, shape, and position of the structure in the wind and having values specified in *Table 2 (Shape Factors)*

**Vp** = Impact Pressure =  $0.00256V^2$   
(Where V = The design velocity).  
Values of Vp may be obtained from *Table 3 (Impact Pressures)*

Table 2

Shape Factors	
Structure	Shape Factor "C"
Isolated Structural Shapes	2.0
Trusses, Towers, Etc.	2.0
Wires, Cables, Etc.	1.2
Pipe Supports, Poles, Etc.	1.0

For trusses and towers the wind load is assumed to be acting on the projected area of the windward face only. For structures with circular cross sections, the affected area is the area projected on a vertical plane.

Table 3

Impact Pressures			
V (mph)	Vp (psf)	V (mph)	Vp (psf)
15	0.58	85	18.5
20	1.02	90	20.7
25	1.60	95	23.1
30	2.30	100	25.6
35	3.13	105	28.2
40	4.09	110	30.9
45	5.18	115	33.8
50	6.39	120	36.8
55	7.73	125	40.0
60	9.21	130	43.3
65	10.80	135	46.6
70	12.50	140	50.1
75	14.40	145	53.8
80	16.40	150	57.6

These values are for an air density of 0.07651 lbs per cu ft corresponding to a temperature of 60°F and barometric pressure of 14.7 lbs per sq in.

**Wind Direction & Distribution**—The allowance for wind pressure shall be made assuming the wind from any possible direction to be critical. Wind loads shall be considered uniformly distributed.

- d. **Traction Forces**—These forces are caused by the cables starting and stopping during the cable installation period, and they vary in magnitude and direction. They are of such nature that no general assumptions can be made to provide for them. However, the safety factors selected for the basic design stresses should be conservative enough to provide for these forces when they do occur.

- e. **Electromagnetic Forces**—These forces, caused by short-circuit current during a cable fault, vary in magnitude and position. It is impractical to make an assumption providing for them. Ordinarily, the safety factors selected for the

## DESIGN LOADING & DEFLECTION

basic design stresses will be adequate. However, in installations where these forces are of such magnitude that they become a factor in the design of the cable tray system, adequate provision must be made so that the design stresses are not exceeded.

### Dynamic Loads

In cable tray design, dynamic loads are considered as follows:

- **Impact loads**—result because the live load is in motion, are loads in addition to the static weight of the live load. Such loads could be caused by cables being dropped onto it, or by workmen walking on it or climbing up or down a ladder leaning against a tray. These loads are provided for in the same manner as traction forces. The safety factors selected for the basic design stresses should be conservative enough to provide for these forces if they occur.
- **Inertia loads**—Are caused when the structure itself is in motion, such as may occur during an earthquake. An earthquake is considered to give the structure a horizontal acceleration, and the resulting acceleration and deceleration cause forces proportional to the mass and to the acceleration and deceleration. These loads represent special design requirements, and the design loading should be in accordance with the ASA's *"American Standard Building Code Requirements for Minimum Design Loads in Buildings and Other Structures"* or other suitable specifications.

### Design Loadings

Basic cable trays are designed on the basis of maximum allowable stress for a certain section and material. Therefore, the allowable cable load will vary with span, type and width of tray. The design loadings for cable tray are given in the form of load tables. These tables are located on pages 33 through 57.

The design loadings are to be used for designing standard supports, which necessitates assuming design loadings for the cable trays to be supported.

The concept of "Cables in Free Air" for power distribution and control cables has been adopted primarily for economic reasons. Cable tray support systems should be designed, whenever possible, for minimum installed

cost. In order to achieve this objective, the engineer must bear in mind that the general design rules established for aluminum and steel structures are not always compatible with design rules for a cable tray system. This is particularly applicable in the case of restrictions on deflection.

Since the most economical cable tray system uses heat-treated aluminum alloys, or high strength steels with long spans, any limitation on deflection that will not permit the best utilization of material and design will increase the cost. By limiting the maximum fiber and shear stress used in the design, the adequacy and safety of the structure is ensured.

### Why Limit Deflection?

The primary reason to limit deflection in cable tray systems is appearance. Engineers and owners take pride in the appearance of their plants. Rigid restrictions on deflection of cable trays installed at eye level or in a prominent location are common. However, it is neither economical nor good engineering practice to restrict deflection of a cable tray system in less prominent areas.

### Methods of Decreasing Deflection

There are various ways to limit deflection of a cable tray. If the objective is minimal installed cost, the options should be considered in this order:

- **Decreasing stress by decreasing the bending moment** This can be accomplished by introducing restraining moments at the end of a span in the form of a rigid support. The deflection in a continuous beam, with negative bending moments at the intermediate support points, is only a fraction of the simple beam deflection.
- **Increasing depth of the tray** Deflection in any location can be reduced by increasing the depth of the load-carrying side members and/or by adding to their cross-sectional area. Adding to the depth generally utilizes the material most economically.
- **Increasing modulus of elasticity** Since the modulus of elasticity of steel is  $29 \times 10^6$  psi, and that of aluminum alloys is only  $10 \times 10^6$  psi, greater deformation of aluminum alloy trays is to be expected at any given stress level. Under its own weight, an aluminum beam will deflect the same amount as an identical steel beam, since not only



## DESIGN LOADING & DEFLECTION

the weight, but also the modulus of elasticity is only one-third that of steel. However, under the same applied load (disregarding the beam's own weight), aluminum will deflect almost three times as much as steel. Therefore, consideration must be given to the choice of material for any one location, for an isolated run or for an entire installation.

- **Decreasing span length** For economic reasons, this method of reducing deflection should be a last resort, as it increases field labor considerably. However, it can be an effective means to improve the appearance of an installation when the number of spans to be reduced is small in comparison to the number in the entire installation.

### Deflection Criteria Applied to Cable Tray

Design rules and specifications developed for steel cannot and should not be applied to aluminum alloys, as this would not permit the most economical use of these materials. Deflection criteria which apply only to steel, and should not be used when the most economical system is desired, include:

- **Span-deflection ratio** Example: Deflection is limited to 1/300 of the span by the National Electrical Manufacturers Association specifications for structures supporting air switches. While very important in that instance, as even slight deflection could cause misalignment in the operating mechanism and result in binding and difficult switch operation, the application of this specification to a cable tray is uneconomical and not recommended.
- **Depth to span ratio** Example: The American Institute of Steel Construction, in the specifications for buildings, defines the depths of beams and girders in floors to be not less than 1/24 of the span or not less than 1/20 of the span where shock or vibration may be encountered. This specification ensures a certain rigidity and levelness of the structure, which is important in that instance, but cannot be justified for cable tray systems because of the higher cost involved.
- **Deflection constant** Example: Deflection is limited to a certain amount by an engineering company for a tray system. While such specifications might make a system using 8 foot

spans look better, it prohibits the use of more economical designs with longer spans that have a much greater deflection and still look acceptable. Such a specification increases the cost of the tray system unnecessarily, especially if the trays are to be installed well above eye level.

### Summary

As a guide, a span-deflection ratio of 1/200 satisfies most owners. This ratio provides an allowable deflection of 0.6" in a 10 foot span, 0.72" in a 12 foot span, and 1.20" in a 20 foot span under the actual loads encountered. Data for calculating deflection is presented in *Table 4 (Constants for Beam Deflections)*.

DESIGN LOADING & DEFLECTION

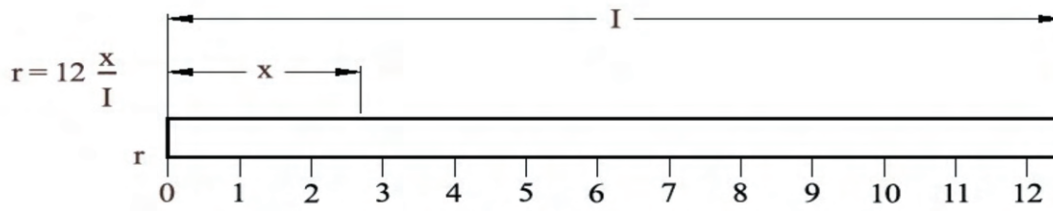


Table 4

Constants for Beam Deflections											
		2 Span	3 Span		4 Span		5 Span				
r	Free Beam	Span 1 Span 2	Span 1 Span 3	Span 2	Span 1 Span 4	Span 2 Span 3	Span 1 Span 5	Span 2 Span 4	Span 3	Fixed Beam	r
0	0	0	0	0	0	0	0	0	0	0	12
1	2.94	1.490	1.800	-0.363	1.680	-0.155	1.71	0.251	0.337	0.190	11
2	5.79	2.780	3.360	-0.311	3.180	0.078	3.24	0.389	0.804	0.691	10
3	8.03	3.970	4.640	-0.078	4.400	0.544	4.37	1.710	1.810	1.23	9
4	9.75	4.450	5.500	-0.181	5.220	1.020	5.10	2.570	2.200	1.77	8
5	10.88	4.570	*5.910	-0.389	5.530	1.350	5.65	3.130	2.450	2.14	7
6	11.31	4.490	5.860	-0.449	5.470	1.620	5.56	4.150	2.720	2.25	6
7	10.88	3.980	5.360	-0.389	4.970	1.640	4.88	3.320	2.450	2.14	5
8	9.75	3.160	4.480	-0.181	4.110	1.360	4.19	3.200	2.200	1.77	4
9	8.03	2.080	3.270	-0.078	2.930	1.030	3.01	2.590	1.810	1.23	3
10	5.79	1.180	2.090	-0.311	1.830	0.640	1.89	1.850	0.804	0.691	2
11	2.94	0.285	0.804	-0.363	0.657	0.147	0.70	0.838	0.337	0.190	1
12	0	0	0	0	0	0	0	0	0	0	0

\*Maximum Deflection for Continuous Beams up to and including 5 Spans.

Formula	Calculation	Where
$\Delta = C \frac{WcL^4}{EI} = 1.92 \times \frac{5.65}{11.31} = 0.96 \text{ (in)}$		$\Delta$ Deflection (in)
		Wc Carrier Load (lbs/ft)
		L Span Length (ft)
		E Modulus of Elasticity (psi)
		I Moment of Intertia of Carrier Stinger (in <sup>4</sup> )
		C Values shown in table

Example: A cable tray with specified load has a simple beam deflection of 1.92 inches at mid-span. Find the deflection for the fifth span of the 5 span installation. From the table above, the maximum constant in the free beam columns is 11.31. Note that this is the center of the span. For the 5 span installation, the maximum constant in the 5 span column is 5.65, which is not in the center, but 7/12 of the span length from the support between spans 4 and 5. For maximum deflection of the fifth span see above.

ELECTRICAL EQUIPMENT & GROUNDING

A cable tray system must provide protection to life and property against faults caused by electrical disturbances, lightning, failures that are a part of the system, and the failure of equipment that is connected to the system. For this reason, all metal enclosures of the system, as well as non-current carrying or neutral conductors, should be

tied together and reduced to a common earth potential. This includes the structural steel of a building, all piping for water, gas, steam, sewers, tanks, well casings, down spouts, gutters, siding, and roofing. There are two distinct divisions to the grounding problem: System Grounding and Equipment Grounding.

## ELECTRICAL EQUIPMENT & GROUNDING

*The following explanation gives the reasons for grounding, and how to provide for it.*

### System Grounding

The purpose of system grounding is to drain off any excessively high voltages that may accidentally come on the tray system. If the system is properly grounded by means of a low-resistance conductor of sufficient capacity, the current will be carried off to earth immediately with minimum danger of fire or shock. In a grounded system, an accidental grounding of one of the current-carrying conductors will result in a short circuit, causing a fuse or circuit breaker to open.

### Equipment Grounding

Equipment grounding means the connection to earth of all exposed, noncurrent-carrying metallic parts of the components of the distribution system. The purpose of this ground is to prevent a voltage higher than earth potential on cable tray or equipment. Therefore grounding reduces the danger of shock or fire in the event a live conductor comes in contact with these conductive parts.

### Methods of Grounding

Effective grounding must be permanent and continuous, and have ample capacity to safely conduct any current likely to be imposed on it. It should also have impedance sufficiently low to limit the potential above ground and to facilitate operation of over-current devices in the circuit. A continuous, under-ground metallic water supply system is acknowledged to be the best electrical ground. Other suitable methods of grounding include continuous metallic steam and gas piping systems, the grounded metal framing of the building, or an artificial electrode such as a driven steel pipe, galvanized or otherwise protected from corrosion, or a buried metallic plate.

The tray system and equipment ground connections should be made to the same electrode at the service entrance, on the supply side of the equipment used for disconnecting the service. Equipment should be solidly tied in with the system ground. It is also important, that wherever multiple grounds are used, they be tied together in order to avoid any difference of potential between the various parts of the tray system.

Complete rules for grounding are contained in *Article 250 of the National Electric Code*.

### Electrical Properties of Cable Tray

MP Husky has always recognized the importance of electrical design, as well as structural design, to provide positive, safe protection to personnel, facility, and equipment. Thorough testing has proven that the cable support system must be electrically designed for maximum carrying capacity. Based on this, Power cables may have short circuit capacity from 5,000 to 150,000 amperes, and the division of fault current places considerable burden on the support system, even though adequate grounding has been provided. **Table 5 (Division of Fault Currents)**, shows the division of fault current determined by tests of an aluminum and a steel interlocked armored 3 conductor 4/0 cable on a MP Husky aluminum cable ladder.

It is not the purpose or intent of the support system to be used for a continuous ground, but to provide extremely high, one second current-carrying capacity as a safety feature. The entire system should be grounded at periodic intervals to keep the potential at or below 100 volts in case of a cable fault. MP Husky cable trays are classified by Underwriters Laboratories® as to their suitability as an equipment grounding conductor only.

**Table 5**

Division of Fault Currents						
Fault Current Path	Steel Armored Cable			Aluminum Armored Cable		
	% through armor	% through ground wire	% through ladder	% through armor	% through ground wire	% through ladder
Armor and Ladder	50	—	50	23	—	77
Armor, External Ground Wire and Ladder	50	23	27	17	37	46
Armor, Internal Ground Wire and Ladder	5	74	21	9	54	37

## TRAY SIZING

### Sizing Trays for Multiple Conductor Cables

NEC Section 392.22 lists the requirements for installing multiple conductor cables in ladder, ventilated trough, solid bottom trough, solid channel, or ventilated channel-type trays.

For ladder or ventilated trough trays, the diameter of all cables No. 4/0 and larger must be added together and the total must not exceed the width of the cable tray. Cables must be placed side by side. NEC Table 392.22(A), Column 1 is used for cables less than 4/0. These cables do not have to be placed side by side. NEC Table 392.22(A), Column 2 is used for a combination of cables rated larger than 4/0 and smaller than 4/0.

The total cross-sectional areas of the cables in trays with an inside depth of 6 or less, containing control and/or signal cables, must not exceed 50 percent of the cross-sectional area of the tray.

For solid bottom trays, the diameter of all cables No. 4/0 and larger must not exceed 90 percent of the cable tray width. NEC Table 392.22(A), Column 3 is used for cables smaller than 4/0. NEC Table 392.22(A), Column 4 is used for a combination of cables rated 4/0 or larger, or less than 4/0.

For trays with an inside depth of 6 inches or less, containing control and/or signal cables, the total cross-sectional areas of the cables must not exceed 40 percent of the cross-sectional area of the tray.

For ventilated channel-type trays, the total cross-sectional areas of all cables must not exceed 1.3 square inches for 3" wide trays, 2.5 square inches for 4" wide trays, or 3.8 square inches for 6" wide trays.

For solid bottom channel, the total cross-sectional area must not exceed 1.1 square inches for 3" wide, 2.1 square inches for 4" wide and 3.2 square inches for 6" wide trays.

### Sizing Trays for Single Conductor Cables

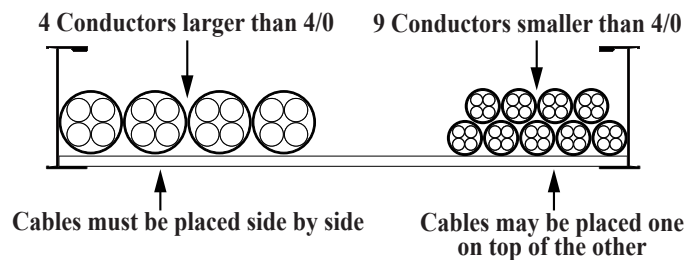
For ladder or ventilated trough trays, the total diameter of all cables 1000MCM and larger must not exceed the width of the cable tray. NEC Table 392.22(B)(1), Column 1 is used for cables 250kcmil through 900kcmil. NEC Tables 392.22(B)(1), Column 2 is used for a com-

bination of cables rated 1000MCM and larger, and smaller than 1000MCM. For ventilated channel trays, the total diameter of all cables must not exceed the inside width of 3", 4", or 6" wide trays.

#### Problem: Multiple Conductor Cables

What size ladder-type cable tray is required for 9 multi-conductor cables smaller than 4/0 and 4 multi-conductor cables larger than 4/0? The total diameter (in inches) for the 4/0 and larger cables is 12.6" and the total area for the cables rated less than 4/0 is 22 sq. in.

*Cable tray width must be selected from NEC Table 392.22(A) and be based on the calculation in column 2.*



*Note: Square inch area of cables obtained from manufacturer.*

**Step 1:** NEC 392.22(A)(1)(c)  
Sq. in. of cables, smaller than 4/0 = 22 sq. in.  
Diameter of cables larger than 4/0 = 12.6"

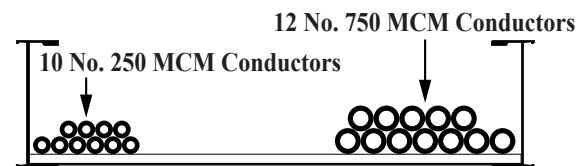
**Step 2:** NEC Table 392.22(A) Column 2  
22 sq. in. + (12.6 x 1.2) = 37.12 sq. in.  
A 36" wide tray has 42 sq. in. area

**Answer:** The inside width of the cable tray must be equal to 36"

#### Problem: Single Conductor Cables

What size tray is required for (10) No. 250 MCM RHH RHW copper conductors and (12) No. 750 MCM RHH RHW copper conductors laid in a ladder tray?

*Cable Tray must be selected from NEC Table 392.22(B)(1) and be based on square inch area shown in Column 1.*



Cables may be placed on top of each other

**Step 1:** 250 MCM = 0.554 sq. in.  
750 MCM = 1.286 sq. in.

**Step 2:** NEC 392.22(B)(1)(b)  
.554 x 10 = 5.54 sq. in. + 1.286 x 12 = 15.43 sq. in.  
= 20.97 sq. in.

**Step 3:** NEC Table 392.22(B) Column 1  
18" wide tray = 19.5 sq. in.  
24" wide tray = 26.0 sq. in.

**Answer:** The inside width of the cable tray must be equal to 24"

## FORMULAS & CALCULATIONS

### Calculate the load for a span shorter than the one shown in the load table.

Formula: Take the load shown on a known span, multiply by the known span squared and divide it by the desired shorter span squared. See sample load table below. Calculate the load for a 10' span.

A()IJC5-(W)-144()									
NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Part No.	UL EGC (amps)	LD (in)	FL (in)	Fitting Prefix
12C		12ft 10ft	122 (182) 176 (262)	1.15 (29.2) 0.80 (20.3)	A(RS)IJC5-(W)-(L)	1200	3.9	2.0	ALIJC5
SWL* stands for Safe Working Load									
RS stands for Rung Spacing									

Formula	Calculations	Where
$W_2 = \frac{W_1 \times L_1^2}{L_2^2} = \frac{122 \times 12^2}{10^2} = 176 \text{ lbs/ft on } 10' \text{ span}$		$W_2$ Calculated load for the new span
		$W_1$ Load shown in table above for 12' span
		$L_1$ Span shown in table above
		$L_2$ Desired Shorter span

### Calculate the deflection for the new load value of 176 pounds per foot on a 10' span.

Formula: Divide the new known load for the 12' span by the desired load for the 10' span and multiply the result by the deflection for the known 12' span. See sample load table above. Calculate the deflection for the new load on 10' span.

Formula	Calculation	Where
$D_2 = \frac{W_1}{W_2} \times D_1 = \frac{122}{176} \times 1.15 = 0.80"$		$D_2$ Calculated deflection for the new load
		$W_2$ Calculated load for the new span
		$W_1$ Load shown in table above for 12' span
		$D_1$ Deflection shown in table above for 12' span

### Calculate the deflection for a load smaller than the load shown for the span in the load table.

Formula: Divide the desired load by the known load shown in the deflection table and multiply the answer by the deflection shown for the known load in the deflection table. See sample load table above. Calculate the deflection for a load of 80 pounds per foot on a 12' span instead of 122 pounds per foot as shown.

Formula	Calculation	Where
$D_2 = \frac{W_2}{W_1} \times D_1 = \frac{80}{122} \times 1.15 = 0.754"$		$D_2$ Calculated deflection for smaller load
		$W_2$ Smaller load for the span
		$W_1$ Load shown in table above for 12' span
		$D_1$ Deflection shown in table above for 12' span



FORMULAS & CALCULATIONS

**Convert a load with a 1.5 safety factor to a load with a 2.0 safety factor.**

Formula: Multiply the load with a 1.5 safety factor by 0.75 to convert it to a load with a 2.0 safety factor. See sample-load table below: Example: Convert 122 pounds per foot with a 1.5 safety factor to a load with a 2.0 safety factor.

A ( ) IJC5-(W)-144( )									
NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Part No.	UL EGC (amps)	LD (in)	FL (in)	Fitting Prefix
12C		12ft 10ft	122 (182) 176 (262)	1.15 (29.2) 0.80 (20.3)	A(RS)IJC5-(W)-(L)	1200	3.9	2.0	ALIJC5
SWL* stands for Safe Working Load									
RS stands for Rung Spacing									

Formula	Calculations	Where
$W_2 = W_1 \times \text{Multiplier} = 122 \times 0.75 = 91.5 \text{ lbs/ft}$		$W_2$ Calculated Load with a 2.0 Safety Factor
		$W_1$ Load Shown in Table Above for 12' Span
		Multiplier Safety Factor Multiplier (0.75) for 2.0

**Convert a concentrated load to pounds per linear foot.**

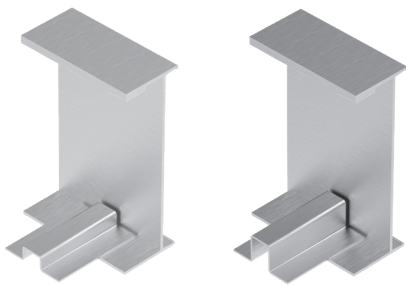
Formula: Double the concentrated load and then divide the result by the support span. See sample load table above. Convert a 200 pound concentrated load to pounds per linear foot.

Formula	Calculation	Where
$W_E = \frac{2 \times CL}{S} = \frac{2 \times 200}{10} = 40 \text{ lbs/ft}$		$W_E$ Converted Concentrated Load to Pounds Per Linear Foot
		CL Concentrated Load
		S Span (ft)

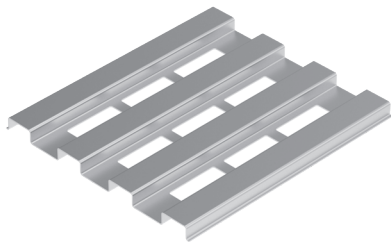
The calculation above converted a 200 pound concentrated load on a 10 foot span to a 40 pound per linear foot load. Now that the concentrated load is in pounds per linear foot it can be added to the cable load that is also in pounds per foot for the 10 foot span. The 40 pounds per foot can be added directly to the cable load and compared to the loads shown in our load tables. This would result in a 1.5 safety factor on the cable load and the concentrated load. The 40 pounds per foot can be divided by 1.5 resulting in 26.7 pounds per linear foot. When you add 26.7 pounds per linear foot to the cable load the result is a 1.5 safety factor on the cable load and the concentrated load doesn't have a safety factor.



Side Rail and I-Beam Rung Profiles



Standard and High Hat Rung Profile



Ventilated Corrugated Bottom

# SIDE RAIL, RUNG & BOTTOM PROFILES & RUNG OPTIONS

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

*CSA Classified Trays Available*

Table of Contents	Page
Side Rail Profiles	26 - 28
Rung & Bottom Profiles	29
Rung Options	30
Electrical Properties	31



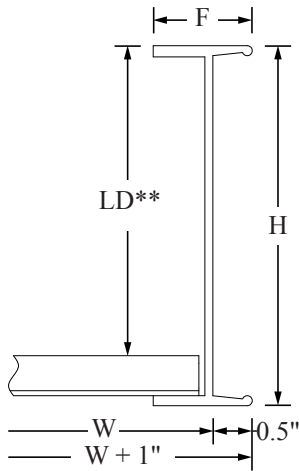
# mphusky

## TECHNICAL DATA

## I-BEAM SECTIONS

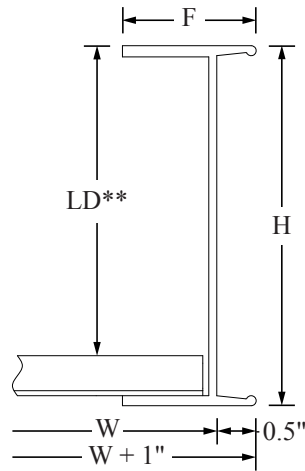
4.5" HIGH

I-BEAM PROFILES



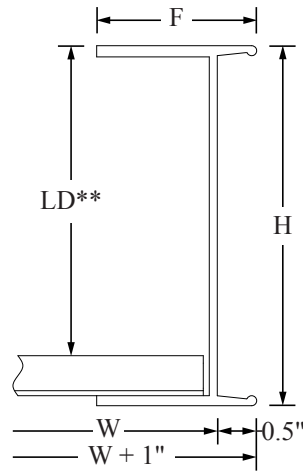
**IJA, IJB**

H	F	LD
4.5"	1.25"	3.9**



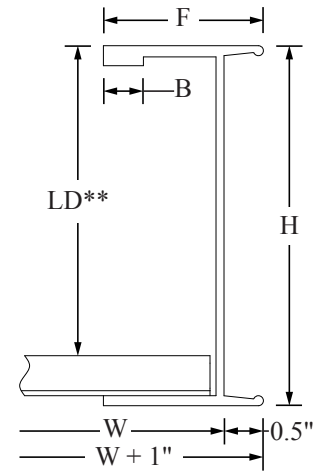
**IJC, IJD**

H	F	LD
4.5"	1.5"	3.9**



**IYA, IYB**

H	F	LD
4.5"	2"	3.9**



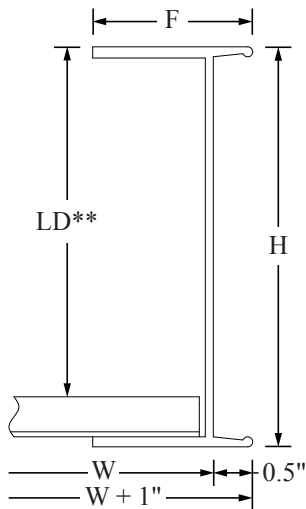
**IYC**

H	F	B	LD
4.5"	2"	0.5"	3.9**

## TECHNICAL DATA

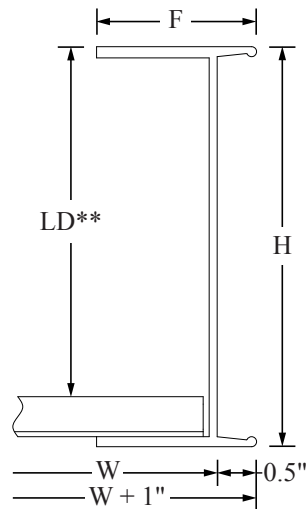
## I-BEAM SECTIONS

5" HIGH



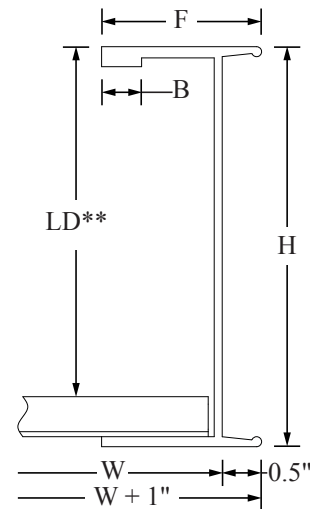
**IJC5**

H	F	LD
5"	2"	4.4**



**IYB5**

H	F	LD
5"	2"	4.4**



**IYC5**

H	F	B	LD
5"	2"	0.5"	4.4**

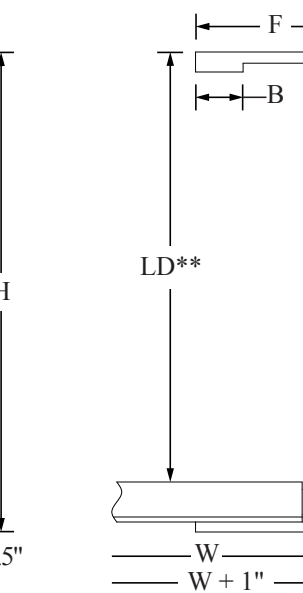
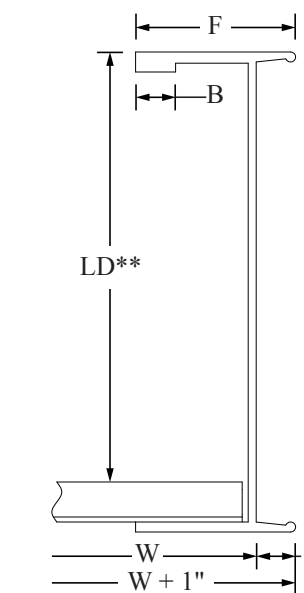
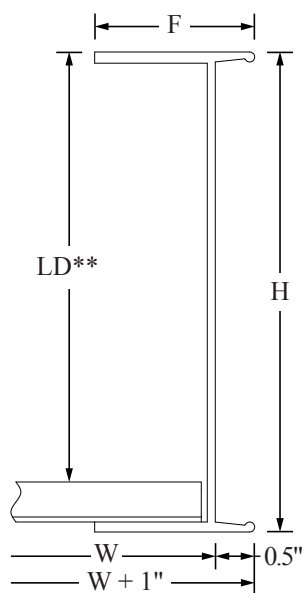
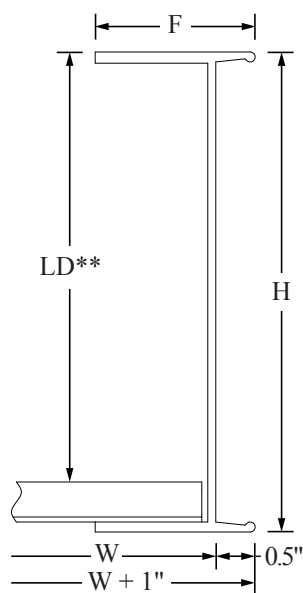
\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or trays 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).



TECHNICAL DATA

I-BEAM SECTIONS

6" HIGH



**IMB, IMC, IMD**

H	F	LD
6"	2"	5.4**

**IXA**

H	F	LD
6"	2"	5.4**

**IXB**

H	F	B	LD
6"	2"	0.5"	5.4**

**IXC, IXD**

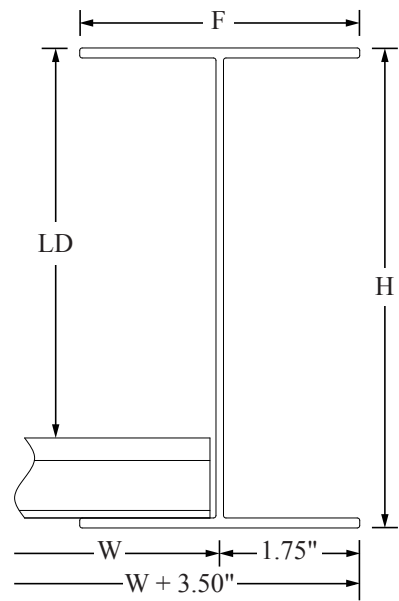
H	F	B	LD
6"	2"	0.75"	5.4**

I-BEAM PROFILES

TECHNICAL DATA

I-BEAM SECTIONS

6" HIGH



**I6**

H	F	LD
6"	3.50"	4.9"

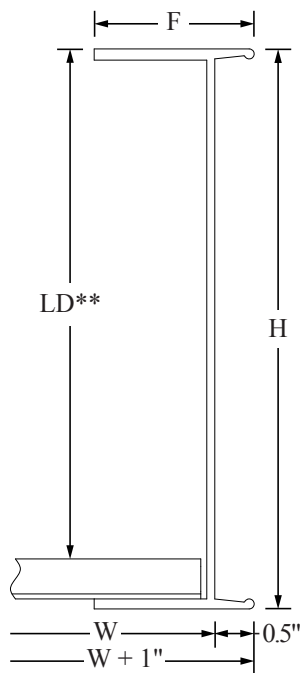
\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or trays 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).

I-BEAM PROFILES

TECHNICAL DATA

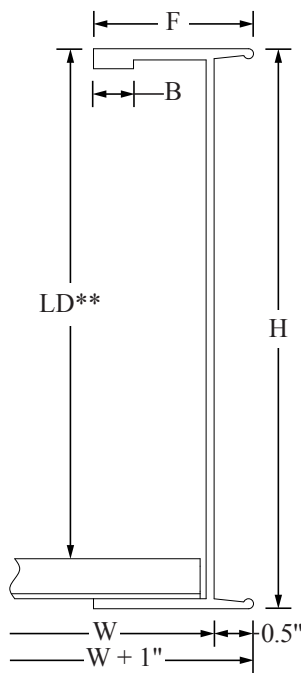
I-BEAM SECTIONS

7" HIGH



IMC7

H	F	LD
7"	2"	6.4**



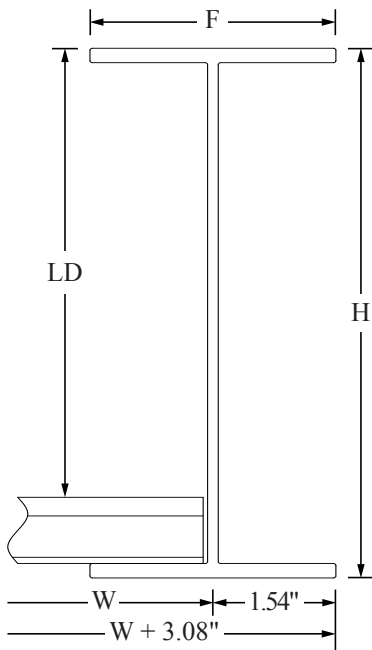
IXC7, IXD7

H	F	B	LD
7"	2"	0.75"	6.4**

TECHNICAL DATA

I-BEAM SECTIONS

8" HIGH



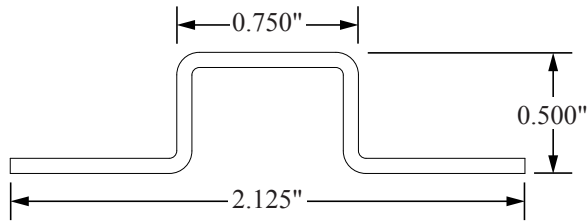
I8

H	F	LD
8"	3.08"	6.8"

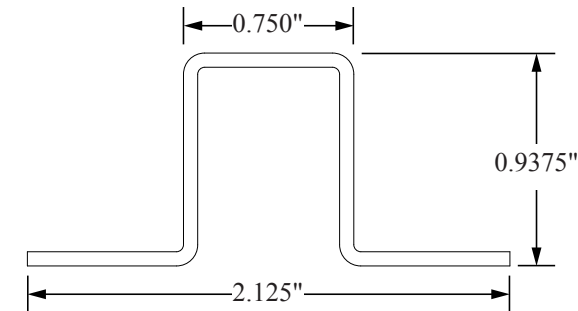
\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or trays 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).

TECHNICAL DATA

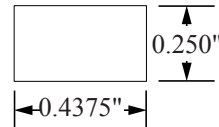
RUNG SECTIONS



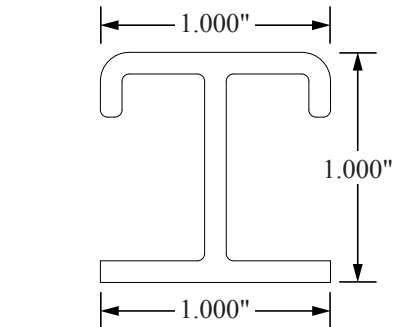
**Hat Rung**  
6" - 24" Wide (Standard)  
(Except I6 & I8)



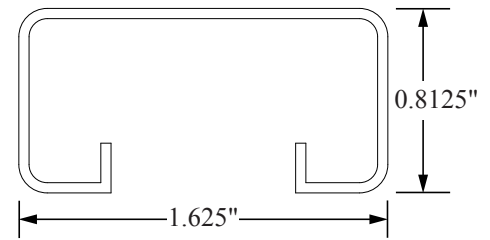
**High Hat Rung**  
6" - 24" Wide (-HR)  
30" - 36" Wide (Standard)  
(Except I6 & I8)



**Marine Slot Detail**  
1.0" On Center  
See Slotted Rung Options  
on Page 30



**I-Beam Rung**  
6" - 36" Wide  
(Standard I6 & I8)

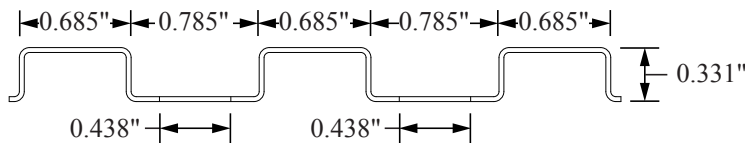


**Strut Rung**  
6" - 36" Wide  
(-SR)(-ISR)(-ASR)

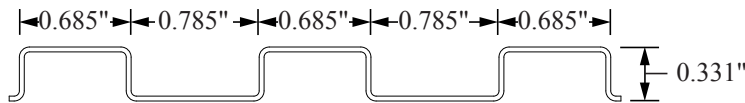
RUNG PROFILES

TECHNICAL DATA

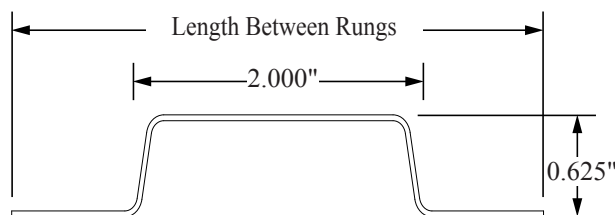
BOTTOM SECTIONS



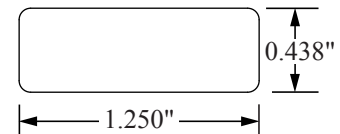
**Ventilated Corrugated Bottom**  
6" - 24" Wide



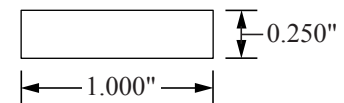
**Solid Corrugated Bottom**  
6" - 24" Wide



**06C Bump Bottom**  
6" - 36" Wide (-06C)  
12" Rung Spacing Rungs



**Ventilated Corrugated Slot Detail**  
1.5" On Center



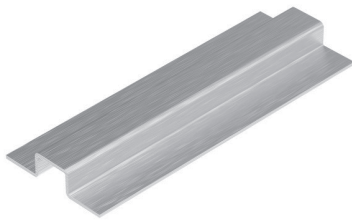
**F04 Perforated Slot Detail**  
6" - 36" Wide (-F04)  
12" Rung Spacing Rungs  
1.5" On Center (Width)  
0.5" On Center (Length)



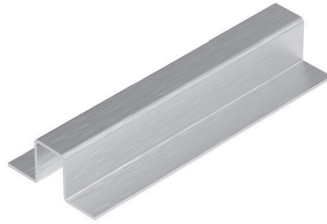
**F04 Perforated Bottom**  
6" - 36" Wide (-F04)  
12" Rung Spacing Rungs

TECHNICAL DATA

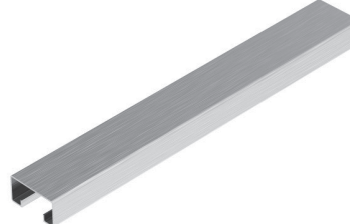
SOLID RUNG OPTIONS



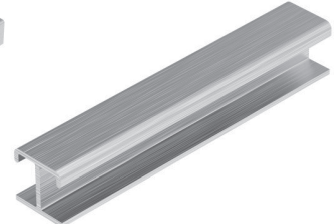
**Hat Rung**  
(Standard)



**High Hat Rung**  
6" - 24" Wide (-HR)  
30" - 36" Wide (Standard)  
(*Except I6 & I8*)



**Strut Rung**  
(-SR)(-ISR)(-ASR)



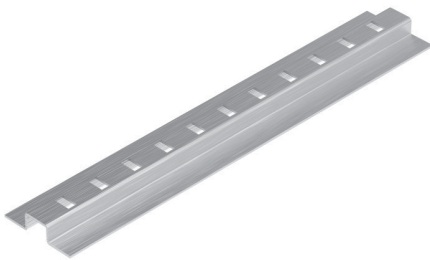
**I-Beam Rung**  
(Standard)  
I6 & I8

Solid Rung Option Suffix Codes

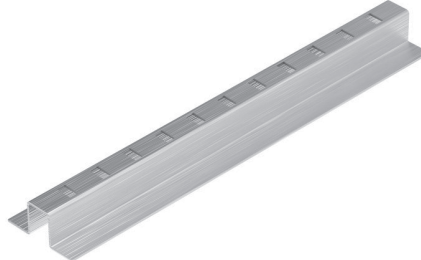
Rung Type	High Hat	I-Beam	Flat Side Up	Flat Side Down	Every Other Rung Inverted
Hat Rung	----	----	----	----	----
High Hat Rung	-HR	----	----	----	----
Strut Rung	----	----	-SR	-ISR	-ASR
I-Beam Rung (I6 & I8)	----	Standard	----	----	----

TECHNICAL DATA

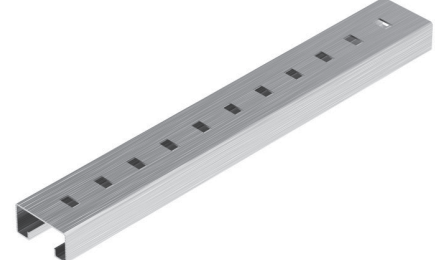
SLOTTED RUNG OPTIONS



**Slotted Hat Rung**  
(-SM)



**Slotted High Hat Rung**  
(-RM)



**Slotted Strut Rung**  
(-FM)(-IM)(-AM)

Slotted Rung Option Suffix Codes

Rung Type	Hat Slotted	Flat Side Up	Flat Side Down	Every Other Rung Inverted
Slotted Hat Rung	-SM	----	----	----
High Hat Rung	-RM	----	----	----
Strut Rung	----	-FM	-IM	-AM

Slotted hat-shape rungs and strut-shape rungs are available as options for all I-Beam style trays (*Except I6 & I8*). The solid hat-shape rung is standard. Strut-shape rungs can be solid or slotted and have the flat side up, flat side down or an alternating design with every other rung inverted. Slotted rungs can aid in fastening cables down with zip ties. Slots are 7/16" wide by 1/4" and are located on 1" centers. A( )I6 and A( )I8 trays do not use these rungs and use an I-Beam style rung, (shown above), which is not available with slots. Slotted rungs are often referred to as marine rungs. Add the suffix code shown above to the end of the catalog number. Example: A9IXC-24-144-**SM** or ALIXC-24H90-24-**SM** (slotted hat rungs).

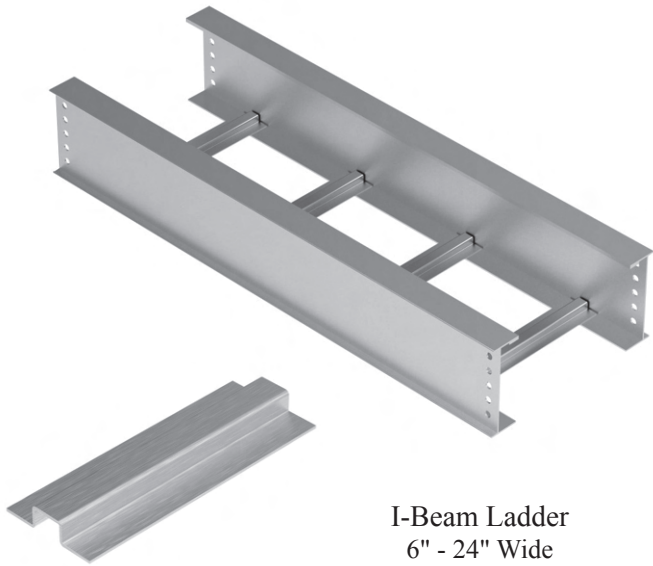
**TECHNICAL DATA-ELECTRICAL PROPERTIES**

The table below provides the electrical properties of the cable tray side rails in this section.

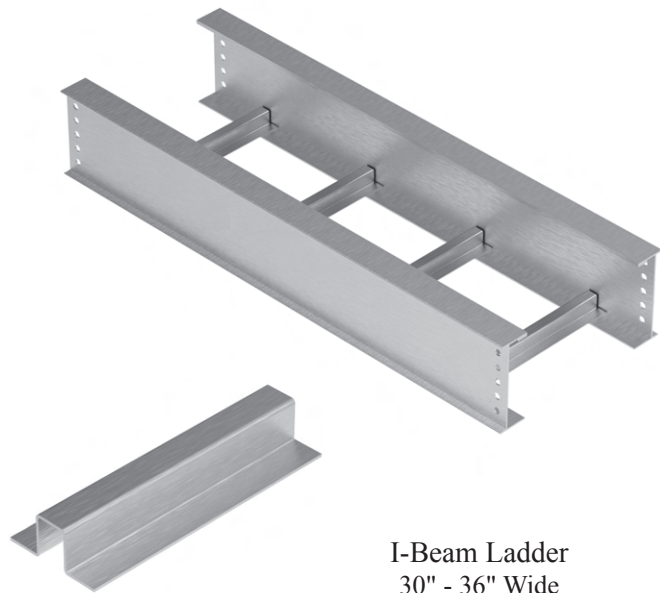
Electrical Properties of the Cable Trays				
Prefix Ladder Ventilated Trough Solid Bottom Trough	Resistance Across 1 ft of Rail (microhms/ft)	Resistance Across Splice (microhms)	Resistance of 12 ft Length With Splices (microhms)	Copper Equivalent (MCM)
A( )IJA, AIJA, ASIJA	5	9	63	771
A( )IJB, AIJB, ASIJB	5	9	63	771
A( )IJC, AIJC, ASIJC	5	10	63	934
A( )IJD, AIJD, ASIJD	5	10	63	934
A( )IYA, AIYA, ASIYA	5	8	75	1159
A( )IYB, AIYB, ASIYB	5	8	75	1159
A( )IYC, AIYC, ASIYC	5	12	63	1255
A( )IJC5, AIJC5, ASIJC5	5	12	63	784
A( )IYB5, AIYB5, ASIYB5	7	9	63	1222
A( )IYC5, AIYC5, ASIYC5	6	8	75	1319
A( )IMB, AIMB, ASIMB	6	7	69	867
A( )IMC, AIMC, ASIMC	6	7	69	867
A( )IMD, AIMD, ASIMD	6	7	69	867
A( )IXA, AIXA, ASIXA	6	6	69	1222
A( )IXB, AIXB, ASIXB	6	6	69	1259
A( )IXC, AIXC, ASIXC	6	4	69	1423
A( )IXD, AIXD, ASIXD	6	4	69	1423
A( )I6, A4I6	4	8	57	1801
A( )IMC7, AIMC7, ASIMC7	5	6	63	1204
A( )IXC7, AIXC7, ASIXC7	5	6	63	1639
A( )IXD7, AIXD7, ASIXD7	5	6	63	1639
A( )I8, A4I8	4	5.6	57	3113

ELECTRICAL PROPERTIES





I-Beam Ladder  
6" - 24" Wide



I-Beam Ladder  
30" - 36" Wide

# I-BEAM LADDER

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

*CSA Classified Trays Available*

Table of Contents	Page
Selection Tables	34
4.5" High Ladder	35
5" High Ladder	36
6" High Ladder	37
16 6" High Ladder	38
7" High Ladder	39
18 8" High Ladder	40
Ladder Loading & Deflection	41



mphusky

## I-BEAM LADDER SELECTION TABLES

Tray Height	NEMA Class	CSA Class	Prefix	NEMA Load (lbs/ft)	Span (ft)	Load Depth (in)	Flange Width
4.5"	12A	D (3m)	A()IJA	57	12	3.9**	1.25
	12B		A()IJB	93	12	3.9**	1.25
	12C		A()IJC	115	12	3.9**	1.50
	12C		A()IJD	159	12	3.9**	1.50
	20A	D (6m)	A()IYA	70	20	3.9**	2.00
	20B	E (6m)	A()IYB	82	20	3.9**	2.00
	20C	E (6m)	A()IYC	100	20	3.9**	2.00
5.0"	12A		A()IJC5	122	12	4.4**	2.00
	12B		A()IJB5	122	12	4.4**	2.00
	12C		A()IJC5	122	12	4.4**	2.00
	20A		A()IYB5	76	20	4.4**	2.00
	20B		A()IYB5	76	20	4.4**	2.00
	20C		A()IYC5	100	20	4.4**	2.00
6.0"	12A		A()IMB	83	12	5.4**	2.00
	12B		A()IMB	83	12	5.4**	2.00
	12C		A()IMC	106	12	5.4**	2.00
	12C		A()IMD	135	12	5.4**	2.00
	20A	D (6m)	A()IXA	69	20	5.4**	2.00
	20B	E (6m)	A()IXB	95	20	5.4**	2.00
	20C	E (6m)	A()IXC	104	20	5.4**	2.00
	20C	E (6m)	A()IXD	113	20	5.4**	2.00
	20C	E (6m)	A()I6	200	20	4.9	3.50
	24A	E (6m)	A()I6	139	24	4.9	3.50
	24B	E (6m)	A()I6	139	24	4.9	3.50
	24C	E (6m)	A()I6	139	24	4.9	3.50
	25C	E (6m)	A()I6	128	25	4.9	3.50
	30A	E (6m)	A()I6	89	30	4.9	3.50
	30B	E (6m)	A()I6	89	30	4.9	3.50
7.0"	12A		A()IMC7	157	12	6.4**	2.00
	12B		A()IMC7	157	12	6.4**	2.00
	12C		A()IMC7	157	12	6.4**	2.00
	20A		A()IXC7	114	20	6.4**	2.00
	20B		A()IXC7	114	20	6.4**	2.00
	20C		A()IXC7	114	20	6.4**	2.00
	20C	E (6m)	A()IXD7	128	20	6.4**	2.00
	24A	E (6m)	A()IXD7	89	24	6.4**	2.00
	24B	E (6m)	A()IXD7	89	24	6.4**	2.00
8.0"	24C	E (6m)	A()I8	288	24	6.8	3.08
	30C	E (6m)	A()I8	128	30	6.8	3.08
	40A	E (6m)	A()I8	72	40	6.8	3.08

\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. (Except I6 & I8).

NEMA Class	Load lbs/ft (kgs/m)	Span (ft)
12A	50 / (74.4)	12
12B	75 / (111.6)	12
12C	100 / (148.8)	12
20A	50 / (74.4)	20
20B	75 / (111.6)	20
20C	100 / (148.8)	20

CSA Class	Load kgs/m (lbs/ft)	Span (m)
A	37 / (24.9)	3
C	97 / (65.2)	3
D	179 / (120.3)	3
D	67 / (45.0)	6
E	299 / (200.9)	3
E	112 / (75.3)	6



I-BEAM SERIES

ALUMINUM LADDER

4.5" HIGH

A9IJC - 24 - 144 ( )				
Material	Ladder Rung Spacing	Tray Type	Width	Length
Aluminum	6 (6" Rung Spacing)	IJA	6 (6" Wide)	120 (10')
	9 (9" Rung Spacing)	IJB	9 (9" Wide)	144 (12')
	12 (12" Rung Spacing)	IJC	12 (12" Wide)	240 (20')
	Trough Bottom	IJD	18 (18" Wide)	288 (24')
	4 (4" RS Ventilated Btm)	IYA	24 (24" Wide)	
		IYB	30 (30" Wide)	
		IYC	36 (36" Wide)	
				( ) Optional Hardware
				-6S (316 Stainless)
				-SB (Silicon Bronze)
Standard hardware is Zinc-Plated Steel				

I-BEAM SERIES

ALUMINUM LADDER

4.5" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12A		12 ft	57 (84.8)	0.77 (19.6)	A(RS)IJA-(W)-(L)	1200	3.9**	1.25	ALIJA
12B		12 ft	93 (138.4)	1.26 (32.0)	A(RS)IJB-(W)-(L)	1200	3.9**	1.25	ALIJB
12C	D (3m)	12 ft	115 (171.1)	1.36 (34.5)	A(RS)IJC-(W)-(L)	1200	3.9**	1.5	ALIJC
12C		12 ft	159 (236.6)	1.88 (47.8)	A(RS)IJD-(W)-(L)	1200	3.9**	1.5	ALIJD
20A	D (6m)	20 ft	70 (104.2)	4.26 (108.2)	A(RS)IYA-(W)-(L)	1200	3.9**	2.0	ALIYA
20B	E (6m)	20 ft	82 (122.0)	4.99 (126.8)	A(RS)IYB-(W)-(L)	1200	3.9**	2.0	ALIYB
20C	E (6m)	20 ft	100 (148.8)	5.52 (140.2)	A(RS)IYC-(W)-(L)	1600	3.9**	2.0	ALIYC

(RS) = Denotes desired nominal Rung Spacing (in)  
(W) = Denotes desired Width (in)  
(L) = Denotes desired Length (in)  
\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.  
\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).  
CONTACT FACTORY FOR QUICK SHIP DETAILS.

IJA, IJB, IJC, IJD, IYA, IYB, IYC

For trays that show a CSA load class in the table above insert a (-CSA) after the length on straight sections or at the end of the part number on fittings. See examples below:  
A9IJC-24-144-CSA  
ALIJC-24H90-24-CSA

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IJC Fitting Prefix
Ladder	ALIJC
4" RS Ventilated Trough	A4IJC



# I-BEAM LADDER

mphusky

I-BEAM SERIES

ALUMINUM LADDER

5" HIGH

A9IJC5 - 24 - 144 ( )

## Material

Aluminum

## Ladder Rung Spacing

6 (6" Rung Spacing)

9 (9" Rung Spacing)

12 (12" Rung Spacing)

## Trough Bottom

4 (4" RS Ventilated Btm)

## Tray Type

IJC5

IYB5

IYC5

## Width

6 (6" Wide)

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

## Length

120 (10')

144 (12')

240 (20')

288 (24')

## ( ) Optional Hardware

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

5" HIGH LADDER

I-BEAM SERIES

ALUMINUM LADDER

5" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12C		12 ft	122 (181.6)	1.15 (29.2)	A(RS)IJC5-(W)-(L)	1200	4.4**	2.0	ALIJC5
20B		20 ft	76 (113.1)	4.77 (121.2)	A(RS)IYB5-(W)-(L)	1600	4.4**	2.0	ALIYB5
20C		20 ft	100 (148.9)	4.33 (110.0)	A(RS)IYC5-(W)-(L)	2000	4.4**	2.0	ALIYC5

(RS) = Denotes desired nominal Rung Spacing (in)

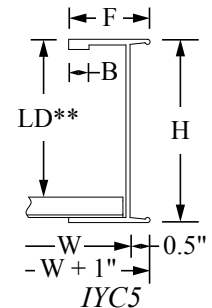
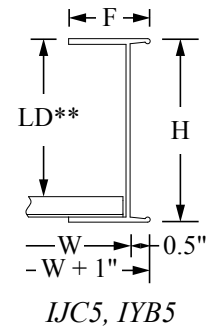
(W) = Denotes desired Width (in)

(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.

\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).

[CONTACT FACTORY FOR QUICK SHIP DETAILS](#)



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IJC5 Fitting Prefix
Ladder	ALIJC5
4" RS Ventilated Trough	A4IJC5

National Electrical Manufacturers Association  
**NEMA**  
Setting Standards for Excellence  
Member



I-BEAM SERIES

ALUMINUM LADDER

6" HIGH

**A9IXC - 24 - 240 ( )**

Material	Ladder Rung Spacing	Tray Type	Width	Length	
Aluminum	6 (6" Rung Spacing)	<b>IMB</b>	6 (6" Wide)	120 (10')	
	9 (9" Rung Spacing)	<b>IMC</b>	9 (9" Wide)	144 (12')	
	12 (12" Rung Spacing)	<b>IMD</b>	12 (12" Wide)	240 (20')	
	<b>Trough Bottom</b>	<b>IXA</b>	18 (18" Wide)	288 (24')	
	4 (4" RS Ventilated Btm)	<b>IXB</b>	24 (24" Wide)		
		<b>IXC</b>	30 (30" Wide)		
		<b>IXD</b>	36 (36" Wide)		

**( ) Optional Hardware**

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

I-BEAM SERIES

ALUMINUM LADDER

6" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12B		12 ft	83 (123.5)	0.47 (12.0)	A(RS)IMB-(W)-(L)	1200	5.4**	2.0	ALIMB
12C		12 ft	106 (157.8)	0.60 (15.2)	A(RS)IMC-(W)-(L)	1200	5.4**	2.0	ALIMC
12C		12 ft	135 (200.9)	0.76 (19.3)	A(RS)IMD-(W)-(L)	1200	5.4**	2.0	ALIMD
20A	D (6m)	20 ft	69 (102.7)	2.29 (58.2)	A(RS)IXA-(W)-(L)	1600	5.4**	2.0	ALIXA
20B	E (6m)	20 ft	95 (141.4)	3.08 (78.2)	A(RS)IXB-(W)-(L)	1600	5.4**	2.0	ALIXB
20C	E (6m)	20 ft	104 (154.8)	3.08 (78.2)	A(RS)IXC-(W)-(L)	2000	5.4**	2.0	ALIXC
20C	E (6m)	20 ft	113 (168.2)	3.34 (84.8)	A(RS)IXD-(W)-(L)	2000	5.4**	2.0	ALIXD

(RS) = Denotes desired nominal Rung Spacing (in)

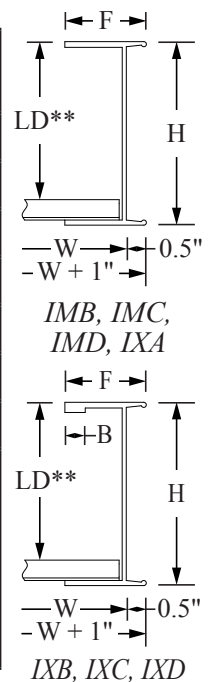
(W) = Denotes desired Width (in)

(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.

\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except I6 & I8).

**CONTACT FACTORY FOR QUICK SHIP DETAILS.**



For trays that show a CSA load class in the table above insert a (-CSA) after the length on straight sections or at the end of the part number on fittings. See examples below:

A9IXC-24-144-CSA  
ALIXC-24H90-24-CSA

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IXC Fitting Prefix
Ladder	ALIXC
4" RS Ventilated Trough	A4IXC



# I-BEAM LADDER

mphusky

## I-BEAM SERIES

## ALUMINUM LADDER

I6 6" HIGH

A9I6 - 24 - 300 ( )

### Material

Aluminum

### Ladder Rung Spacing

6 (6" Rung Spacing)

9 (9" Rung Spacing)

12 (12" Rung Spacing)

18 (18" Rung Spacing)

### Trough Bottom

4 (4" RS Ventilated Btm)

### Tray Type

I6

### Width

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

### Length

240 (20')

288 (24')

300 (25')

360 (30')

### ( ) Optional Hardware

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

6" HIGH LADDER

## I-BEAM SERIES

## ALUMINUM LADDER

I6 6" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
20C	E (6m)	20 ft	200 (297.6)	3.10 (78.7)	A(RS)I6-(W)-(L)	2000	4.9	3.5	ALI6
24C	E (6m)	24 ft	139 (206.9)	4.46 (113.3)	A(RS)I6-(W)-(L)	2000	4.9	3.5	ALI6
25C	E (6m)	25 ft	128 (190.5)	4.85 (123.2)	A(RS)I6-(W)-(L)	2000	4.9	3.5	ALI6
30B	E (6m)	30 ft	89 (132.5)	6.97 (177.0)	A(RS)I6-(W)-(L)	2000	4.9	3.5	ALI6

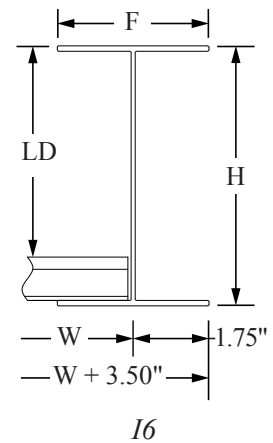
(RS) = Denotes desired nominal Rung Spacing (in)

(W) = Denotes desired Width (in)

(L) = Denotes desired Length (in)

\*Safe Working Load based on 20 ft (6m), 24 ft (7.32m), 25 ft (7.62m), or 30 ft (9.14m) span with a 1.5 safety factor.

Loads shown should be multiplied by 0.75 for 18 inch rung spacing.



For trays that show a CSA load class in the table above insert a (-CSA) after the length on straight sections or at the end of the part number on fittings. See examples below:

A9I6-24-144-CSA  
ALI6-24H90-24-CSA

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	I6 Fitting Prefix
Ladder	ALI6
4" RS Ventilated Trough	A4I6



I-BEAM SERIES

ALUMINUM LADDER

7" HIGH

A9IMC7 - 24 - 144 ( )

Material
Aluminum

Ladder Rung Spacing
6 (6" Rung Spacing)
9 (9" Rung Spacing)
12 (12" Rung Spacing)
Trough Bottom
4 (4" RS Ventilated Btm)

Tray Type
<b>IMC7</b>
<b>IXC7</b>
<b>IXD7</b>

Width
6 (6" Wide)
9 (9" Wide)
12 (12" Wide)
18 (18" Wide)
24 (24" Wide)
30 (30" Wide)
36 (36" Wide)

Length
120 (10')
144 (12')
240 (20')
288 (24')

**( ) Optional Hardware**  
-6S (316 Stainless)  
-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

I-BEAM SERIES

ALUMINUM LADDER

7" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
<b>12C</b>		12 ft	157 (233.6)	0.61 (15.5)	A(RS) <b>IMC7</b> -(W)-(L)	1600	6.4**	2.0	ALIMC7
<b>20C</b>		20 ft	114 (169.7)	2.17 (55.1)	A(RS) <b>IXC7</b> -(W)-(L)	2000	6.4**	2.0	ALIXC7
<b>24B</b>	E (6m)	24 ft	89 ( 132.5)	3.52 (89.4)	A(RS) <b>IXD7</b> -(W)-(L)	2000	6.4**	2.0	ALIXD7

(RS) = Denotes desired nominal Rung Spacing (in)  
(W) = Denotes desired Width (in)  
(L) = Denotes desired Length (in)  
\*Safe Working Load based on 12 ft (3.66m), 20 ft (6m), or 24 ft (7.3m) span with a 1.5 safety factor.  
\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the High Hat Rung, (Except I6 & I8).

**IMC7**

**IXC7, IXD7**

For trays that show a CSA load class in the table above insert a (-CSA) after the length on straight sections or at the end of the part number on fittings. See examples below:

A9IXD7-24-144-CSA  
ALIXD7-24H90-24-CSA

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IMC7 Fitting Prefix
Ladder	ALIMC7
4" RS Ventilated Trough	A4IMC7



# I-BEAM LADDER

mphusky

I-BEAM SERIES

ALUMINUM LADDER

I8 8" HIGH

A9I8 - 24 - 480 ( )

## Material

Aluminum

## Ladder Rung Spacing

6 (6" Rung Spacing)

9 (9" Rung Spacing)

12 (12" Rung Spacing)

18 (18" Rung Spacing)

## Trough Bottom

4 (4" RS Ventilated Btm)

## Tray Type

I8

## Width

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

## Length

240 (20')

288 (24')

300 (25')

360 (30')

480 (40')

## ( ) Optional Hardware

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

8" HIGH LADDER

I-BEAM SERIES

ALUMINUM LADDER

I8 8" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
20C	E (6m)	20 ft	288 (428.6)	1.35 (34.3)	A(RS)I8-(W)-(L)	2000	6.8	3.08	ALI8
24C	E (6m)	24 ft	200 (297.6)	1.94 (49.3)	A(RS)I8-(W)-(L)	2000	6.8	3.08	ALI8
25C	E (6m)	25 ft	184 (273.8)	2.11 (53.6)	A(RS)I8-(W)-(L)	2000	6.8	3.08	ALI8
30C	E (6m)	30 ft	128 (190.5)	3.03 (77.0)	A(RS)I8-(W)-(L)	2000	6.8	3.08	ALI8
40A	E (6m)	40 ft	72 (107.2)	5.39 (136.9)	A(RS)I8-(W)-(L)	2000	6.8	3.08	ALI8

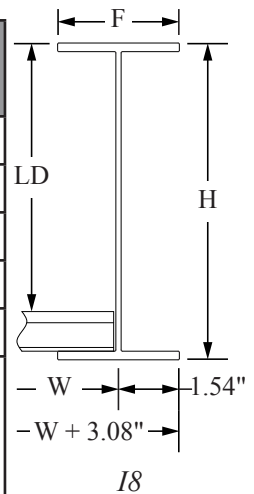
(RS) = Denotes desired nominal Rung Spacing (in)

(W) = Denotes desired Width (in)

(L) = Denotes desired Length (in)

\*Safe Working Load based on 20 ft (6m), 24 ft (7.32m), 25 ft (7.62m), or 30 ft (9.14m), 40 ft (12.24m) span with a 1.5 safety factor.

Loads shown should be multiplied by 0.75 for 18 inch rung spacing.



For trays that show a CSA load class in the table above insert a (-CSA) after the length on straight sections or at the end of the part number on fittings. See examples below:

A9I8-24-144-CSA  
ALI8-24H90-24-CSA

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	I8 Fitting Prefix
Ladder	ALI8
4" RS Ventilated Trough	A4I8

National Electrical Manufacturers Association  
**NEMA**  
Setting Standards for Excellence  
Member





**ALUMINUM LADDER LOADING & DEFLECTION**

TRAYS FOR 12 FOOT SUPPORT SPANS OR LESS									
	Support Span	6 ft		8 ft		10 ft		12 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
4.5"	A()IJA	228	0.19	128	0.34	82	0.53	57	0.77
	A()IJB	372	0.32	209	0.56	134	0.87	93	1.26
	A()IJC	460	0.34	259	0.60	166	0.94	115	1.36
	A()IJD	636	0.47	358	0.84	228	1.29	159	1.88
5.0"	A()IJC5	488	0.29	275	0.51	176	0.80	122	1.15
6.0"	A()IMB	332	0.12	187	0.21	120	0.33	83	0.47
	A()IMC	424	0.15	239	0.27	153	0.42	106	0.60
	A()IMD	540	0.19	304	0.34	194	0.53	135	0.76
7.0"	A()IMC7	628	0.15	353	0.27	226	0.42	157	0.61

TRAYS FOR SPANS UP TO 20 FOOT									
	Support Span	12 ft		16 ft		18 ft		20 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
4.5"	A()IYA	194	1.53	109	2.72	86	3.43	70	4.26
	A()IYB	228	1.80	128	3.20	101	4.05	82	4.99
	A()IYC	278	1.99	156	3.53	123	4.47	100	5.52
5.0"	A()IYB5	211	1.72	118	3.05	94	3.86	76	4.77
	A()IYC5	278	1.56	156	2.78	123	3.52	100	4.33
6.0"	A()IXA	192	0.83	108	1.47	85	1.86	69	2.29
	A()IXB	264	1.11	148	1.97	117	2.50	95	3.08
	A()IXC	289	1.11	163	1.97	128	2.49	104	3.08
	A()IXD	314	1.20	177	2.14	140	2.70	113	3.34
7.0"	A()IXC7	317	0.78	178	1.39	141	1.76	114	2.17

HEAVY DUTY TRAYS FOR SPANS UP TO 40 FOOT											
	Support Span	20 ft		24 ft		25 ft		30 ft		40 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
6.0"	A()I6	200	3.10	139	4.46	128	4.85	89	6.97		
7.0"	A()IXD7	128	2.45	89	3.52						
8.0"	A()I8	288	1.35	200	1.94	184	2.11	128	3.03	72	5.39

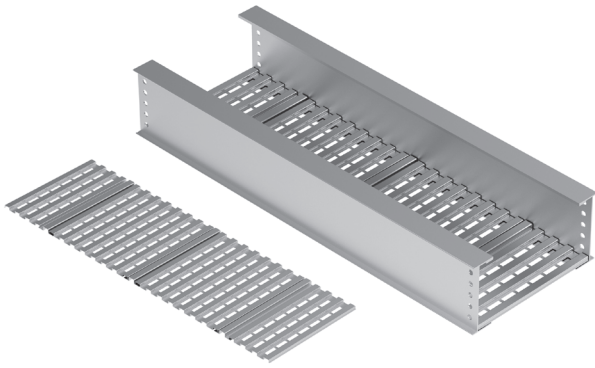
Load shown is pounds per linear foot.

Deflection shown is inches.

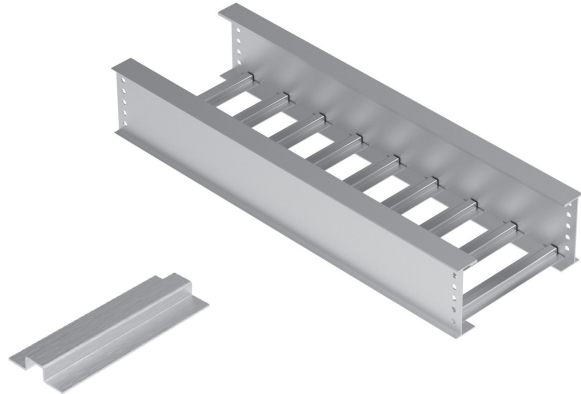
Loads shown should be multiplied by 0.75 for 18 inch rung spacing.



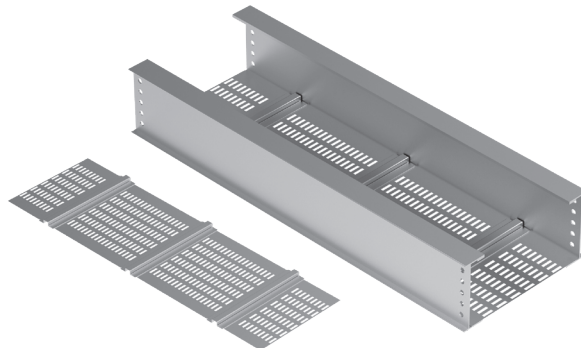




Ventilated Corrugated Bottom  
12" Rung Spacing, 6" - 24" Wide



Ventilated Bottom  
4" Rung Spacing, 6" - 36" Wide



Ventilated Perforated Bottom (-F04)  
12" Rung Spacing, 6" - 36" Wide

# I-BEAM VENTILATED BOTTOM TROUGH

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

Table of Contents	Page
Selection Tables	44
4.5" High Ventilated Trough	45
5" High Ventilated Trough	46
6" High Ventilated Trough	47
7" High Ventilated Trough	48
Ventilated Trough Loading & Deflection	49



# mphusky

## I-BEAM VENTILATED TROUGH SELECTION TABLES

Tray Height	NEMA Class	CSA Class	Prefix	NEMA Load (lbs/ft)	Span (ft)	Load Depth (in)	Flange Width
4.5"	12A		A()IJA	57	12	3.9**	1.25
	12B		A()IJB	93	12	3.9**	1.25
	12C		A()IJC	115	12	3.9**	1.50
	12C		A()IJD	159	12	3.9**	1.50
	20A		A()IYA	70	20	3.9**	2.00
	20B		A()IYB	82	20	3.9**	2.00
	20C		A()IYC	100	20	3.9**	2.00
5.0"	12A		A()IJC5	122	12	4.4**	2.00
	12B		A()IJC5	122	12	4.4**	2.00
	12C		A()IJC5	122	12	4.4**	2.00
	20A		A()IYB5	76	20	4.4**	2.00
	20B		A()IYB5	76	20	4.4**	2.00
	20C		A()IYC5	100	20	4.4**	2.00
6.0"	12A		A()IMB	83	12	5.4**	2.00
	12B		A()IMB	83	12	5.4**	2.00
	12C		A()IMC	106	12	5.4**	2.00
	12C		A()IMD	135	12	5.4**	2.00
	20A		A()IXA	69	20	5.4**	2.00
	20B		A()IXB	95	20	5.4**	2.00
	20C		A()IXC	104	20	5.4**	2.00
	20C		A()IXD	113	20	5.4**	2.00
	20C	E (6m)	A()I6	200	20	4.9	3.50
	24A	E (6m)	A()I6	139	24	4.9	3.50
	24B	E (6m)	A()I6	139	24	4.9	3.50
	24C	E (6m)	A()I6	139	24	4.9	3.50
	25C	E (6m)	A()I6	128	25	4.9	3.50
	30A	E (6m)	A()I6	89	30	4.9	3.50
	30B	E (6m)	A()I6	89	30	4.9	3.50
7.0"	12A		A()IMC7	157	12	6.4**	2.00
	12B		A()IMC7	157	12	6.4**	2.00
	12C		A()IMC7	157	12	6.4**	2.00
	20A		A()IXC7	114	20	6.4**	2.00
	20B		A()IXC7	114	20	6.4**	2.00
	20C		A()IXC7	114	20	6.4**	2.00
	20C		A()IXD7	128	20	6.4**	2.00
	24A		A()IXD7	89	24	6.4**	2.00
	24B		A()IXD7	89	24	6.4**	2.00
8.0"	24C	E (6m)	A()I8	288	24	6.8	3.08
	30C	E (6m)	A()I8	128	30	6.8	3.08
	40C	E (6m)	A()I8	72	40	6.8	3.08

\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. (Except I6 & I8).

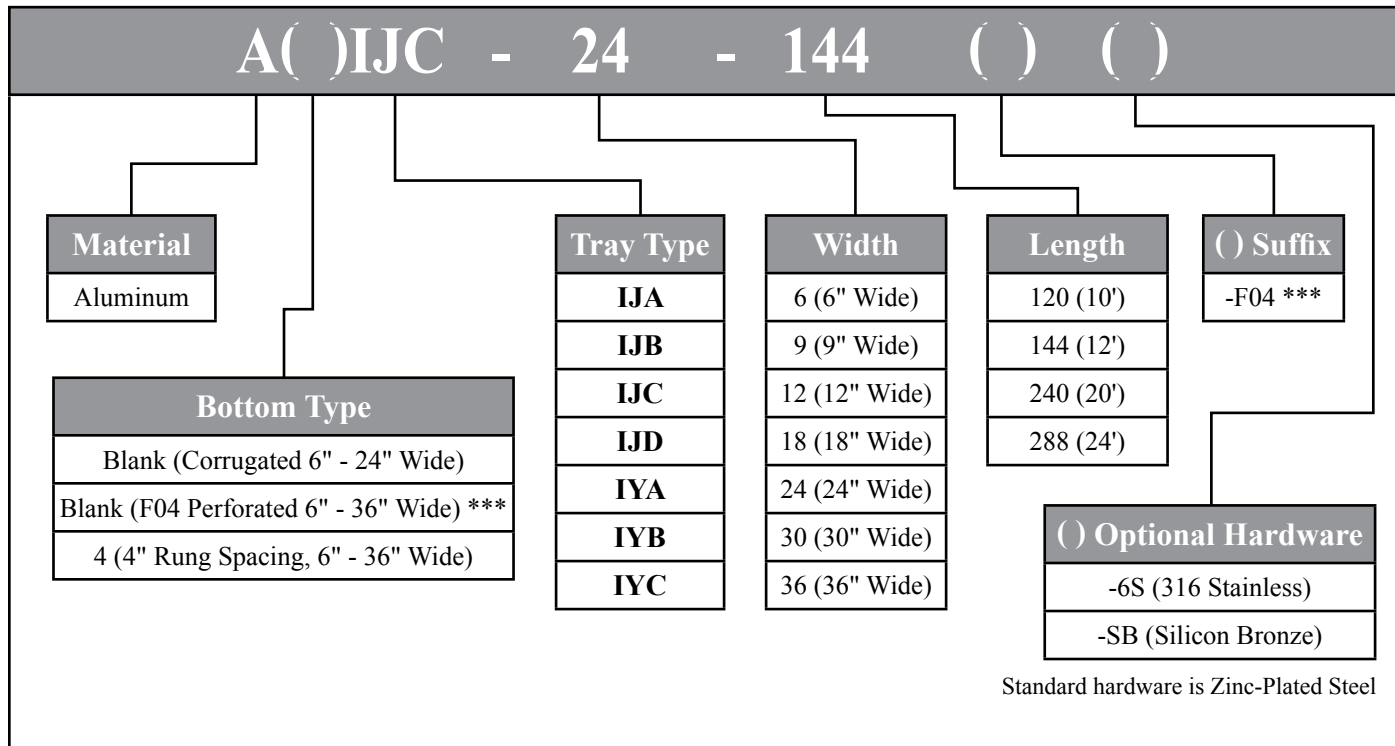
NEMA Class	Load lbs/ft (kgs/m)	Span (ft)
12A	50 / (74.4)	12
12B	75 / (111.6)	12
12C	100 / (148.8)	12
20A	50 / (74.4)	20
20B	75 / (111.6)	20
20C	100 / (148.8)	20

CSA Class	Load kgs/m (lbs/ft)	Span (m)
A	37 / (24.9)	3
C	97 / (65.2)	3
D	179 / (120.3)	3
D	67 / (45.0)	6
E	299 / (200.9)	3
E	112 / (75.3)	6

I-BEAM SERIES

ALUMINUM VENTILATED TROUGH

4.5" HIGH



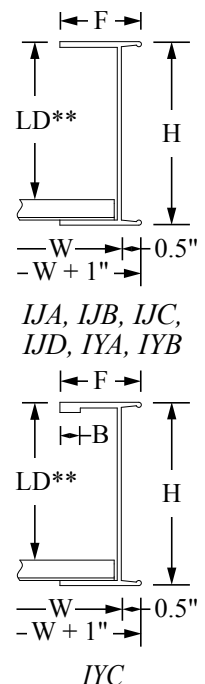
I-BEAM SERIES

ALUMINUM VENTILATED TROUGH

4.5" HIGH

NEMA Class	CSA Class	Support Span	SWL * lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
<b>12A</b>		12 ft	57 (84.8)	0.77 (19.6)	A ( ) <b>IJA</b> -(W)-(L)	1200	3.9**	1.25	A ( ) IJA
<b>12B</b>		12 ft	93 (138.4)	1.26 (32.0)	A ( ) <b>IJB</b> -(W)-(L)	1200	3.9**	1.25	A ( ) IJB
<b>12C</b>		12 ft	115 (171.1)	1.36 (34.5)	A ( ) <b>IJC</b> -(W)-(L)	1200	3.9**	1.5	A ( ) IJC
<b>12C</b>		12 ft	159 (236.6)	1.88 (47.8)	A ( ) <b>IJD</b> -(W)-(L)	1200	3.9**	1.5	A ( ) IJD
<b>20A</b>		20 ft	70 (104.2)	4.26 (108.2)	A ( ) <b>IYA</b> -(W)-(L)	1200	3.9**	2.0	A ( ) IYA
<b>20B</b>		20 ft	82 (122.0)	4.99 (126.8)	A ( ) <b>IYB</b> -(W)-(L)	1200	3.9**	2.0	A ( ) IYB
<b>20C</b>		20 ft	100 (149.8)	5.52 (140.2)	A ( ) <b>IYC</b> -(W)-(L)	1600	3.9**	2.0	A ( ) IYC

( ) = Blank (Corrugated 6" - 24" wide), Blank (F04 Perf. 6" - 36" wide), 4 (4" rung spacing 6" - 36" wide). See Ladder Section for NEMA load & CSA on 4" rung spacing.  
(W) = Denotes desired Width (in)  
(L) = Denotes desired Length (in)  
\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor  
\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugation or perforated bottom is present will be below rung height.  
\*\*\*Requires the (-F04) suffix



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IJC Fitting Prefix
Ventilated Trough	AIJC
4" RS Ventilated Trough	A4IJC

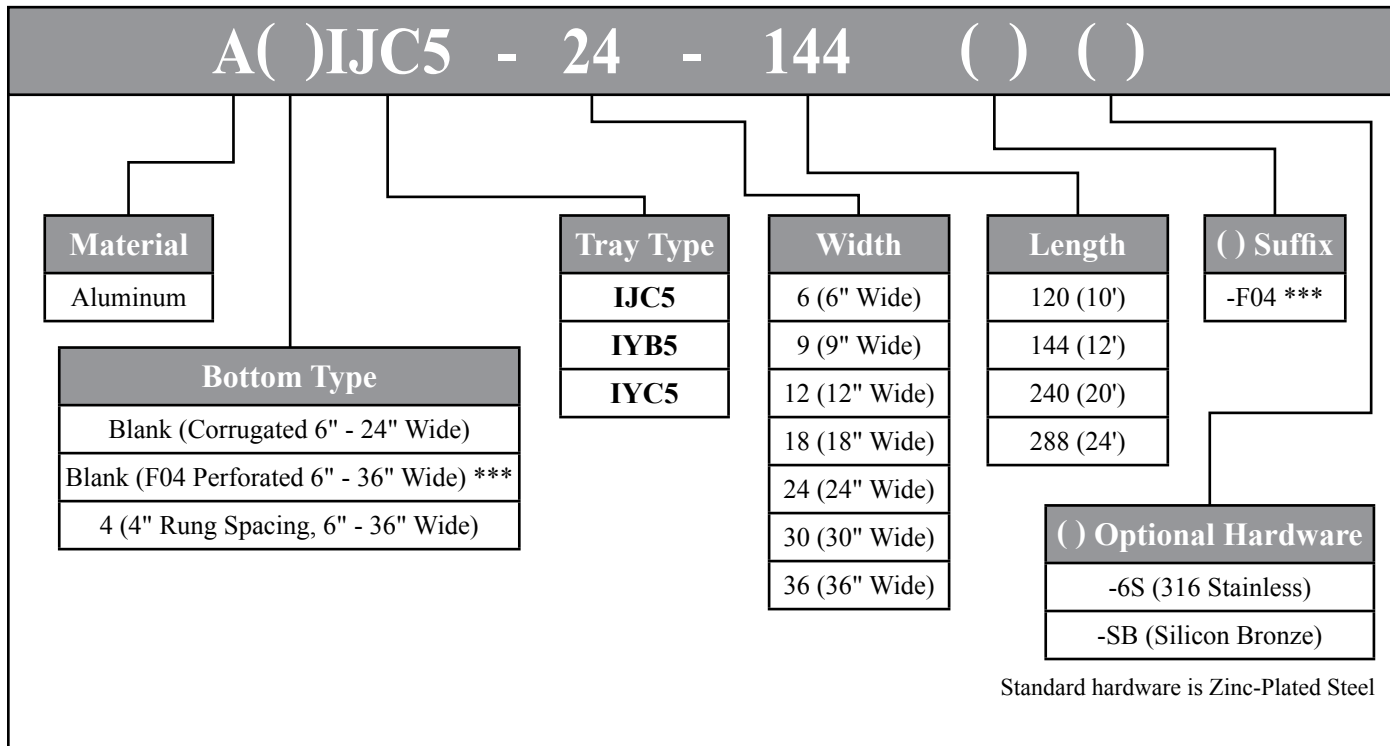




## I-BEAM SERIES

## ALUMINUM VENTILATED TROUGH

5" HIGH



## I-BEAM SERIES

## ALUMINUM VENTILATED TROUGH

5" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
<b>12C</b>		12 ft	122 (181.6)	1.15 (29.2)	A( )IJC5-(W)-(L)	1200	4.4**	2.0	A( )IJC5
<b>20B</b>		20 ft	76 (113.1)	4.77 (121.2)	A( )IYB5-(W)-(L)	1600	4.4**	2.0	A( )IYB5
<b>20C</b>		20 ft	100 (148.8)	4.33 (110.0)	A( )IYC5-(W)-(L)	2000	4.4**	2.0	A( )IYC5

( ) = Blank (Corrugated 6" - 24" wide), Blank (F04 Perf. 6" - 36" wide), 4 (4" rung spacing 6" - 36" wide). See Ladder Section for NEMA load & CSA on 4" rung spacing.

(W) = Denotes desired Width (in)

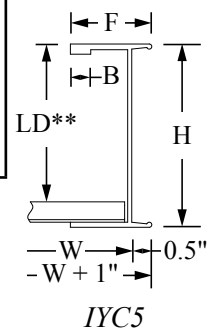
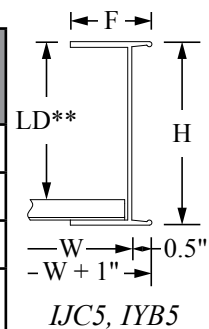
(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.

\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide.

Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugation or perforated bottom is present will be below rung height.

\*\*\*Requires the (-F04) suffix



SEE PAGES 59 – 70 FOR FITTINGS

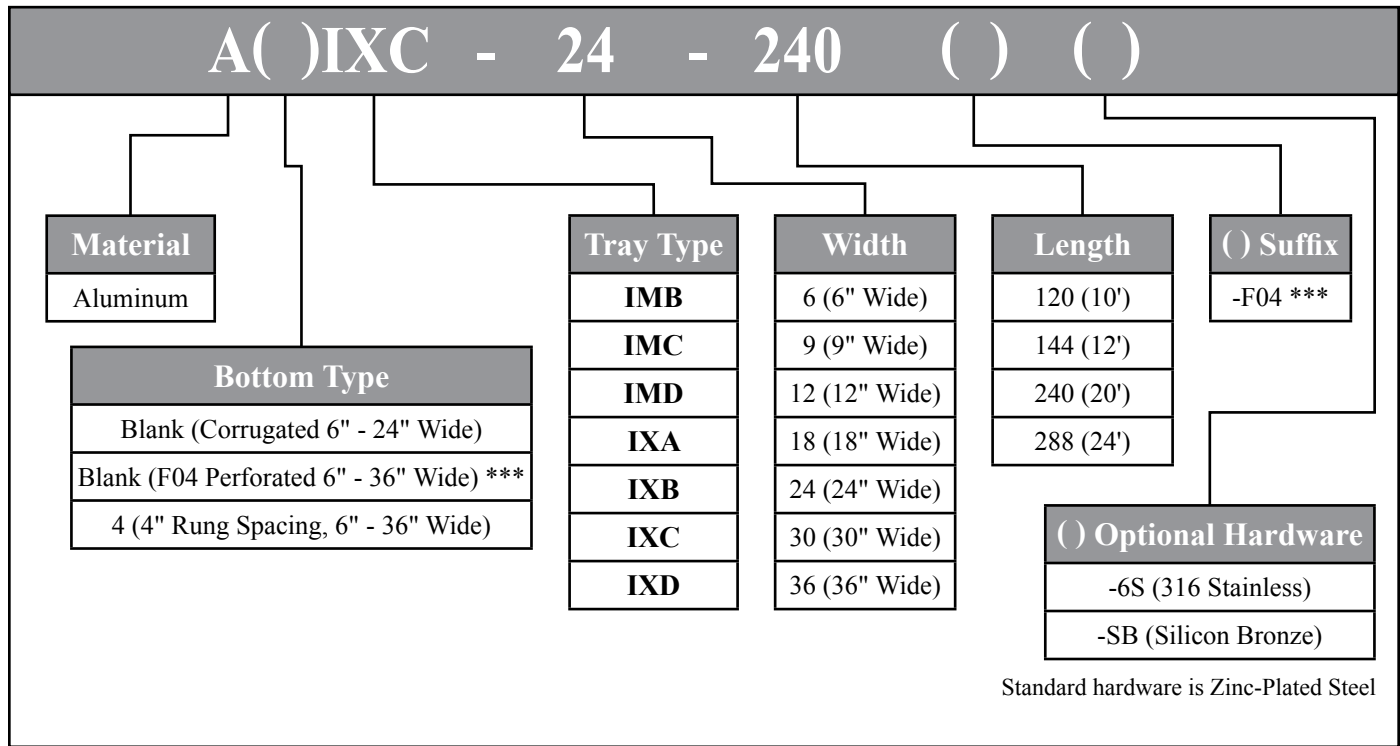
Prefix Examples	
Tray Style	IJC5 Fitting Prefix
Ventilated Trough	AIJC5
4" RS Ventilated Trough	A4IJC5



I-BEAM SERIES

ALUMINUM VENTILATED TROUGH

6" HIGH



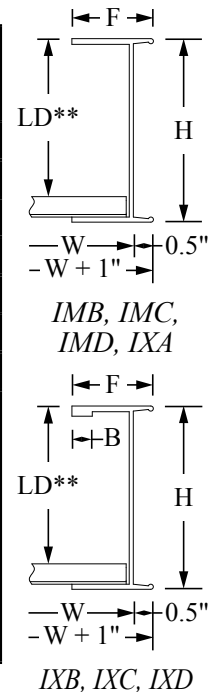
I-BEAM SERIES

ALUMINUM VENTILATED TROUGH

6" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12B		12 ft	83 (123.5)	0.47 (11.9)	A( )IMB-(W)-(L)	1200	5.4**	2.0	A( )IMB
12C		12 ft	106 (157.8)	0.60 (15.2)	A( )IMC-(W)-(L)	1200	5.4**	2.0	A( )IMC
12C		12 ft	135 (200.9)	0.76 (19.3)	A( )IMD-(W)-(L)	1200	5.4**	2.0	A( )IMD
20A		20 ft	69 (102.7)	2.29 (58.2)	A( )IXA-(W)-(L)	1600	5.4**	2.0	A( )IXA
20B		20 ft	95 (141.4)	3.08 (78.2)	A( )IXB-(W)-(L)	1600	5.4**	2.0	A( )IXB
20C		20 ft	104 (154.8)	3.08 (78.2)	A( )IXC-(W)-(L)	2000	5.4**	2.0	A( )IXC
20C		20 ft	113 (168.2)	3.34 (84.8)	A( )IXD-(W)-(L)	2000	5.4**	2.0	A( )IXD

( ) = Blank (Corrugated 6" - 24" wide), Blank (F04 Perf. 6" - 36" wide), 4 (4" rung spacing 6" - 36" wide). See Ladder Section for NEMA load & CSA on 4" rung spacing.  
 (W) = Denotes desired Width (in)  
 (L) = Denotes desired Length (in)  
 \*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor  
 \*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugation or perforated bottom is present will be below rung height.  
 \*\*\*Requires the (-F04) suffix



6" HIGH VENT TROUGH

SEE PAGES 59 – 70 FOR FITTINGS

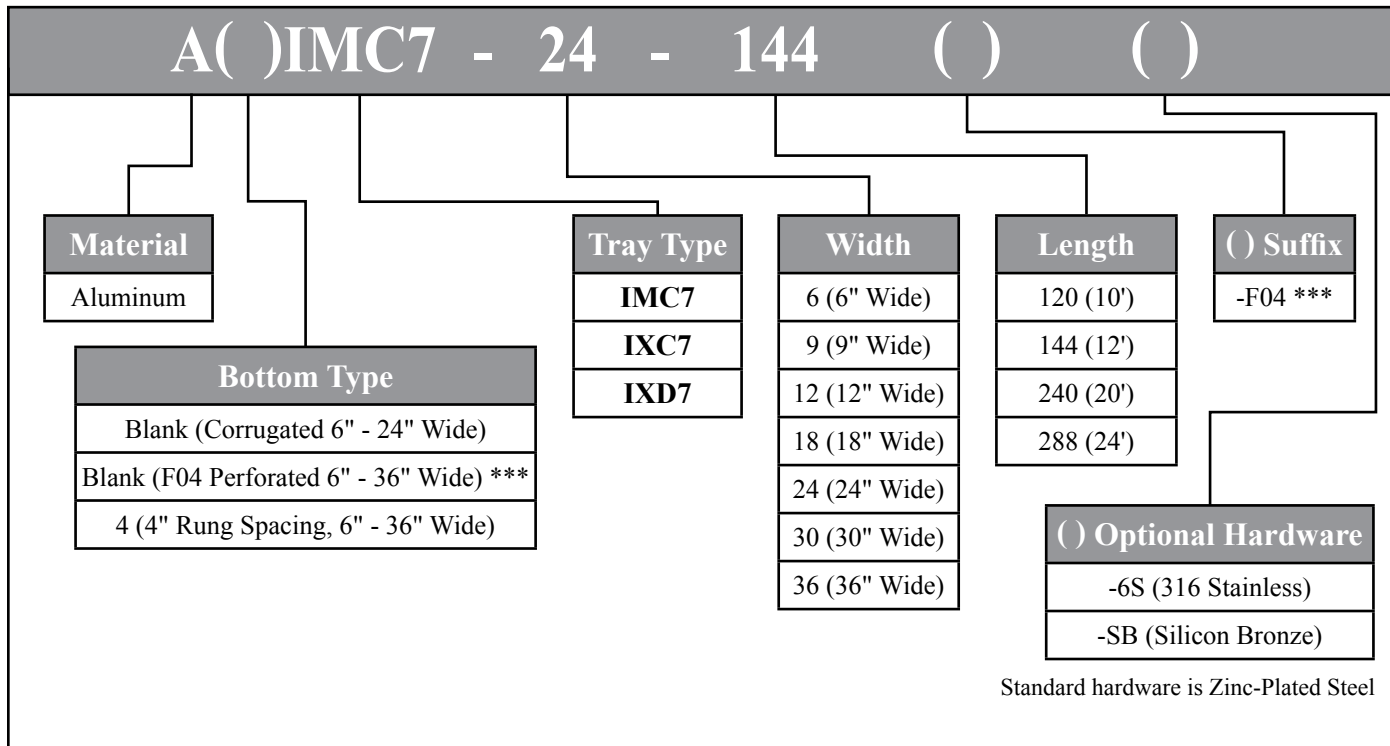
Prefix Examples	
Tray Style	IXC Fitting Prefix
Ventilated Trough	AIXC
4" RS Ventilated Trough	A4IXC



## I-BEAM SERIES

## ALUMINUM VENTILATED TROUGH

7" HIGH



## I-BEAM SERIES

## ALUMINUM VENTILATED TROUGH

7" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12C		12 ft	157 (233.6)	0.61 (15.5)	A( )IMC7-(W)-(L)	1600	6.4**	2.0	A( )IMC7
20C		20 ft	114 (169.7)	2.17 (55.1)	A( )IXC7-(W)-(L)	2000	6.4**	2.0	A( )IXC7
24B		24 ft	89 (132.5)	3.52 (89.4)	A( )IXD7-(W)-(L)	2000	6.4**	2.0	A( )IXD7

( ) = Blank (Corrugated 6" - 24" wide), Blank (F04 Perf. 6" - 36" wide), 4 (4" rung spacing 6" - 36" wide). See Ladder Section for NEMA load & CSA on 4" rung spacing.

(W) = Denotes desired Width (in)

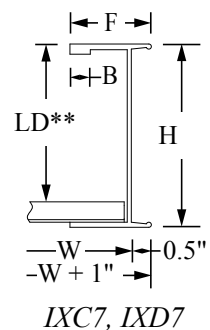
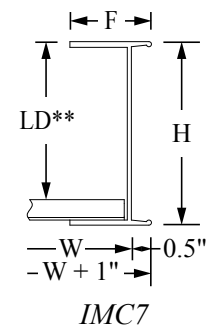
(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m), 20 ft (6m) or 24 ft (7.3m) span with a 1.5 safety factor.

\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide.

Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugation or perforated bottom is present will be below rung height.

\*\*\*Requires the (-F04) suffix



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IMC7 Fitting Prefix
Ventilated Trough	AIMC7
4" RS Ventilated Trough	A4IMC7



**ALUMINUM VENTILATED TROUGH LOADING & DEFLECTION**

TRAYS FOR 12 FOOT SUPPORT SPANS OR LESS									
	Support Span	6 ft		8 ft		10 ft		12 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>4.5"</b>	A()IJA	228	0.19	128	0.34	82	0.53	57	0.77
	A()IJB	372	0.32	209	0.56	134	0.87	93	1.26
	A()IJC	460	0.34	259	0.60	166	0.94	115	1.36
	A()IJD	636	0.47	358	0.84	228	1.29	159	1.88
<b>5.0"</b>	A()IJC5	488	0.29	275	0.51	176	0.80	122	1.15
<b>6.0"</b>	A()IMB	332	0.12	187	0.21	120	0.33	83	0.47
	A()IMC	424	0.15	239	0.27	153	0.42	106	0.60
	A()IMD	540	0.19	304	0.34	194	0.53	135	0.76
<b>7.0"</b>	A()IMC7	628	0.15	353	0.27	226	0.42	157	0.61

TRAYS FOR SPANS UP TO 20 FOOT									
	Support Span	12 ft		16 ft		18 ft		20 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>4.5"</b>	A()IYA	194	1.53	109	2.72	86	3.43	70	4.26
	A()IYB	228	1.80	128	3.20	101	4.05	82	4.99
	A()IYC	278	1.99	156	3.53	123	4.47	100	5.52
<b>5.0"</b>	A()IYB5	211	1.72	118	3.05	94	3.86	76	4.77
	A()IYC5	278	1.56	156	2.78	123	3.52	100	4.33
<b>6.0"</b>	A()IXA	192	0.83	108	1.47	85	1.86	69	2.29
	A()IXB	264	1.11	148	1.97	117	2.50	95	3.08
	A()IXC	289	1.11	163	1.97	128	2.49	104	3.08
	A()IXD	314	1.20	177	2.14	140	2.70	113	3.34
<b>7.0"</b>	A()IXC7	317	0.78	178	1.39	141	1.76	114	2.17

HEAVY DUTY TRAYS FOR SPANS UP TO 40 FOOT											
	Support Span	20 ft		24 ft		25 ft		30 ft		40 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>6.0"</b>	A()I6	200	3.10	139	4.46	128	4.85	89	6.97		
<b>7.0"</b>	A()IXD7	128	2.45	89	3.52						
<b>8.0"</b>	A()I8	288	1.35	200	1.94	184	2.11	128	3.03	72	5.39

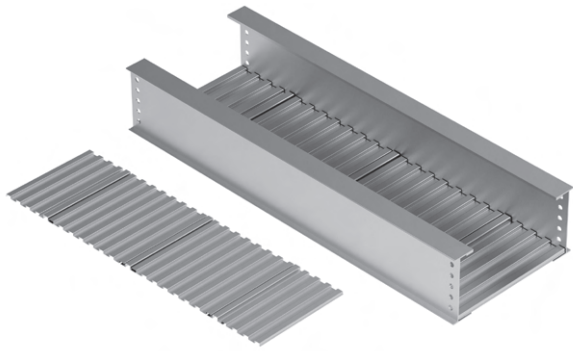
Load shown is pounds per linear foot.  
Deflection shown is inches.



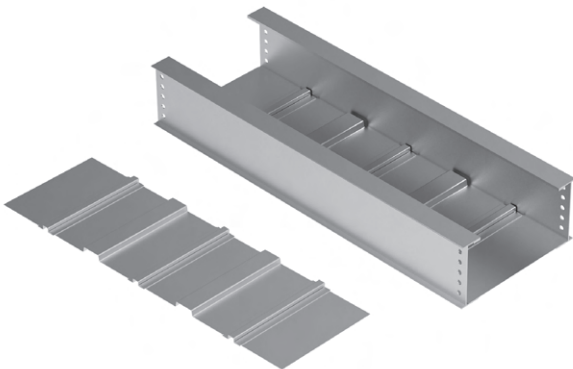
VENTILATED TROUGH



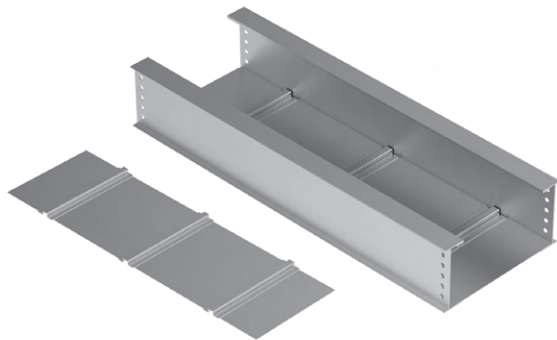




Solid Corrugated Bottom  
12" Rung Spacing, 6" - 24" Wide



Solid Bump Bottom (06C)  
12" Rung Spacing, 6" - 36" Wide



Flat Solid Bottom (F04)  
12" Rung Spacing, 6" - 36" Wide

# I-BEAM SOLID BOTTOM TROUGH

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

Table of Contents	Page
Selection Tables	52
4.5" High Solid Trough	53
5" High Solid Trough	54
6" High Solid Trough	55
7" High Solid Trough	56
Solid Trough Loading & Deflection	57



# mphusky

## I-BEAM SOLID BOTTOM TROUGH SELECTION TABLES

Tray Height	NEMA Class	CSA Class	Prefix	NEMA Load (lbs/ft)	Span (ft)	Load Depth (in)	Flange Width
4.5"	12A		ASIJA	57	12	3.9**	1.25
	12B		ASIJB	93	12	3.9**	1.25
	12C		ASIJC	115	12	3.9**	1.50
	12C		ASIJD	159	12	3.9**	1.50
	20A		ASIYA	70	20	3.9**	2.00
	20B		ASIYB	82	20	3.9**	2.00
	20C		ASIYC	100	20	3.9**	2.00
5.0"	12A		ASIJC5	122	12	4.4**	2.00
	12B		ASIJC5	122	12	4.4**	2.00
	12C		ASIJC5	122	12	4.4**	2.00
	20A		ASIYB5	76	20	4.4**	2.00
	20B		ASIYB5	76	20	4.4**	2.00
	20C		ASIYC5	100	20	4.4**	2.00
6.0"	12A		ASIMB	83	12	5.4**	2.00
	12B		ASIMB	83	12	5.4**	2.00
	12C		ASIMC	106	12	5.4**	2.00
	12C		ASIMD	135	12	5.4**	2.00
	20A		ASIXA	69	20	5.4**	2.00
	20B		ASIXB	95	20	5.4**	2.00
	20C		ASIXC	104	20	5.4**	2.00
	20C		ASIXD	113	20	5.4**	2.00
	20C		ASIXD	113	20	5.4**	2.00
7.0"	12A		ASIMC7	157	12	6.4**	2.00
	12B		ASIMC7	157	12	6.4**	2.00
	12C		ASIMC7	157	12	6.4**	2.00
	20A		ASIXC7	114	20	6.4**	2.00
	20B		ASIXC7	114	20	6.4**	2.00
	20C		ASIXC7	114	20	6.4**	2.00
	20C		ASIXC7	114	20	6.4**	2.00
	20C		ASIXD7	128	20	6.4**	2.00
	24A		ASIXD7	89	24	6.4**	2.00
	24B		ASIXD7	89	24	6.4**	2.00

\*\* = Load Depth (in) shown for standard hat rung 6" - 24" wide ladder. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung, (Except 16 & 18).

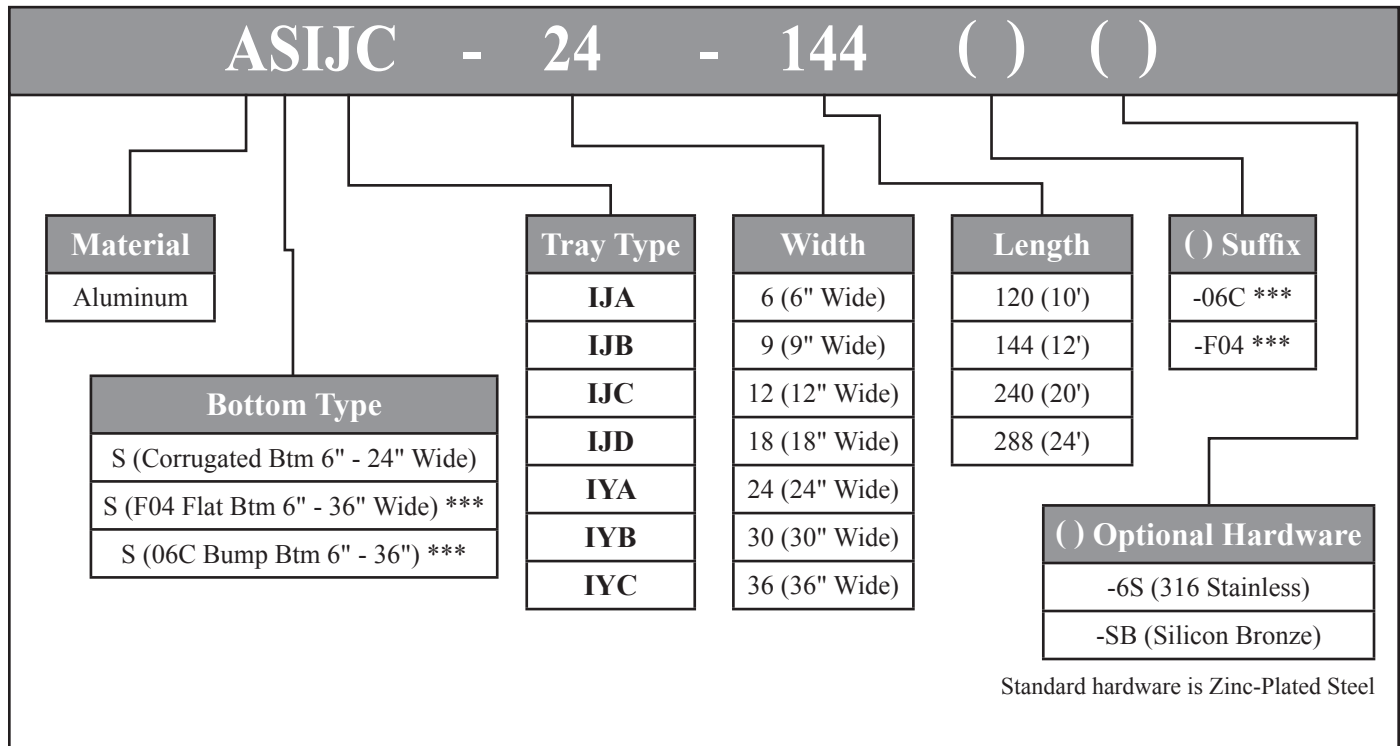
NEMA Class	Load lbs/ft (kgs/m)	Span (ft)
12A	50 / (74.4)	12
12B	75 / (111.6)	12
12C	100 / (148.8)	12
20A	50 / (74.4)	20
20B	75 / (111.6)	20
20C	100 / (148.8)	20

CSA Class	Load kgs/m (lbs/ft)	Span (m)
A	37 / (24.9)	3
C	97 / (65.2)	3
D	179 / (120.3)	3
D	67 / (45.0)	6
E	299 / (200.9)	3
E	112 / (75.3)	6

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

4.5" HIGH



I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

4.5" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12A		12 ft	57 (84.8)	0.77 (19.6)	ASIJA-(W)-(L)	1200	3.9**	1.25	ASIJA
12B		12 ft	93 (138.)	1.26 (32.0)	ASIJB-(W)-(L)	1200	3.9**	1.25	ASIJB
12C		12 ft	115 (171.1)	1.36 (34.5)	ASIJC-(W)-(L)	1200	3.9**	1.5	ASIJC
12C		12 ft	159 (236.6)	1.88 (47.8)	ASIJD-(W)-(L)	1200	3.9**	1.5	ASIJD
20A		20 ft	70 (104.2)	4.26 (108.2)	ASIYA-(W)-(L)	1200	3.9**	2.0	ASIYA
20B		20 ft	82 (122.0)	4.99 (126.8)	ASIYB-(W)-(L)	1200	3.9**	2.0	ASIYB
20C		20 ft	100 (148.8)	5.52 (140.2)	ASIYC-(W)-(L)	1600	3.9**	2.0	ASIYC

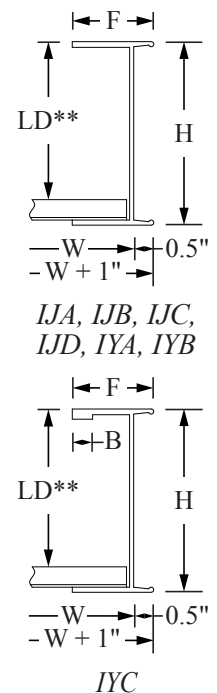
(W) = Desired Width (in)

(L) = Desired Length (in)

\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.

\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugated or flat sheet bottom is present will be below rung height. On (-06C) Bump Bottom 6" - 24" wide subtract 0.125" on all trays that don't have the (-HR) suffix.

\*\*\*Requires the (-F04) or (-06C) suffix



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IJC Fitting Prefix
Solid Bottom Trough	ASIJC

National Electrical Manufacturers Association  
**NEMA**  
Setting Standards for Excellence  
Member



4.5" HIGH SOLID TROUGH

# SOLID BOTTOM TROUGH

mphusky

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

5" HIGH

ASIJC5 - 24 - 144 ( ) ( )

## Material

Aluminum

## Tray Type

IJC5

IYB5

IYC5

## Width

6 (6" Wide)

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

## Length

120 (10')

144 (12')

240 (20')

288 (24')

## ( ) Suffix

-06C \*\*\*

-F04 \*\*\*

## Bottom Type

S (Corrugated Btm 6" - 24" Wide)

S (F04 Flat Btm 6" - 36" Wide) \*\*\*

S (06C Bump Btm 6" - 36") \*\*\*

## ( ) Optional Hardware

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

5" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12C		12 ft	122 (181.6)	1.15 (29.2)	ASIJC5-(W)-(L)	1200	4.4**	2.0	ASIJC5
20B		20 ft	76 (113.1)	4.77 (121.2)	ASIYB5-(W)-(L)	1600	4.4**	2.0	ASIYB5
20C		20 ft	100 (148.8)	4.33 (110.0)	ASIYC5-(W)-(L)	2000	4.4**	2.0	ASIYC5

(W) = Denotes desired Width (in)

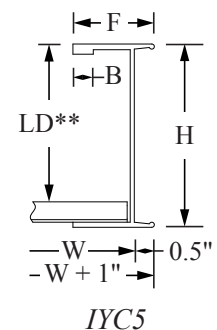
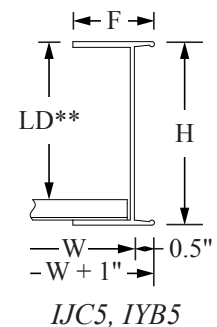
(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.

\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide.

Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugated or flat sheet bottom is present will be below rung height. On (-06C) Bump Bottom 6" - 24" wide subtract 0.125" on all trays that don't have the (-HR) suffix.

\*\*\*Requires the (-F04) or (-06C) suffix



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IJC5 Fitting Prefix
Solid Bottom Trough	ASIJC5



5" HIGH SOLID TROUGH

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

6" HIGH

**ASIXC - 24 - 240 ( ) ( )**

<b>Material</b>	<b>Bottom Type</b>	<b>Tray Type</b>	<b>Width</b>	<b>Length</b>	<b>( ) Suffix</b>	<b>( ) Optional Hardware</b>
Aluminum	S (Corrugated Btm 6" - 24" Wide)	<b>IMB</b>	6 (6" Wide)	120 (10')	-06C ***	-6S (316 Stainless)
	S (F04 Flat Btm 6" - 36" Wide) ***	<b>IMC</b>	9 (9" Wide)	144 (12')	-F04 ***	-SB (Silicon Bronze)
	S (06C Bump Btm 6" - 36") ***	<b>IMD</b>	12 (12" Wide)	240 (20')		
		<b>IXA</b>	18 (18" Wide)	288 (24')		
		<b>IXB</b>	24 (24" Wide)			
		<b>IXC</b>	30 (30" Wide)			
		<b>IXD</b>	36 (36" Wide)			

Standard hardware is Zinc-Plated Steel

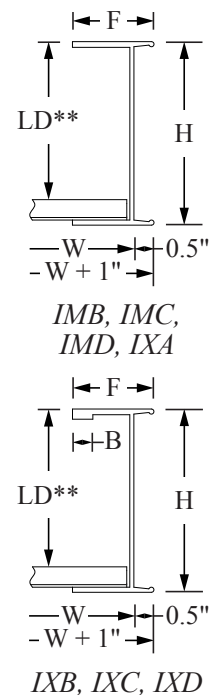
I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

6" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12B		12 ft	83 (123.5)	0.47 (11.9)	ASIMB-(W)-(L)	1200	5.4**	2.0	ASIMB
12C		12 ft	106 (157.8)	0.60 (15.2)	ASIMC-(W)-(L)	1200	5.4**	2.0	ASIMC
12C		12 ft	135 (200.9)	0.76 (19.3)	ASIMD-(W)-(L)	1200	5.4**	2.0	ASIMD
20A		20 ft	69 (102.7)	2.29 (58.2)	ASIXA-(W)-(L)	1600	5.4**	2.0	ASIXA
20B		20 ft	95 (141.4)	3.08 (78.2)	ASIXB-(W)-(L)	1600	5.4**	2.0	ASIXB
20C		20 ft	104 (154.8)	3.08 (78.2)	ASIXC-(W)-(L)	2000	5.4**	2.0	ASIXC
20C		20 ft	113 (168.2)	3.34 (84.8)	ASIXD-(W)-(L)	2000	5.4**	2.0	ASIXD

(W) = Denotes desired Width (in)  
(L) = Denotes desired Length (in)  
\*Safe Working Load based on 12 ft (3.66m) or 20 ft (6m) span with a 1.5 safety factor.  
\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide. Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugated or flat sheet bottom is present will be below rung height. On (-06C) Bump Bottom 6" - 24" wide subtract 0.125" on all trays that don't have the (-HR) suffix.  
\*\*\*Requires the (-F04) or (-06C) suffix



SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IXC Fitting Prefix
Solid Bottom Trough	ASIXC



6" HIGH SOLID TROUGH



# SOLID BOTTOM TROUGH

mphusky

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

7" HIGH

ASIMC7 - 24 - 240 ( ) ( )

**Material**

Aluminum

**Bottom Type**

S (Corrugated Btm 6" - 24" Wide)

S (F04 Flat Btm 6" - 36" Wide) \*\*\*

S (06C Bump Btm 6" - 36") \*\*\*

**Tray Type**

IMC7

IXC7

IXD7

**Width**

6 (6" Wide)

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

**Length**

120 (10')

144 (12')

240 (20')

288 (24')

**( ) Suffix**

-06C \*\*\*

-F04 \*\*\*

**( ) Optional Hardware**

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

I-BEAM SERIES

ALUMINUM SOLID BOTTOM TROUGH

7" HIGH

NEMA Class	CSA Class	Support Span	SWL* lbs/ft (kg/m)	Deflection in (mm)	Catalog No.	UL EGC (amps)	LD (in)	F (in)	Fitting Prefix
12C		12 ft	157 (233.6)	0.61 (15.5)	ASIMC7-(W)-(L)	1600	6.4**	2.0	ASIMC7
20C		20 ft	114 (169.7)	2.17 (55.1)	ASIXC7-(W)-(L)	2000	6.4**	2.0	ASIXC7
24B		24 ft	89 ( 132.5)	3.52 (89.4)	ASIXD7-(W)-(L)	2000	6.4**	2.0	ASIXD7

(W) = Denotes desired Width (in)

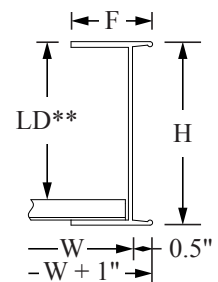
(L) = Denotes desired Length (in)

\*Safe Working Load based on 12 ft (3.66m), 20 ft (6m) or 24 ft (7.3m) span with a 1.5 safety factor.

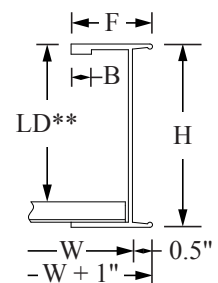
\*\* = Nominal Load Depth (in) shown for corrugated bottom or standard hat rung on 4" rung spacing 6" - 24" wide.

Subtract 0.4375" for high hat rung on 30" and wider trays or 6" - 24" wide trays with a (-HR) suffix indicating the tray is using the high hat rung. Area where corrugated or flat sheet bottom present will be below rung height. On (-06C) Bump Bottom 6" - 24" wide subtract 0.125" on all trays that don't have the (-HR) suffix.

\*\*\*Requires the (-F04) or (-06C) suffix



IMC7



IXC7, IXD7

SEE PAGES 59 – 70 FOR FITTINGS

Prefix Examples	
Tray Style	IMC7 Fitting Prefix
Solid Bottom Trough	ASIMC7



7" HIGH SOLID TROUGH

**ALUMINUM SOLID BOTTOM LOADING & DEFLECTION**

TRAYS FOR 12 FOOT SUPPORT SPANS OR LESS									
	Support Span	6 ft		8 ft		10 ft		12 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>4.5"</b>	A()IJA	228	0.19	128	0.34	82	0.53	57	0.77
	A()IJB	372	0.32	209	0.56	134	0.87	93	1.26
	A()IJC	460	0.34	259	0.60	166	0.94	115	1.36
	A()IJD	636	0.47	358	0.84	228	1.29	159	1.88
<b>5.0"</b>	A()IJC5	488	0.29	275	0.51	176	0.80	122	1.15
<b>6.0"</b>	A()IMB	332	0.12	187	0.21	120	0.33	83	0.47
	A()IMC	424	0.15	239	0.27	153	0.42	106	0.60
	A()IMD	540	0.19	304	0.34	194	0.53	135	0.76
<b>7.0"</b>	A()IMC7	628	0.15	353	0.27	226	0.42	157	0.61

TRAYS FOR SPANS UP TO 20 FOOT									
	Support Span	12 ft		16 ft		18 ft		20 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>4.5"</b>	A()IYA	194	1.53	109	2.72	86	3.43	70	4.26
	A()IYB	228	1.80	128	3.20	101	4.05	82	4.99
	A()IYC	278	1.99	156	3.53	123	4.47	100	5.52
<b>5.0"</b>	A()IYB5	211	1.72	118	3.05	94	3.86	76	4.77
	A()IYC5	278	1.56	156	2.78	123	3.52	100	4.33
<b>6.0"</b>	A()IXA	192	0.83	108	1.47	85	1.86	69	2.29
	A()IXB	264	1.11	148	1.97	117	2.50	95	3.08
	A()IXC	289	1.11	163	1.97	128	2.49	104	3.08
	A()IXD	314	1.20	177	2.14	140	2.70	113	3.34
<b>7.0"</b>	A()IXC7	317	0.78	178	1.39	141	1.76	114	2.17

HEAVY DUTY TRAYS FOR SPANS UP TO 24 FEET											
	Support Span	20 ft		24 ft		25 ft		30 ft		40 ft	
Tray Height	Tray Type	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)	Load (lbs/ft)	Defl (in)
<b>7.0"</b>	A()IXD7	128	2.45	89	3.52						

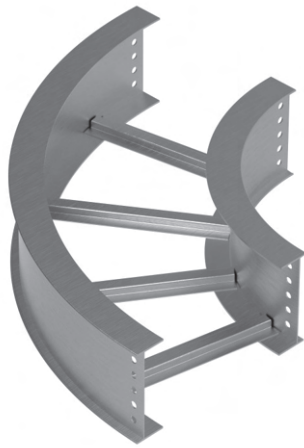
Load shown is pounds per linear foot.

Deflection shown is inches.

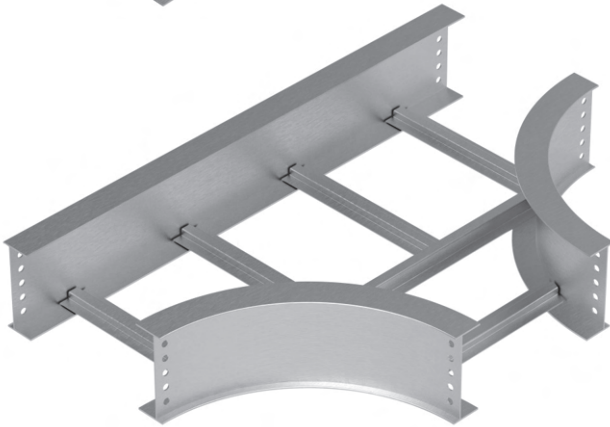
Loads shown should be multiplied by 0.75 for 18 inch rung spacing.



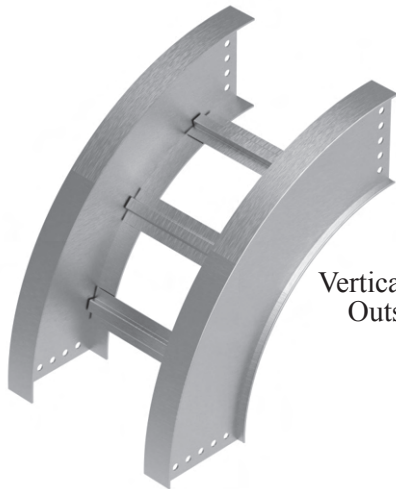




Horizontal 90  
Degree Bend



Horizontal Tee



Vertical 90 Degree  
Outside Bend

# I-BEAM CABLE TRAY FITTINGS

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

*CSA Classified Trays Available*

Table of Contents	Page
Identification Charts	60 - 61
Horizontal Bends	62
Vertical Bends	63 - 64
Tee Fittings	65
Cross Fittings	66
Reducer Fittings	67
Vertical Tee Fittings	68
Vertical Cross Fittings	69
Alternate Fitting Supports	70



# mphusky

## ALUMINUM I-BEAM HORIZONTAL &amp; VERTICAL FITTINGS

A(L)I8 - 24 H(°) - 24 ( ) ( )

## Material

Aluminum

## Bottom Type

L (Ladder)

Blank (Corrugated 6" - 24" Wide)

Blank (F04 Perforated, 6" - 36" Wide)

4 (4" Rung Spacing, 6" - 36" Wide)

S (Corrugated Btm 6" - 24" Wide)

S (F04 Flat Btm 6" - 36" Wide) \*\*\*

S (06C Bump Btm 6" - 36") \*\*\*

## Width

6 (6" Wide)

9 (9" Wide)

12 (12" Wide)

18 (18" Wide)

24 (24" Wide)

30 (30" Wide)

36 (36" Wide)

## Fitting Type

H(°) (Horizontal Bend)

VI(°) (Vertical Inside)

VO(°) (Vertical Outside)

VS (Vertical Support)

VT (Vertical Tee)

VTU (Vertical Tee Up)

VX (Vertical Cross)

## Radius

12 (12" Rad)

18 (18" Rad)

24 (24" Rad)

36 (36" Rad)

48 (48" Rad)

## ( ) Suffix

-06C \*\*\*

-F04 \*\*\*

## ( ) Optional Hardware

-6S (316 Stainless)

-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

## Tray Type / Height

4.5"	5"	6"	7"	8"
<b>IJA</b>	<b>IJC5</b>	<b>IMB</b>	<b>IMC7</b>	<b>I8</b>
<b>IJB</b>	<b>IYB5</b>	<b>IMC</b>	<b>IXC7</b>	
<b>IJC</b>	<b>IYC5</b>	<b>IMD</b>	<b>IXD7</b>	
<b>IJD</b>		<b>IXA</b>		
<b>IYA</b>		<b>IXB</b>		
<b>IYB</b>		<b>IXC</b>		
<b>IYC</b>		<b>IXD</b>		
		<b>I6</b>		

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04)\*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.

(°) Degree of Bend (90, 60, 45, or 30) for Horizontal and Vertical Inside or Outside Bends

Please see the sheets that follow for complete catalog numbers for Fittings.

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

\*\*\*Requires the (-F04) or (-06C) suffix

ALUMINUM I-BEAM TEES, CROSSES & REDUCERS

A(L)I8 - 24(T)(W1) - 24 ( ) ( )

Material
Aluminum

Bottom Type
L (Ladder)
Blank (Corrugated 6" - 24" Wide)
Blank (F04 Perforated. 6" - 36" Wide)
4 (4" Rung Spacing, 6" - 36" Wide)
S (Corrugated Btm 6" - 24" Wide)
S (F04 Flat Btm 6" - 36" Wide) ***
S (06C Bump Btm 6" - 36") ***

Width
6 (6" Wide)
9 (9" Wide)
12 (12" Wide)
18 (18" Wide)
24 (24" Wide)
30 (30" Wide)
36 (36" Wide)

Width 1
Blank (Standard T or X)
Insert Second Width

Fitting Type
T (Horizontal Tee)
X (Horizontal Cross)
R (Straight Reducer)
RR (Right Reducer)
RL (Left Reducer)

Radius
12 (12" Rad)
18 (18" Rad)
24 (24" Rad)
36 (36" Rad)
48 (48" Rad)

( ) Suffix
-06C ***
-F04 ***

Tray Type / Height				
4.5"	5"	6"	7"	8"
IJA	IJC5	IMB	IMC7	I8
IJB	IYB5	IMC	IXC7	
IJC	IYC5	IMD	IXD7	
IJD		IXA		
IYA		IXB		
IYB		IXC		
IYC		IXD		
		I6		

( ) Optional Hardware
-6S (316 Stainless)
-SB (Silicon Bronze)

Standard hardware is Zinc-Plated Steel

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings *(Except I6 & I8 are 12" Rung Spacing)*), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04)\*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.

(°) Degree of Bend (90, 60, 45, or 30) for Horizontal and Vertical Inside or Outside Bends

Please see the sheets that follow for complete catalog numbers for Fittings.

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

\*\*\*Requires the (-F04) or (-06C) suffix




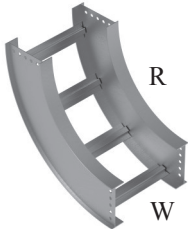
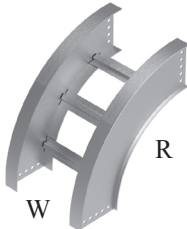
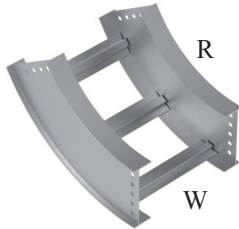
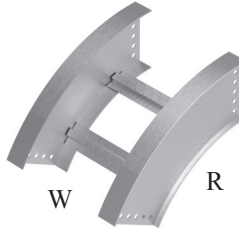
## TRAY FITTINGS - HORIZONTAL BENDS

Tray Height	Tray Prefix	Horizontal 90 Degree Bend	Horizontal 60 Degree Bend	Horizontal 45 Degree Bend	Horizontal 30 Degree Bend
4.5"	A(L)IJA	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IJB	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IJC	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IJD	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IYA	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IYB	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IYC	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
5"	A(L)IJC5	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IYB5	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IYC5	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
6"	A(L)IMB	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IMC	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IMD	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXA	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXB	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXC	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXD	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)I6	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
7"	A(L)IMC7	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXC7	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
	A(L)IXD7	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )
8"	A(L)I8	-(W)H90-(R)( )	-(W)H60-(R)( )	-(W)H45-(R)( )	-(W)H30-(R)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze  
ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.  
\*\*\*Requires the (-F04) or (-06C) suffix

Examples: ALIJC-12H90-24 (Ladder, 12" wide Horizontal 90 Degree Bend with 24" radius with standard Zinc-Plated Hardware)  
AIJC-24H60-12-6S (Ventilated Trough, 24" wide Horizontal 60 Degree Bend with 12" radius with 316 Stainless Steel Hardware)  
ASIJC-18H45-36-SB (Solid Bottom Trough, 18" wide Horizontal 45 Degree Bend with 36" radius with Silicon Bronze Hardware)


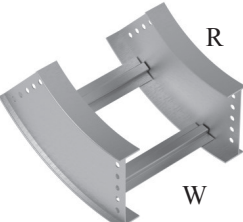
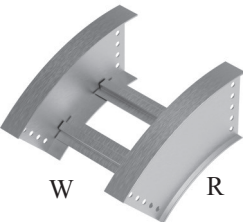
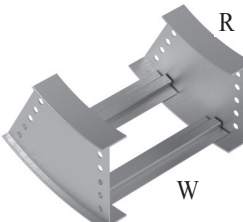
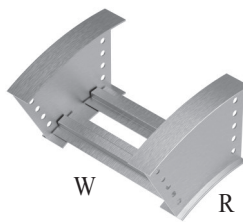
TRAY FITTINGS - VERTICAL 90 & 60 DEGREE BENDS

					
Tray Height	Tray Type	Vertical 90 Degree Inside Bend	Vertical 90 Degree Outside Bend	Vertical 60 Degree Inside Bend	Vertical 60 Degree Outside Bend
4.5"	A(L)IJA	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IJB	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IJC	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IJD	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L>IYA	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L>IYB	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L>IYC	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
5"	A(L)IJC5	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L>IYB5	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L>IYC5	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
6"	A(L)IMB	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IMC	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IMD	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXA	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXB	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXC	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXD	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
7"	A(L)IMC7	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXC7	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
	A(L)IXD7	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )
8"	A(L)I8	-(W)VI90-(R)( )	-(W)VO90-(R)( )	-(W)VI60-(R)( )	-(W)VO60-(R)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze  
ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.  
\*\*\*Requires the (-F04) or (-06C) suffix

Examples: ALIJC-12VI90-24 (Ladder, 12" wide Vertical Inside 90 Degree Bend with 24" radius with standard Zinc-Plated Hardware)  
ALIJC-24VO90-12-6S (Ventilated Trough, 24" wide Vertical Outside 90 Degree Bend with 12" radius with 316 Stainless Steel Hardware)  
ASIJC-18VI60-36-SB (Solid Bottom Trough, 18" wide Vertical Inside 60 Degree Bend with 36" radius with Silicon Bronze Hardware)

## TRAY FITTINGS - VERTICAL 45 &amp; 30 DEGREE BENDS

					
Tray Height	Tray Type	Vertical 45 Degree Inside Bend	Vertical 45 Degree Outside Bend	Vertical 30 Degree Inside Bend	Vertical 30 Degree Outside Bend
4.5"	A(L)IJA	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IJB	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IJC	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IJD	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L>IYA	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L>IYB	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L>IYC	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
5"	A(L)IJC5	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L>IYB5	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L>IYC5	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
6"	A(L)IMB	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IMC	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IMD	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXA	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXB	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXC	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXD	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)I6	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
7"	A(L)IMC7	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXC7	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
	A(L)IXD7	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )
8"	A(L)I8	-(W)VI45-(R)( )	-(W)VO45-(R)( )	-(W)VI30-(R)( )	-(W)VO30-(R)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.

(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)

(R) = Insert Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

\*\*\*Requires the (-F04) or (-06C) suffix

Examples: ALIJC-12VI45-24 (Ladder, 12" wide Vertical Inside 45 Degree Bend with 24" radius with standard Zinc-Plated Hardware)


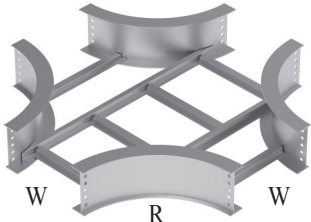
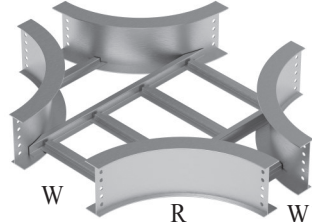
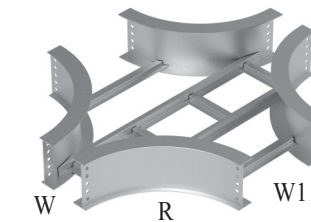
ALIJC-24VO45-12-6S (Ventilated Trough, 24" wide Vertical Outside 45 Degree Bend with 12" radius with 316 Stainless Steel Hardware)

ASIJC-18VI30-36-SB (Solid Bottom Trough, 18" wide Vertical Inside 30 Degree Bend with 36" radius with Silicon Bronze Hardware)

TRAY FITTINGS - TEES

Tray Height	Tray Type	Horizontal Tee	Horizontal Reducing Tee	Horizontal Enlarging Tee
4.5"	A(L)IJA	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IJB	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IJC	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IJD	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L>IYA	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L>IYB	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L>IYC	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
5"	A(L)IJC5	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L>IYB5	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L>IYC5	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
6"	A(L)IMB	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IMC	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IMD	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXA	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXB	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXC	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXD	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)I6	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
7"	A(L)IMC7	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXC7	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
	A(L)IXD7	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
8"	A(L)I8	-(W)T-(R)( )	-(W)T(W1)-(R)( )	-(W)T(W1)-(R)( )
<p>(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 &amp; I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) *** or Flat Bottom (F04) *** (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) *** (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.</p> <p>(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)</p> <p>(W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in)</p> <p>(R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)</p> <p>( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze</p> <p>ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.</p> <p>***Requires the (-F04) or (-06C) suffix</p> <p>Examples: ALIJC-12T-24 (Ladder, 12" wide Horizontal Tee with 24" radius with standard Zinc-Plated Hardware)</p> <p>AIJC-24T-12-6S (Ventilated Trough, 24" wide Horizontal Tee with 12" radius with 316 Stainless Steel Hardware)</p> <p>ASIJC-18T-36-SB (Solid Bottom Trough, 18" wide Horizontal Tee with 36" radius with Silicon Bronze Hardware)</p>				

## TRAY FITTINGS - CROSSES


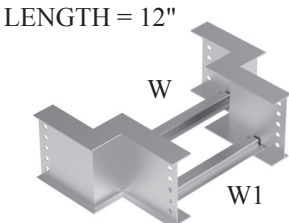
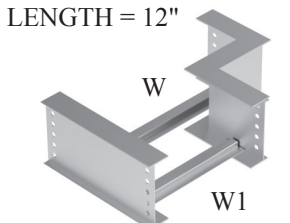
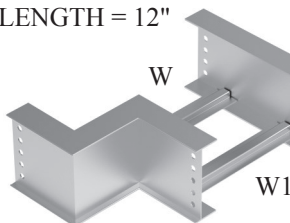
				
Tray Height	Tray Type	Horizontal Cross	Horizontal Reducing Cross	Horizontal Enlarging Cross
4.5"	A(L)IJA	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IJB	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IJC	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IJD	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IYA	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L>IYB	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IYC	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
5"	A(L)IJC5	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IYB5	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IYC5	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
6"	A(L)IMB	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IMC	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IMD	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXA	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXB	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXC	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXD	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)I6	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
7"	A(L)IMC7	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXC7	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
	A(L)IXD7	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )
8"	A(L)I8	-(W)X-(R)( )	-(W)X(W1)-(R)( )	-(W)X(W1)-(R)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04)\*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in)  
(R) = Insert Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze  
ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.  
\*\*\*Requires the (-F04) or (-06C) suffix

Examples: ALIJC-12X-24 (Ladder, 12" wide Horizontal Cross with 24" radius with standard Zinc-Plated Hardware)  
AIJC-24X6-12-6S (Ventilated Trough, 24" wide to 6" wide Horizontal Reducing Cross with 12" radius with 316 Stainless Steel Hardware)  
ASUJC-18X36-36-SB (Solid Bottom Trough, 18" wide to 36" wide Horizontal Enlarging Cross with 36" radius with Silicon Bronze Hardware)



TRAY FITTINGS - REDUCERS

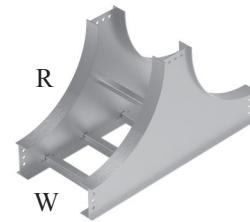
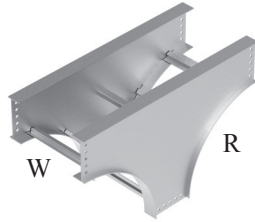
				
Tray Height	Tray Type	Straight Reducer (Concentric)	Right Hand Reducer (Eccentric)	Left Hand Reducer (Eccentric)
4.5"	A(L)IJA	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IJB	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IJC	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IJD	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IYA	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IYB	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IYC	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
5"	A(L)IJC5	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IYB5	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IYC5	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
6"	A(L)IMB	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IMC	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IMD	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXA	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXB	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXC	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXD	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
7"	A(L)IMC7	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXC7	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
	A(L)IXD7	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )
8"	A(L)I8	-(W)R(W1)( )	-(W)RR(W1)( )	-(W)RL(W1)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in)  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze  
ALI6 and ALI8 Reducer Fittings are 24" long. Other I-Beam Reducers are 12" long  
\*\*\*Requires the (-F04) or (-06C) suffix

Examples: ALIJC-12R6 (Ladder, 12" wide to 6" wide Straight Reducer with standard Zinc-Plated Hardware)  
ALIJC-24RR12-6S (Ventilated Trough, 24" wide to 12" wide Right Hand Reducer with 316 Stainless Steel Hardware)  
ASIIJC-18RL9-6B (Solid Bottom Trough, 18" wide to 9" wide Left Hand Reducer with Silicon Bronze Hardware)



## TRAY FITTINGS - VERTICAL TEES


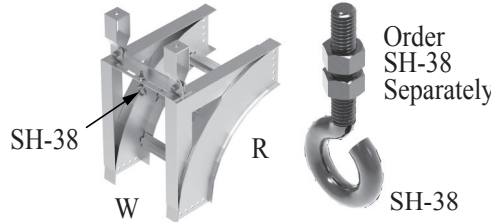
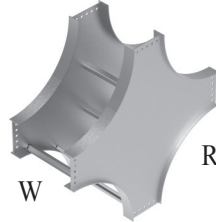


Tray Height	Tray Type	Vertical Tee Turns Down	Vertical Tee Turns Up
4.5"	A(L)IJA	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IJB	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IJC	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IJD	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IYA	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L>IYB	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IYC	-(W)VT-(R)( )	-(W)VTU-(R)( )
5"	A(L)IJC5	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IYB5	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IYC5	-(W)VT-(R)( )	-(W)VTU-(R)( )
6"	A(L)IMB	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IMC	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IMD	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXA	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXB	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXC	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXD	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)I6	-(W)VT-(R)( )	-(W)VTU-(R)( )
7"	A(L)IMC7	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXC7	-(W)VT-(R)( )	-(W)VTU-(R)( )
	A(L)IXD7	-(W)VT-(R)( )	-(W)VTU-(R)( )
8"	A(L)I8	-(W)VT-(R)( )	-(W)VTU-(R)( )

(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (Except I6 & I8 are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) \*\*\* or Flat Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) \*\*\* (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze  
ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.  
\*\*\*Requires the (-F04) or (-06C) suffix

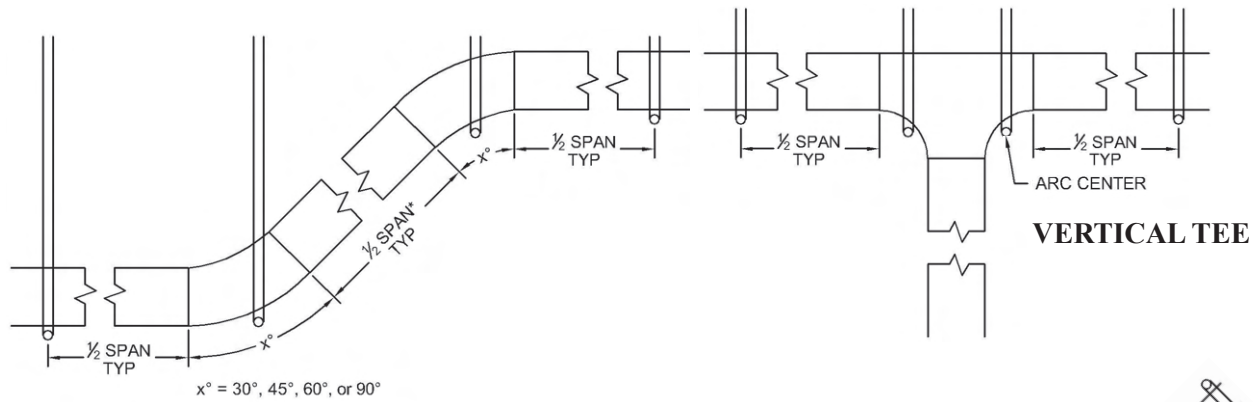
Examples: ALIJC-12VT-24 (Ladder, 12" wide Vertical Tee with 24" radius with standard Zinc-Plated Hardware)  
AIJC-24VT-12-6S (Ventilated Trough, 24" wide Vertical Tee with 12" radius with 316 Stainless Steel Hardware)  
ASIJC-18VTU-36-SB (Solid Bottom Trough, 18" wide Vertical Tee Up with 36" radius with Silicon Bronze Hardware)

TRAY FITTINGS - VERTICAL SUPPORT ELBOWS & VERTICAL CROSSES

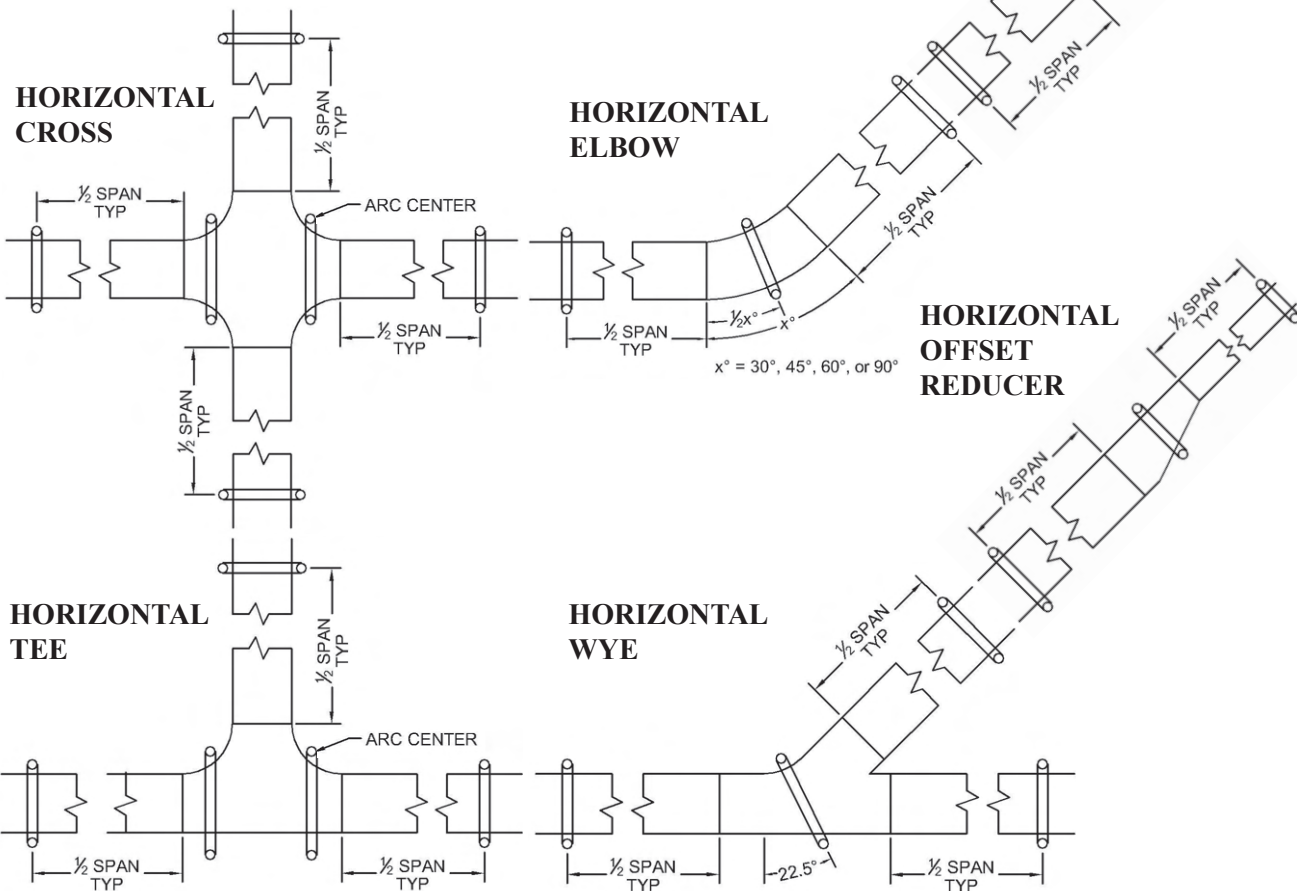
					
Tray Height	Tray Type	Vertical Support 90 Fitting		Vertical Cross	
4.5"	A(L)IJA	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IJB	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IJC	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IJD	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L>IYA	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L>IYB	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L>IYC	-(W)VS-(R)( )		-(W)VX-(R)( )	
5"	A(L)IJC5	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L>IYB5	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L>IYC5	-(W)VS-(R)( )		-(W)VX-(R)( )	
6"	A(L)IMB	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IMC	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IMD	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXA	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXB	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXC	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXD	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)I6	-(W)VS-(R)( )		-(W)VX-(R)( )	
7"	A(L)IMC7	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXC7	-(W)VS-(R)( )		-(W)VX-(R)( )	
	A(L)IXD7	-(W)VS-(R)( )		-(W)VX-(R)( )	
8"	A(L)I8	-(W)VS-(R)( )		-(W)VX-(R)( )	
<p>(L) = Ladder (Rung Spacing 9" for all I-Beam Fittings (<i>Except I6 &amp; I8</i> are 12" Rung Spacing)), (S) for Solid Bottom Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), Bump Bottom (06C) *** or Flat Bottom (F04) *** (6" - 36" Wide) between the rungs), ( ) Blank for Ventilated Trough (Rung Spacing 12" with Corrugation (6" - 24" Wide), or Flat Perf. Bottom (F04) *** (6" - 36" Wide) between the rungs) or (4) for 4" Rung Spacing on (6" - 36" Wide) Ventilated Trough Fittings. (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in) ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents. ***Requires the (-F04) or (-06C) suffix</p> <p>Examples: ALIJC-12VX-24 (Ladder, 12" wide Vertical Cross with 24" radius with standard Zinc-Plated Hardware) AIJC-24VX-12-6S (Ventilated Trough, 24" wide Vertical Cross with 12" radius with 316 Stainless Steel Hardware) ASIJC-18VX-36-SB (Solid Bottom Trough, 18" wide Vertical Cross with 36" radius with Silicon Bronze Hardware)</p>					

## ALTERNATE FITTING SUPPORT LOCATIONS

Diagrammed below are fitting support locations as tested with specially-constructed NEMA 20C cable tray fittings as an alternate to the support locations diagrammed in NEMA VE-2. *Please consult the factory at time of quote if you intend to support the fittings in this manner.*

**VERTICAL ELBOW**

\*Maximum span without additional support

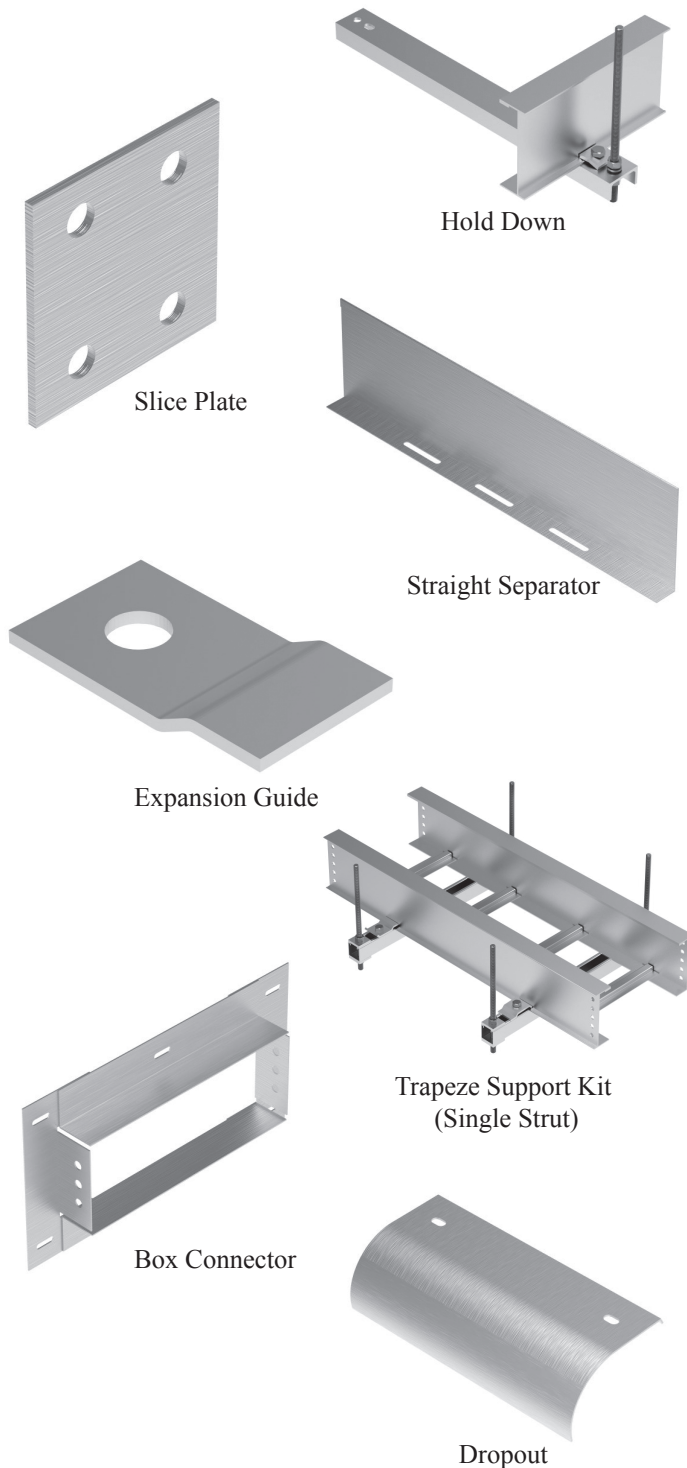
**HORIZONTAL REDUCER**

# I-BEAM CABLE TRAY ACCESSORIES & SUPPORTS

*Manufactured & Tested In  
Accordance With NEMA VE-1*


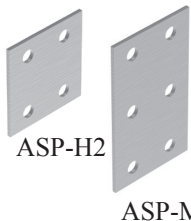


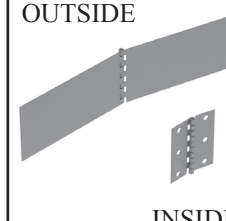
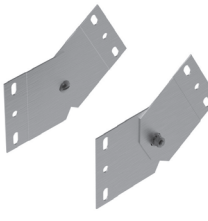
*Classified By UL As An Equipment  
Grounding Conductor*

Table of Contents	Page
Splice Connectors	72
Splices, Dropouts & End Plates	73
Separators, Hold Downs & Exp Guides	74 - 75
Trapeze Supports	75 - 76
Wall Penetration Sleeves	77
Mid-Span/Qtr-Span Expansion Splices	78 - 79


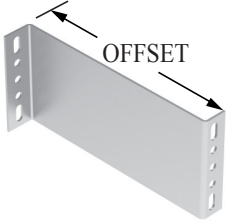
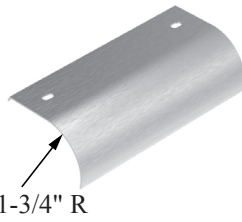
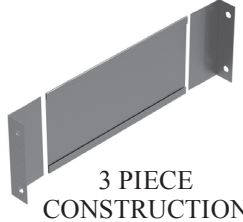
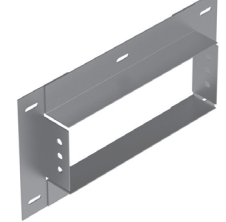


# mphusky

ACCESSORIES - SPLICE CONNECTORS

						
Tray Height	Tray Type	Standard Splice Kit	Expansion Splice Kit	90 Degree Splice	Horizontal Hinge Splice Kit	Vertical Hinge Splice Kit
4.5"	A(L)IJA	ASP-H2( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IJB	ASP-H2( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IJC	ASP-H2( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IJD	ASP-H2( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IYA	ASP-H6( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L>IYB	ASP-H6( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IYC	ASP-H6( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
5"	A(L)IJC5	ASP-H2( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IYB5	ASP-H6( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
	A(L)IYC5	ASP-H6( )-K	ASP-4-EX( )-K	ASP-4-90( )	AFS-H4( )-K	AFS-V4( )-K
6"	A(L)IMB	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IMC	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IMD	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXA	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXB	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXC	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXD	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)I6	ASP-E2( )-K	ASP-I6-EX( )-K	ASP-I6-90( )	AFS-HI6( )-K	AFS-VI6( )-K
7"	A(L)IMC7	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXC7	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
	A(L)IXD7	ASP-M2( )-K	ASP-6-EX( )-K	ASP-6-90( )	AFS-H6( )-K	AFS-V6( )-K
8"	A(L)I8	ASP-I8( )-K	ASP-I8-EX( )-K	ASP-I8-90( )	AFS-HI8( )-K	AFS-VI8( )-K
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze -K = Kitted Hardware and Splice						

ACCESSORIES - SPLICES, DROPOUTS, END PLATES & BOX CONNECTORS

					
Tray Height	Tray Type	Offset Reducing Splice	Dropout	End Plate	Box Connector
4.5"	A(L)IJA	ASP-HOR-(OFF)( )	AVD-(W)( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L)IJB	ASP-HOR-(OFF)( )	AVD-(W)( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L)IJC	ASP-HOR-(OFF)( )	AVD-(W)-XA( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L)IJD	ASP-HOR-(OFF)( )	AVD-(W)-XA( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L>IYA	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L>IYB	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
	A(L>IYC	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-4-1/2( )	AVBC-(W)-4-1/2( )
5"	A(L)IJC5	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-5( )	AVBC-(W)-5( )
	A(L>IYB5	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-5( )	AVBC-(W)-5( )
	A(L>IYC5	ASP-HOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-5( )	AVBC-(W)-5( )
6"	A(L)IMB	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IMC	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IMD	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IXA	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IXB	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IXC	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)IXD	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-6( )	AVBC-(W)-6( )
	A(L)I6	ASP-I6OR-(OFF)( )	AVD-(W)-X( )	AEP-(W)-I6( )	AVBC-(W)-I6( )
7"	A(L)IMC7	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-7( )	AVBC-(W)-7( )
	A(L)IXC7	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-7( )	AVBC-(W)-7( )
	A(L)IXD7	ASP-XOR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-7( )	AVBC-(W)-7( )
8"	A(L)I8	ASP-I8OR-(OFF)( )	AVD-(W)-YA( )	AEP-(W)-I8( )	AVBC-(W)-I8( )


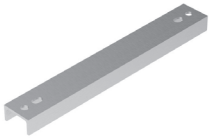
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in).  
(OFF) Offset in inches Example: ASP-HOR-4-1/2  
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze



## ACCESSORIES - SEPARATORS &amp; HOLD DOWN/EXPANSION CLAMPS

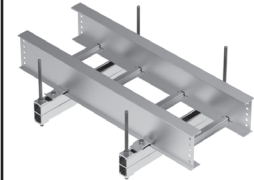
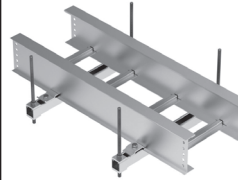
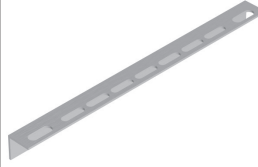
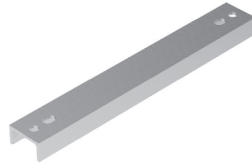
						
Tray Height	Tray Type	Straight Separator (Aluminum)	Horizontal Bend Separator (Aluminum)	Vertical Inside Bend Separator (Aluminum)	Vertical Outside Bend Separator (Aluminum)	Hold Down/Expansion Clamp (Zinc-Plated)
4.5"	A(L)IJA	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L)IJB	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L)IJC	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L)IJD	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L>IYA	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L>IYB	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
	A(L>IYC	A3S-(L)( )	A3S-HA( )	A3V-VI(D)-(R)( )	A3V-VO(D)-(R)( )	SHDEC
5"	A(L)IJC5	A4S-(L)( )	A4S-HA( )	A4V-VI(D)-(R)( )	A4V-VO(D)-(R)( )	SHDEC
	A(L>IYB5	A4S-(L)( )	A4S-HA( )	A4V-VI(D)-(R)( )	A4V-VO(D)-(R)( )	SHDEC
	A(L>IYC5	A4S-(L)( )	A4S-HA( )	A4V-VI(D)-(R)( )	A4V-VO(D)-(R)( )	SHDEC
6"	A(L)IMB	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IMC	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IMD	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IXA	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IXB	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IXC	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)IXD	A5S-(L)( )	A5S-HA( )	A5V-VI(D)-(R)( )	A5V-VO(D)-(R)( )	SHDEC
	A(L)I6	AI6S-(L)( )	AI6S-HA( )	AI6V-VI(D)-(R)( )	AI6V-VO(D)-(R)( )	SHDEC
7"	A(L)IMC7	A6S-(L)( )	A6S-HA( )	A6V-VI(D)-(R)( )	A6V-VO(D)-(R)( )	SHDEC
	A(L)IXC7	A6S-(L)( )	A6S-HA( )	A6V-VI(D)-(R)( )	A6V-VO(D)-(R)( )	SHDEC
	A(L)IXD7	A6S-(L)( )	A6S-HA( )	A6V-VI(D)-(R)( )	A6V-VO(D)-(R)( )	SHDEC
8"	A(L)I8	AI8S-(L)( )	AI8S-HA( )	AI8V-VI(D)-(R)( )	AI8V-VO(D)-(R)( )	SHDEC
<p>(L) = Insert 120 (10'), 3M (3Meters), 144 (12') Long            (D) = Insert Degree (30, 45, 60, or 90)            (R) = Insert Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            Each separator includes one CSS separator splice and 4 self-drilling self-tapping screws.            ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze            Example: A3V-VO90-12 (Divider for 4-1/2" high tray, Vertical Outside 90 Degree Bend with 12" Radius)</p>						

SUPPORTS - HOLD DOWN CLAMPS, HANGER CLIPS & TRAPEZE SUPPORTS

		 HOLD DOWN  EXPANSION				
Tray Height	Tray Type	Hold Down/ Expansion Clamp (Aluminum)	Heavy Duty Hold Down (Aluminum)	Heavy Duty Hold Down (Aluminum)	Hanger Clip Set (Zinc-Plated) for 1/2" Hanger Rod	Trapeze Support Channel (HDGAF)
4.5"	A(L)IJA	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IJA	SSC-(W)
	A(L)IJB	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IJA	SSC-(W)
	A(L)IJC	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IJC	SSC-(W)
	A(L)IJD	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IJC	SSC-(W)
	A(L>IYA	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC	SSC-(W)
	A(L>IYB	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC	SSC-(W)
	A(L>IYC	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC	SSC-(W)
5"	A(L)IJC5	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC5	SSC-(W)
	A(L>IYB5	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC5	SSC-(W)
	A(L>IYC5	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IYC5	SSC-(W)
6"	A(L)IMB	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IMC	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IMD	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IXA	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IXB	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IXC	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)IXD	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXB	SSC-(W)
	A(L)I6	AHDEC	AHDC-HV( )	AHDC-HV2( )	—	SSC-(W)
7"	A(L)IMC7	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXD7	SSC-(W)
	A(L)IXC7	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXD7	SSC-(W)
	A(L)IXD7	AHDEC	AHDC-HV( )	AHDC-HV2( )	SHC-IXD7	SSC-(W)
8"	A(L)I8	AHDEC	AHDC-HV( )	AHDC-HV2( )	—	SSC-(W)

(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in).  
 ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze

SUPPORTS - TRAPEZE SUPPORTS




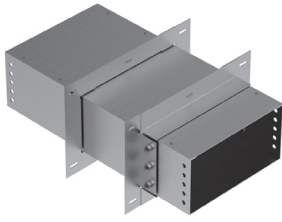
ACCESSORIES & SUPPORTS

Tray Height	Tray Type	Trapeze Support Channel (Aluminum)	Trapeze Support Angle (HDGAF)	Trapeze Support Kit (Single Strut) (Mill Galv)	Trapeze Support Kit (Double Strut) (Mill Galv)
4.5"	A(L)IJA	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IJB	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IJC	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IJD	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L>IYA	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L>IYB	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L>IYC	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
5"	A(L)IJC5	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L>IYB5	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L>IYC5	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
6"	A(L)IMB	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IMC	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IMD	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXA	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXB	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXC	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXD	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)I6	ASC-(W)	STSA-(W)	TSHP200-(W)-3( )	TSHP201-(W)-3( )
7"	A(L)IMC7	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXC7	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
	A(L)IXD7	ASC-(W)	STSA-(W)	TSHP200-(W)-2( )	TSHP201-(W)-2( )
8"	A(L)I8	ASC-(W)	STSA-(W)	TSHP200-(W)-3( )	TSHP201-(W)-3( )

(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in).

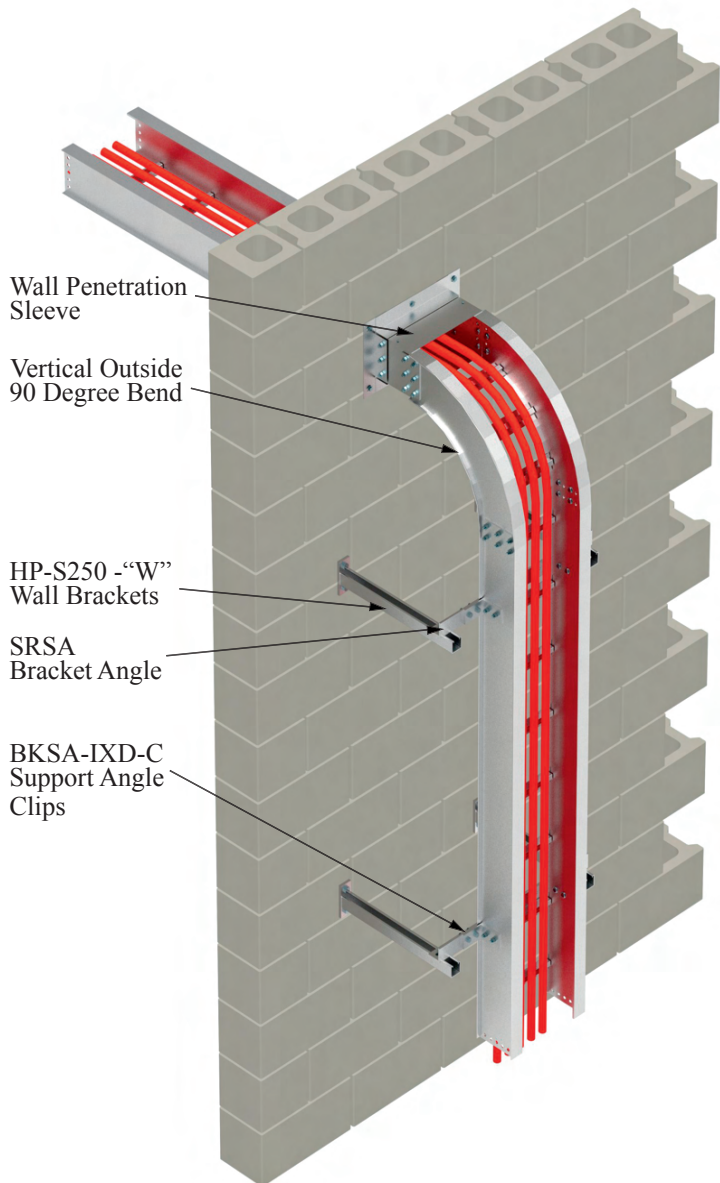
( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze

WALL PENETRATION SLEEVES

		
Tray Height	Tray Type	Wall Penetration Sleeve (Aluminum)
4.5"	A(L)IJA	AWPS-(W)-4-1/2( )
	A(L)IJB	AWPS-(W)-4-1/2( )
	A(L)IJC	AWPS-(W)-4-1/2( )
	A(L)IJD	AWPS-(W)-4-1/2( )
	A(L)IYA	AWPS-(W)-4-1/2( )
	A(L)IYB	AWPS-(W)-4-1/2( )
	A(L)IYC	AWPS-(W)-4-1/2( )
5"	A(L)IJC5	AWPS-(W)-5( )
	A(L)IYB5	AWPS-(W)-5( )
	A(L)IYC5	AWPS-(W)-5( )
6"	A(L)IMB	AWPS-(W)-6( )
	A(L)IMC	AWPS-(W)-6( )
	A(L)IMD	AWPS-(W)-6( )
	A(L)IXA	AWPS-(W)-6( )
	A(L)IXB	AWPS-(W)-6( )
	A(L)IXC	AWPS-(W)-6( )
	A(L)IXD	AWPS-(W)-6( )
	A(L)I6	AWPS-(W)-I6( )
7"	A(L)IMC7	AWPS-(W)-7( )
	A(L)IXC7	AWPS-(W)-7( )
	A(L)IXD7	AWPS-(W)-7( )
8"	A(L)I8	AWPS-(W)-I8( )

(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in).  
 ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel, or (-SB) for Silicon Bronze

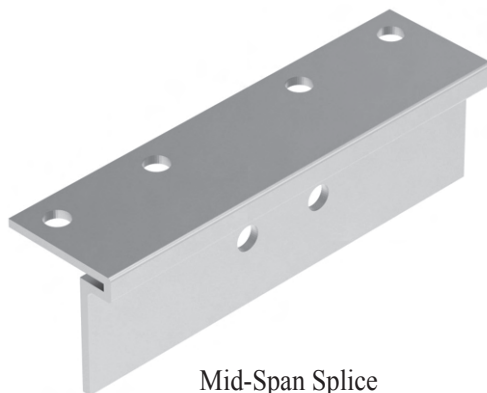
The detail below shows the application of a wall penetration sleeve through a wall. This diagram also shows how to support a vertical tray running up a wall using wall brackets, a bracket angle to span between the wall brackets, and BKSA-IXD-C support angle clips to mount the tray to the bracket angle. For longer vertical runs, a vertical support 90 with SH-38 cable support hooks is recommended because the cables would be supported by Kellems Grips that hook over the SH-38 cable support hooks. On longer runs, intermediate cable supports such as MP Husky's cable support members and additional Kellems Grips, need to be added.



## MID-SPAN SPLICES &amp; QUARTER-SPAN EXPANSION SPLICES



Mid-Span Splice



Mid-Span Splice

Quarter-Span  
Expansion Splice***Mid-Span Splices***

Optional mid-span splices can be placed at any location within a span, eliminating the need to have splices located within the quarter point of the span as shown in NEMA VE-2. This can reduce the cost of supports in the installation.

***Quarter-Span Expansion Splices***

Optional quarter-span expansion splices can be placed at any location within the quarter point of the span without supporting both sides of the splice as outlined in NEMA VE-2. This can lower the installed cost of the system by reducing the number of supports required.

See the chart below for application information.

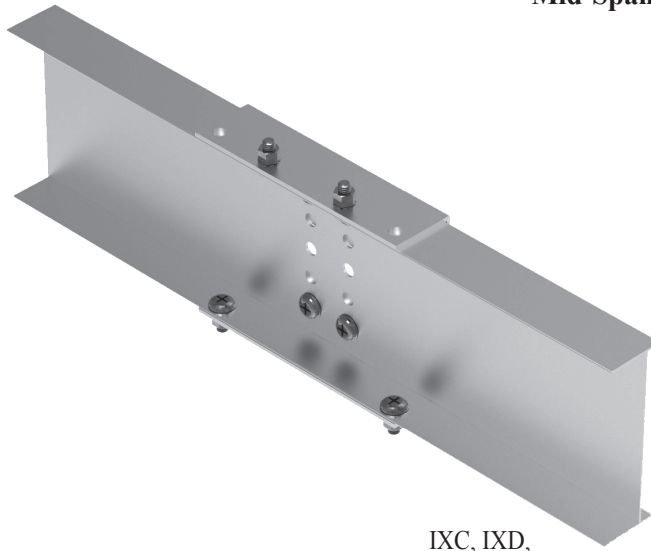
Tray lengths need to be the same as the span length or longer.

Tray Height	Tray Type	Mid-Span Splice	Quarter-Span Expansion Splice
4.5"	IYC	ASP-MS-4-1/2	ASP-QS-4-1/2-EX
6"	IXC	ASP-MS-6	ASP-QS-6-EX
6"	IXD	ASP-MS-6	—————
6"	I6	STANDARD SPLICE	ASP-QS-I6-EX
7"	IXC7	ASP-MS-7	—————
7"	IXD7	ASP-MS-7	—————
8"	I8	STANDARD SPLICE	—————

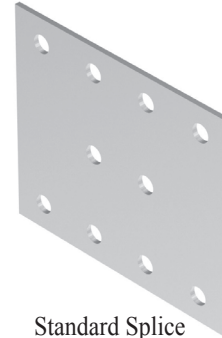


**MID-SPAN SPLICES & QUARTER-SPAN EXPANSION SPLICES**

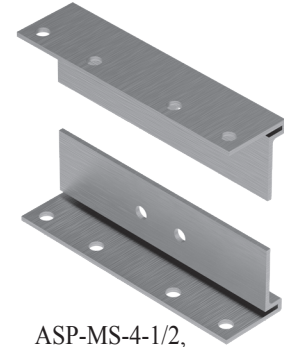
**Mid-Span Splices**



IXC, IXD,  
IXC7 & IXD7



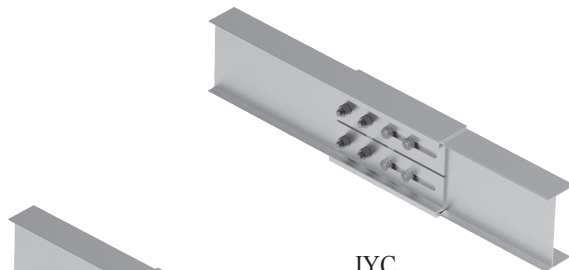
Standard Splice  
(I6 & I8)



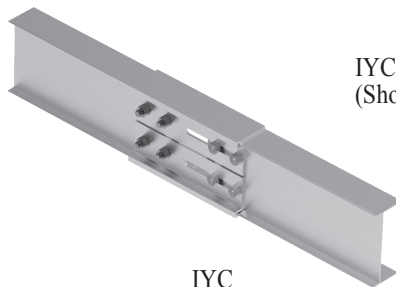
ASP-MS-4-1/2,  
ASP-MS-6 &  
ASP-MS-7

ACCESSORIES & SUPPORTS

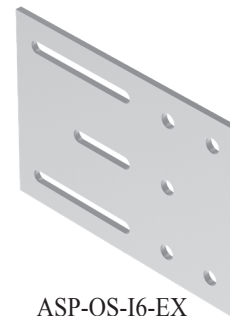
**Quarter-Span Expansion Splices**



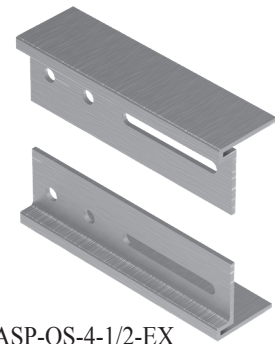
IYC  
(Shown Closed)



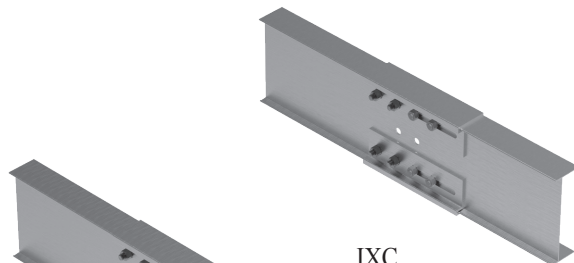
IYC  
(Shown Open)



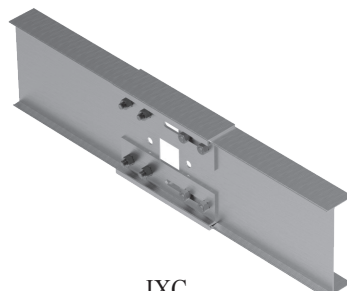
ASP-QS-I6-EX



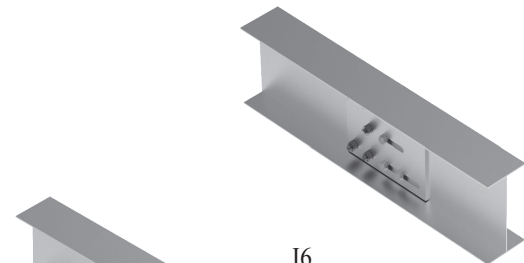
ASP-QS-4-1/2-EX  
& ASP-QS-6-EX



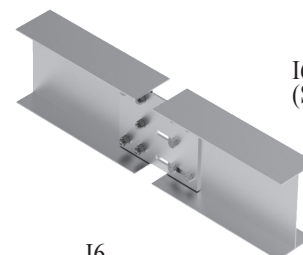
IXC  
(Shown Closed)



IXC  
(Shown Open)



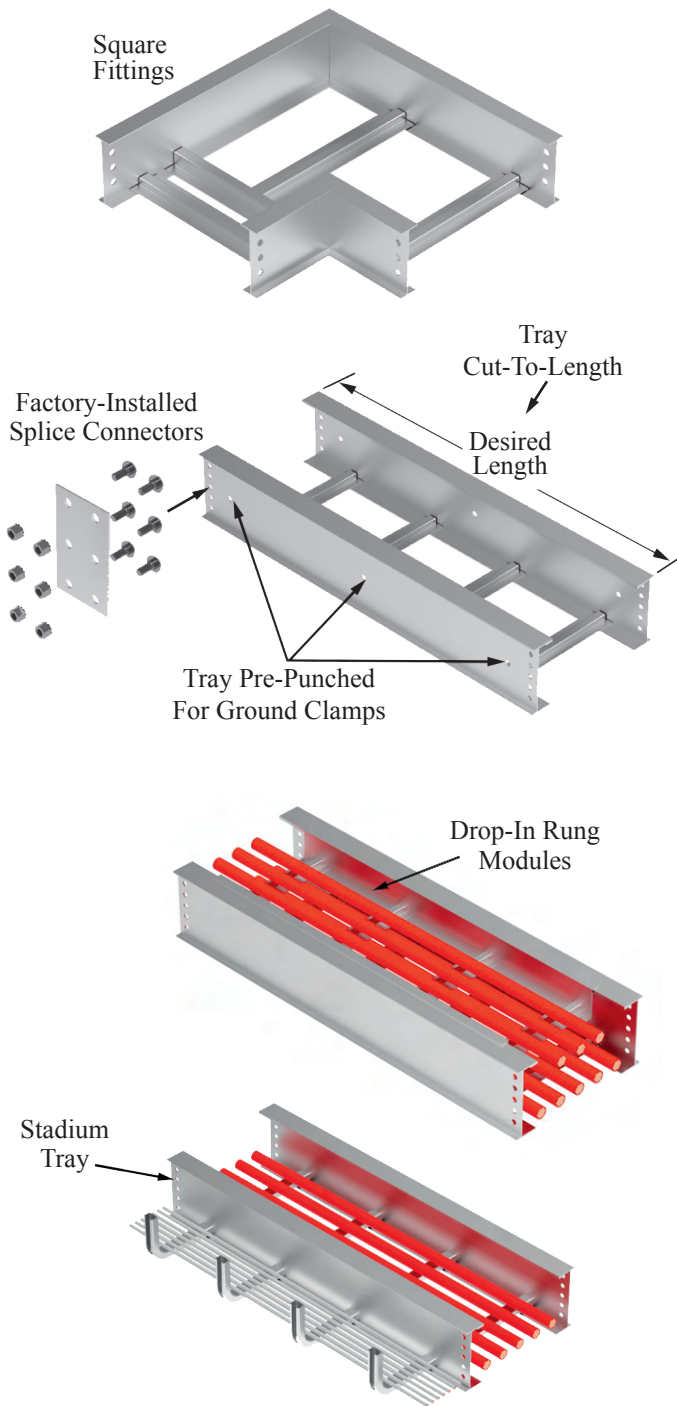
I6  
(Shown Closed)



I6  
(Shown Open)







# ENGINEERED CABLE TRAY

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

*CSA Classified Trays Available*

Table of Contents	Page
Square Fittings	82
Large Radius Fittings	82
Cut-To-Length Tray	83
Factory-Installed Splices	83
Pre-Punched Ground Holes	83
Factory-Installed Separators	83
Drop-In Rung Modules	84
Stadium Tray	85
Walkable Covers	86



# mphusky

## ENGINEERED CABLE TRAY

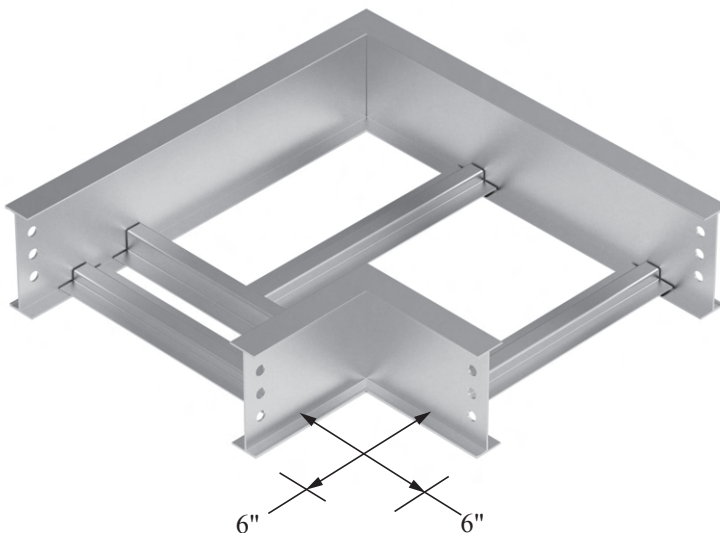
MP Husky strives to meet the standard product needs of our customers while also helping to solve unusual installation needs. We also want to offer labor saving opportunities on projects. For this reason, we now make custom-made products engineered to solve our customers' field challenges. Special design trays and services include the following:

- Square Fittings
- Large Radius Fittings
- Cut-To-Length Tray Sections
- Factory-Installed Splice Plates
- Factory-Punched Ground Lug Holes To Save Field Labor
- Factory-Installed Separators
- Drop-In Rung Modules
- Stadium Tray

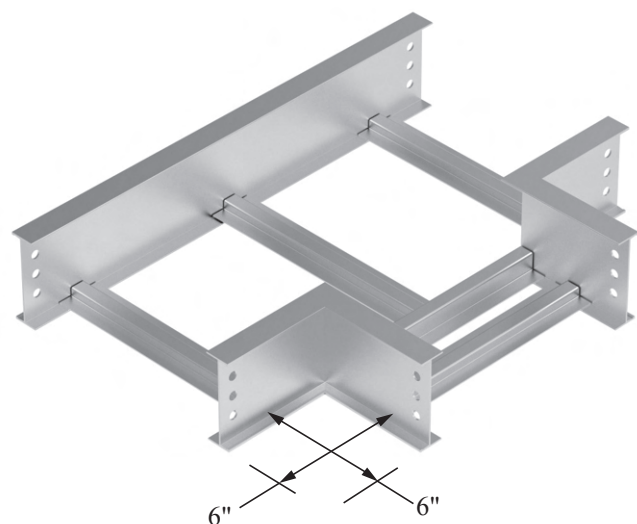
## SQUARE FITTINGS

Square fittings are offered for applications where standard fittings with a radius would not work as needed. These fittings have square inside and outside corners allowing them to fit in room corners or go around square corners while still hugging the wall. The ends extend only 6" from the inside corner of the bend. They are available in 30, 45, 60, and 90 degree, horizontal or vertical fittings as well as tees and crosses. We also offer 3" corner length fittings. See samples below.

Horizontal Bend



Horizontal Tee



## LARGE RADIUS FITTINGS

Large radius fittings are offered for applications where standard fittings would not work as needed. These fittings have a large radius custom-designed and bent to go around large equipment. We have supplied many large radius applications including tunnel applications. Consult MP Husky for further details on your specific application.

### CUT-TO-LENGTH TRAY SECTIONS

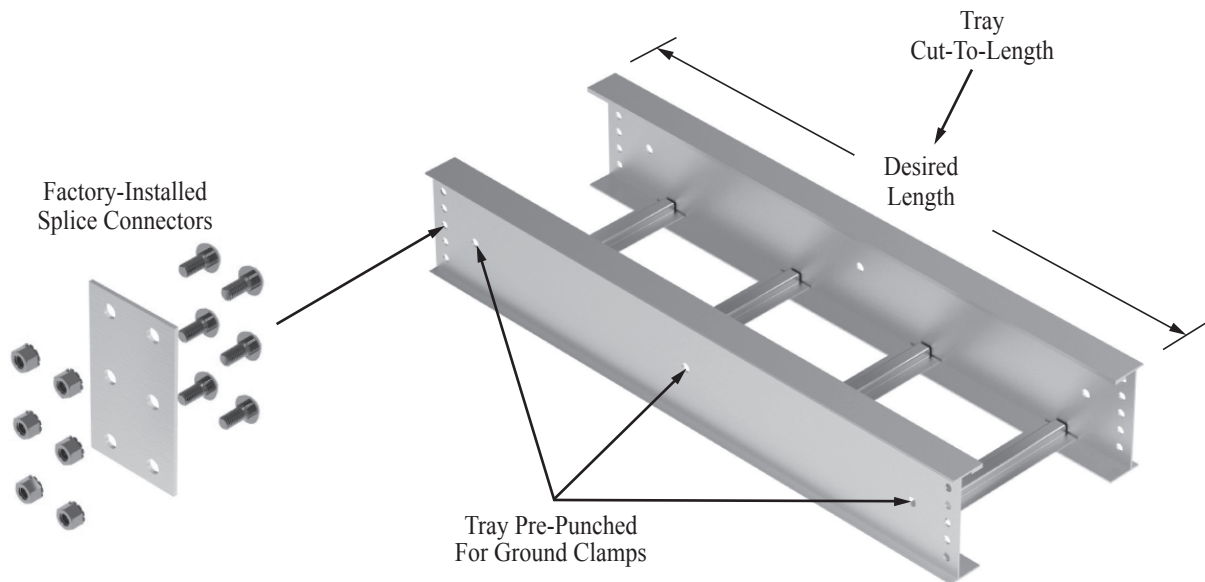
MP Husky can supply projects with cut-to-length tray sections. Each section will arrive at site cut to the proper length with end holes on both ends and the part number, including the length, printed on the label. This service can provide huge savings in installed cost by eliminating costly field labor to cut the tray to length and drilling of splice connector holes after cutting. Additionally, there will be less material drop from cutting, less cutting errors and the job will be completed faster, allowing you to get on with your next project. Contact the factory to find out how economical this service is. See Detail below.

### FACTORY-INSTALLED SPLICE CONNECTORS

MP Husky can install splice connectors on one end of each straight section prior to shipment, reducing field installation costs. See Detail below.

### PRE-PUNCHED GROUND CLAMP HOLES

MP Husky can pre-punch ground lug mounting holes in the tray before it ships to you. With today's labor cost, the tray can arrive at the jobsite with the ground holes already punched at a fraction of the cost, saving a considerable amount of installation labor. See Detail below.

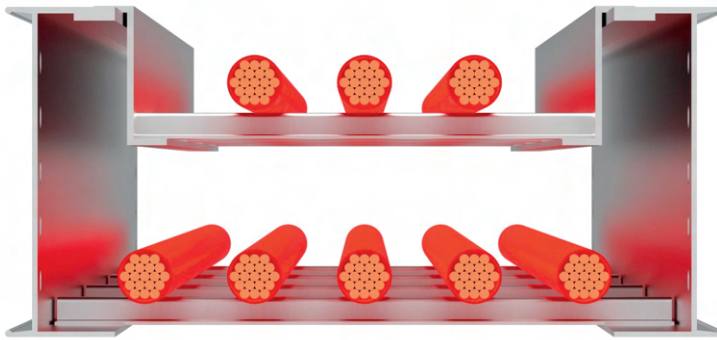


### FACTORY-INSTALLED SEPARATORS

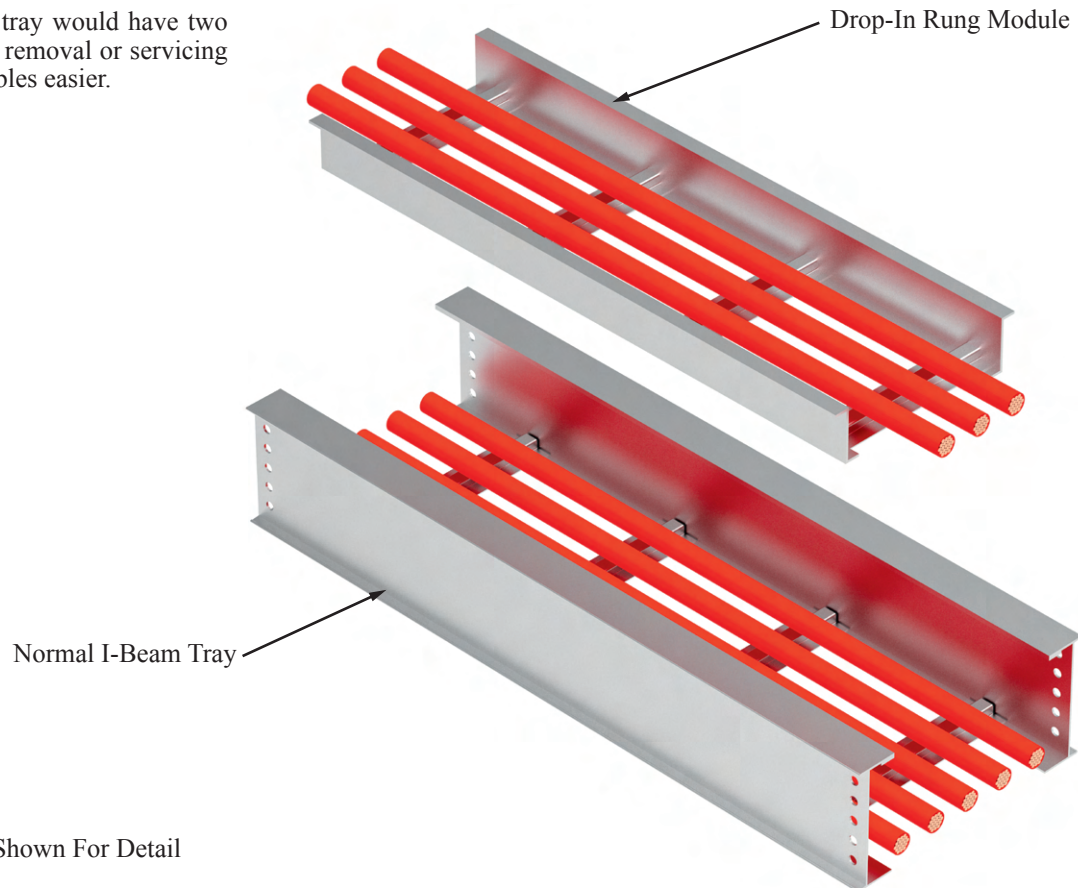
In some cases MP Husky can factory install separators providing additional savings in field labor.

## DROP-IN RUNG MODULE

Drop-In Rung Modules are available to provide a second layer of cable support in the same tray. Once cables are installed in the normal support area the module is dropped in from the top providing another level of rungs for cable placement. The rungs are mounted to a Z-member that slides in from the top of the tray and hangs on the upper flanges of the tray. The modules are about half the length of a straight tray section to make it easier to drop them in or remove them to get to the cables underneath for servicing.



A 10' or 12' long tray would have two modules, to make removal or servicing the lower level cables easier.

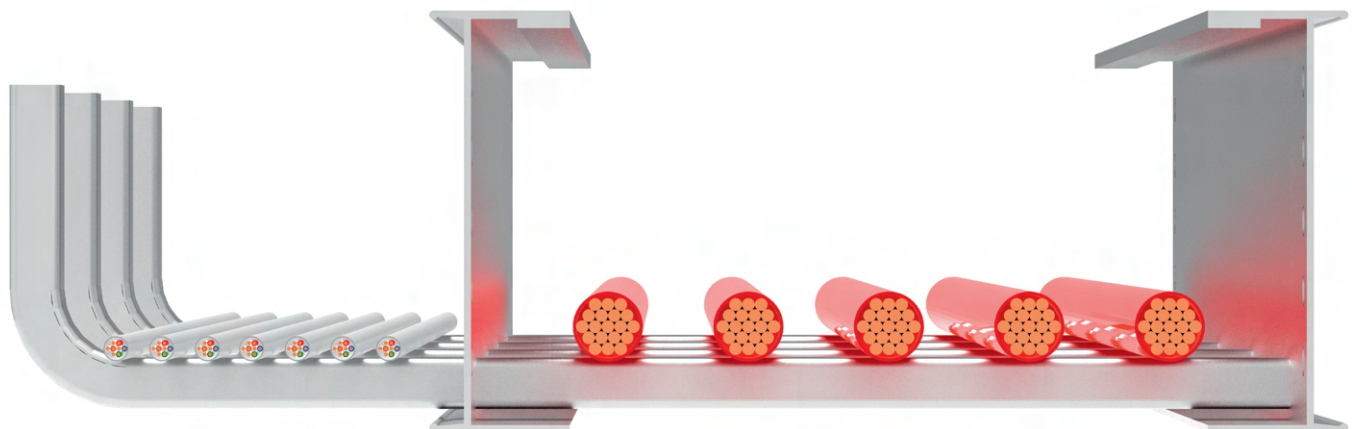
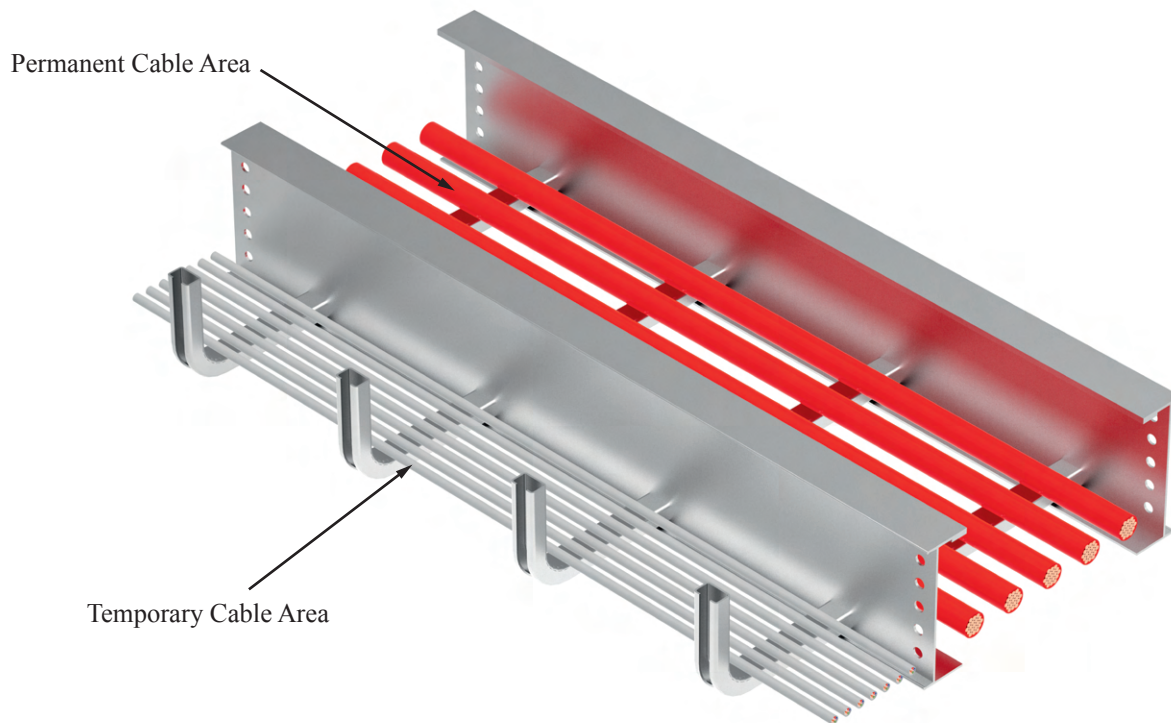


Note: Short Tray Shown For Detail



**STADIUM TRAY**

Stadium Tray is engineered to provide an area for permanent cables and an exterior temporary area that is easy to access for cable installation and removal. This system is very useful for a convention hall where trade shows are held or similar applications. The permanent cables would be installed between the hanger rods in the permanent section and kept separate from the temporary section. The open design of the temporary area allows cables to be laid in the tray without pulling and dropped to various locations as needed. The hook design prevents the cables from slipping out and keeps them in place. Cables are easily lifted out when the event is over. The rungs that turn up can be every rung or every other rung as desired. Rung caps are available to cover rung tips for cable protection.

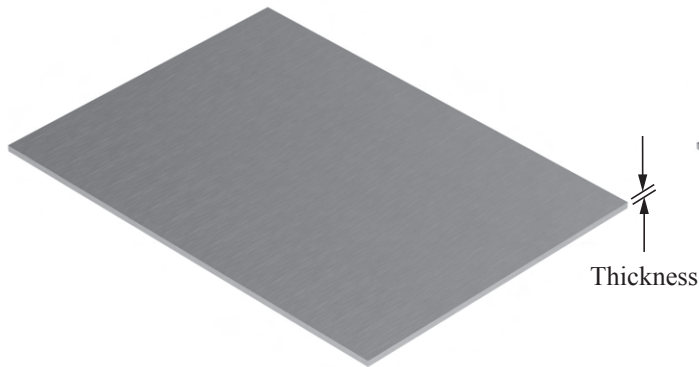


ENGINEERED CABLE TRAY

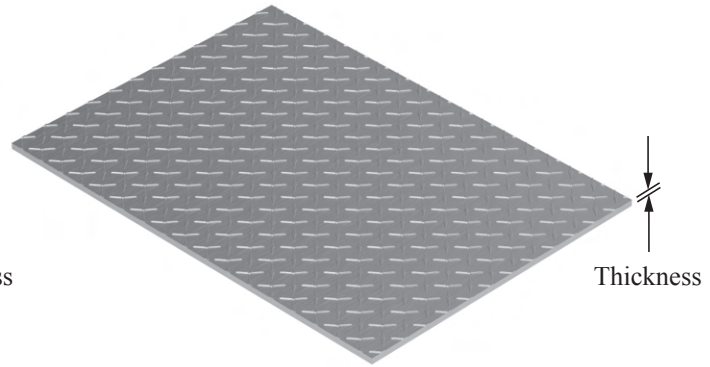


## WALKABLE COVERS

Walkable covers are offered for areas where trays are mounted near floor level and may be stepped on or walked on. These covers are manufactured thicker than standard covers to yield more strength, making them more rigid in the event they are stepped on. Walkable covers are offered as flat sheet style or diamond plate style for non-skid use. These covers have been tested in various widths and thicknesses to ensure they will withstand the additional loading.



Flat Sheet Style



Diamond Pattern Style

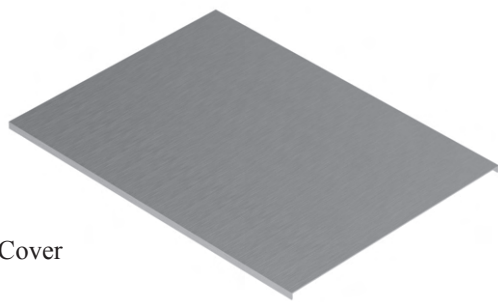
## WALKABLE ALUMINUM COVER CHART

The chart below shows the required thickness for covers to withstand a 200 pound person stepping on the cover. There will be deflection until the load is removed. The cover could deflect into the cables in the tray. For less deflection use a thicker cover.

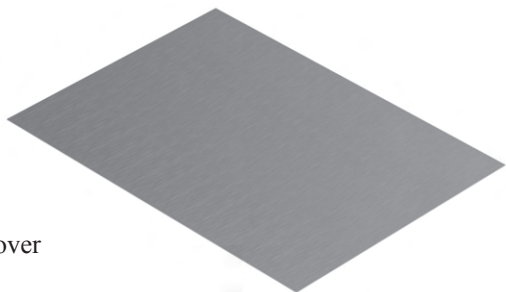
Width (in)	0.040" Thick (Standard)	0.063" Thick	0.080" Thick	0.125" Thick	0.250" Thick
6	No	Yes	Yes	Yes	Yes
9	No	Yes	Yes	Yes	Yes
12	No	No	Yes	Yes	Yes
18	No	No	No	Yes	Yes
24	No	No	No	Yes	Yes
30	No	No	No	No	Yes
36	No	No	No	No	Yes
42	No	No	No	No	Yes
48	No	No	No	No	Yes

MP Husky does not recommend walking on any cable tray.  
Contact MP Husky for additional information.

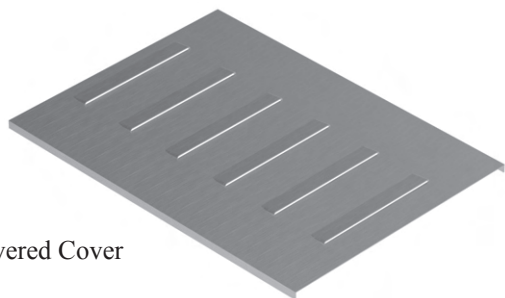
Flat Flanged Cover



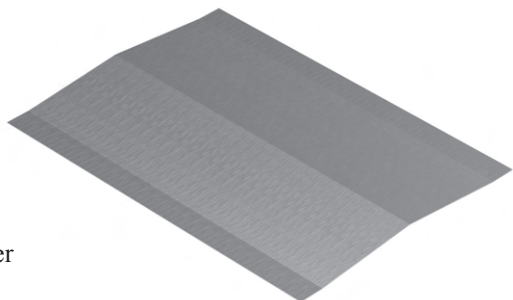
Flat Solid Cover



Flanged Louvered Cover



Peaked Cover



# I-BEAM STRAIGHT FLAT & FLANGED COVERS

*Manufactured & Tested In  
Accordance With NEMA VE-1*

Table of Contents	Page
Identification Charts	88
Flanged Covers	89
Flat Covers	90



# mphusky

FLAT OR FLANGED COVERS

CA(6)(F)( ) - 24 - 144 ( )					
Material	Cover Type	Thickness	Width	Length	Option
Aluminum	S (Flat Solid)	Blank (0.040")	6 (6" Wide)	60 (5')	L (Louvered)
	F (Flat Flanged)	6 (0.063")	9 (9" Wide)	72 (6')	
		4 (0.080")	12 (12" Wide)	120 (10')	
		11 (0.125")	18 (18" Wide)	144 (12')	
		25 (0.250")	24 (24" Wide)		
			30 (30" Wide)		
			36 (36" Wide)		
Tray Type					
6 (All I-Beam Except I6 & I8)					
I6 (I6 I-Beam)					
I8 (I8 I-Beam)					

PEAKED OR HAT-SHAPE COVERS


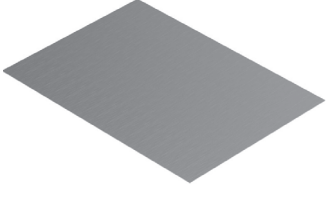
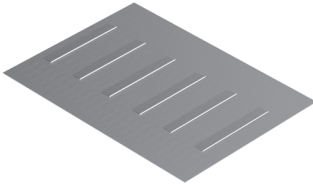
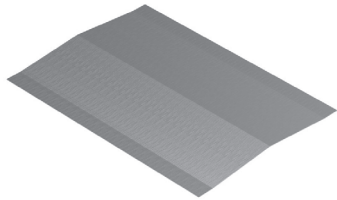
C(0)(P) - A(6)(F)( ) - 24 - 144					
<div>Cover Shape</div> <div>P (Peaked)</div> <div>S (Hat Solid)</div> <div>V (Hat Ventilated)</div>		<div>Flange Type</div> <div>S (Flat Solid)</div> <div>F (Flat Flanged)</div>	<div>Thickness</div> <div>Blank (0.040")</div> <div>6 (0.063")</div> <div>4 (0.080")</div> <div>11 (0.125")</div> <div>25 (0.250")</div>	<div>Width</div> <div>6 (6" Wide)</div> <div>9 (9" Wide)</div> <div>12 (12" Wide)</div> <div>18 (18" Wide)</div> <div>24 (24" Wide)</div> <div>30 (30" Wide)</div> <div>36 (36" Wide)</div>	<div>Length</div> <div>60 (5')</div> <div>72 (6')</div> <div>120 (10')</div> <div>144 (12')</div>
<div>Material</div> <div>Aluminum</div>					
<div>Peak or Hat Height</div> <div>0 (1/2" High Peak)</div> <div>2 (2" High Hat)</div> <div>4 (4" High Hat)</div>	<div>More Peaked Cover Heights</div> <div>2 (2" High)</div> <div>3 (3" High)</div> <div>4 (4" High)</div> <div>6 (6" High)</div> <div>8 (8" High)</div> <div>10 (10" High)</div> <div>12 (12" High)</div>	<div>Tray Type</div> <div>6 (All I-Beam <i>Except I6 &amp; I8</i>)</div> <div>I6 (I6 I-Beam)</div> <div>I8 (I8 I-Beam)</div>			
<div>Peaked covers are not available for fittings.</div>					

COVER CHARTS

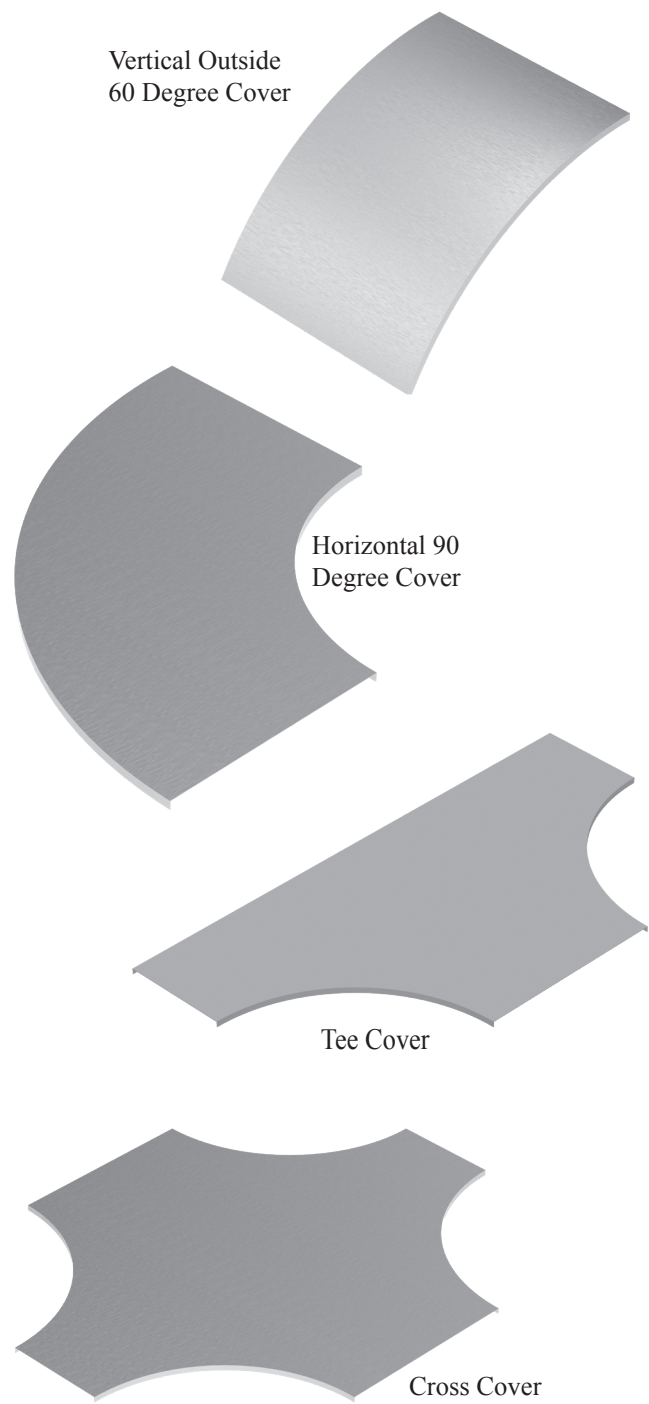
FLANGED COVERS

				
Tray Height	Tray Type	Straight Flanged Solid Cover	Straight Flanged Louvered Cover	Straight Flanged Peaked Cover
4.5"	A(RS)IJA	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IJB	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IJC	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IJD	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IYA	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS>IYB	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IYC	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
5"	A(RS)IJC5	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IYB5	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IYC5	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
6"	A(RS)IMB	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IMC	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IMD	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXA	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXB	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXC	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXD	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)I6	CAI6F( )-(W)-(L)	CAI6F( )-(W)-(L)-L	C(0)P-AI6F( )-(W)-(L)
7"	A(RS)IMC7	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXC7	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
	A(RS)IXD7	CA6F( )-(W)-(L)	CA6F( )-(W)-(L)-L	C(0)P-A6F( )-(W)-(L)
8"	A(RS)I8	CAI8F( )-(W)-(L)	CAI8F( )-(W)-(L)-L	C(0)P-AI8F( )-(W)-(L)
<p>( ) = Blank for 0.040" Thickness (Standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness</p> <p>(RS) = Rung Spacing (4, 6, 9, 12, or 18 (in)), "S", or ( ) "Blank"</p> <p>(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)</p> <p>(L) = Insert Cover Length in inches (120 or 144) denotes desired Length (in)</p> <p>(0) = Insert Peak Height Example: (0) for 1/2" High Peak, (2) for 2" High Peak, denotes Peak Height (in)</p> <p>-L = Louvered Cover</p> <p>Fitting Covers are not peaked</p> <p>Example: CA6F-24-144-L (Cover Flanged, 24 inches wide, 12' long, Louvered)</p>				

FLAT COVERS

				
Tray Height	Tray Type	Straight Flat Solid Cover	Straight Flat Louvered Cover	Straight Peaked Cover
4.5"	A(RS)IJA	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IJB	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IJC	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IJD	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IYA	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IYB	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IYC	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
5"	A(RS)IJC5	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IYB5	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IYC5	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
6"	A(RS)IMB	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IMC	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IMD	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXA	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXB	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXC	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXD	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)I6	CAI6S( )-(W)-(L)	CAI6S( )-(W)-(L)-L	C(0)P-AI6S( )-(W)-(L)
7"	A(RS)IMC7	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXC7	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
	A(RS)IXD7	CA6S( )-(W)-(L)	CA6S( )-(W)-(L)-L	C(0)P-A6S( )-(W)-(L)
8"	A(RS)I8	CAI8S( )-(W)-(L)	CAI8S( )-(W)-(L)-L	C(0)P-AI8S( )-(W)-(L)

( ) = Blank for 0.040" Thickness (Standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness  
(RS) = Rung Spacing (4, 6, 9, 12, or 18 (in)), "S", or ( ) "Blank"  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
(L) = Insert Cover Length in inches (120 or 144) denotes desired Length (in)  
(0) = Insert Peak Height Example: (0) for 1/2" High Peak, (2) for 2" High Peak, denotes Peak Height (in)  
-L = Louvered Cover  
Fitting Covers are not peaked  
Example: CA6F-24-144-L (Cover Flanged, 24 inches wide, 12' long, Louvered)



# I-BEAM FLAT FLANGED FITTING COVERS

*Manufactured & Tested In  
Accordance With NEMA VE-1*

Table of Contents	Page
Identification Charts	92
Horizontal Fitting Covers	93
Vertical Fitting Covers	94 - 95
Horizontal Tee Covers	96
Horizontal Cross Covers	97
Horizontal Reducer Covers	98
Vertical Tee Covers	99
Vertical Support & Cross Covers	100





## FLAT FLANGED FITTING COVERS

## CA(6)(F)( ) - 24 H(°) - 24

Material	Cover Type	Width	Fitting Type	Radius
Aluminum	F (Flat Flanged)	6 (6" Wide)	H(°) (Horizontal Bend)	12 (12" Rad)
		9 (9" Wide)	VI(°) (Vertical Inside)	18 (18" Rad)
		12 (12" Wide)	VO(°) (Vertical Outside)	24 (24" Rad)
		18 (18" Wide)	VS (Vertical Support)	36 (36" Rad)
		24 (24" Wide)	VT (Vertical Tee)	48 (48" Rad)
		30 (30" Wide)	VTU (Vertical Tee Up)	
		36 (36" Wide)	VX (Vertical Cross)	

Tray Type	Thickness
6 (All I-Beam <i>Except I6 &amp; I8</i> )	Blank (0.040")
I6 (I6 I-Beam)	6 (0.063")
I8 (I8 I-Beam)	4 (0.080")

(°) Insert degree of bend (90, 60, 45, or 30) for Horizontal and Vertical Inside or Outside Bends.

Please see the sheets that follow for complete catalog numbers for Fittings.

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

Fitting Covers are not peaked

## CA(6)(F)( ) - 24(T) (W1) - 24

Material	Cover Type	Width	Width 1	Radius
Aluminum	F (Flat Flanged)	6 (6" Wide)	Blank (Standard T or X)	12 (12" Rad)
		9 (9" Wide)	Insert Second Width (for Reducing or Enlarging)	18 (18" Rad)
		12 (12" Wide)		24 (24" Rad)
		18 (18" Wide)		36 (36" Rad)
		24 (24" Wide)		48 (48" Rad)
		30 (30" Wide)		
		36 (36" Wide)		

Tray Type	Thickness
6 (All I-Beam <i>Except I6 &amp; I8</i> )	Blank (0.040")
I6 (I6 I-Beam)	6 (0.063")
I8 (I8 I-Beam)	4 (0.080")


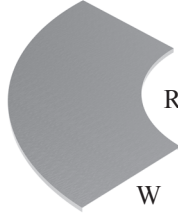
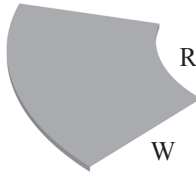
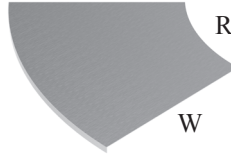
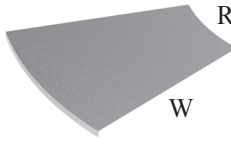
  

Fitting Type
T (Horizontal Tee)
X (Horizontal Cross)
R (Straight Reducer)
RR (Right Reducer)
RL (Left Reducer)


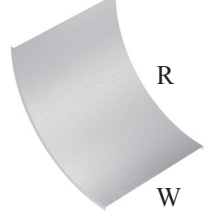
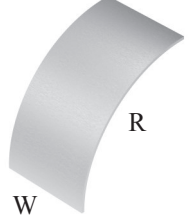
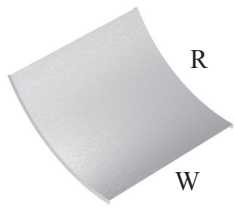
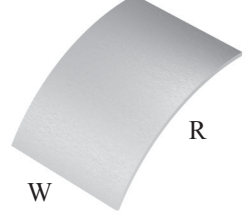
ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

Fitting Covers are not peaked

FLAT FLANGED COVERS - HORIZONTAL BENDS

					
Tray Height	Tray Type	Horizontal 90 Degree Bend Flanged Cover	Horizontal 60 Degree Bend Flanged Cover	Horizontal 45 Degree Bend Flanged Cover	Horizontal 30 Degree Bend Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IJB	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IJC	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IJD	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L>IYA	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L>IYB	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L>IYC	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
5"	A(L)IJC5	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L>IYB5	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L>IYC5	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
6"	A(L)IMB	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IMC	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IMD	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXA	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXB	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXC	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXD	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)I6	CAI6F( )-(W)H90-(R)	CAI6F( )-(W)H60-(R)	CAI6F( )-(W)H45-(R)	CAI6F( )-(W)H30-(R)
7"	A(L)IMC7	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXC7	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
	A(L)IXD7	CA6F( )-(W)H90-(R)	CA6F( )-(W)H60-(R)	CA6F( )-(W)H45-(R)	CA6F( )-(W)H30-(R)
8"	A(L)I8	CAI8F( )-(W)H90-(R)	CAI8F( )-(W)H60-(R)	CAI8F( )-(W)H45-(R)	CAI8F( )-(W)H30-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Examples: CA6F-12H90-24 (Solid Flanged Cover, 12" wide Horizontal 90 Degree Bend with 24" radius)</p>					

FLAT FLANGED COVERS - VERTICAL 90 & 60 DEGREE BENDS

					
Tray Height	Tray Type	Vertical 90 Degree Inside Bend Flanged Cover	Vertical 90 Degree Outside Bend Flanged Cover	Vertical 60 Degree Inside Bend Flanged Cover	Vertical 60 Degree Outside Bend Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IJB	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IJC	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IJD	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IYA	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L>IYB	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IYC	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
5"	A(L)IJC5	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IYB5	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IYC5	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
6"	A(L)IMB	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IMC	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IMD	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXA	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXB	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXC	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXD	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)I6	CAI6F( )-(W)VI90-(R)	CAI6F( )-(W)VO90-(R)	CAI6F( )-(W)VI60-(R)	CAI6F( )-(W)VO60-(R)
7"	A(L)IMC7	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXC7	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
	A(L)IXD7	CA6F( )-(W)VI90-(R)	CA6F( )-(W)VO90-(R)	CA6F( )-(W)VI60-(R)	CA6F( )-(W)VO60-(R)
8"	A(L)I8	CAI8F( )-(W)VI90-(R)	CAI8F( )-(W)VO90-(R)	CAI8F( )-(W)VI60-(R)	CAI8F( )-(W)VO60-(R)

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
 ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness  
 (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
 (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
 ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.

Examples: CA6F-12VI90-24 (Solid Flanged Cover, 12" wide Vertical Inside 90 Degree Bend with 24" radius)

**FLAT FLANGED COVERS - VERTICAL 45 & 30 DEGREE BENDS**

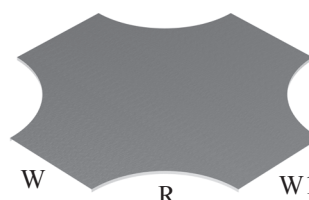
Tray Height	Tray Type	Vertical 45 Degree Inside Bend Flanged Cover	Vertical 45 Degree Outside Bend Flanged Cover	Vertical 30 Degree Inside Bend Flanged Cover	Vertical 30 Degree Outside Bend Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IJB	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IJC	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IJD	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L>IYA	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L>IYB	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L>IYC	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
5"	A(L)IJC5	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L>IYB5	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L>IYC5	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
6"	A(L)IMB	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IMC	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IMD	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXA	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXB	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXC	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXD	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)I6	CAI6F( )-(W)VI45-(R)	CAI6F( )-(W)VO45-(R)	CAI6F( )-(W)VI30-(R)	CAI6F( )-(W)VO30-(R)
7"	A(L)IMC7	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXC7	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
	A(L)IXD7	CA6F( )-(W)VI45-(R)	CA6F( )-(W)VO45-(R)	CA6F( )-(W)VI30-(R)	CA6F( )-(W)VO30-(R)
8"	A(L)I8	CAI8F( )-(W)VI45-(R)	CAI8F( )-(W)VO45-(R)	CAI8F( )-(W)VI30-(R)	CAI8F( )-(W)VO30-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough          ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness          (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)          (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)          ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.          Examples: CA6F-12VI45-24 (Solid Flanged Cover, 12" wide Vertical Inside 45 Degree Bend with 24" radius)</p>					

FLAT FLANGED COVERS - TEES

				
Tray Height	Tray Type	Horizontal Tee Flanged Cover	Horizontal Reducing Tee Flanged Cover	Horizontal Enlarging Tee Flanged Cover
4.5"	A(L)IJA	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IJB	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IJC	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IJD	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IYA	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L>IYB	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IYC	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
5"	A(L)IJC5	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IYB5	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IYC5	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
6"	A(L)IMB	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IMC	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IMD	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXA	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXB	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXC	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXD	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)I6	CAI6F(-)(W)T-(R)	CAI6F(-)(W)T(W1)-(R)	CAI6F(-)(W)T(W1)-(R)
7"	A(L)IMC7	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXC7	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
	A(L)IXD7	CA6F(-)(W)T-(R)	CA6F(-)(W)T(W1)-(R)	CA6F(-)(W)T(W1)-(R)
8"	A(L)I8	CAI8F(-)(W)T-(R)	CAI8F(-)(W)T(W1)-(R)	CAI8F(-)(W)T(W1)-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (W1) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Examples: CA6F-12T-24 (Solid Flanged Cover, 12" wide Horizontal Tee with 24" radius)</p>				



FLAT FLANGED COVERS - CROSSES


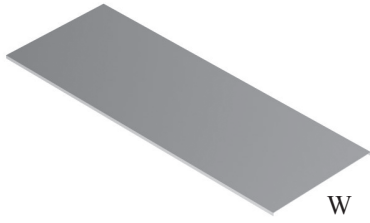

				
Tray Height	Tray Type	Horizontal Cross Flanged Cover	Horizontal Reducing Cross Flanged Cover	Horizontal Enlarging Cross Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IJB	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IJC	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IJD	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IYA	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IYB	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IYC	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
5"	A(L)IJC5	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IYB5	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IYC5	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
6"	A(L)IMB	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IMC	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IMD	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXA	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXB	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXC	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXD	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)I6	CAI6F( )-(W)X-(R)	CAI6F( )-(W)X(W1)-(R)	CAI6F( )-(W)X(W1)-(R)
7"	A(L)IMC7	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXC7	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
	A(L)IXD7	CA6F( )-(W)X-(R)	CA6F( )-(W)X(W1)-(R)	CA6F( )-(W)X(W1)-(R)
8"	A(L)I8	CAI8F( )-(W)X-(R)	CAI8F( )-(W)X(W1)-(R)	CAI8F( )-(W)X(W1)-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (W1) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Examples: CA6F-12X-24 (Solid Flanged Cover, 12" wide Horizontal Cross with 24" radius)</p>				






FLAT FLANGED COVERS - REDUCERS

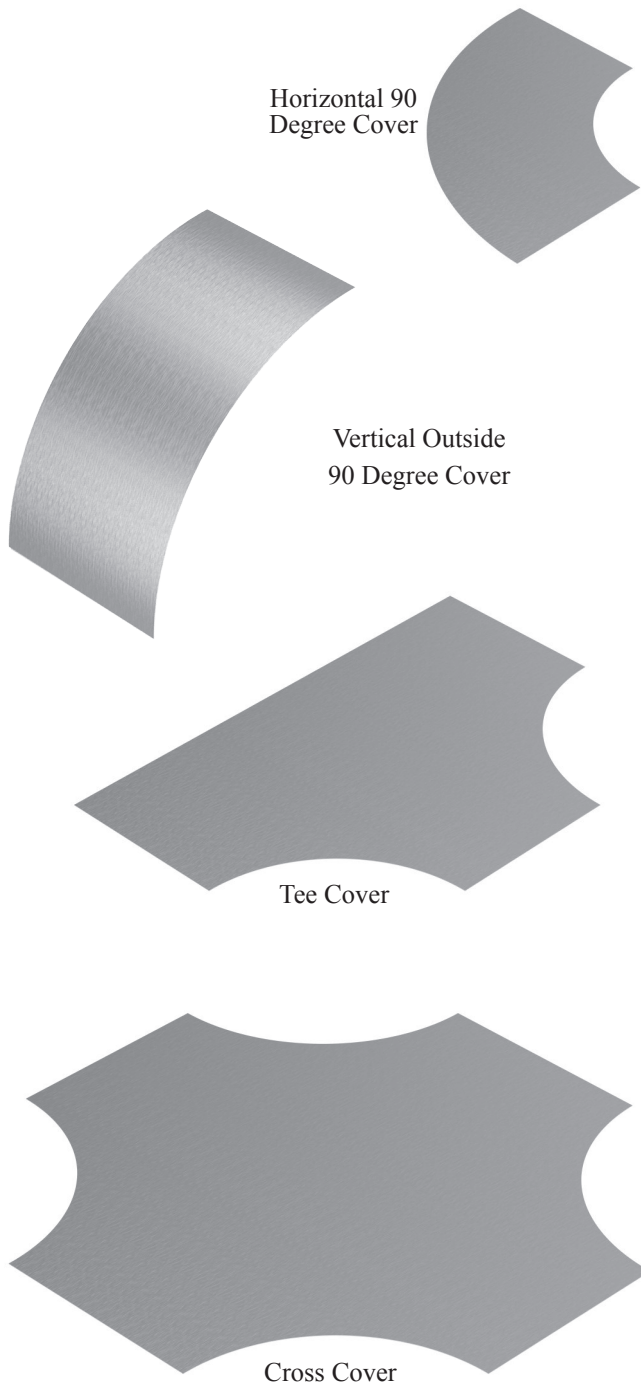
		LENGTH = 12" 	LENGTH = 12" 	LENGTH = 12" 
Tray Height	Tray Type	Straight (Concentric) Reducer Flanged Cover	Right Hand (Eccentric) Reducer Flanged Cover	Left Hand (Eccentric) Reducer Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IJB	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IJC	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IJD	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IYA	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L>IYB	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IYC	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
5"	A(L)IJC5	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IYB5	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IYC5	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
6"	A(L)IMB	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IMC	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IMD	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXA	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXB	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXC	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXD	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)I6	CAI6F( )-(W)R(W1)	CAI6F( )-(W)RR(W1)	CAI6F( )-(W)RL(W1)
7"	A(L)IMC7	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXC7	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
	A(L)IXD7	CA6F( )-(W)R(W1)	CA6F( )-(W)RR(W1)	CA6F( )-(W)RL(W1)
8"	A(L)I8	CAI8F( )-(W)R(W1)	CAI8F( )-(W)RR(W1)	CAI8F( )-(W)RL(W1)
(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) (W1) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired second Width (in) ALI6 and ALI8 Reducer Covers are 24" long. All other I-Beam Reducer Covers are 12" long. Examples: CA6F-12R6 (Solid Flanged Cover, 12" wide to 6" wide Straight Reducer)				

FLAT FLANGED COVERS - VERTICAL TEES

			
Tray Height	Tray Type	Vertical Tee Turns Down Flanged Cover	Vertical Tee Turns Up Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IJB	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IJC	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IJD	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IYA	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L>IYB	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IYC	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
5"	A(L)IJC5	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IYB5	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IYC5	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
6"	A(L)IMB	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IMC	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IMD	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXA	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXB	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXC	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXD	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)I6	CAI6F( )-(W)VT-(R)	CAI6F( )-(W)VTU-(R)
7"	A(L)IMC7	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXC7	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
	A(L)IXD7	CA6F( )-(W)VT-(R)	CA6F( )-(W)VTU-(R)
8"	A(L)I8	CAI8F( )-(W)VT-(R)	CAI8F( )-(W)VTU-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough          ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness          (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)          (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)          ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.          Examples: CA6F-12VT-24 (Solid Flanged Cover, 12" wide Vertical Tee with 24" radius)</p>			

## FLAT FLANGED COVERS - VERTICAL SUPPORT ELBOWS &amp; VERTICAL CROSSES

			
Tray Height	Tray Type	Vertical Support 90 Fitting Flanged Cover	Vertical Cross Flanged Cover
4.5"	A(L)IJA	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IJB	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IJC	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IJD	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IYA	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L>IYB	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IYC	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
5"	A(L)IJC5	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IYB5	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IYC5	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
6"	A(L)IMB	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IMC	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IMD	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXA	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXB	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXC	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXD	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)I6	CAI6F( )-(W)VS-(R)	CAI6F( )-(W)VX-(R)
7"	A(L)IMC7	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXC7	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
	A(L)IXD7	CA6F( )-(W)VS-(R)	CA6F( )-(W)VX-(R)
8"	A(L)I8	CAI8F( )-(W)VS-(R)	CAI8F( )-(W)VX-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, or (4) for 0.080" Thickness  (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  AL16 and AL18 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.  Examples: CA6F-12VX-24 (Solid Flanged Cover, 12" wide Vertical Cross with 24" radius)</p>			



# I-BEAM FLAT SOLID FITTING COVERS

*Manufactured & Tested In  
Accordance With NEMA VE-1*

Table of Contents	Page
Identification Charts	102
Horizontal Fitting Covers	103
Vertical Fitting Covers	104 - 105
Horizontal Tee Covers	106
Horizontal Cross Covers	107
Horizontal Reducer Covers	108
Vertical Tee Covers	109
Vertical Support & Cross Covers	110



**mphusky**

## FLAT SOLID FITTING COVERS

## CA(6)(S)( ) - 24 H(°) - 24

Material	Cover Type	Width	Fitting Type	Radius
Aluminum	S (Flat Solid)	6 (6" Wide)	H(°) (Horizontal Bend)	12 (12" Rad)
		9 (9" Wide)	VI(°) (Vertical Inside)	18 (18" Rad)
		12 (12" Wide)	VO(°) (Vertical Outside)	24 (24" Rad)
		18 (18" Wide)	VS (Vertical Support)	36 (36" Rad)
		24 (24" Wide)	VT (Vertical Tee)	48 (48" Rad)
		30 (30" Wide)	VTU (Vertical Tee Up)	
		36 (36" Wide)	VX (Vertical Cross)	

Tray Type	Thickness
6 (All I-Beam <i>Except</i> I6 & I8)	Blank (0.040")
I6 (I6 I-Beam)	6 (0.063")
I8 (I8 I-Beam)	4 (0.080")
	11 (0.125")
	25 (0.250")

(°) Insert degree of bend (90, 60, 45, or 30) for Horizontal and Vertical Inside or Outside Bends.

Please see the sheets that follow for complete catalog numbers for Fittings.

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

Fitting Covers are not peaked

## CA(6)(S)( ) - 24(T) (W1) - 24

Material	Cover Type	Width	Width 1	Radius
Aluminum	S (Flat Solid)	6 (6" Wide)	Blank (Standard T or X)	12 (12" Rad)
		9 (9" Wide)	Insert Second Width (for Reducing or Enlarging)	18 (18" Rad)
		12 (12" Wide)		24 (24" Rad)
		18 (18" Wide)		36 (36" Rad)
		24 (24" Wide)		48 (48" Rad)
		30 (30" Wide)		
		36 (36" Wide)		


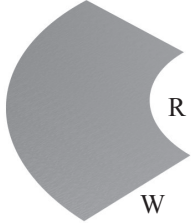
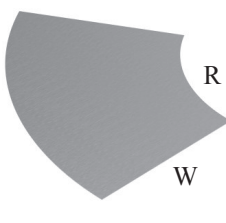
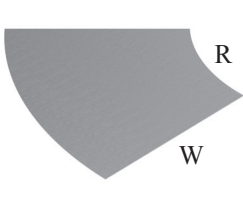
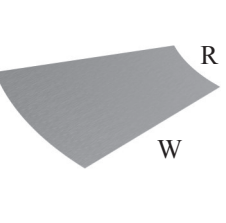
  

Tray Type	Thickness	Fitting Type
6 (All I-Beam <i>Except</i> I6 & I8)	Blank (0.040")	T (Horizontal Tee)
I6 (I6 I-Beam)	6 (0.063")	X (Horizontal Cross)
I8 (I8 I-Beam)	4 (0.080")	R (Straight Reducer)
	11 (0.125")	RR (Right Reducer)
	25 (0.250")	RL (Left Reducer)

ALI6 and ALI8 Fittings have 5" tangents. All other Fittings have 0" tangents.

Fitting Covers are not peaked

FLAT SOLID COVERS - HORIZONTAL BENDS

					
Tray Height	Tray Prefix	Horizontal 90 Degree Bend Flat Solid Cover	Horizontal 60 Degree Bend Flat Solid Cover	Horizontal 45 Degree Bend Flat Solid Cover	Horizontal 30 Degree Bend Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IJB	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IJC	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IJD	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L>IYA	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L>IYB	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L>IYC	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
5"	A(L)IJC5	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L>IYB5	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L>IYC5	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
6"	A(L)IMB	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IMC	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IMD	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXA	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXB	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXC	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXD	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)I6	CAI6S( )-(W)H90-(R)	CAI6S( )-(W)H60-(R)	CAI6S( )-(W)H45-(R)	CAI6S( )-(W)H30-(R)
7"	A(L)IMC7	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXC7	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
	A(L)IXD7	CA6S( )-(W)H90-(R)	CA6S( )-(W)H60-(R)	CA6S( )-(W)H45-(R)	CA6S( )-(W)H30-(R)
8"	A(L)I8	CAI8S( )-(W)H90-(R)	CAI8S( )-(W)H60-(R)	CAI8S( )-(W)H45-(R)	CAI8S( )-(W)H30-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Examples: CA6S-12H90-24 (Flat Solid Cover, 12" wide Horizontal 90 Degree Bend with 24" radius)</p>					



FLAT SOLID COVERS - VERTICAL 90 & 60 DEGREE BENDS

Tray Height	Tray Type	Vertical 90 Degree Inside Bend Flat Solid Cover	Vertical 90 Degree Outside Bend Flat Solid Cover	Vertical 60 Degree Inside Bend Flat Solid Cover	Vertical 60 Degree Outside Bend Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IJB	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IJC	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IJD	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IYA	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L>IYB	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IYC	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
5"	A(L)IJC5	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IYB5	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IYC5	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
6"	A(L)IMB	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IMC	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IMD	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXA	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXB	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXC	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXD	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)I6	CAI6S( )-(W)VI90-(R)	CAI6S( )-(W)VO90-(R)	CAI6S( )-(W)VI60-(R)	CAI6S( )-(W)VO60-(R)
7"	A(L)IMC7	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXC7	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
	A(L)IXD7	CA6S( )-(W)VI90-(R)	CA6S( )-(W)VO90-(R)	CA6S( )-(W)VI60-(R)	CA6S( )-(W)VO60-(R)
8"	A(L)I8	CAI8S( )-(W)VI90-(R)	CAI8S( )-(W)VO90-(R)	CAI8S( )-(W)VI60-(R)	CAI8S( )-(W)VO60-(R)

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
 ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness  
 (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
 (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
 ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.  
 Flat Vertical Covers are not rolled, they are shipped flat and will conform to the Fitting.  
 Examples: CA6S-12VI90-24 (Flat Solid Cover, 12" wide Vertical Inside 90 Degree Bend with 24" radius)

FLAT SOLID COVERS - VERTICAL 45 & 30 DEGREE BENDS


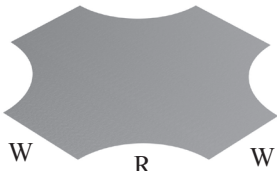
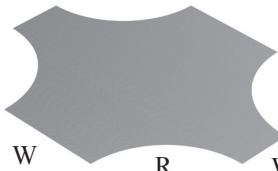
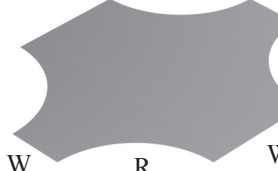
Tray Height	Tray Type	Vertical 45 Degree Inside Bend Flat Solid Cover	Vertical 45 Degree Outside Bend Flat Solid Cover	Vertical 30 Degree Inside Bend Flat Solid Cover	Vertical 30 Degree Outside Bend Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IJB	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IJC	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IJD	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IYA	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IYB	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IYC	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
5"	A(L)IJC5	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IYB5	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IYC5	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
6"	A(L)IMB	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IMC	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IMD	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXA	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXB	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXC	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXD	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)I6	CAI6S( )-(W)VI45-(R)	CAI6S( )-(W)VO45-(R)	CAI6S( )-(W)VI30-(R)	CAI6S( )-(W)VO30-(R)
7"	A(L)IMC7	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXC7	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
	A(L)IXD7	CA6S( )-(W)VI45-(R)	CA6S( )-(W)VO45-(R)	CA6S( )-(W)VI30-(R)	CA6S( )-(W)VO30-(R)
8"	A(L)I8	CAI8S( )-(W)VI45-(R)	CAI8S( )-(W)VO45-(R)	CAI8S( )-(W)VI30-(R)	CAI8S( )-(W)VO30-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough          ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness          (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)          (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)          ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.          Flat Vertical Covers are not rolled, they are shipped flat and will conform to the Fitting.          Examples: CA6S-12VI45-24 (Flat Solid Cover, 12" wide Vertical Inside 45 Degree Bend with 24" radius)</p>					

FLAT SOLID COVERS - TEES

				
Tray Height	Tray Type	Horizontal Tee Flat Solid Cover	Horizontal Reducing Tee Flat Solid Cover	Horizontal Enlarging Tee Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IJB	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IJC	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IJD	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L>IYA	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L>IYB	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L>IYC	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
5"	A(L)IJC5	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L>IYB5	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L>IYC5	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
6"	A(L)IMB	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IMC	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IMD	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXA	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXB	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXC	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXD	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)I6	CAI6S( )-(W)T-(R)	CAI6S( )-(W)T(W1)-(R)	CAI6S( )-(W)T(W1)-(R)
7"	A(L)IMC7	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXC7	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
	A(L)IXD7	CA6S( )-(W)T-(R)	CA6S( )-(W)T(W1)-(R)	CA6S( )-(W)T(W1)-(R)
8"	A(L)I8	CAI8S( )-(W)T-(R)	CAI8S( )-(W)T(W1)-(R)	CAI8S( )-(W)T(W1)-(R)

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
 ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness  
 (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
 (W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
 (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
 ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.  
 Examples: CA6S-12T-24 (Flat Solid Cover, 12" wide Horizontal Tee with 24" radius)

FLAT SOLID COVERS - CROSSES


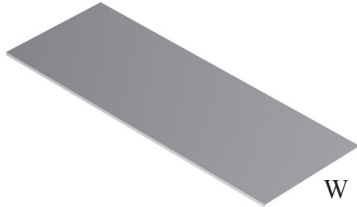
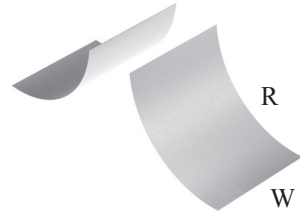
				
Tray Height	Tray Type	Horizontal Cross Flat Solid Cover	Horizontal Reducing Cross Flat Solid Cover	Horizontal Enlarging Cross Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IJB	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IJC	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IJD	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L>IYA	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L>IYB	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L>IYC	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
5"	A(L)IJC5	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L>IYB5	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L>IYC5	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
6"	A(L)IMB	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IMC	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IMD	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXA	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXB	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXC	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXD	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)I6	CAI6S( )-(W)X-(R)	CAI6S( )-(W)X(W1)-(R)	CAI6S( )-(W)X(W1)-(R)
7"	A(L)IMC7	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXC7	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
	A(L)IXD7	CA6S( )-(W)X-(R)	CA6S( )-(W)X(W1)-(R)	CA6S( )-(W)X(W1)-(R)
8"	A(L)I8	CAI8S( )-(W)X-(R)	CAI8S( )-(W)X(W1)-(R)	CAI8S( )-(W)X(W1)-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Examples: CA6S-12X-24 (Flat Solid Cover, 12" wide Horizontal Cross with 24" radius)</p>				

FLAT SOLID COVERS - REDUCERS

		LENGTH = 12" 	LENGTH = 12" 	LENGTH = 12" 
Tray Height	Tray Type	Straight (Concentric) Reducer Flat Solid Cover	Right Hand (Eccentric) Reducer Flat Solid Cover	Left Hand (Eccentric) Reducer Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IJB	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IJC	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IJD	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L>IYA	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L>IYB	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L>IYC	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
5"	A(L)IJC5	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L>IYB5	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L>IYC5	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
6"	A(L)IMB	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IMC	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IMD	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXA	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXB	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXC	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXD	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)I6	CAI6S( )-(W)R(W1)	CAI6S( )-(W)RR(W1)	CAI6S( )-(W)RL(W1)
7"	A(L)IMC7	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXC7	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
	A(L)IXD7	CA6S( )-(W)R(W1)	CA6S( )-(W)RR(W1)	CA6S( )-(W)RL(W1)
8"	A(L)I8	CAI8S( )-(W)R(W1)	CAI8S( )-(W)RR(W1)	CAI8S( )-(W)RL(W1)
(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) (W1) = Second Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) ALI6 and ALI8 Reducer Covers are 24" long. All other I-Beam Reducer Covers are 12" long. Examples: CA6S-12R6 (Flat Solid Cover, 12" wide to 6" wide Straight Reducer)				


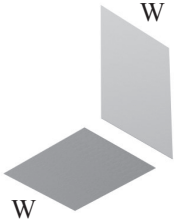


FLAT SOLID COVERS - VERTICAL TEES

			
Tray Height	Tray Type	Vertical Tee Turns Down Flat Solid Cover	Vertical Tee Turns Up Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IJB	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IJC	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IJD	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IYA	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IYB	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IYC	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
5"	A(L)IJC5	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IYB5	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IYC5	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
6"	A(L)IMB	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IMC	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IMD	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXA	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXB	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXC	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXD	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)I6	CAI6S( )-(W)VT-(R)	CAI6S( )-(W)VTU-(R)
7"	A(L)IMC7	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXC7	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
	A(L)IXD7	CA6S( )-(W)VT-(R)	CA6S( )-(W)VTU-(R)
8"	A(L)I8	CAI8S( )-(W)VT-(R)	CAI8S( )-(W)VTU-(R)
<p>(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough            ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness            (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)            (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)            ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.            Flat Vertical Covers are not rolled, they are shipped flat and will conform to the Fitting.            Examples: CA6S-12VT-24 (Flat Solid Cover, 12" wide Vertical Tee with 24" radius)</p>			



FLAT SOLID COVERS - VERTICAL SUPPORT ELBOWS & VERTICAL CROSSES

			
Tray Height	Tray Type	Vertical Support 90 Fitting Flat Solid Cover	Vertical Cross Flat Solid Cover
4.5"	A(L)IJA	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IJB	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IJC	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IJD	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L>IYA	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L>IYB	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L>IYC	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
5"	A(L)IJC5	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L>IYB5	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L>IYC5	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
6"	A(L)IMB	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IMC	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IMD	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXA	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXB	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXC	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXD	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)I6	CAI6S( )-(W)VS-(R)	CAI6S( )-(W)VX-(R)
7"	A(L)IMC7	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXC7	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
	A(L)IXD7	CA6S( )-(W)VS-(R)	CA6S( )-(W)VX-(R)
8"	A(L)I8	CAI8S( )-(W)VS-(R)	CAI8S( )-(W)VX-(R)

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
 ( ) = Blank for 0.040" Thickness (standard), (6) for 0.063" Thickness, (4) for 0.080" Thickness, (11) for 0.125" Thickness, or (25) for 0.25" Thickness  
 (W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)  
 (R) = Radius (12, 18, 24, 36, or 48) denotes desired Radius (in)  
 ALI6 and ALI8 Fitting Covers have 5" tangents. All other Fittings have 0" tangents.  
 Flat Vertical Covers are not rolled they are shipped flat and will conform to the Fitting.  
 Examples: CA6S-12VX-24 (Flat Solid Cover, 12" wide Vertical Cross with 24" radius)

# I-BEAM COVER CLAMPS & ACCESSORIES

*Manufactured & Tested In  
Accordance With NEMA VE-1*

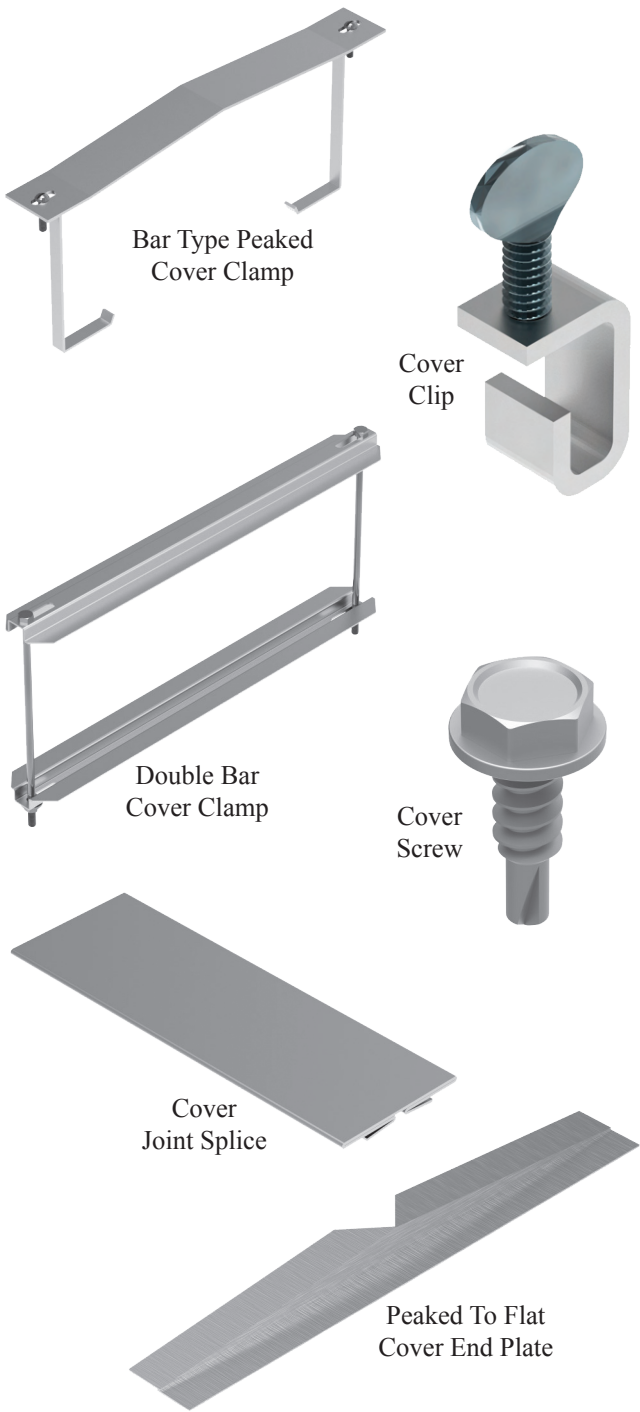







Table of Contents	Page
Cover Clips, Clamps & Hardware	112 - 113
Cover Screws	114
Cover Splices	115
Peaked Cover End Caps	115




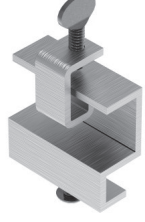


# mphusky

## COVER CLAMPS

		 6ECC-R			
Tray Height	Tray Type	Cover Clips (Stainless Steel)	Bar Style Cover Clamp (Aluminum with Stainless Hardware)	Double Bar Style Cover Clamp (Aluminum with Stainless Hardware)	Bar Style Peaked Cover Clamp (Aluminum with Stainless Hardware)
4.5"	A ( ) IJA	6ECC-R	AHC-(W)-IJA	2AHC-(W)-IJA	AHC-(0)P-(W)-IJA
	A ( ) IJB	6ECC-R	AHC-(W)-IJA	2AHC-(W)-IJA	AHC-(0)P-(W)-IJA
	A ( ) IJC	6ECC-R	AHC-(W)-IJC	2AHC-(W)-IJC	AHC-(0)P-(W)-IJC
	A ( ) IJD	6ECC-R	AHC-(W)-IJC	2AHC-(W)-IJC	AHC-(0)P-(W)-IJC
	A ( ) IYA	6ECC-R	AHC-(W)-IYC	2AHC-(W)-IYC	AHC-(0)P-(W)-IYC
	A ( ) IYB	6ECC-R	AHC-(W)-IYC	2AHC-(W)-IYC	AHC-(0)P-(W)-IYC
	A ( ) IYC	6ECC-R	AHC-(W)-IYC	2AHC-(W)-IYC	AHC-(0)P-(W)-IYC
5"	A ( ) IJC5	6ECC-R	AHC-(W)-IYC5	2AHC-(W)-IYC5	AHC-(0)P-(W)-IYC5
	A ( ) IYB5	6ECC-R	AHC-(W)-IYC5	2AHC-(W)-IYC5	AHC-(0)P-(W)-IYC5
	A ( ) IYC5	6ECC-R	AHC-(W)-IYC5	2AHC-(W)-IYC5	AHC-(0)P-(W)-IYC5
6"	A ( ) IMB	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IMC	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IMD	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IXA	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IXB	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IXC	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) IXD	6ECC-R	AHC-(W)-IMC	2AHC-(W)-IMC	AHC-(0)P-(W)-IMC
	A ( ) I6	6ECC-E	AHC-(W)-I6	2AHC-(W)-I6	AHC-(0)P-(W)-I6
7"	A ( ) IMC7	6ECC-R	AHC-(W)-IXD7	2AHC-(W)-IXD7	AHC-(0)P-(W)-IXD7
	A ( ) IXC7	6ECC-R	AHC-(W)-IXD7	2AHC-(W)-IXD7	AHC-(0)P-(W)-IXD7
	A ( ) IXD7	6ECC-R	AHC-(W)-IXD7	2AHC-(W)-IXD7	AHC-(0)P-(W)-IXD7
8"	A ( ) I8	6ECC-E	AHC-(W)-I8	2AHC-(W)-I8	AHC-(0)P-(W)-I8
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) (0) = Insert Peak Height Example: (0) for 1/2" High Peak, (2) for 2" High Peak Fitting Covers are not peaked					



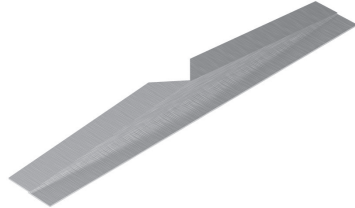
COVER CLAMPS

					
Tray Height	Tray Type	Double Bar Peaked Cover Clamp (Aluminum with Stainless Hardware)	Heavy Duty Raised Double Bar Cover Clamp (Aluminum with Stainless Hardware)	Heavy Duty Raised Double Bar Peaked Cover Clamp (Aluminum with Stainless Hardware)	Raised Cover Clamps (Mill Galvanized)
4.5"	A( )IJA	2AHC-(0)P-(W)-IJA	2AHC-(W)-IJA-R(H)	2AHC-(0)P-(W)-IJA-R(H)	RCC-IJB-(H)( )
	A( )IJB	2AHC-(0)P-(W)-IJA	2AHC-(W)-IJA-R(H)	2AHC-(0)P-(W)-IJA-R(H)	RCC-IJB-(H)( )
	A( )IJC	2AHC-(0)P-(W)-IJC	2AHC-(W)-IJC-R(H)	2AHC-(0)P-(W)-IJC-R(H)	RCC-IYC-(H)( )
	A( )IJD	2AHC-(0)P-(W)-IJC	2AHC-(W)-IJC-R(H)	2AHC-(0)P-(W)-IJC-R(H)	RCC-IYC-(H)( )
	A( )IYA	2AHC-(0)P-(W)-IYC	2AHC-(W)-IYC-R(H)	2AHC-(0)P-(W)-IYC-R(H)	RCC-IYC-(H)( )
	A( )IYB	2AHC-(0)P-(W)-IYC	2AHC-(W)-IYC-R(H)	2AHC-(0)P-(W)-IYC-R(H)	RCC-IYC-(H)( )
	A( )IYC	2AHC-(0)P-(W)-IYC	2AHC-(W)-IYC-R(H)	2AHC-(0)P-(W)-IYC-R(H)	RCC-IYC-(H)( )
5"	A( )IJC5	2AHC-(0)P-(W)-IYC5	2AHC-(W)-IYC5-R(H)	2AHC-(0)P-(W)-IYC5-R(H)	RCC-IXD-(H)( )
	A( )IYB5	2AHC-(0)P-(W)-IYC5	2AHC-(W)-IYC5-R(H)	2AHC-(0)P-(W)-IYC5-R(H)	RCC-IXD-(H)( )
	A( )IYC5	2AHC-(0)P-(W)-IYC5	2AHC-(W)-IYC5-R(H)	2AHC-(0)P-(W)-IYC5-R(H)	RCC-IXD-(H)( )
6"	A( )IMB	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IMC	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IMD	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IXA	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IXB	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IXC	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
	A( )IXD	2AHC-(0)P-(W)-IMC	2AHC-(W)-IMC-R(H)	2AHC-(0)P-(W)-IMC-R(H)	RCC-IXD-(H)( )
7"	A( )I6	2AHC-(0)P-(W)-I6	2AHC-(W)-I6-R(H)	2AHC-(0)P-(W)-I6-R(H)	RCC-IXD-(H)( )
	A( )IMC7	2AHC-(0)P-(W)-IXD7	2AHC-(W)-IXD7-R(H)	2AHC-(0)P-(W)-IXD7-R(H)	RCC-IXD-(H)( )
	A( )IXC7	2AHC-(0)P-(W)-IXD7	2AHC-(W)-IXD7-R(H)	2AHC-(0)P-(W)-IXD7-R(H)	RCC-IXD-(H)( )
8"	A( )IXD7	2AHC-(0)P-(W)-IXD7	2AHC-(W)-IXD7-R(H)	2AHC-(0)P-(W)-IXD7-R(H)	RCC-IXD-(H)( )
	A( )I8	2AHC-(0)P-(W)-I8	2AHC-(W)-I8-R(H)	2AHC-(0)P-(W)-I8-R(H)	RCC-IXD-(H)( )
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in) (0) = Insert Peak Height: Example: (0) for 1/2" High Peak, (2) for 2" High Peak Fitting Covers are not peaked (H) = Cover Spacer Height: Example: (1) for 1" high, (2) for 2" high ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.					

## COVER HARDWARE

					
Tray Height	Tray Type	Cover Screw #10 x 5/8" Hex head self-drilling self-tapping (410 Stainless)	Cover Screw #8 x 1/2" Phillips head self-drilling self-tapping (Zinc-Plated)	Cover Screw #8 x 1/2" Phillips head self-drilling self-tapping (410 Stainless)	Cover Screw #6 x 3/8" Phillips head self-drilling self-tapping (Zinc-Plated)
4.5"	A( )IJA	B-55-SS	B-37	B-37-SS	B-26
	A( )IJB	B-55-SS	B-37	B-37-SS	B-26
	A( )IJC	B-55-SS	B-37	B-37-SS	B-26
	A( )IJD	B-55-SS	B-37	B-37-SS	B-26
	A( )IYA	B-55-SS	B-37	B-37-SS	B-26
	A( )IYB	B-55-SS	B-37	B-37-SS	B-26
	A( )IYC	B-55-SS	B-37	B-37-SS	B-26
5"	A( )IJC5	B-55-SS	B-37	B-37-SS	B-26
	A( )IYB5	B-55-SS	B-37	B-37-SS	B-26
	A( )IYC5	B-55-SS	B-37	B-37-SS	B-26
6"	A( )IMB	B-55-SS	B-37	B-37-SS	B-26
	A( )IMC	B-55-SS	B-37	B-37-SS	B-26
	A( )IMD	B-55-SS	B-37	B-37-SS	B-26
	A( )IXA	B-55-SS	B-37	B-37-SS	B-26
	A( )IXB	B-55-SS	B-37	B-37-SS	B-26
	A( )IXC	B-55-SS	B-37	B-37-SS	B-26
	A( )IXD	B-55-SS	B-37	B-37-SS	B-26
	A( )I6	B-55-SS	B-37	B-37-SS	B-26
7"	A( )IMC7	B-55-SS	B-37	B-37-SS	B-26
	A( )IXC7	B-55-SS	B-37	B-37-SS	B-26
	A( )IXD7	B-55-SS	B-37	B-37-SS	B-26
8"	A( )I8	B-55-SS	B-37	B-37-SS	B-26

**COVER SPLICES & END CAPS**

			
Tray Height	Tray Type	Slip-on Cover Splice Connector (Aluminum)	End Caps for Peaked Covers To Flat Covers (Aluminum)
4.5"	A( )IJA	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IJB	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IJC	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IJD	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IYA	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IYB	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IYC	ASP-VS-(W)	C(0)P-A6-(W)-EC
5"	A( )IJC5	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IYB5	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IYC5	ASP-VS-(W)	C(0)P-A6-(W)-EC
6"	A( )IMB	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IMC	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IMD	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXA	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXB	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXC	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXD	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )I6	ASP-VS-(W)	C(0)P-AI6-(W)-EC
7"	A( )IMC7	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXC7	ASP-VS-(W)	C(0)P-A6-(W)-EC
	A( )IXD7	ASP-VS-(W)	C(0)P-A6-(W)-EC
8"	A( )I8	ASP-VS-(W)	C(0)P-AI8-(W)-EC
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in). (0) = Insert Peak Height: Example: (0) for 1/2" High Peak, (2) for 2" High Peak Fitting Covers are not peaked			





# I-BEAM SPLICE CONNECTORS & ACCESSORIES

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

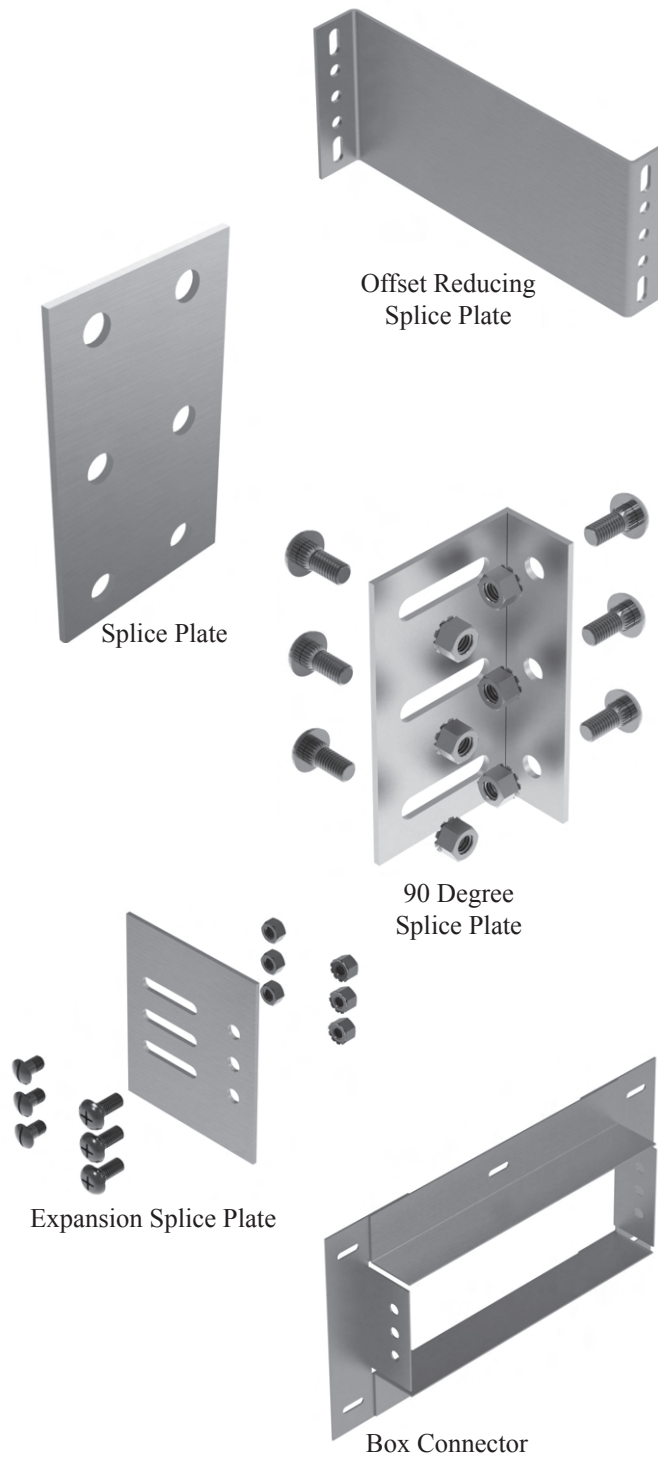
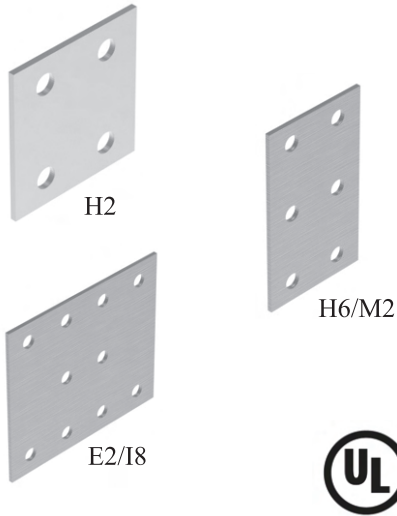


Table of Contents	Page
Splices & Connectors	118 - 121
Box Connectors	122
Wall Penetration Sleeves	122
End Plates & Dropouts	123
Bonding Jumpers	124
Ground Connectors & Clamps	125 - 126
Tray Separators	127 - 128
Mini Trim	129



# mphusky

SPLICES & CONNECTORS



**Splice Plates**

Standard splice connectors used to join tray sections. Splices with one blank side can be used to connect to a competitors tray by field drilling.  
3/8" hardware included See Detail "A" in Details on page 158.

Tray Type	Standard Splice	One Side Blank
IJA, IJB, IJC, IJD & IJC5	ASP-H2(-)-K	ASP-H2-1B( )
IYA, IYB, IYC, IYB5 & IYC5	ASP-H6(-)-K	ASP-H6-1B( )
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	ASP-M2(-)-K	ASP-M2-1B( )
I6	ASP-E2(-)-K	ASP-E2-1B( )
I8	ASP-I8(-)-K	ASP-I8-1B( )

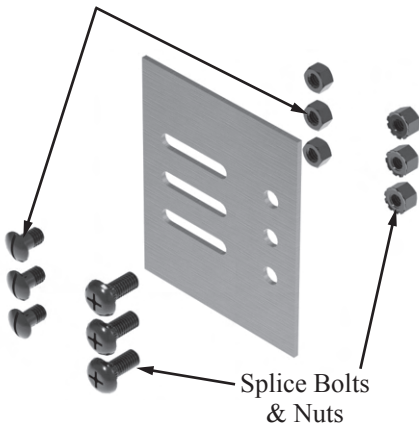


**90 Degree Splice Connector**

These splices can be used to make field tee's or to connect to cabinets.  
3/8" hardware included

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IJC5, IYA, IYB, IYC, IYB5 & IYC5	ASP-4-90( )
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	ASP-6-90( )
I6	ASP-I6-90( )
I8	ASP-I8-90( )

Shoulder Bolts  
& Nuts



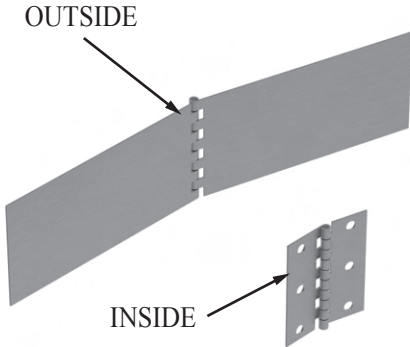
**Expansion Splice Connectors**

Expansion splice connectors are designed to allow 1-1/2" of free movement between adjacent straight sections. 3/8" hardware included. Bonding jumpers are required. See NEMA VE-2 for installation information.  
See Detail "B" in Details on page 158.

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IJC5, IYA, IYB, IYC, IYB5 & IYC5	ASP-4-EX(-)-K
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	ASP-6-EX(-)-K
I6	ASP-I6-EX(-)-K
I8	ASP-I8-EX(-)-K

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.  
-K = Kitted Hardware and Splice


SPLICES & CONNECTORS



**Horizontal Hinge Splice Plates**

Horizontal hinged splices offer flexibility to go around obstacles during installation. Bonding jumpers should be used on each side rail. The long hinge is field drilled once the trays are at the desired angle. 3/8" hardware is included. See Detail "D" in Details on page number 159.

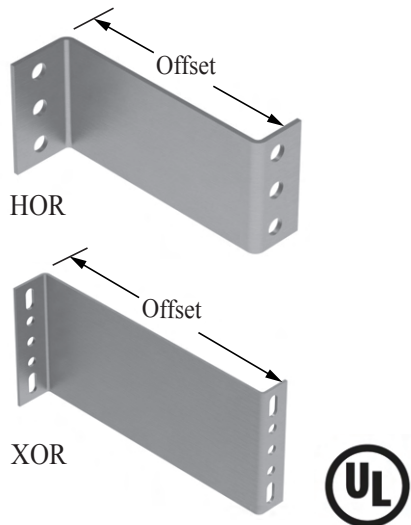
Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IJC5, IYA, IYB, IYC, IYB5 & IYC5	AFS-H4( )-K
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	AFS-H6( )-K
I6	AFS-HI6( )-K
I8	AFS-HI8( )-K



**Vertical Hinge Splice Plates**

Vertical hinged splices offer flexibility to go over or under obstacles during installation. Bonding jumpers should be used on each side rail. 3/8" hardware is included. See Detail "C" in Details on page 159.

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IJC5, IYA, IYB, IYC, IYB5 & IYC5	AFS-V4( )-K
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	AFS-V6( )-K
I6	AFS-VI6( )-K
I8	AFS-VI8( )-K



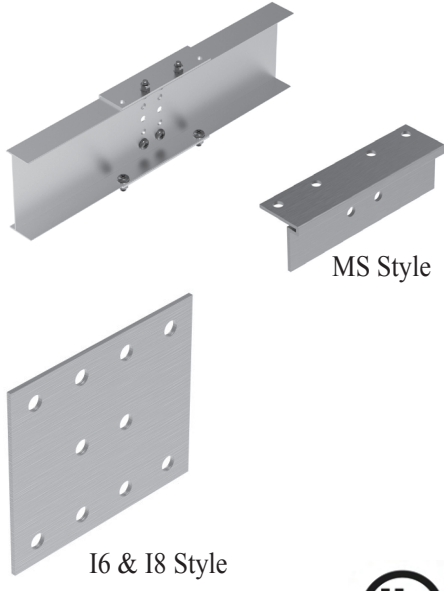
**Offset Reducing Splice Plates**

Offset reducing splice plates can be used instead of reducer fittings and offer better versatility and economy since they are less expensive and don't require covers. Use two plates for concentric reductions or one offset plate along with a standard splice plate for eccentric reductions. 3/8" hardware included.

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IJC5, IYA, IYB, IYC, IYB5 & IYC5	ASP-HOR-(OFF)( )
IMB, IMC, IMD, IXA, IXB, IXC, IXD, IMC7, IXC7 & IXD7	ASP-XOR-(OFF)( )
I6	ASP-I6OR-(OFF)( )
I8	ASP-I8OR-(OFF)( )

(OFF) Insert Offset in inches  
 ( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.  
 -K = Kitted Hardware and Splice


## SPLICES &amp; CONNECTORS



**Mid-Span Splices**

Optional mid-span splices can be placed at any location within a span, eliminating the need to have splices located within the quarter point of the span as shown in NEMA VE-2. This can reduce the number of supports and cost of installation. The mid-span splices need to be ordered separately. 3/8" hardware is included.

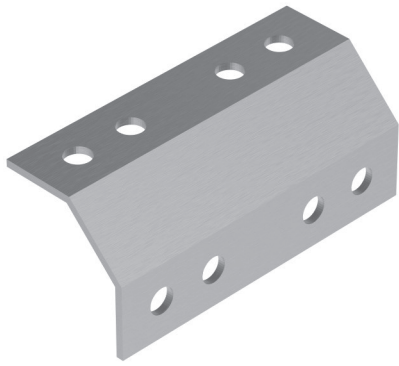
Tray Height	Tray Type	Catalog No.
4.5"	IYC	ASP-MS-4-1/2( )
6"	IXC	ASP-MS-6( )
6"	IXD	ASP-MS-6( )
6"	I6	STANDARD SPLICE: ASP-E2( )
7"	IXC7	ASP-MS-7( )
7"	IXD7	ASP-MS-7( )
8"	I8	STANDARD SPLICE: ASP-I8( )



**Quarter-Span Expansion Splices**

Optional quarter-span expansion splices can be placed at any location within the quarter point of the span without supporting both sides of the splice as outlined in NEMA VE-2. These splices can reduce the installed cost by reducing the number of supports required. 3/8" hardware is included. Bonding jumpers required.

Tray Height	Tray Type	Catalog No.
4.5"	IYC	ASP-QS-4-1/2-EX( )
6"	IXC	ASP-QS-6-EX( )
6"	I6	ASP-QS-I6-EX( )



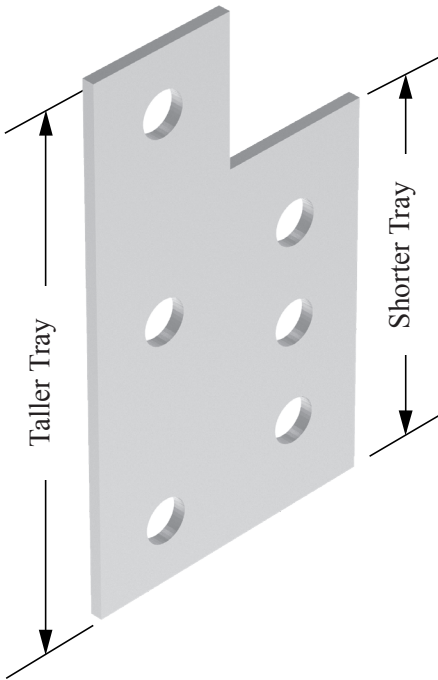
**Channel to Ladder or Trough Connector**

These connectors are used to connect a single channel to a ladder or trough tray. Connection is perpendicular to the tray. 3/8" hardware is included.

Channel Type	Alum	HDGAF	316 SS
G3	ACC-IG3( )	SCC-IG3( )	6CC-IG3( )
G4 & G6	ACC-IGU( )	SCC-IGU( )	6CC-IGU( )

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.

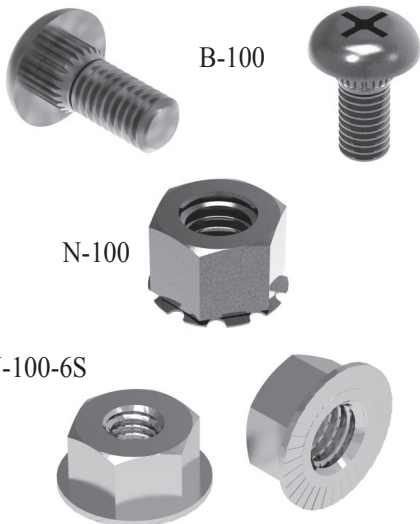
SPLICES & CONNECTORS



**Step Down Splice Connectors**

Step down splices are used to connect two trays together of different heights, while keeping the bottoms of both trays lined up. These splice connectors are handy when you want to change the height of the tray during a run such as changing the tray you are running from 6" high to 4.5" high. Also used to adapt one tray type to another. Two pieces required. 3/8" hardware is included.

Tray Type	Catalog No.
5" to 4.5" High Trays	<b>ASP-500/450( )</b>
6" to 4.5" High Trays ( <i>Except I6</i> )	<b>ASP-600/450( )</b>
6" to 5" High Trays ( <i>Except I6</i> )	<b>ASP-600/500( )</b>
7" to 4.5" High Trays	<b>ASP-700/450( )</b>
7" to 5" High Trays	<b>ASP-700/500( )</b>
7" to 6" High Trays ( <i>Except I6</i> )	<b>ASP-700/600( )</b>
I6 to 7" High Trays	<b>ASP-I6/700( )</b>
I6 to 6" High Trays	<b>ASP-I6/600( )</b>
I6 to 5" High Trays	<b>ASP-I6/500( )</b>
I6 to 4.5" High Trays	<b>ASP-I6/450( )</b>
I8 to 7" High Trays	<b>ASP-I8/700( )</b>
I8 to I6 High Trays	<b>ASP-I8/I6( )</b>
I8 to 6" High Trays ( <i>Except I6</i> )	<b>ASP-I8/600( )</b>
I8 to 5" High Trays	<b>ASP-I8/500( )</b>
I8 to 4.5" High Trays	<b>ASP-I8/450( )</b>



**Hardware for Splice Connectors**

Splice hardware is offered in standard Zinc-Plated steel finish. 316 Stainless Steel and Silicon Bronze (Non-Ferrous) are also offered.

Description	Catalog No.
3/8" x 3/4" Splice Bolt, Zinc-Plated	<b>B-100</b>
3/8" Splice Nut with Captive Lock Washer, Zinc-Plated	<b>N-100</b>
3/8" x 3/4" Splice Bolt, 316 Stainless Steel	<b>B-100-6S</b>
3/8" Serrated Flange Lock Nut, 316 Stainless Steel	<b>N-100-6S</b>
3/8" x 3/4" Splice Bolt, Silicon Bronze	<b>B-19-SB</b>
3/8" Splice Nut, Silicon Bronze	<b>N-17-SB</b>
3/8" Lock Washer, Silicon Bronze	<b>W-17-SB</b>

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.



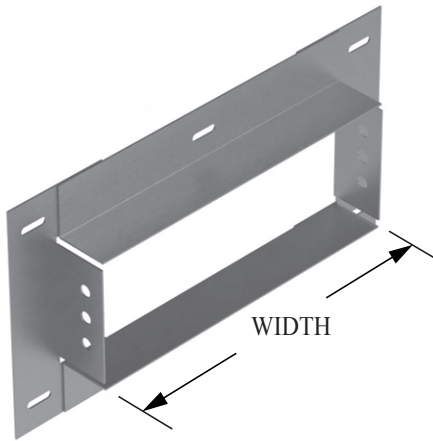
## BOX CONNECTORS &amp; WALL PENETRATION SLEEVES

**Drill Jigs**

Using drill jigs on field-cut ends ensures the proper alignment of holes, allowing full design strength of the splice. A splice plate can also be clamped to the side rail and used as a template for a small quantity of field cuts.

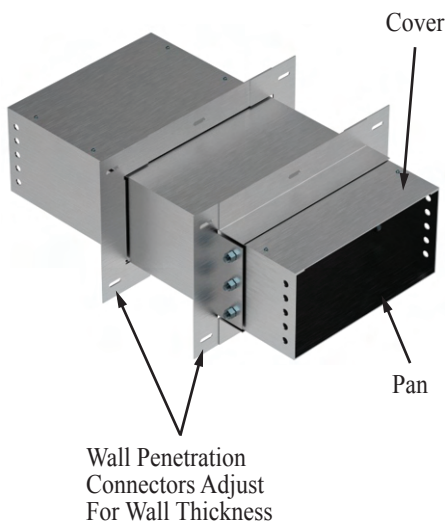
Tray Height	Catalog No.
4.5"	IYCDJ
5"	IJC5DJ
6"	IXCDJ

Tray Height	Catalog No.
7"	IXC7DJ
I6	I6DJ
I8	I8DJ

**Box Connectors**

Box connectors are used to connect trays to boxes or panels. 3/8" hardware is included.

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IYA, IYB & IYC	AVBC-(W)-4-1/2( )
IJC5, IYB5 & IYC5	AVBC-(W)-5( )
IMB, IMC, IMD, IXA, IXB, IXC & IXD	AVBC-(W)-6( )
I6	AVBC-(W)-I6( )
IMC7, IXC7 & IXD7	AVBC-(W)-7( )
I8	AVBC-(W)-I8( )

**Wall Penetration Sleeves**

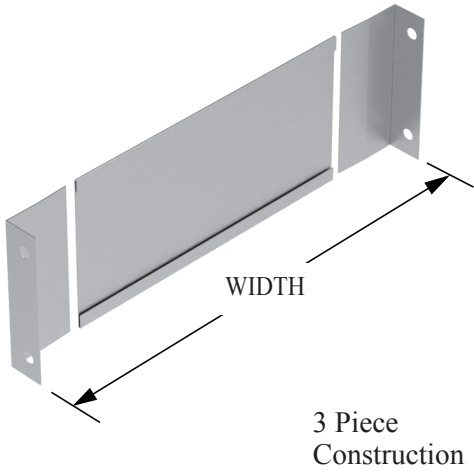
The wall penetration sleeve includes a 24" long pan, 2 wall connectors, a cover with cover screws and a pair of splice connectors, that allows tray to be connected on both sides of the wall. Gaskets and sealants are not included.

3/8" splice hardware is included. See Details "O" and "P" in Details on pages 165 and 166.

Tray Type	Catalog No.
IJA, IJB, IJC, IJD, IYA, IYB & IYC	AWPS-(W)-4-1/2( )
IJC5, IYB5 & IYC5	AWPS-(W)-5( )
IMB, IMC, IMD, IXA, IXB, IXC & IXD	AWPS-(W)-6( )
I6	AWPS-(W)-I6( )
IMC7, IXC7 & IXD7	AWPS-(W)-7( )
I8	AWPS-(W)-I8( )

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)

END PLATES & DROPOUTS

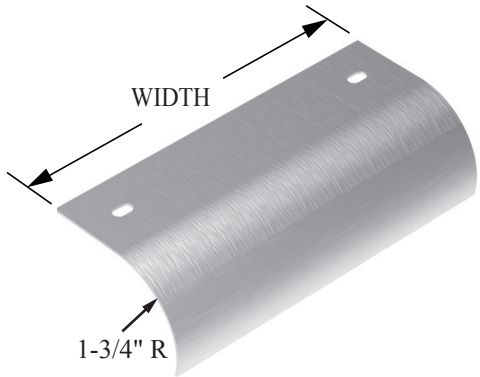


3 Piece Construction

**End Plates**

End plates are available to close off the end of a tray run. The end plate is three-piece constructed to allow a small width adjustment to prevent bowing when installed. Hardware is included.

Tray Type	Catalog No.
4.5" High Trays	AEP-(W)-4-1/2( )
5" High Trays	AEP-(W)-5( )
6" High Trays (Except I6)	AEP-(W)-6( )
I6	AEP-(W)-I6( )
7" High Trays	AEP-(W)-7( )
I8	AEP-(W)-I8( )



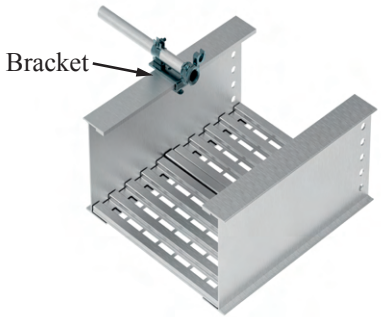
1-3/4" R

**Dropouts**

This dropout is used at the end of a cable tray, or to provide a smooth drop off for small cables at any point between rungs. They can be used in pairs to drop from two directions or singly to drop from one direction. Hardware is included.

Tray Type	Catalog No.
IJA, & IJB	AVD-(W)( )
IJC, & IJD	AVD-(W)-XA( )
IJC5, IYB5, IYC5, IYA, IYB, IYC, IMB, IMC, IMD, IXA, IXB, IXC, IMC7, IXC7, & IXD7	AVD-(W)-YA( )
I6	AVD-(W)-X( )
I8	AVD-(W)-YA( )

CONDUIT SIDE DROPOUT BRACKET ONLY. PIPE CLAMP, PIPE, AND GROUND BUSHING ARE NOT INCLUDED.



Bracket

**Conduit Side-Type Dropouts**

The conduit side-type dropout is a bracket to secure a conduit clamp (*not included*) to the side rail of the tray, allowing cables to exit the tray into conduit drops to the equipment. Not UL listed.

Tray Type	Zinc-Plated	316 SS
All Trays (Except I6 & I8)	VDS-U( )	6VDS-U
I6 & I8	VDS-U-I6( )	6VDS-U-I6

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.  
(W) = Width (6, 9, 12, 18, 24, 30, or 36) denotes desired Width (in)

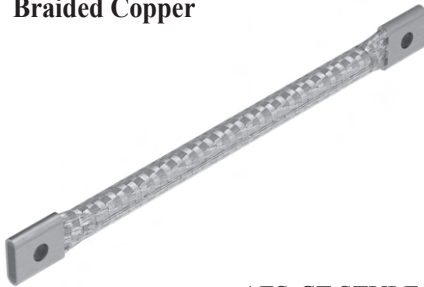
## BONDING JUMPERS

## Laminated Aluminum



AFS-C STYLE

## Braided Copper



AFS-CT STYLE

## Green Insulated Copper



AFS-CT INSULATED

Amperage	Wire Size
600 AMPS	#1 AWG
800 AMPS	1/0 AWG
1000 AMPS	2/0 AWG
1200 AMPS	3/0 AWG
1600 AMPS	4/0 AWG
2000 AMPS	250 MCM

**Bonding Jumpers / Grounding Straps**

Bonding jumpers are primarily used to jump across connections that are considered non-secure such as hinge splices or expansion splices. Jumpers should be installed on both side rails when jumping across hinge splices and expansion splices. When used as an EGC, jumpers should be installed on both side rails and the two jumpers amperage values should add up to the fuse rating of the equipment being protected. Many styles and amperages are available including:

Laminated Aluminum, Green Insulated Copper, and Tinned Braided Copper. Jumpers are offered in two lengths 12" and 16" from bolt hole to bolt hole.

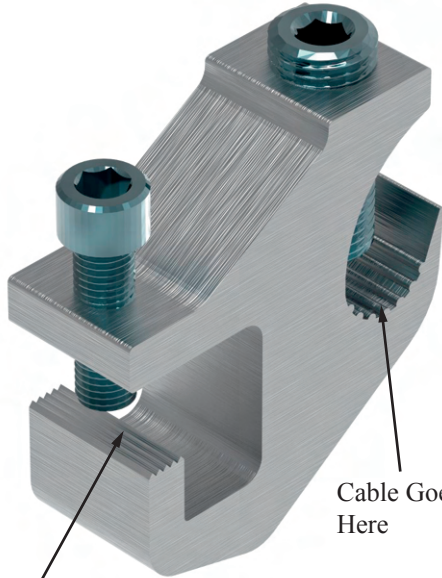
Jumpers include mounting hardware.

See Details "B", "C" and "D" in Details on pages 158 and 159.

Amperage	Description	Catalog No. 12" Long	Catalog No. 16" Long
600	Laminated Alum	AFS-C()	AFS-C-16L()
1000	Laminated Alum	AFS-C-1000()	AFS-C-1000-16L()
1200	Laminated Alum	AFS-C-1200()	AFS-C-1200-16L()
600	Green Ins. Cu	AFS-CT-600-I()	AFS-CT-600-I-16L()
800	Green Ins. Cu	AFS-CT-800-I()	AFS-CT-800-I-16L()
1000	Green Ins. Cu	AFS-CT-1000-I()	AFS-CT-1000-I-16L()
1200	Green Ins. Cu	AFS-CT-1200-I()	AFS-CT-1200-I-16L()
1600	Green Ins. Cu	AFS-CT-1600-I()	AFS-CT-1600-I-16L()
2000	Green Ins. Cu	AFS-CT-2000-I()	AFS-CT-2000-I-16L()
600	Braided Cu	AFS-CT-600()	AFS-CT-600-16L()
1000	Braided Cu	AFS-CT-1000()	AFS-CT-1000-16L()
1200	Braided Cu	AFS-CT-1200()	AFS-CT-1200-16L()
1600	Braided Cu	AFS-CT-1600()	AFS-CT-1600-16L()
2000	Braided Cu	AFS-CT-2000()	AFS-CT-2000-16L()

() = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.

GROUND CLAMPS



Tray Flange  
Goes Here

Cable Goes  
Here



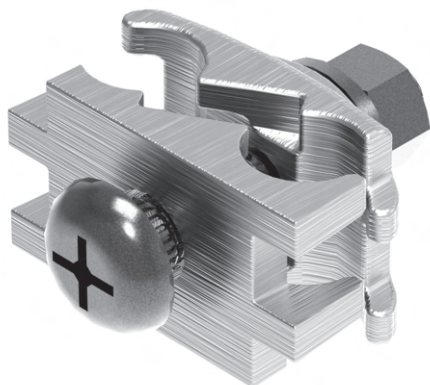
**Ground Clamps**

Ground Clamp for fastening ground wire to cable tray. Clamp is Tin-Plated extruded aluminum with zinc-electroplated steel hardware. Use for aluminum or copper conductors. Clamp has serrations to bite through insulating oxides on aluminum tray and grip the tray. Screws tighten with 1/4" hex wrench. See Detail "L" in Details on page 163.

Third Party Certification:  
UL Listed  
CSA Certified

Applicable Third Party standards:  
UL Standard 467  
CSA Standard C22.2 No.41  
NEC 250.77 and 392.6

Conductor	Catalog No.
#6, #4, #3, #1, 1/0, 2/0, 3/0, 4/0 AWG to 250KCMIL	HP-CTGC



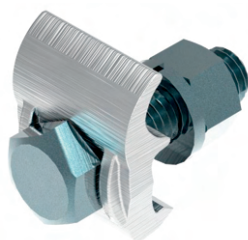
**Grounding Connectors**

Type GC connectors hold a single through cable and a tap cable while separating the ground conductor from the cable tray. Note that the bolt head is mounted on the inside wall of the cable tray to avoid damage to the cable insulation. Grounding connector can be used with aluminum or galvanized steel cable trays and aluminum or copper conductors. When mounted, the bolt may be used to replace one of the bolts in a splice plate eliminating the need to drill the tray. When used on aluminum conductors the cable must be scratch brushed and Oxidation Inhibitor (OI) must be applied on the cable and connector. Clamps are copper alloy Tin-Plated. See Detail "K" in Details on page 163.

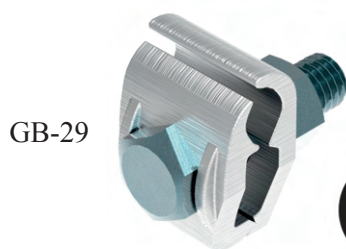
UL Listed  
CSA Certified  
UL Standard 467

Conductor	Catalog No.
#6 (SOL), #4, #3, #2, #1 & 1/0 STR (0.162 - 0.372 Dia)	GC-2525-CT
#2 (SOL), #1, 1/0, & 2/0 STR (0.258 - 0.419 Dia)	GC-2626-CT
2/0 (STR), 3/0, 4/0 & 250 KCMIL (0.414 - 0.575 Dia)	GC-2929-CT

## GROUND CLAMPS



GBM-29



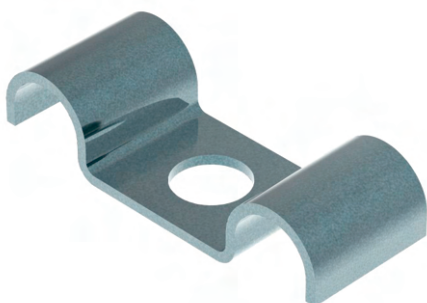
GB-29

**Grounding Clamps**

Type GBM high-copper alloy clamps hold a single through cable directly on the cable tray surface. One wrench installation and UL 467 listed. Copper alloy cast body with Durium bolts, nuts, and washers. Furnished in copper alloy, however, Tin-Plating is available as an option. GB-style clamps have a back piece that separates the cable from the tray surface.

UL listed. See Detail "L" in Details on page 163.

Conductor	GBM Cat. No.	GB Cat. No.
#4 (Sol), #3, #2, #1, 1/0 & 2/0 STR	<b>GBM-26</b>	<b>GB-26</b>
2/0 (Sol), 3/0, 4/0 & 250 MCM	<b>GBM-29</b>	<b>GB-29</b>
300, 350, 400 & 500 MCM	<b>GBM-34</b>	<b>GB-34</b>
550 - 750 MCM	<b>GBM-39</b>	<b>GB-39</b>

**Double Cable Clamps**

This double cable clamp is used to clamp ground wires to the tray or structure. The hole is 5/16". Not UL listed.

Diameter	Conductor	Plated Clamp	316 SS
1/4"	#4, #3 & #2 Bare Copper	<b>HCM-28</b>	<b>6HCM-28</b>
3/8"	#1, 1/0 & 2/0 Bare Copper		<b>6HCM-29</b>
1/2"	3/0, 4/0 & 250 MCM	<b>HCM-30</b>	<b>6HCM-30</b>
3/4"			<b>6HCM-31</b>
1"			<b>6HCM-32</b>

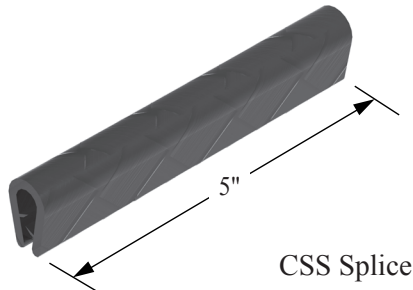
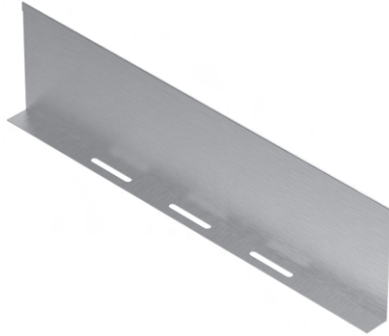
**Oxidation Inhibitor**

An oxidation inhibitor is used where permanent electrical continuity is important. For best results, clean contact surfaces from dirt and oil by wiping clean and remove oxide coating by abrasion once over with emery cloth. Apply a thin coat of oxidation inhibitor on the cleaned surfaces and make connection immediately. Each container of compound is sufficient to effect approximately eighty splices.

Description	Catalog No.
Oxidation Inhibitor	<b>OI</b>



## SEPARATORS

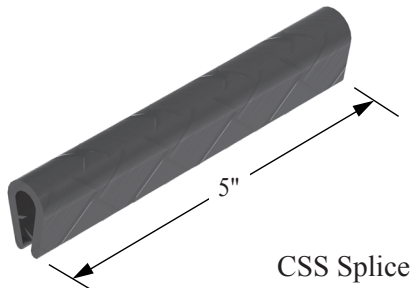
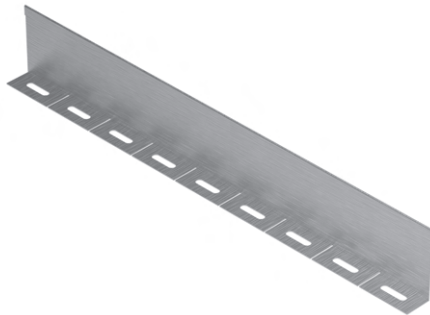


### *Separators / Dividers*

Cable separators (dividers) are available for all tray types in aluminum, HDGAF, mill galvanized, galvanized, or 316 Stainless Steel. Separators come in various heights and are slotted at regular intervals for ease of installation without field drilling. Each separator is furnished with B-37 self-drilling self-tapping sheet metal screws for ease of mounting and one (CSS) separator splice. Stainless separators are furnished with stainless bolts, nuts, and washers. Optional separator mounting clips (SSUSC-U) with hardware are also available for mounting without drilling.

**Straight Lengths:** Standard length is 10 or 12 feet. For 10 foot lengths change the -144 to -120. Also available in 5 foot -60 or 6 foot -72 lengths.

Tray Height	Separator Height	Alum	316 SS
4.5"	2.75"	A3S-144()	63S-144
5"	3.75"	A4S-144()	64S-144
6" (I6 only)	4.75"	AI6S-144( )	6I6S-144
6"	4.75"	A5S-144()	65S-144
7"	5.75"	A6S-144( )	66S-144
8" (I8 only)	6.75"	AI8S-144( )	6I8S-144



### *Separators for Horizontal Bends*

Separators for horizontal bends are supplied in the standard 6 foot length. Each piece is punched and slotted for easy field adjustment to any degree of radius curvature. Sections may be field cut or continued along a straight run. Self-drilling self-tapping screws and one (CSS) separator splice are included with each section. Stainless separators are furnished with stainless bolts, nuts, and washers. Optional separator mounting clips (SSUSC-U) with hardware are also available for mounting without drilling.

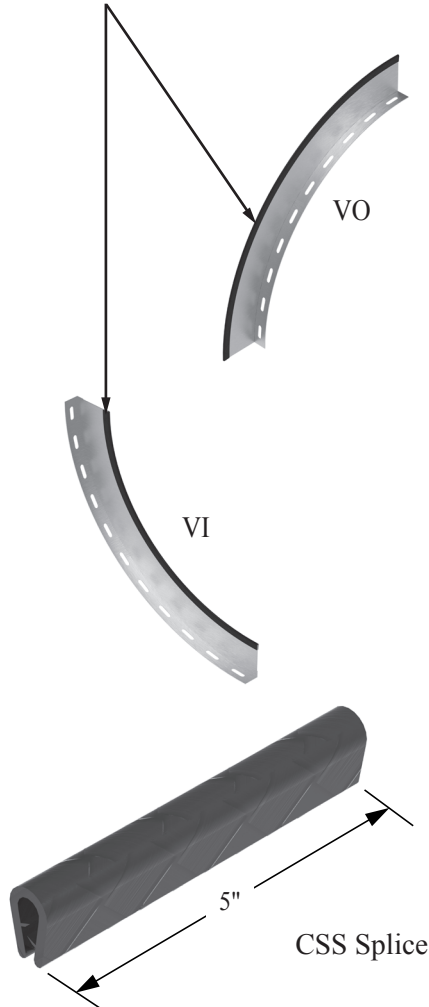
Tray Height	Separator Height	Alum	316 SS
4.5"	2.75"	A3S-HA()	63S-HA
5"	3.75"	A4S-HA()	64S-HA
6" (I6 only)	4.75"	AI6S-HA( )	6I6S-HA
6"	4.75"	A5S-HA()	65S-HA
7"	5.75"	A6S-HA()	66S-HA
8" (I8 only)	6.75"	AI8S-HA( )	6I8S-HA

() = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.



## SEPARATORS

Mini Trim Edge Protector

**Separators for Vertical Bends**

Cable separators (dividers) for vertical bends must be factory formed to the proper radius needed. Vertical separators can be ordered to the specific degree of bend or the customer can order 90 degree separators and field cut them to the proper degree bends. Each separator is furnished with B-37 self-drilling self-tapping screws and one (CSS) separator splice. Stainless separators are furnished with stainless bolts, nuts, and washers. Optional separator mounting clips (SSUSC-U) with hardware are also available for mounting without drilling.

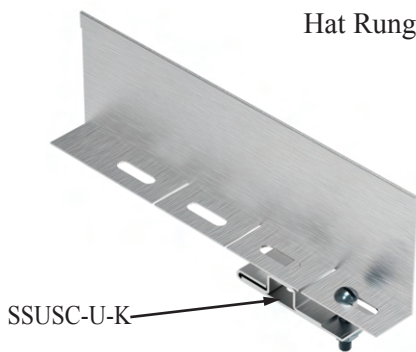
The following information is required for Vertical Separators:

1. Inside or Outside bend
2. Type of Material
3. Degree of Bend
4. Radius of Bend
5. Separator Height

Example: A3V-VI45-24

Tray Height	Separator Height	Alum	316 SS
4.5"	2.75"	A3V-V(†)(°)-(R)( )	63V-V(†)(°)-(R)
5"	3.75"	A4V-V(†)(°)-(R)( )	64V-V(†)(°)-(R)
6" (I6 only)	4.75"	AI6V-V(†)(°)-(R)( )	6I6V-V(†)(°)-(R)
6"	4.75"	A5V-V(†)(°)-(R)( )	65V-V(†)(°)-(R)
7"	5.75"	A6V-V(†)(°)-(R)( )	66V-V(†)(°)-(R)
8" (I8 only)	6.75"	AI8V-V(†)(°)-(R)( )	6I8V-V(†)(°)-(R)

Hat Rung

**Separator Fasteners for Ladder Tray (Optional)**

Separator fasteners allow attachment of separators to ladder rungs without drilling or shooting self-drilling self-tapping screws into the rungs. Order 4 per straight section, 3 per horizontal fitting and 2 per vertical fitting. Rung fasteners are Stainless Steel and include mounting hardware.

Catalog No.

SSUSC-U-K

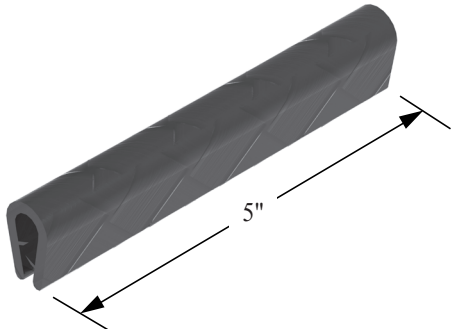
(†) Insert (I) for Inside or (O) for Outside Bend

(°) Insert Degree of Bend (90, 60, 45, or 30)

(R) = Insert Radius of Bend (12, 18, 24, 36, or 48) (in)

( ) = Blank for standard Zinc-Plated Hardware, (-6S) for 316 Stainless Steel or (-SB) for Silicon Bronze.

SPLICES AND MINI TRIM

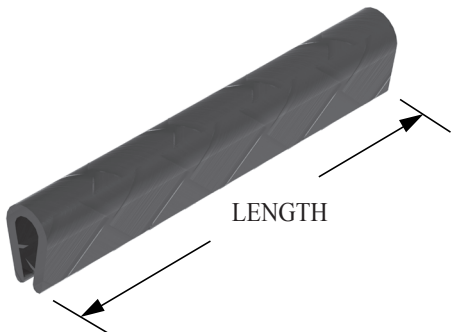


**Separator Splice**

The CSS separator splice is applied to insure a smooth transition between barrier strips. The splice is a vinyl embossed extrusion with segmented metal core 5" long.

Catalog No.

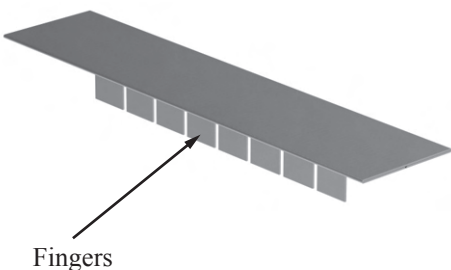
CSS



**Mini Trim**

Mini Trim can be used as a protective edging to protect cables from sharp surfaces that they may contact. Mini trim is a vinyl embossed extrusion with segmented metal core that can be cut with a knife between the metal core segments. It will grip edges from 0.100" to 0.050" thick, and is supplied in 100 foot and 250 foot rolls.

Length	Catalog No.
100 ft	<b>MINI-TRIM-100</b>
250 ft	<b>MINI-TRIM-250</b>

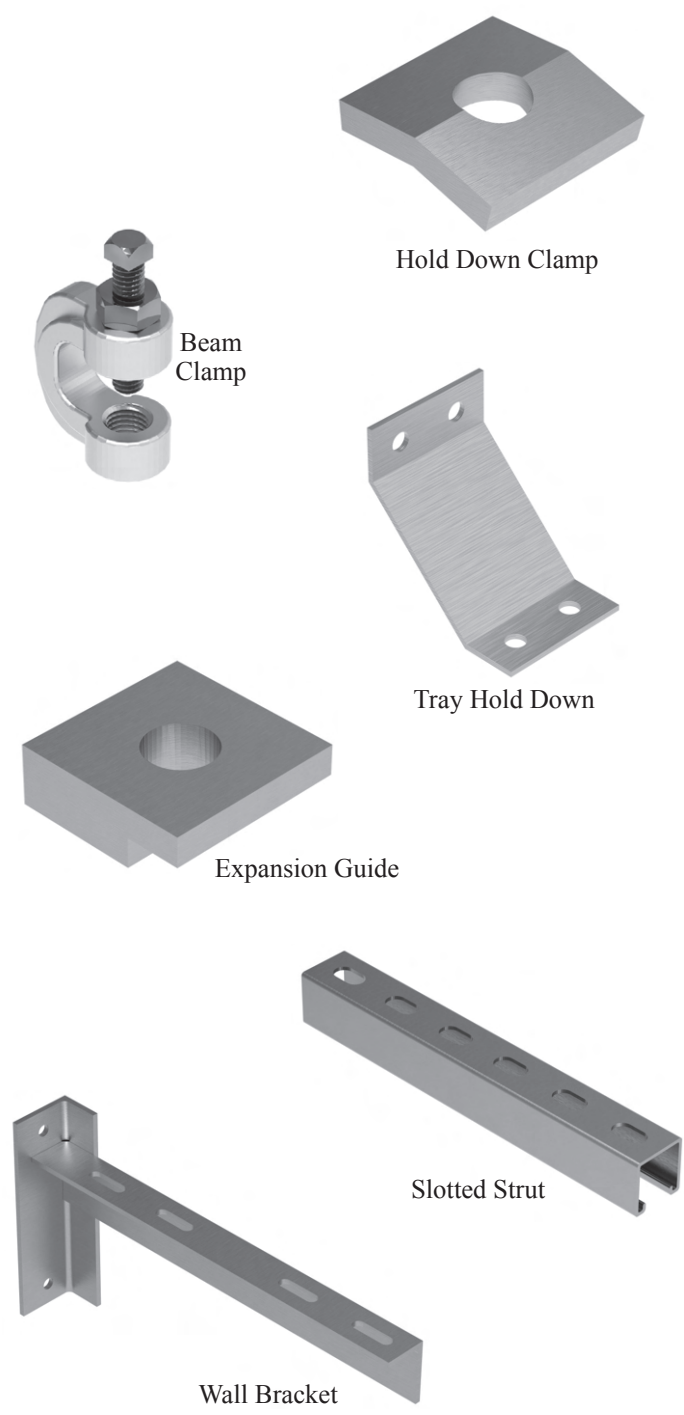


**Bottom Splices for Ventilated or Solid bottom**

Finger splices are used to cover gaps between sections of ventilated trough or solid bottom trays and to prevent bottom edges from damaging cables as they cross the joints. These are especially useful on trays with flat solid bottoms or flat sheets mounted on top of rungs. Simply drop them in between tray bottoms and bend the fingers underneath in opposite directions to secure in place. Insert the tray width for "W".

Catalog No.	Material
<b>ASP-"W"</b>	Aluminum
<b>SSP-"W"</b>	Mill Galvanized





# I-BEAM HOLD DOWNS & SUPPORT MATERIAL

*Manufactured & Tested In  
Accordance With NEMA VE-1*

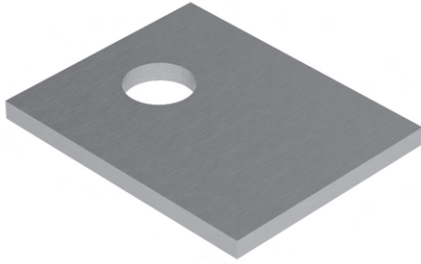
*Classified By UL As An Equipment  
Grounding Conductor*

Table of Contents	Page
Hold Down/Exp Clamps	132 - 133
Nylon Insulating Pads	134
Tray Hangers	135 - 137
Threaded Rod & Couplings	138
Beam Clamps	139 - 141
Z-Brackets & Angles	142 - 144
Aluminum Wall Brackets	145 - 146
Steel Wall Brackets	147 - 149
Strut & Hardware	150 - 151
C-Port Roof Blocks	152 - 156



# mphusky

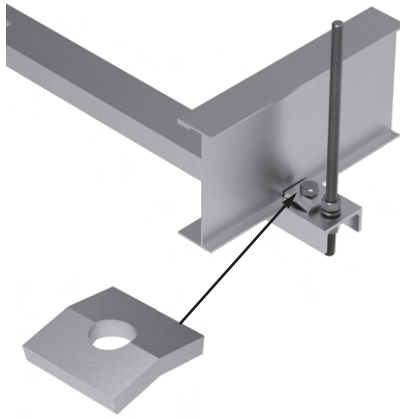
## HOLD DOWNS

***Single Hold Down Clips for I-Beam***

This clip is used to fasten all Husky ladder-style trays to a support using the inside flange of the tray. Hardware is not included. Sold as each. See NEMA VE-2 for information on installation.

Dimensions: 1-7/8" L x 1-1/2" W x 1/8" (11GA) Thick

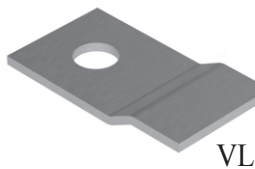
Hardware	Alum	Zinc-Plated	HDGAF	316 SS
3/8"	AHDC-V	SHDC-V	GHDC-V	6HDC-V
1/2"	AHDC-V-1/2	SHDC-V-1/2	GHDC-V-1/2	6HDC-V-1/2

***Single Hold Down Clamp for I-Beam***

This clamp holds Husky I-Beam trays securely to a lower support channel or bracket using the outside flange of the tray. Uses 1/2" hardware, not included. See NEMA VE-2 for information on installation. Sold as each. See Detail "E" in Details on page 160.

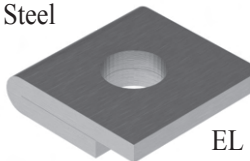
Dimensions: 1-1/2" L x 1-1/2" W x 1/4" Thick

Hardware	Alum	Zinc-Plated	HDGAF	316 SS
1/2"	AHDC-A	SHDC-A	GHDC-A	6HDC-A



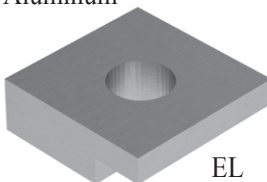
VL

Steel



EL

Aluminum



EL

***Expansion Guides for I-Beam Trays***

Expansion guides are used to secure I-Beam trays, while guiding the tray's movement during thermal expansion. For expansion guide recommendations, please refer to NEMA VE-2. Uses 1/2" hardware which is not included. Sold as each.

See Detail "B" in Details on page 158.

Dimensions:

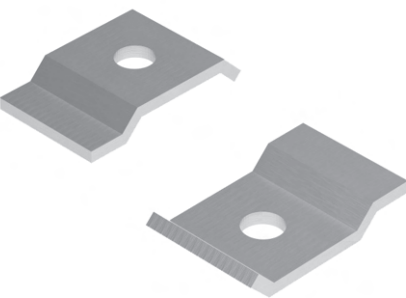
VL: 2-27/32" L x 1-1/2" W x 1/8" Thick

EL (Aluminum): 1-1/2" L x 1-1/2" W x 1/2" Thick

EL (Steel): 1-1/2" L x 1-1/2" W x 3/8" Thick

Hardware	Alum	Zinc-Plated	HDGAF	316 SS
1/2"	AEXG-VL	SEXG-VL	GEXG-VL	6EXG-VL
1/2"	AEXG-EL	SEXG-EL	GEXG-EL	6EXG-EL

## HOLD DOWNS



Hold Down

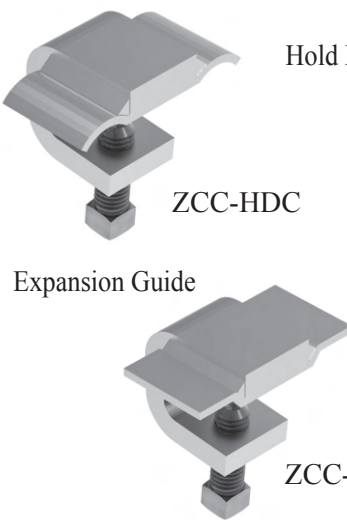
Expansion Guide

***Hold Downs / Expansion Guides For I-Beam***

These heavy duty combination hold down clamps/expansion guides can be used in one orientation as a hold down clamp and flipped upside down to use as an expansion guide, eliminating the need to determine the exact number needed of each type before ordering. Designed for use on the outside flange of the tray. See NEMA VE-2 for information on installation. Uses 1/2" hardware, not included. See Detail "F" in Details on page 160.

Dimensions: 3-1/16" L x 1-3/4" W x 7 GA

All I-Beam Tray	Alum	Zinc-Plated	HDGAF	316 SS
Hold Down/Expansion	AHDEC	SHDEC	GHDEC	6HDEC



Hold Down

ZCC-HDC

Expansion Guide

ZCC-EXC

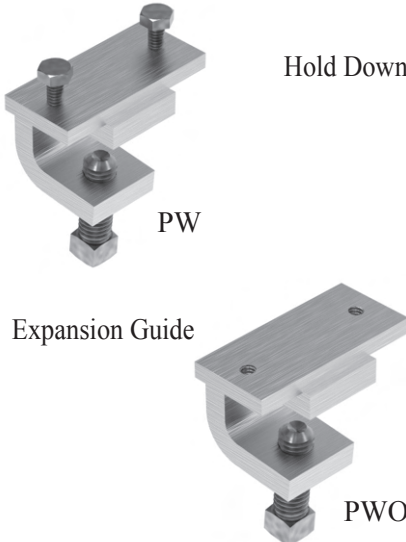
***Hold Downs / Expansion Guides For I-Beam***

These special heavy duty tray hold down clamps and expansion guides are ideal for fastening trays to C-channels and beams such as those found on bridges. They are easy to install and reduce field labor costs since the beam clamp set screw eliminates the need to drill the C-channel or beam. Designed for use on the outside flange of the tray.

See NEMA VE-2 for information on installation.

For beams up to 1" thick.  
( )=Blank for standard Zinc-Plated Hardware, (-6S) for 16 Stainless Steel

All I-Beam Tray	Zinc-Plated	HDGAF	316 SS
Hold Down Clamp	ZCC-HDC( )	GCC-HDC( )	6CC-HDC
Expansion Guide	ZCC-EXC( )	GCC-EXC( )	6CC-EXC



Hold Down

PW

Expansion Guide

PWO

***Hold Downs / Expansion Guides For I-Beam***

These special heavy duty tray hold down clamps and expansion guides are ideal for fastening trays to C-channels and beams such as those found on bridges. They are easy to install and reduce field labor costs since the beam clamp set screw eliminates the need to drill the C-channel or beam. Designed for use on the outside flange of the tray.

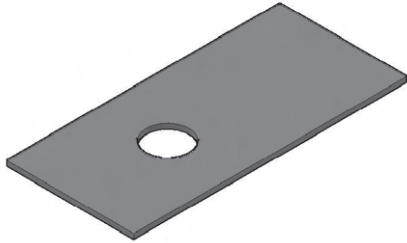
See NEMA VE-2 for information on installation.

For beams up to 1" thick.  
( )=Blank for standard Zinc-Plated Hardware, (-6S) for 16 Stainless Steel

All I-Beam Tray	Zinc-Plated	HDGAF	316SS
Hold Down Clamp	HP-514A-PW( )	GHP-514A-PW( )	6HP-514A-PW
Expansion Guide	HP-514A-PWO( )	GHP-514A-PWO( )	6HP-514A-PWO



## HOLD DOWNS

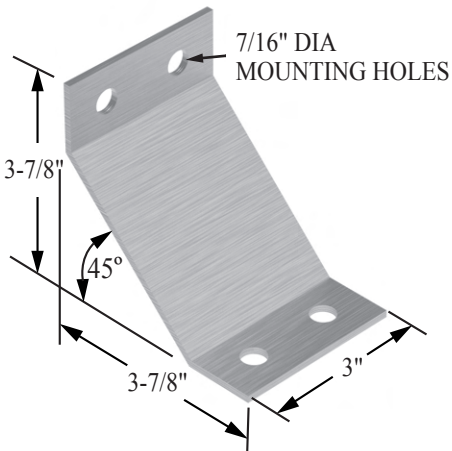
***Nylon Insulating Pads***

These nylon insulating pads are used under trays and hold down clamps or expansion guides to separate dissimilar metals and prevent corrosion. They are often used on steel supports to isolate an aluminum tray from sitting on the steel support. They also provide a smooth surface for trays to slide on during expansion and contraction. Uses 1/2" hardware, which is not included. Sold as each.

Dimensions: 1-5/8" Wide x 3-1/2" Long x 1/16" Thick  
9/16" Diameter Hole Center 1-1/4" from End

Catalog No.

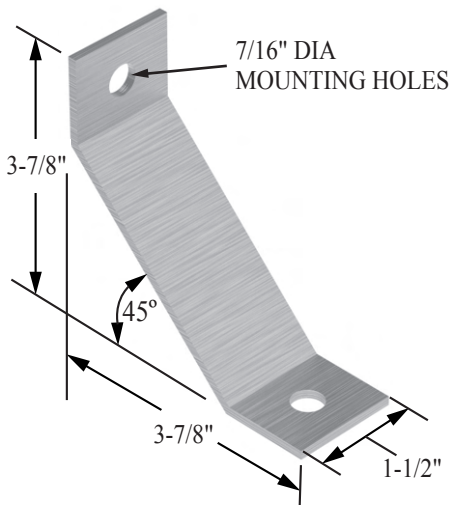
INSL-VE

***Heavy Duty Hold Down Clamps***

These 3" wide heavy duty hold down clamps can be used to secure tray to supports in horizontal runs or to secure trays running vertically to wall supports or other trays. Mounting requires drilling the tray side rail. Sold as each.

3/8" hardware to mount clamp to tray is included.

Alum	Mill Galv	HDGAF	316 SS
AHDC-HV()	SHDC-HV()	GHDC-HV()	6HDC-HV

***Heavy Duty Hold Down Clamps***

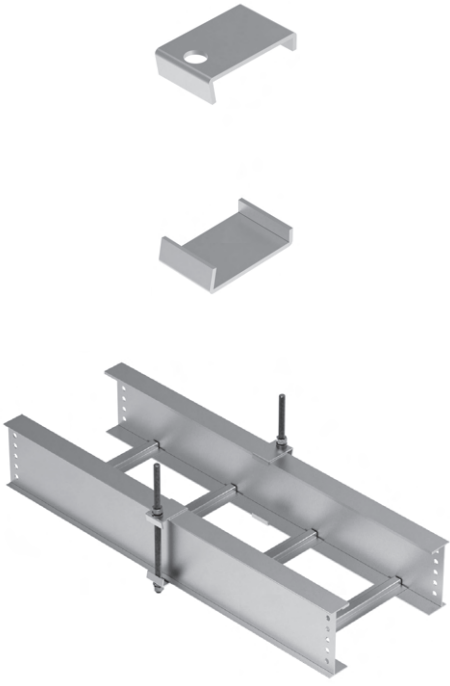
These 1-1/2" wide heavy duty hold down clamps can be used to secure tray to supports in horizontal runs or to secure trays running vertically to wall supports or other trays. Mounting requires drilling the tray side rail. Sold as each.

3/8" hardware to mount clamp to tray is included.

Alum	Mill Galv	HDGAF	316 SS
AHDC-HV2()	SHDC-HV2()	GHDC-HV2()	6HDC-HV2

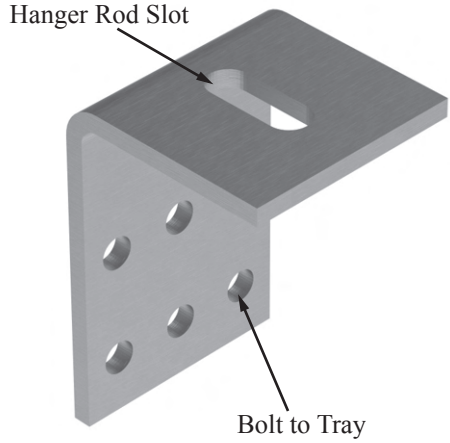
() = Blank for standard Zinc-Plated Hardware, Insert (-6S) for 316 Stainless Steel Hardware, (-SB) for Silicon Bronze Hardware.

## HANGERS



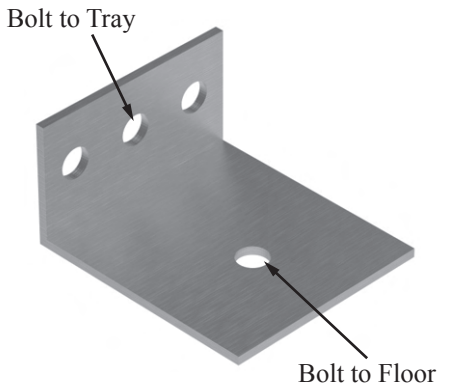
***I-Beam Tray Hanger Clips***  
The tray hanger clip sets are used to hang an I-Beam tray (*Except I6 & I8*) by the side rails eliminating the need for a trapeze support. Includes top and bottom clamps. Use with 1/2" hanger rod only. Hanger rod, washers, and hex nuts need to be purchased separately. One set for one rail. See Detail "G" in Details on page 161.

Tray Type	Zinc-Plated	HDGAF	316 SS
IJA & IJB	SHC-IJA	GHC-IJA	6HC-IJA
IJC, & IJD	SHC-IJC	GHC-IJC	6HC-IJC
IYA, IYB & IYC	SHC-IYC	GHC-IYC	6HC-IYC
IJC5, IYB5 & IYC5	SHC-IYC5	GHC-IYC5	6HC-IYC5
IMB, IMC, IMD, IXA, IXB, IXC & IXD	SHC-IXB	GHC-IXB	6HC-IXB
IMC7, IXC7 & IXD7	SHC-IXD7	GHC-IXD7	6HC-IXD7



***Vertical Hangers for Tray***  
Vertical hangers support single-type vertical ladders or troughs from 1/2" hanger rods. The unit is generally used to splice the vertical tray and the vertical outside 90 degree bend or vertical support elbow together. The splice hardware is included. Hanger rod not included. See Detail "O" in Details on page 153.

Tray Type	HDGAF	316 SS
All tray ( <i>Except I6 &amp; I8</i> )	SH-VU( )	6SH-VU
I6	SH-VU-I6( )	6SH-VU-I6
I8	SH-VU-I8( )	6SH-VU-I8

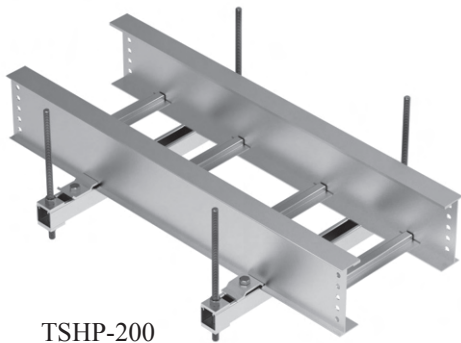


***Structural Connector For Ladder and Trough***  
Structural connectors terminate ladder or trough on top of concrete floors or can be used to fasten to walls or cabinets. The splice hardware is included, however the 1/2" hardware to mount to the floor is not included. See Detail "J" in Details on page 162.

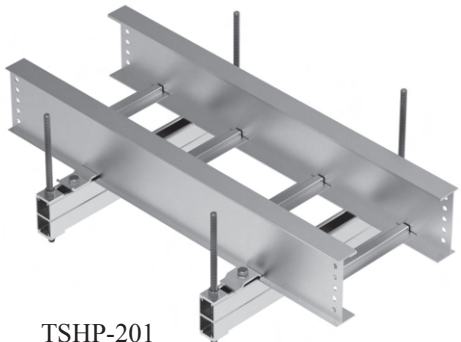
Tray Type	Aluminum	HDGAF	316 SS
All trays	ASC-U( )	SSC-U( )	6SC-U

( ) = Blank for standard Zinc-Plated Hardware, Insert (-6S) for 316 Stainless Steel Hardware, (-SB) for Silicon Bronze Hardware.

## TRAPEZE SUPPORTS



TSHP-200

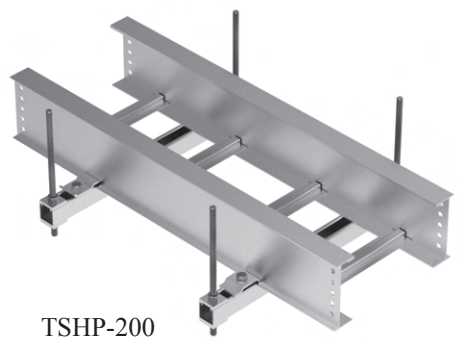


TSHP-201

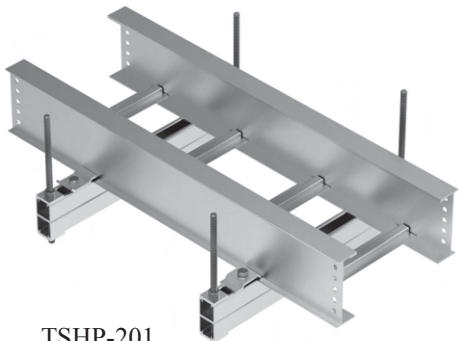
**Trapeze Support Kits (Except I6 & I8) (Mill Galv Strut)**

These trapeze support kits include all the hardware required to attach I-Beam trays (*Except I6 & I8*) to 1/2" hanger rods. Included with each kit is the strut, hold down clips with spring nuts, bolts, washers, and nuts needed to attach to threaded rod (*hanger rod is not included*). There is also an option to use double strut, which is two pieces of strut welded back to back for additional strength.

Single Strut (Except I6 & I8)	Double Strut (Except I6 & I8)	Trapeze Length
TSHP200-6-2()	TSHP201-6-2()	16"
TSHP200-9-2()	TSHP201-9-2()	20"
TSHP200-12-2()	TSHP201-12-2()	22"
TSHP200-18-2()	TSHP201-18-2()	28"
TSHP200-24-2()	TSHP201-24-2()	34"
TSHP200-30-2()	TSHP201-30-2()	40"
TSHP200-36-2()	TSHP201-36-2()	46"
TSHP200-42-2()	TSHP201-42-2()	52"
TSHP200-48-2()	TSHP201-48-2()	58"



TSHP-200



TSHP-201

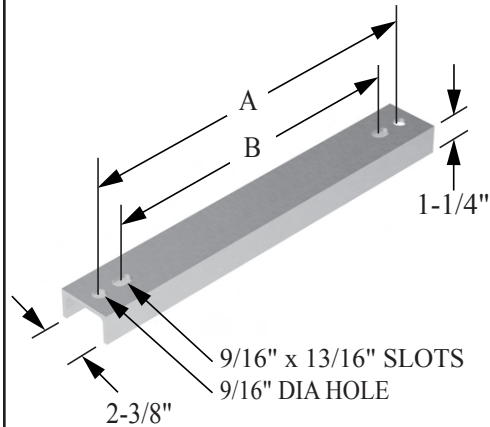
**Trapeze Support Kits (I6 & I8 Only) (Mill Galv Strut)**

These trapeze support kits include all the hardware required to attach I6 & I8 I-Beam trays to 1/2" hanger rods. Included with each kit is the strut, hold down clips with spring nuts, bolts, washers, and nuts needed to attach to threaded rod (*hanger rod is not included*). There is also an option to use double strut, which is two pieces of strut welded back to back for additional strength.

Single Strut (I6 & I8)	Double Strut (I6 & I8)	Trapeze Length
TSHP200-9-3()	TSHP201-9-3()	22"
TSHP200-12-3()	TSHP201-12-3()	24"
TSHP200-18-3()	TSHP201-18-3()	30"
TSHP200-24-3()	TSHP201-24-3()	36"
TSHP200-30-3()	TSHP201-30-3()	42"
TSHP200-36-3()	TSHP201-36-3()	48"
TSHP200-42-3()	TSHP201-42-3()	54"
TSHP200-48-3()	TSHP201-48-3()	60"

() = Blank for standard Zinc-Plated Hardware, Insert (-6S) for 316 Stainless Steel Hardware, (-SB) for Silicon Bronze Hardware.

## TRAPEZE SUPPORTS

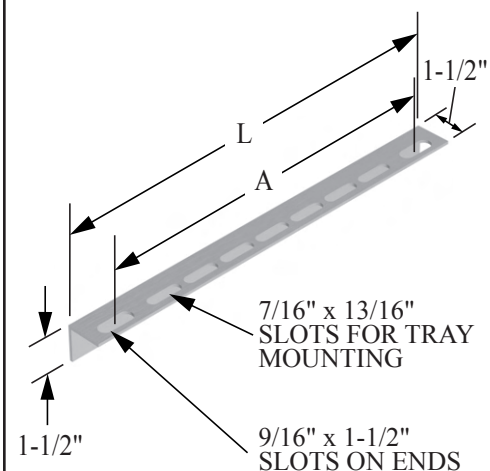


### ***Trapeze Support Channels***

Channels are used with hanger rods (*not included*) to support I-Beam-style trays where hanger clips cannot be utilized.

See Details "A" and "B" in Details on page 158.

Tray Width	A	B	Alum	HDGAF	316 SS
6"	11.625"	7.875"	ASC-6	SSC-6	6SC-6
9"	14.625"	10.875"	ASC-9	SSC-9	6SC-9
12"	17.625"	13.875"	ASC-12	SSC-12	6SC-12
18"	23.625"	19.875"	ASC-18	SSC-18	6SC-18
24"	29.625"	25.875"	ASC-24	SSC-24	6SC-24
30"	35.625"	31.875"	ASC-30	SSC-30	6SC-30
36"	41.625"	37.875"	ASC-36	SSC-36	6SC-36



### ***Trapeze Support Angles***

These trapeze support angles are 1-1/2" x 1-1/2" x 1/8" thick continuous slotted steel and can be used to support I-Beam ladder or trough with 1/2" diameter hanger rods. Hanger rod is not included.

#### **Maximum allowable load:**

Will safely support any loaded tray of the designated width within the load limits of the 1/2" diameter hanger rod.

Tray Width	L	A	HDGAF
6"	11.5"	9"	STSA-6
9"	14.5"	12"	STSA-9
12"	17.5"	15"	STSA-12
18"	23.5"	21"	STSA-18
24"	29.5"	27"	STSA-24
30"	35.5"	33"	STSA-30
36"	41.5"	39"	STSA-36

## HANGER ROD

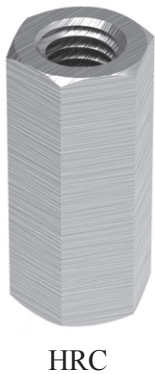
**Hanger Rods**

1/2" diameter, 13 threads per inch, hanger rods can be used with all tray support channels, angles, and support hanger clips. They have continuous threads and are furnished with four (N-12) nuts, two (W-9) lock washers and two (W-12) flat washers.

**Maximum allowable load:**

Use for design, 1100 pounds, in combination with all standard suspension fittings, hanger clips, and couplings normally used.

Item	Zinc-Plated	316 SS
10' - 0" Hanger Rod	<b>HR-120G()</b>	<b>6HR-120G</b>
5' - 0" Hanger Rod	<b>HR-60G()</b>	<b>6HR-60G</b>
2' - 6" Hanger Rod	<b>HR-30G()</b>	<b>6HR-30G</b>
Extra 1/2" Hex Nuts	<b>N-12</b>	<b>N-45</b>
Extra 1/2" Lock Washers	<b>W-9</b>	<b>W-36</b>
Extra 1/2" Flat Washers	<b>W-12</b>	<b>W-35</b>

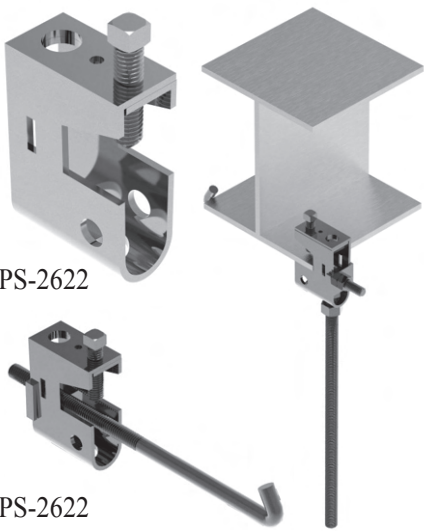
**Hanger Rod Couplings**

Couplings are used to connect hanger rods when lengths of more than 120" are encountered or to connect hanger rods between trays that are hung one over the other. They also reduce field labor cost by extending new or existing hanger rods to support additional trays.

Item	Zinc-Plated	316 SS
1/2" Steel without Window	<b>HRC</b>	<b>6HRC</b>
1/2" Malleable Iron with Window	<b>HRC-G</b>	—————

() = Blank for standard Zinc-Plated Hardware, Insert (-6S) for 316 Stainless Steel Hardware, (-SB) for Silicon Bronze Hardware.

BEAM CLAMPS



PS-2622

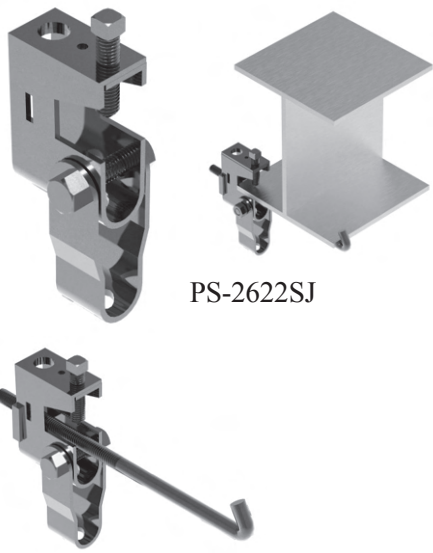
PS-2622

***I-Beam Clamp***

This wide-flanged clamp is furnished with a hook bolt in lengths to accommodate 6" through 12" beams up to 3/4" thick. For 1/2" hanger rod.

**Maximum allowable load:**  
300 lbs.

Item	Zinc-Plated	316 SS
Clamp Only	PS-2622	6PS-2622
<b>Clamp with Hook Bolt</b>		
Less than 6"	PS-2622-6	6PS-2622-6
6" - 10"	PS-2622-10	6PS-2622-10
10" - 12"	PS-2622-12	6PS-2622-12



PS-2622SJ


PS-2622SJ

***I-Beam Clamp with Swivel***

This beam clamp is furnished with a swivel clevis and hook bolt in lengths to accommodate 6" trough 12" beams up to 3/4" thick. For 1/2" hanger rod.

**Maximum allowable load:**  
300 lbs.

Item	Zinc-Plated	316 SS
Clamp Only with Swivel	PS-2622SJ	6PS-2622SJ
<b>Clamp with Hook Bolt &amp; Swivel</b>		
Less than 6"	PS-2622SJ-6	6PS-2622SJ-6
6" - 10"	PS-2622SJ-10	6PS-2622SJ-10
10" - 12"	PS-2622SJ-12	6PS-2622SJ-12



***Beam C-Clamps***

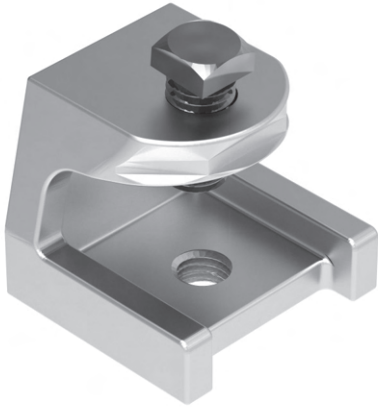
C-clamp beam clamps allow for the direct support of 1/2" hanger rods on I-Beams, wide-flange beam sections and angles. For beam thickness up to 3/4". Supplied in unfinished iron.

**Maximum allowable load:**  
400 lbs.

Catalog Number
GC



## BEAM CLAMPS

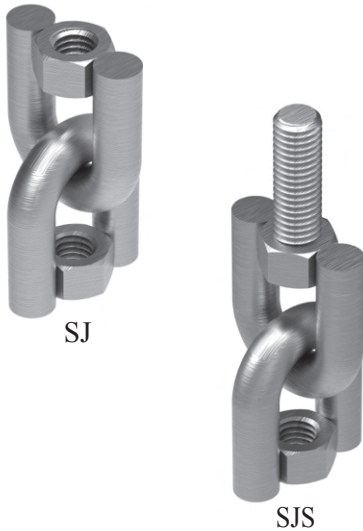
**Beam Clamps**

Beam clamps are heavy duty and have 1/2" holes to attach hanger rods to a beam flange or to support channels. Furnished in unfinished iron.

**Maximum allowable load:**

1000 lbs.

Flange Thickness	Catalog No.
7/8"	SC-503
2"	SC-508

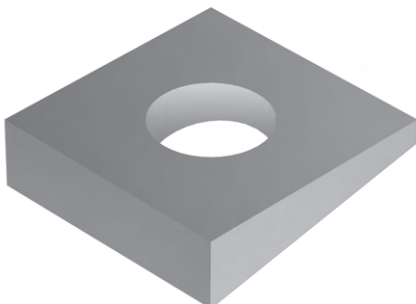
**Swivel Joints**

Swivel joints allow 1/2" hanger rods to swing from an inclined clamp. They are furnished with or without a 1" long stud assembly. The stud style can be mounted directly to a support angle.

**Maximum allowable load:**

1500 lbs.

Item	Zinc-Plated	316 SS
Swivel Joint Only	SJ	6SJ
Swivel Joint with Stud	SJS	6SJS

**Bevel Washers**

The bevel washer is used when mounting to beams or channels to make a level bolting surface. The standard size is 1-1/4" square with a 1/2" bevel and a 9/16" hole for 1/2" hardware. Bolt and nut not included.

Catalog Number
W-11

BEAM CLAMPS



**Channel Clamps**

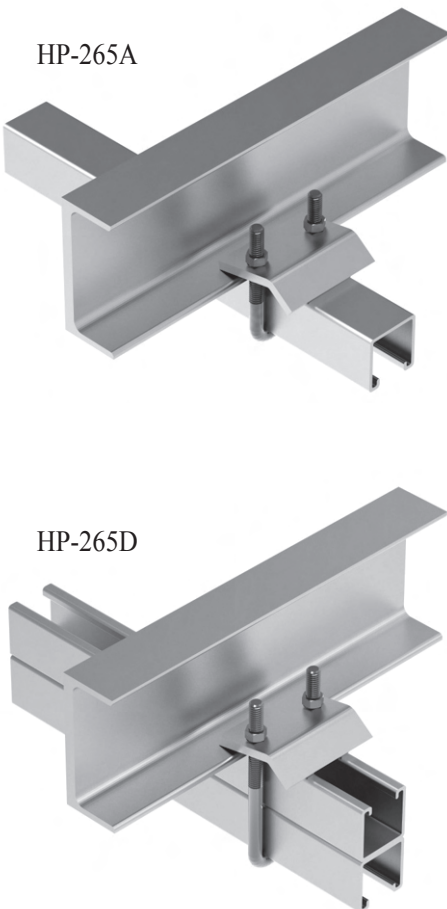
Channel clamp assemblies can be used on all American standard channels with a flange width of 3-1/4" or less. They are furnished for use with 1/2" diameter hanger rods in Zinc-Plated steel with or without a swivel joint.

Hanger rod not included.

**Maximum allowable load:**

500 lbs. with a safety factor of 5

Item	Zinc-Plated
Clamp Only	<b>HP-177</b>
Clamp with Swivel Joint	<b>HP-177-SJ</b>



**HP Channel Clamps**

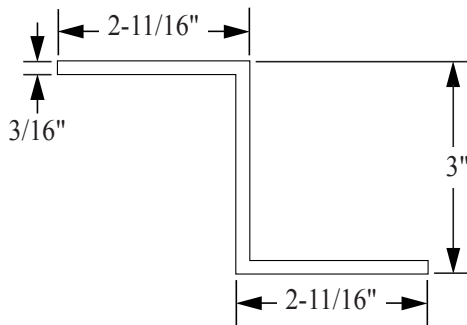
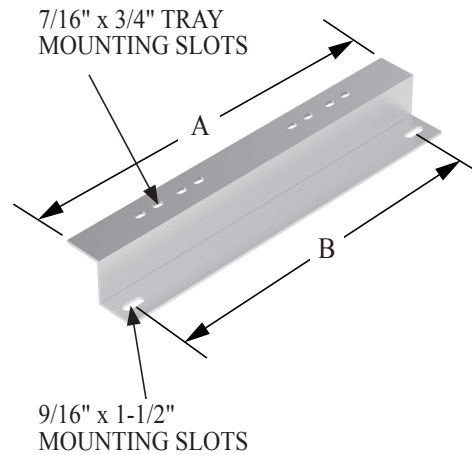
HP single and back-to-back strut type support channels are attached to structural beams with a 0.8" maximum flange thickness. Clamps are furnished with the required hardware.

**Maximum allowable load:**

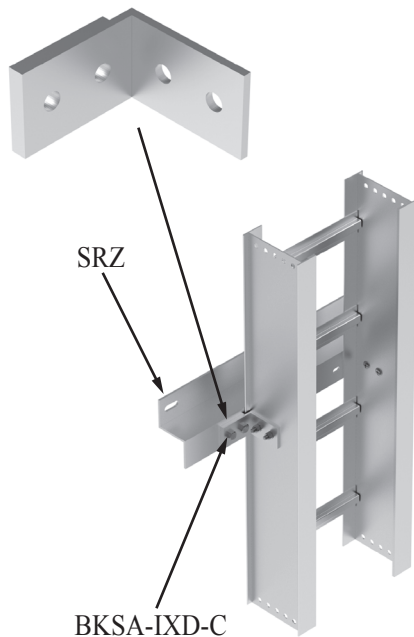
1,275 lbs. with a safety factor of 5

Channel Type	Zinc-Plated
HP-200 Single Strut	<b>HP-265A</b>
HP-201 Double Strut	<b>HP-265D</b>

## Z-BRACKETS



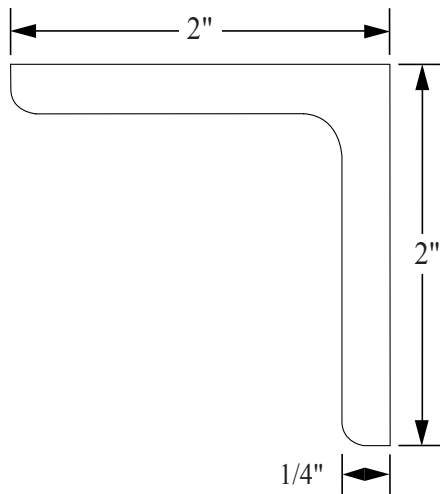
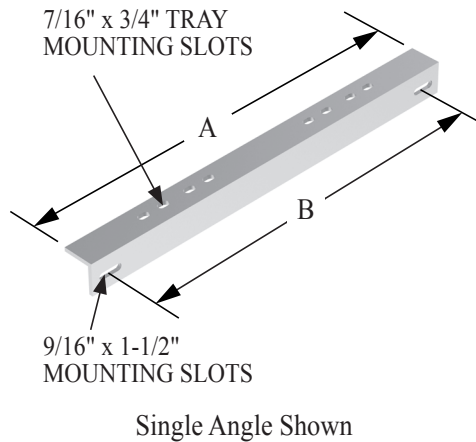
Cross Section

**Z-Brackets**

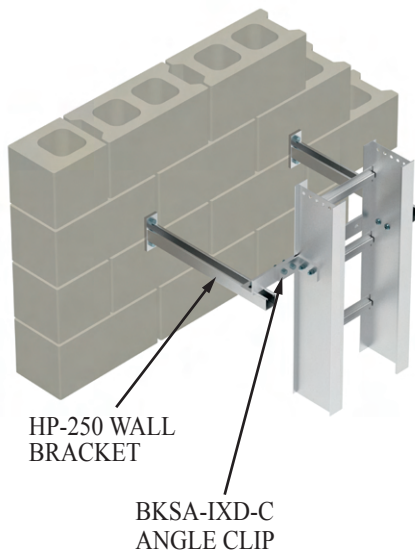
Z-brackets support vertical runs of tray at a distance of 3" from the wall. They have a slot pattern similar to bracket angles and are made from standard 7 gauge Z-shaped HDGAF steel. Hardware is not included. See Detail "H" in Details on page 161.

Tray Width	A	B	HDGAF
Single Z-Bracket			
6"	18"	15.5"	<b>SRZ-6</b>
9"	23"	20.5"	<b>SRZ-9</b>
12"	26"	23.5"	<b>SRZ-12</b>
18"	32"	29.5"	<b>SRZ-18</b>
24"	38"	35.5"	<b>SRZ-24</b>
30"	44"	41.5"	<b>SRZ-30</b>
Double Z-Bracket For Two Trays Side-By-Side			
6" & 6"	34"	31.5"	<b>DRZ-6</b>
9" & 9"	40"	37.5"	<b>DRZ-9</b>
12" & 12"	46"	43.5"	<b>DRZ-12</b>
18" & 18"	58"	55.5"	<b>DRZ-18</b>
24" & 24"	70"	67.5"	<b>DRZ-24</b>
30" & 30"	82"	79.5"	<b>DRZ-30</b>
Double Z-Bracket For U-Type Support Angle Clips			
6" & 6"	28"	25.5"	<b>DDZ-6</b>
9" & 9"	36"	31.5"	<b>DDZ-9</b>
12" & 12"	40"	37.5"	<b>DDZ-12</b>
18" & 18"	52"	49.5"	<b>DDZ-18</b>
24" & 24"	64"	61.5"	<b>DDZ-24</b>
30" & 30"	76"	73.5"	<b>DDZ-30</b>

## BRACKET ANGLES



Cross Section



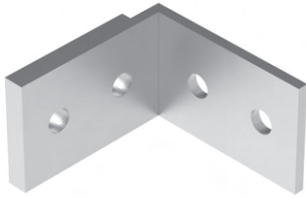
SRSA Support Angle

### Bracket Angles

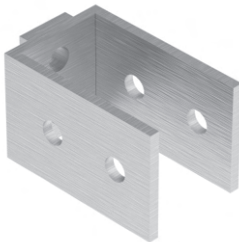
Bracket angles connect two wall brackets, which then serve as a support for vertical runs. Cable trays are then bolted to the bracket angles with support angle clips. Bracket angles have a series of bolt slots to allow the attachment of various types of tray of the same width to the same bracket angle. Fabricated from HDGAF steel. Hardware is not included. See Detail "T" in Details on page 162.

Tray Width	A	B	HDGAF
Single Bracket Angles			
6"	18"	15.5"	SRSA-6
9"	23"	20.5"	SRSA-9
12"	26"	23.5"	SRSA-12
18"	32"	29.5"	SRSA-18
24"	38"	35.5"	SRSA-24
30"	44"	41.5"	SRSA-30
Double Bracket Angles For Two Trays Side-By-Side			
6" & 6"	34"	31.5"	DRSA-6
9" & 9"	40"	37.5"	DRSA-9
12" & 12"	46"	43.5"	DRSA-12
18" & 18"	58"	55.5"	DRSA-18
24" & 24"	60"	67.5"	DRSA-24
30" & 30"	82"	79.5"	DRSA-30
Double Bracket Angles For U-Type Support Angle Clip			
6" & 6"	28"	25.5"	DDSA-6
9" & 9"	34"	31.5"	DDSA-9
12" & 12"	40"	37.5"	DDSA-12
18" & 18"	52"	49.5"	DDSA-18
24" & 24"	64"	61.5"	DDSA-24
30" & 30"	76"	73.5"	DDSA-30

## BRACKETS



BKSA-IXD-C



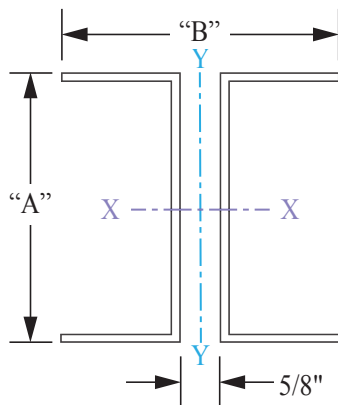
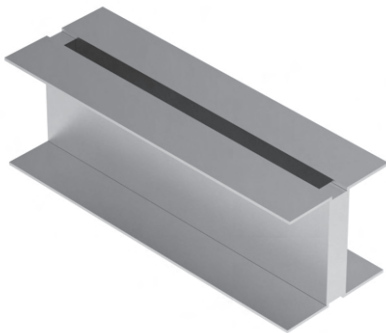
BKSA-IXD-DC

**Support Angle Clips**

Support angle clips fasten a cable tray to a bracket angle or Z-bracket. They come in single or double configurations ("L" or "U") and are furnished with the required hardware to mount to tray ONLY.

See Details "H" and "I" in Details on pages 161 and 162.

Item	HDGAF	316 SS
Single Angle Clip (L-Type)	<b>BKSA-IXD-C()</b>	<b>6BKSA-IXD-C</b>
Double Angle Clip (U-Type)	<b>BKSA-IXD-DC()</b>	<b>6BKSA-IXD-DC</b>

**Spanner Channels**

Four inch spanner channels are designed to span between beams up to 10 feet apart and give direct support for 1/2" hanger rods from structural steel.

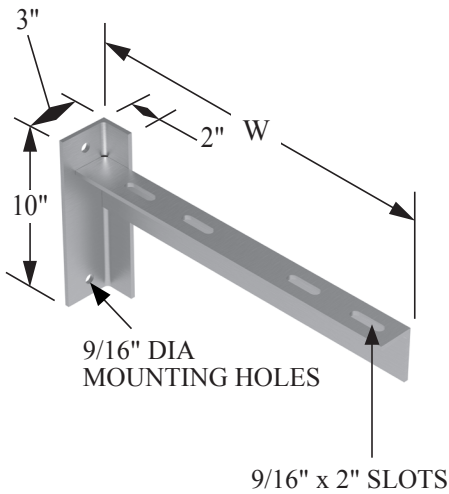
() Insert length in inches.

Item	Catalog Number
Unfinished Steel	<b>HP-904-()</b>
HDGAF Steel	<b>HP-904-()-G</b>

A (in)	B (in)	Area (in)	Wt/Ft (lbs)	X-Axis			Y-Axis		
				I-in <sup>4</sup>	S-in <sup>3</sup>	R-in	I-in <sup>4</sup>	S-in <sup>3</sup>	R-in
4	4.125	1.53	5.20	3.74	1.870	1.563	1.165	0.565	0.872

() = Blank for standard Zinc-Plated Hardware, Insert (-6S) for 316 Stainless Steel Hardware, (-SB) for Silicon Bronze Hardware.

WALL BRACKETS



**Aluminum Wall Brackets (not for AHDEC/SHDEC Style Clamps)**

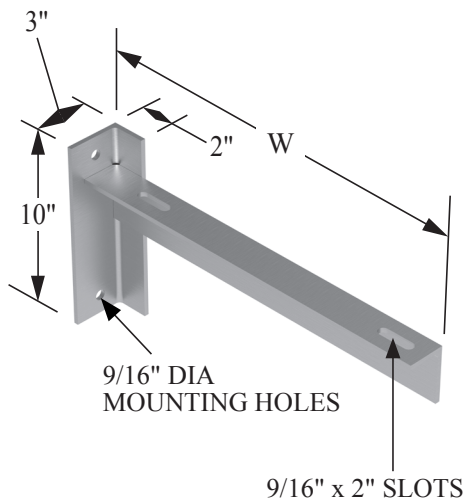
Aluminum universal wall brackets can be placed one bracket below another allowing a minimum vertical spacing of cable trays of 10". Hold down clips must be purchased separately. Not for use with "AHDEC/SHDEC" style hold down clamps. These aluminum wall brackets can be shipped quicker than the galvanized steel brackets.

**Maximum allowable load:**

Load applied at two points: 800 lbs. per bracket (2.0 safety factor)

Load applied at end of bracket: 400 lbs. per bracket (2.0 safety factor)

Tray Width	W	Catalog No.
6"	14.375"	AWBK-6-U2
9"	17.375"	AWBK-9-U2
12"	20.375"	AWBK-12-U2
18"	26.375"	AWBK-18-U2
24"	32.375"	AWBK-24-U2
30"	38.375"	AWBK-30-U2
36"	44.375"	AWBK-36-U2



**Aluminum Wall Brackets (for AHDEC/SHDEC Style Clamps)**

Aluminum universal wall brackets can be placed one bracket below another allowing a minimum vertical spacing of cable trays of 10". Hold down clips must be purchased separately. For use with "AHDEC/SHDEC" style hold down clamps. These aluminum wall brackets can be shipped quicker than the galvanized steel brackets.

**Maximum allowable load:**

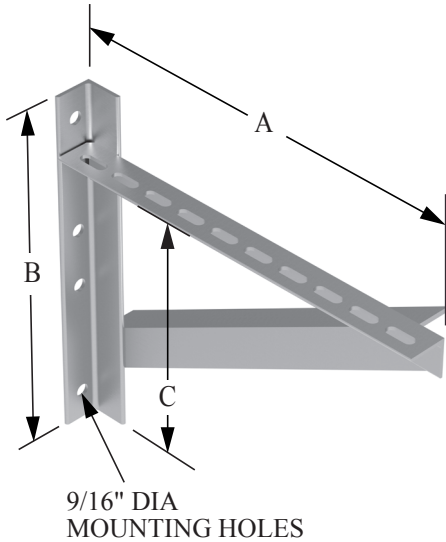
Load applied at two points: 800 lbs. per bracket (2.0 safety factor)

Load applied at end of bracket: 400 lbs. per bracket (2.0 safety factor)

Tray Width	W	Catalog No.
6"	14.625"	AWBK-6-SHDEC
9"	17.625"	AWBK-9-SHDEC
12"	20.625"	AWBK-12-SHDEC
18"	26.625"	AWBK-18-SHDEC
24"	32.625"	AWBK-24-SHDEC
30"	38.625"	AWBK-30-SHDEC
36"	40.625"	AWBK-36-SHDEC



## WALL BRACKETS

**Aluminum Medium-Weight Wall Brackets**

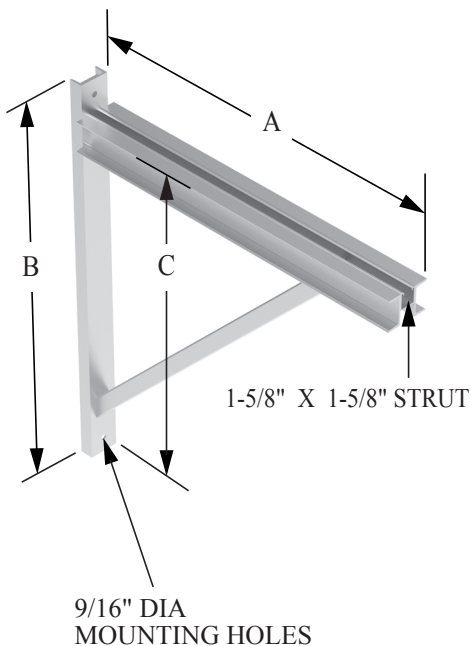
Medium weight aluminum wall brackets are used primarily to support two ladders side-by-side or one tray over the other. Mounting slots are 9/16" x 1-1/2" and are spaced on 2" centers. Hold down clips must be purchased separately. These aluminum wall brackets can be shipped quicker than the galvanized steel brackets.

**Maximum allowable load:**

Load applied at two points: 900 lbs. per bracket (2.0 safety factor)

Load applied at end of bracket: 450 lbs. per bracket (2.0 safety factor)

Type	A	B	C	Catalog No.
21"	21"	18"	15"	<b>AWBK-21M</b>
30"	31"	21"	18"	<b>AWBK-30M</b>
39"	39"	26"	23"	<b>AWBK-39M</b>

**Aluminum Heavy-Weight Wall Brackets**

Heavy weight aluminum wall brackets are used to support long spans or multiple ladder or trough installations that exceed the load capacity of ordinary brackets. These are welded from structural aluminum channels with a stiffening member and 1-5/8" x 1-5/8" aluminum strut channel between the C-channels. The strut makes it easy to fasten the tray anywhere along the length of the bracket with spring nuts, hold down clips, and bolts that are not included. To develop the full strength of the bracket, (3) 1/2" diameter bolts must be used to mount the wall bracket. These aluminum wall brackets can be shipped quicker than the galvanized steel brackets.

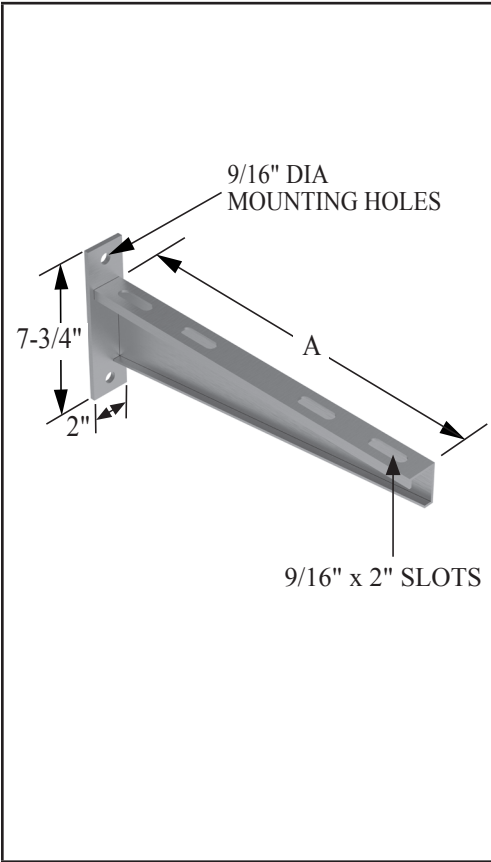
**Maximum allowable load:**

Load applied at two points: 1,000 lbs. per bracket (2.0 safety factor)

Load applied at end of bracket: 500 lbs. per bracket (2.0 safety factor)

Type	A	B	C	Catalog No.
21"	21"	18"	15"	<b>AWBK-21C</b>
30"	31"	21"	18"	<b>AWBK-30C</b>
36"	36"	39"	33"	<b>AWBK-36C</b>

WALL BRACKETS

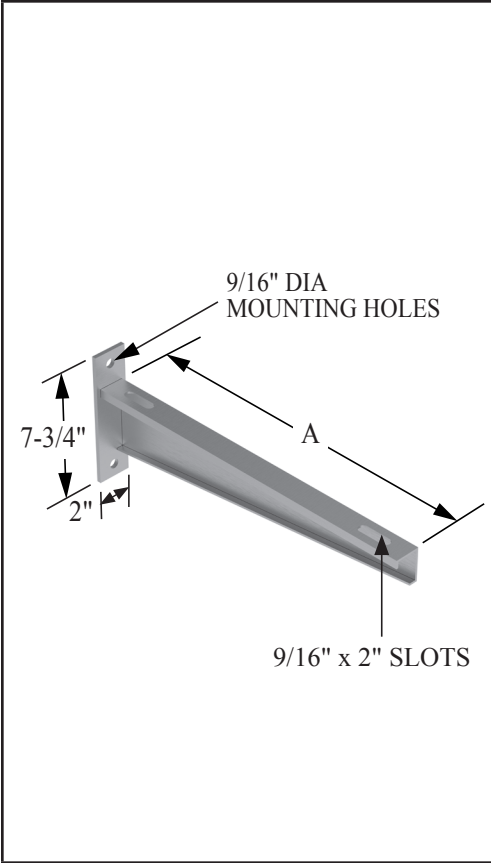


**Universal Wall Brackets (not for AHDEC/SHDEC Style Clamps)**

Light duty brackets are made from 1/8" thick hot dip galvanized steel. Placing one bracket below another allows a minimum vertical spacing of cable trays of 8". For use with all hold down clips and expansion guides except the "AHDEC/SHDEC" style. Hold down clamps must be purchased separately.

**Maximum allowable load:**  
Load applied at two points: 600 lbs.  
Load applied at end of bracket: 300 lbs.

Tray Width	A	Catalog No.
6"	12.750"	WBK-6-U
9"	15.750"	WBK-9-U
12"	18.750"	WBK-12-U
18"	24.750"	WBK-24-U
24"	30.750"	WBK-30-U



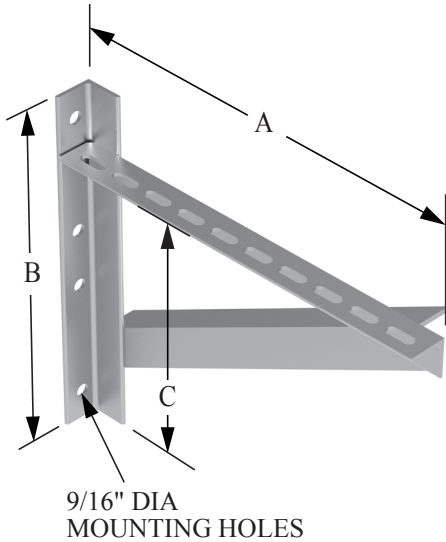
**Universal Wall Brackets (for AHDEC/SHDEC Style Clamps)**

Light duty brackets are made from 1/8" thick hot dip galvanized steel. Placing one bracket below another allows a minimum vertical spacing of cable trays of 8". For use with "AHDEC/SHDEC" style hold down clamps/expansion guides. Hold down clamps must be purchased separately.

**Maximum allowable load:**  
Load applied at two points: 600 lbs.  
Load applied at end of bracket: 300 lbs.

Tray Width	A	Catalog No.
6"	14.625"	WBK-6-SHDEC
9"	17.625"	WBK-9-SHDEC
12"	20.625"	WBK-12-SHDEC
18"	26.625"	WBK-18-SHDEC
24"	32.625"	WBK-24-SHDEC

## WALL BRACKETS

**Medium-Weight Wall Brackets**

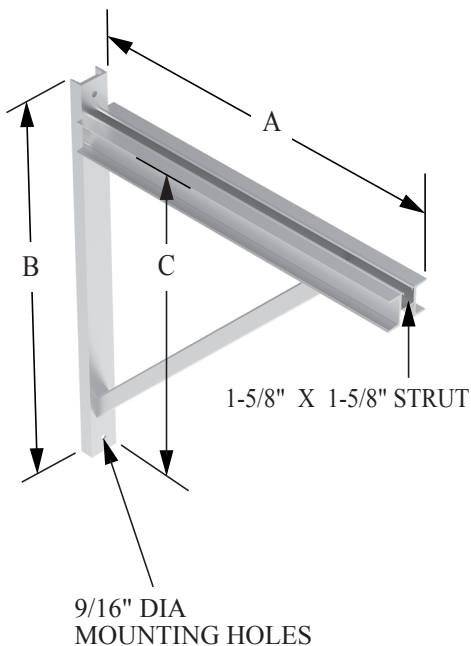
Medium-Weight wall brackets are used primarily to support two ladders side-by-side or one ladder over the other. They are made of 3/16" structural angle welded and hot dip galvanized. The horizontal support angle is continuously slotted to increase the versatility of the bracket. Top mounting slots are 9/16" x 1-1/2" and are spaced on 2" center. Hold down clamps must be purchased separately.

**Maximum allowable load:**

Load applied at two points: 1,200 lbs. per bracket.

Load applied at end of bracket: 600 lbs. per bracket.

Type	A	B	C	Catalog No.
21"	21"	18"	15"	<b>WBK-21M</b>
30"	31"	21"	18"	<b>WBK-30M</b>
39"	39"	26"	23"	<b>WBK-39M</b>
49"	49"	31.5"	28.5"	<b>WBK-49M</b>

**Heavy-Weight Wall Brackets**

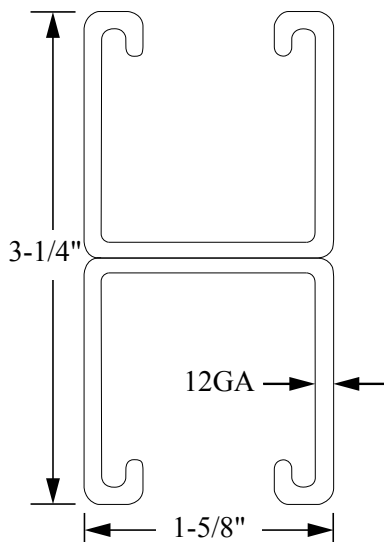
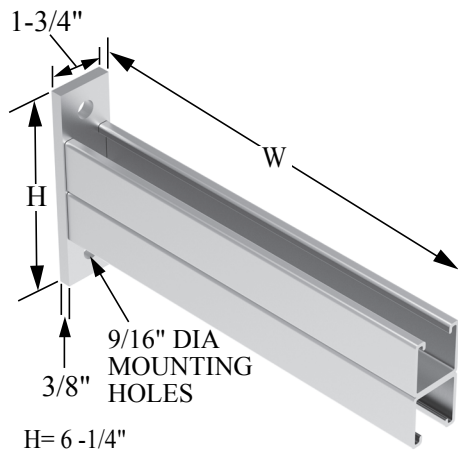
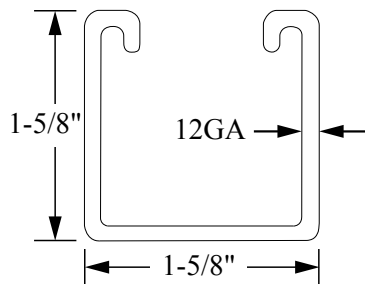
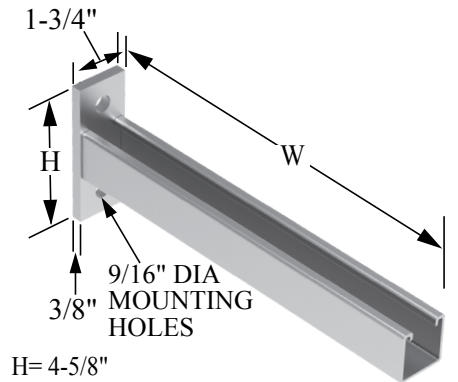
Heavy-Weight channel-type wall brackets are used to support long spans or multiple ladder or trough installations that exceed the load capacity of ordinary brackets. They are constructed with two 3" structural channels with 1-5/8" x 1-5/8" strut between them providing a continuous slot for fastening trays anywhere. They have a stiffener and are hot dip galvanized. To develop the full strength of the bracket, three 1/2" diameter bolts (*not included*) must be used with the pre-drilled holes in the bracket. Hold down clamps and hardware must be purchased separately.

**Maximum allowable load:**

4,000 lbs. when applied as 2 equally concentrated loads, spaced at least 2' - 4" apart on brackets 5' wide and under; or at least 4' - 6" apart on brackets over 5' wide. End load would be 2,000 lbs.

Type	A	B	C	Catalog No.
36"	36"	39"	36"	<b>WBK-36C</b>
42"	42"	39"	36"	<b>WBK-42C</b>
48"	48"	51"	48"	<b>WBK-48C</b>
54"	54"	51"	48"	<b>WBK-54C</b>
60"	60"	63"	60"	<b>WBK-60C</b>
66"	66"	63"	60"	<b>WBK-66C</b>

WALL BRACKETS



**Single & Double Strut Wall Brackets**

Designed primarily for use with framing, these brackets will work well in other applications. The uniform load shown represents a 2.5 safety factor. Furnished in HDGAF steel. Hold down clamps must be purchased separately. See Detail "I" and "O" in Details on pages 162 and 165.

**Maximum concentrated end load:**

One-half the listed uniform load.

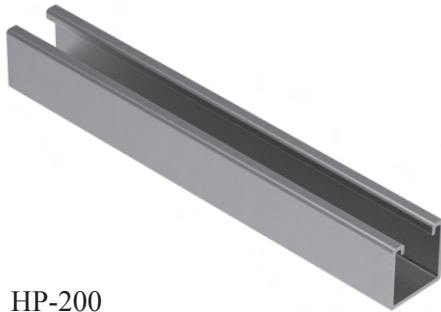
**Wall Brackets for All Trays (Except I6 & I8)**

Tray Width	Bracket Width	Single Strut Wall Bracket		Double Strut Wall Bracket	
		All I-Beam (Except I6 & I8)	Uniform Load (lbs)	All I-Beam (Except I6 & I8)	Uniform Load (lbs)
6"	13"	HP-S250-12	900	HP-S251-12	1,650
9"	16"	HP-S250-15	600	HP-S251-15	1,300
12"	19"	HP-S250-18	400	HP-S251-18	1,050
18"	25"	HP-S250-24	300	HP-S251-24	1,000
24"	31"	HP-S250-30	200	HP-S251-30	800
30"	37"	N/A	N/A	HP-S251-36	650
36"	43"	N/A	N/A	HP-S251-42	400

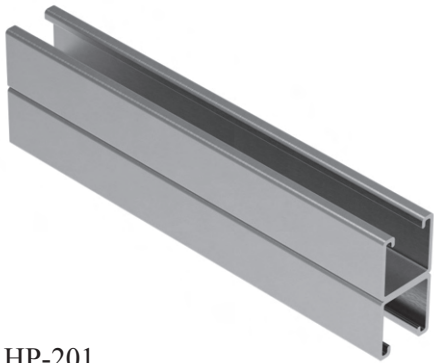
**Wall Brackets for I6 & I8 Trays**

Tray Width	Bracket Width	Single Strut Wall Bracket		Double Strut Wall Bracket	
		All I-Beam (I6 & I8)	Uniform Load (lbs)	All I-Beam (I6 & I8)	Uniform Load (lbs)
6"	16"	HP-S250-15	600	HP-S251-15	1,300
9"	19"	HP-S250-18	400	HP-S251-18	1,050
12"	25"	HP-S250-24	300	HP-S251-24	1,000
18"	31"	HP-S250-30	200	HP-S251-30	800
24"	37"	N/A	N/A	HP-S251-36	650
30"	43"	N/A	N/A	HP-S251-42	400

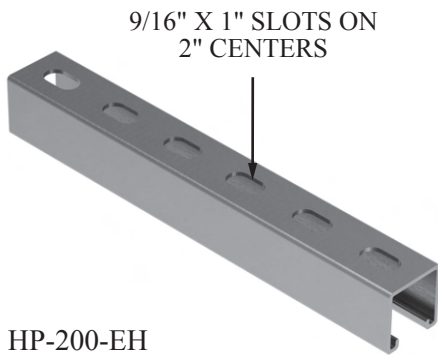
## STRUT



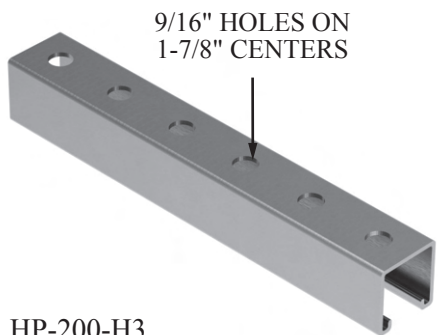
HP-200



HP-201



HP-200-EH



HP-200-H3

**Strut-Type Support Channel**

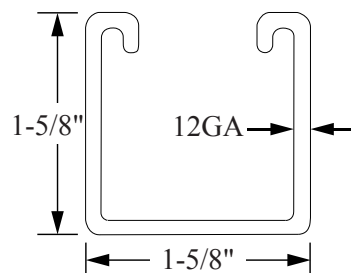
Strut channels provide indirect support for hanger rods by spanning between available structural support beams and channels. The strut is supplied in 10' or 20' lengths and can be easily field cut to the lengths needed for use as a trapeze-type support. Available in single or double back-to-back configurations, as well as slotted or with round holes.

	Style	Single Strut	Double Strut
Black Steel	Solid	HP-200-( )	HP-201-( )
Mill Galvanized	Solid	HP-200-( )-PG	HP-201-( )-PG
HDGAF	Solid	HP-200-( )-HDG	HP-201-( )-HDG
Black Steel	Slotted	HP-200-EH-( )	HP-201-EH-( )
Mill Galvanized	Slotted	HP-200-EH-( )-PG	HP-201-EH-( )-PG
HDGAF	Slotted	HP-200-EH-( )-HDG	HP-201-EH-( )-HDG
Black Steel	Round Holes	HP-200-H3-( )	HP-201-H3-( )
Mill Galvanized	Round Holes	HP-200-H3-( )-PG	HP-201-H3-( )-PG
HDGAF	Round Holes	HP-200-H3-( )-HDG	HP-201-H3-( )-HDG

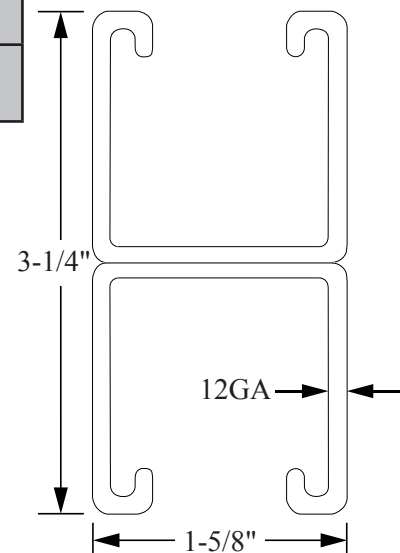
( ) Insert length in inches

Example: **HP-200-EH-120-HDG**

	Single Strut	Double Strut
Width	1-5/8"	1-5/8"
Depth	1-5/8"	3-1/4"
Weight/ Foot	2 lbs.	4 lbs.



SINGLE STRUT



DOUBLE STRUT

SUPPORT HARDWARE

HP-10TG

HP-10WS

W-10

B-61

N-12

W-9

B-12

W-12

### Strut & Support Hardware

The hardware listed below can be used with strut, hold down clips, and hanger rods.

Item	Zinc-Plated	304 SS	316 SS
1/2" Spring Nut	HP-10TG	4HP-10TG	6HP-10TG
3/8" Spring Nut	HP-10TG-3/8	4HP-10TG-3/8	6HP-10TG-3/8
1/2" Sq. Blank Nut	HP-10WS	4HP-10WS	6HP-10WS
3/8" Sq. Blank Nut	HP-10WS-3/8	4HP-10WS-3/8	6HP-10WS-3/8
1-1/2" Sq. Washer 9/16" Hole	W-10		W-10-6S
1-1/2" Sq. Washer 7/16" Hole	W-10-3/8		W-10-3/8-6S
1/2" x 1-1/2" Hex Head Cap Screw	B-61	B-61-4S	B-61-6S
1/2" x 1" Hex Head Cap Screw	B-65		B-65-6S
3/8" x 1-1/2" Hex Head Cap Screw	B-12		B-12-6S
3/8" x 1" Hex Head Cap Screw	B-59		B-59-6S
1/2" Split Lock Washer	W-9	W-9-4S	W-36
3/8" Split Lock Washer	W-17		W-17-6S
1/2" x 13 Hex Nut	N-12	N-12-4S	N-45
3/8" x 16 Hex Nut	N-17	N-17-4S	N-17-6S
1/2" Flat Washer	W-12	W-12-4S	W-35
3/8" Flat Washer	W-5	W-24-4S	W-24-6S



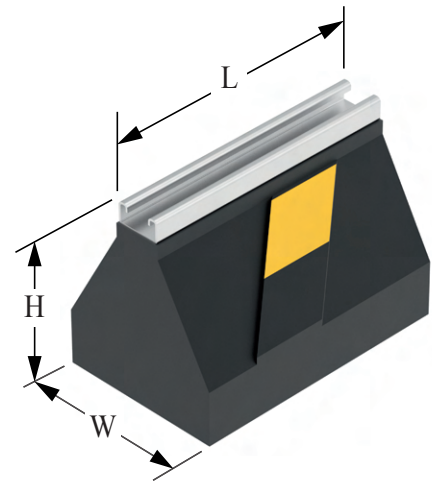
C-PORT C-SERIES ROOF BLOCKS



**C-Series Roof Blocks**

C-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each C-Series Support has a 1-5/8" x 13/16" high, 14 gauge pre galvanized strut on top, making it easy to mount cable tray or piping. They are 4-7/8" high by 6" wide and are offered in lengths from 9.6" to 48".

C-SERIES ROOF BLOCKS					
Cat. No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
<b>C10</b>	4.875" (124 mm)	6" (152 mm)	9.6" (244 mm)	5.30 lbs.	750 lbs.
<b>C20</b>	4.875" (124 mm)	6" (152 mm)	19.2" (488 mm)	11.23 lbs.	1500 lbs.
<b>C30</b>	4.875" (124 mm)	6" (152 mm)	28.8" (732 mm)	16.31 lbs.	2250 lbs.
<b>C40</b>	4.875" (124 mm)	6" (152 mm)	38.5" (978 mm)	21.72 lbs.	3000 lbs.
<b>C48</b>	4.875" (124 mm)	6" (152 mm)	48.0" (1219 mm)	27.12 lbs.	3750 lbs.

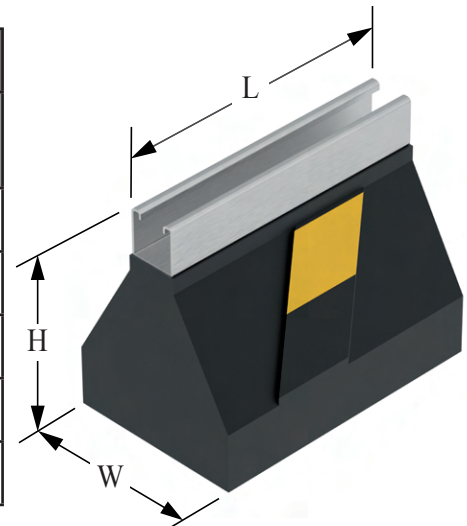


C-PORT C510 & C6-SERIES ROOF BLOCKS

**C510 & C6-Series Roof Blocks**

C510 & C6-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each C510 or C6-Series Support has a 1-5/8" x 1-5/8" high, 14 gauge pre galvanized strut on top and provides additional support for tray, piping or other applications. The C6-Series is applicable where building codes require pipes to be at least 6" above the roof surface.

C510 & C6-ROOF BLOCKS					
Cat. No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
<b>C510</b>	5.750" (146 mm)	6" (152 mm)	9.6" (244 mm)	6.25 lbs.	750 lbs.
<b>C610</b>	6.125" (156 mm)	6" (152 mm)	9.6" (244 mm)	6.67 lbs.	1500 lbs.
<b>C620</b>	6.125" (156 mm)	6" (152 mm)	19.2" (488 mm)	13.34 lbs.	2250 lbs.
<b>C630</b>	6.125" (156 mm)	6" (152 mm)	28.8" (732 mm)	20.01 lbs.	3000 lbs.
<b>C640</b>	6.125" (156 mm)	6" (152 mm)	38.5" (978 mm)	26.68 lbs.	3750 lbs.



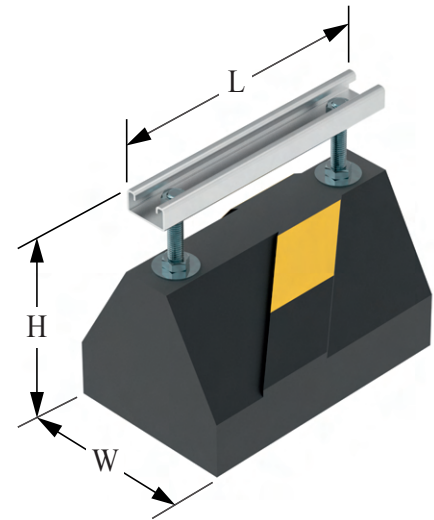
C-PORT CE10-SERIES ROOF BLOCKS



**CE10-Series Roof Blocks**

CE10-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CE10-Series Support has a 1-5/8" x 13/16" high, 14 gauge pre galvanized strut mounted on top of two 1/2" diameter electro-plated zinc threaded rod risers, making it easy to mount cable tray or piping at the desired height. Base is 4" high by 6" wide and 9.6" long and is offered in lengths of 9.6".

CE10-SERIES ROOF BLOCKS					
Cat. No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
<b>CE10-8</b>	8" (203 mm)	6" (152 mm)	9.6" (244 mm)	6.14 lbs.	400 lbs.
<b>CE10-12</b>	12" (305 mm)	6" (152 mm)	9.6" (244 mm)	6.50 lbs.	400 lbs.
<b>CE10-16</b>	16" (406 mm)	6" (152 mm)	9.6" (244 mm)	6.85 lbs.	400 lbs.

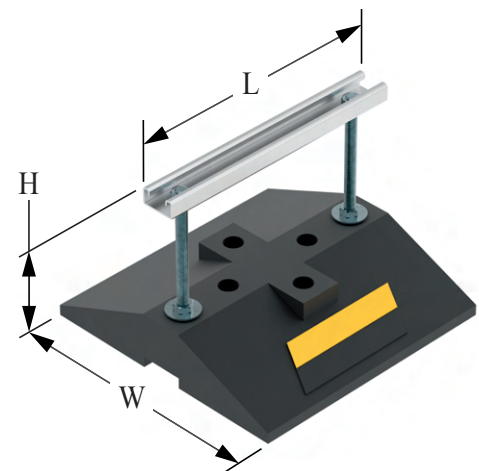


C-PORT CEW12-SERIES ROOF BLOCKS

**CEW12-Series Roof Blocks**

CEW12-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CEW12-Series Support has a 1-5/8" x 13/16" high, 14 gauge pre galvanized strut on top and provides extended support for tray, piping or other applications. The CEW12-Series Support has a wide-bodied base to provide additional stability.

CEW12-SERIES ROOF BLOCKS					
Cat. No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
<b>CEW12-8</b>	8" (203 mm)	12" (305 mm)	12" (305 mm)	10.50 lbs.	800 lbs.
<b>CEW12-12</b>	12" (305 mm)	12" (305 mm)	12" (305 mm)	10.90 lbs.	800 lbs.
<b>CEW12-16</b>	16" (406 mm)	12" (305 mm)	12" (305 mm)	11.20 lbs.	800 lbs.
<b>CEW12-24</b>	24" (610 mm)	12" (305 mm)	12" (305 mm)	11.45 lbs.	800 lbs.



SUPPORT MATERIAL

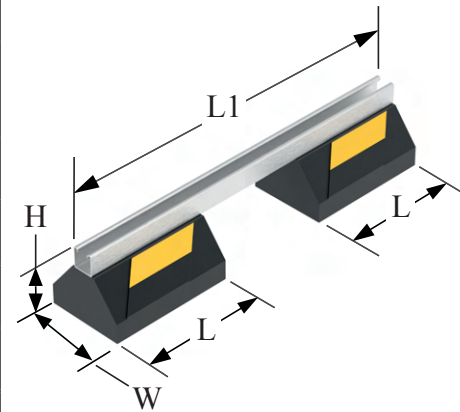
C-PORT CB10-SERIES ROOF BLOCKS



**CB10-Bridge Series Roof Blocks**

CB10-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CB10-Bridge Series Support has a 1-5/8" x 1-5/8" high, 14 gauge pre galvanized strut that bridges between two bases. Each base is 5-5/8" high x 6" wide and 9.6" long. Each channel support is designed as a superior sleeper for support of cable tray, piping or even roof walkway systems.

CB10-BRIDGE SERIES ROOF BLOCKS					
Cat. No.	Height (H)	Curb Length (L)	Strut Length (L1)	Weight	Max Load
<b>CB10-28</b>	5.625" (143 mm)	9.6" (244 mm)	28" (711 mm)	13.59 lbs.	500 lbs.
<b>CB10-36</b>	5.625" (143 mm)	9.6" (244 mm)	36" (914 mm)	14.88 lbs.	500 lbs.
<b>CB10-42</b>	5.625" (143 mm)	9.6" (244 mm)	42" (1067 mm)	15.66 lbs.	500 lbs.
<b>CB10-50</b>	5.625" (143 mm)	9.6" (244 mm)	50" (1270 mm)	17.24 lbs.	500 lbs.
<b>CB10-60</b>	5.625" (143 mm)	9.6" (244 mm)	60" (1524 mm)	18.79 lbs.	500 lbs.

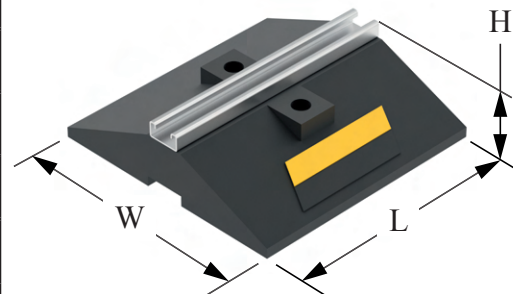


C-PORT CW-SERIES ROOF BLOCKS

**CW-Series Roof Blocks**

CW-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CW-Series Support has a 1-5/8" x 13/16" high, 14 gauge pre galvanized strut on top and provides wide support for tray, piping or other applications. The CW-Series Support has a low profile wide-bodied base to provide additional stability.

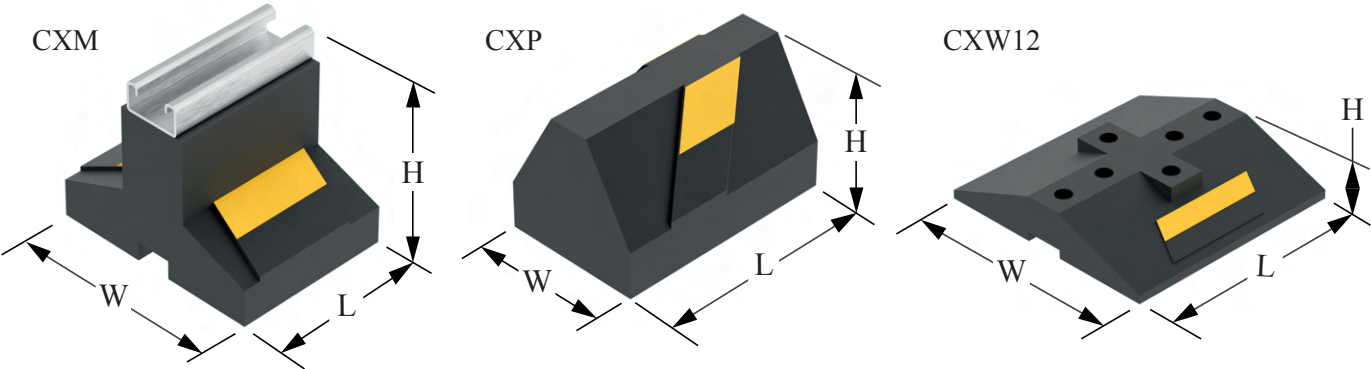
CW-SERIES ROOF BLOCKS					
Cat. No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
<b>CW12</b>	3.3125" (84 mm)	12" (305 mm)	12" (305 mm)	9.5 lbs.	1200 lbs.
<b>CW24</b>	3.3125" (84 mm)	12" (305 mm)	24" (610 mm)	19.0 lbs.	2400 lbs.
<b>CW36</b>	3.3125" (84 mm)	12" (305 mm)	36" (914 mm)	28.5 lbs.	3600 lbs.
<b>CW48</b>	3.3125" (84 mm)	12" (305 mm)	48" (1219 mm)	38.0 lbs.	4800 lbs.
<b>CW60</b>	3.3125" (84 mm)	12" (305 mm)	60" (1524 mm)	47.5 lbs.	6000 lbs.
<b>CW72</b>	3.3125" (84 mm)	12" (305 mm)	72" (1829 mm)	57.0 lbs.	7200 lbs.



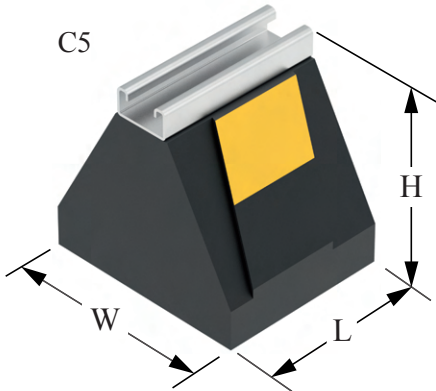
C-PORT CX & C5 -SERIES ROOF BLOCKS



**CX & C5-Series Roof Blocks**  
CX-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CX-Series Support is 2-1/2" or 4" high x 6" wide and available from 4-1/2" to 22" long. The CXM-Series provides an economic alternative when high load-bearing is not required. The CXM-Series uses 14 gauge pre galvanized strut, C5 strut is 14 gauge pre galvanized steel 1-5/8" wide by 13/16" high.



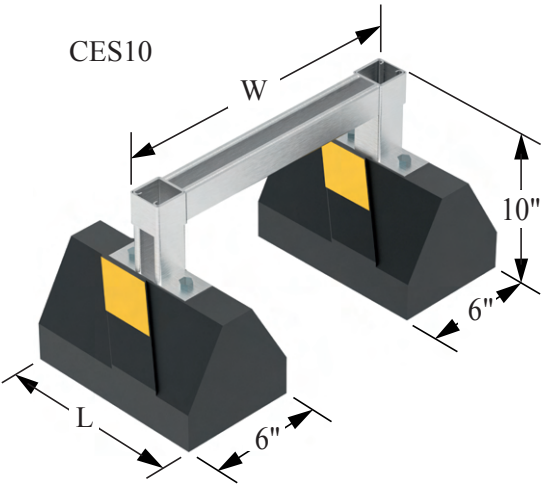
CX & C5-SERIES ROOF BLOCKS					
Cat No.	Height (H)	Width (W)	Length (L)	Weight	Max Load
CXM	4.000" (102 mm)	6" (152 mm)	4.5" (114 mm)	2.60 lbs.	150 lbs.
CXP	4.000" (102 mm)	6" (152 mm)	9.6" (244 mm)	4.56 lbs.	500 lbs.
CXW12	2.500" (64 mm)	12" (305 mm)	12" (305 mm)	10.00 lbs.	1200 lbs.
CXW24	2.500" (64 mm)	12" (305 mm)	24" (610 mm)	19.12 lbs.	2400 lbs.
CXW36	2.500" (64 mm)	12" (305 mm)	36" (914 mm)	28.66 lbs.	3600 lbs.
C5	4.875" (124 mm)	6" (152 mm)	5" (127 mm)	3.32 lbs.	300 lbs.



C-PORT CES10-SERIES ROOF BLOCKS

**CES10-Series Roof Blocks**  
CES10-Series Supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material or other flat surfaces. Each CES10-Series Support has a 1-5/8" x 1-5/8" high, 14 gauge pre galvanized strut on top and provides wide support for tray, piping or other applications. The CES10-Series consists of two supports with a strut channel spanning between them.

CES10-SERIES ROOF BLOCKS					
Cat No.	Height (H)	Crossbeam Width (W)	Base Length (L)	Weight	Max Load
CES10-1012	10" (254 mm)	12" (305 mm)	9.6" (244 mm)	14.21 lbs.	500 lbs.
CES10-1024	10" (254 mm)	24" (610 mm)	9.6" (244 mm)	15.62 lbs.	500 lbs.



SUPPORT MATERIAL

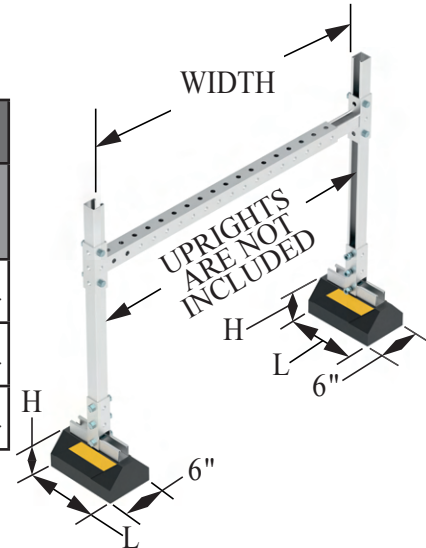
C-PORT DSA10-SERIES ROOF BLOCKS



**DSA10-Roof Block Series**

DSA10-Roof Block Series supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material and are vari-angle to adapt to any roof pitch. Each DSA10-Roof Block Support is 4" high x 6" wide and 9.6" long. The vari-angle bracket is 5-7/8" x 1-7/8" x 1/4" steel. The telescopic crossbeam outer dimensions are 1-7/8" x 1-7/8". The inner crossbeam is 1-5/8" x 1-5/8". Crossbeams are 12 gauge pre galvanized material.

DSA10-SERIES ROOF BLOCKS					
Cat. No.	Width Min	Width Max	Length (L)	Weight	Max Load
<b>DSA10-1831</b>	18" (457 mm)	31" (787 mm)	9.6" (244 mm)	39.90 lbs.	1200 lbs.
<b>DSA10-3157</b>	31" (787 mm)	57" (1448 mm)	9.6" (244 mm)	44.10 lbs.	1200 lbs.
<b>DSA10-57102</b>	57" (1448 mm)	102" (2591 mm)	9.6" (244 mm)	50.10 lbs.	1200 lbs.

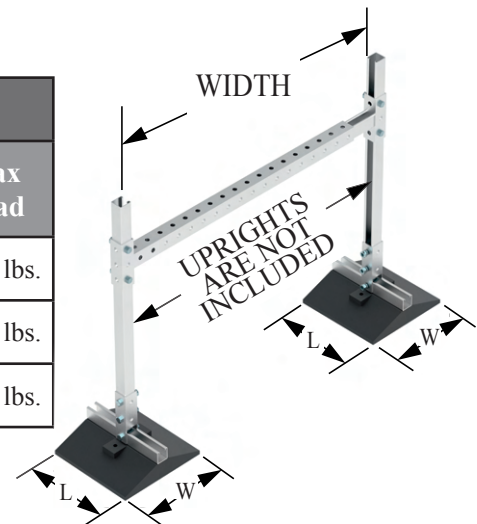


C-PORT DSAW12-SERIES ROOF BLOCKS

**DSAW12-Series Roof Block**

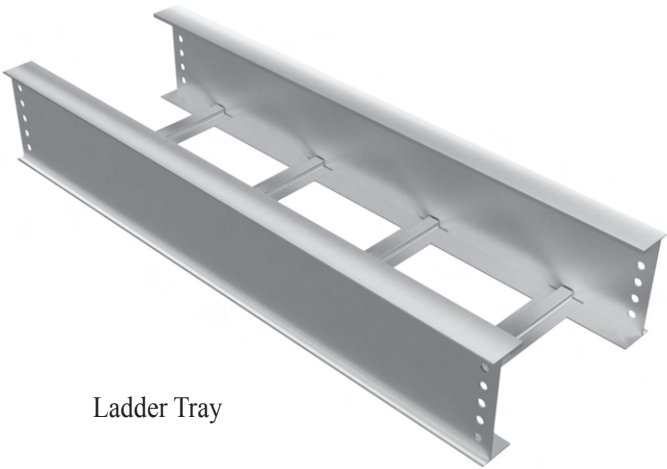
DSAW12-Roof Block Support Series supports are 100% recycled rubber, UV resistant and suitable for installation on most types of roofing material and are vari-angle to adapt to any roof pitch. Each DSAW12-Roof Block Series support is 2-1/4" high x 12" wide and 12" long. The vari-angle bracket is 5-7/8" x 1-7/8" x 1/4" steel. The telescopic crossbeam outer dimensions are 1-7/8" x 1-7/8". The inner crossbeam is 1-5/8" x 1-5/8". Crossbeams are 12 gauge pre galvanized material.

DSAW12-SERIES ROOF BLOCKS					
Cat. No.	Width Min	Width Max	Base Width & Length (L)	Weight	Max Load
<b>DSAW12-1831</b>	18" (457 mm)	31" (787 mm)	12" (305 mm)	29.90 lbs.	1200 lbs.
<b>DSAW12-3157</b>	31" (787 mm)	57" (1448 mm)	12" (305 mm)	35.10 lbs.	1200 lbs.
<b>DSAW12-57102</b>	57" (1448 mm)	102" (2591 mm)	12" (305 mm)	40.10 lbs.	1200 lbs.

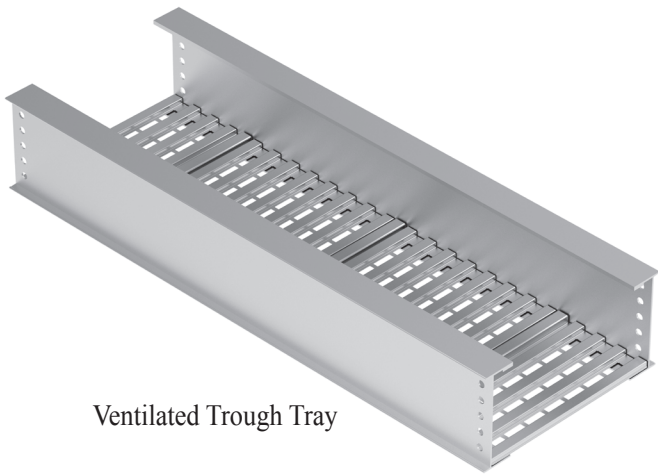




# I-BEAM DETAILS & SAMPLE SPECIFICATIONS



Ladder Tray



Ventilated Trough Tray

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

*CSA Classified Trays Available*

Table of Contents	Page
Details	158 - 166
I-Beam Ladder Specification	167
I-Beam Trough Specification	168 - 169

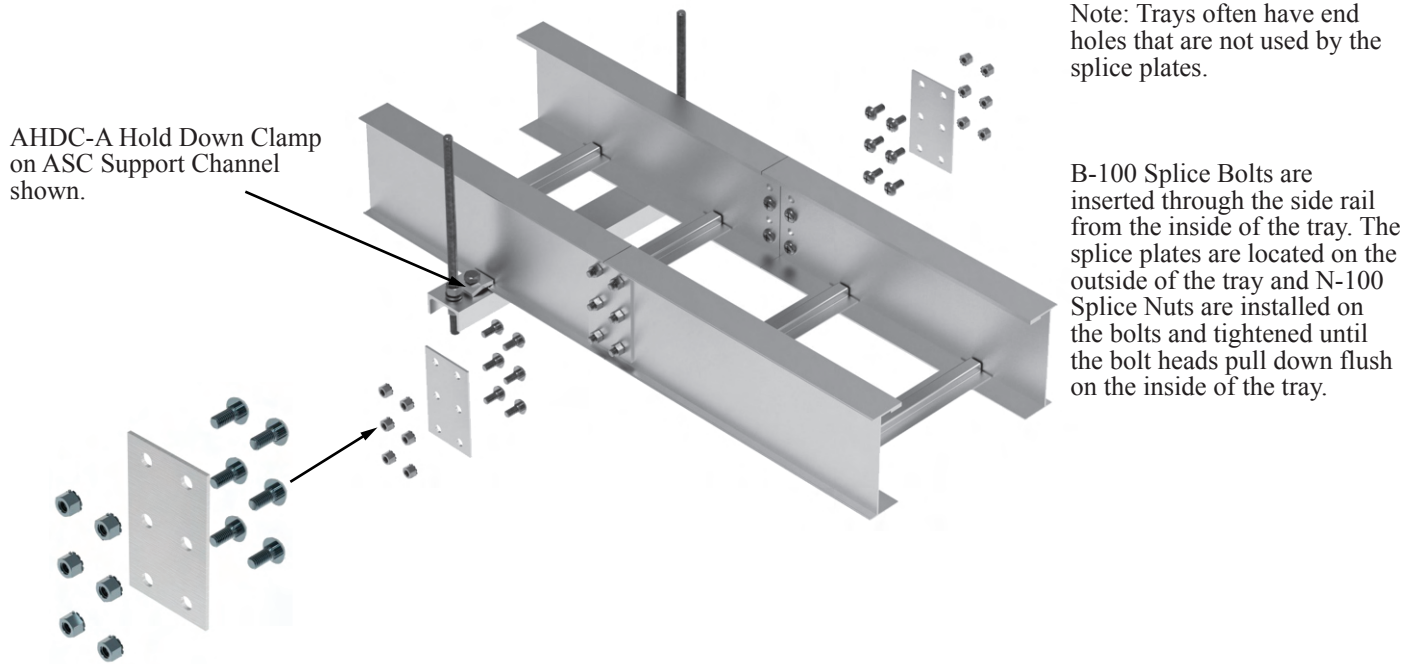


# mphusky

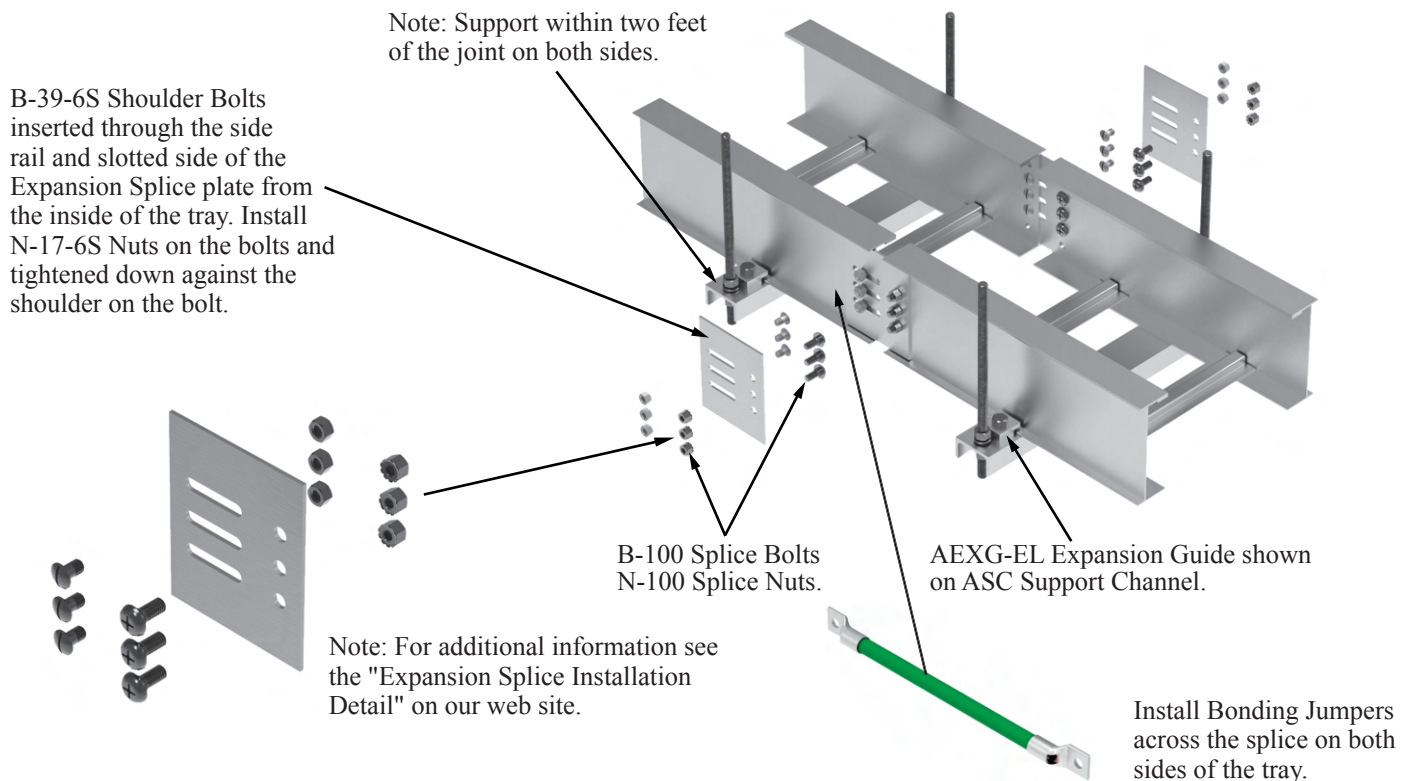


DETAILS

Detail A: Standard Splice



Detail B: Expansion Splice

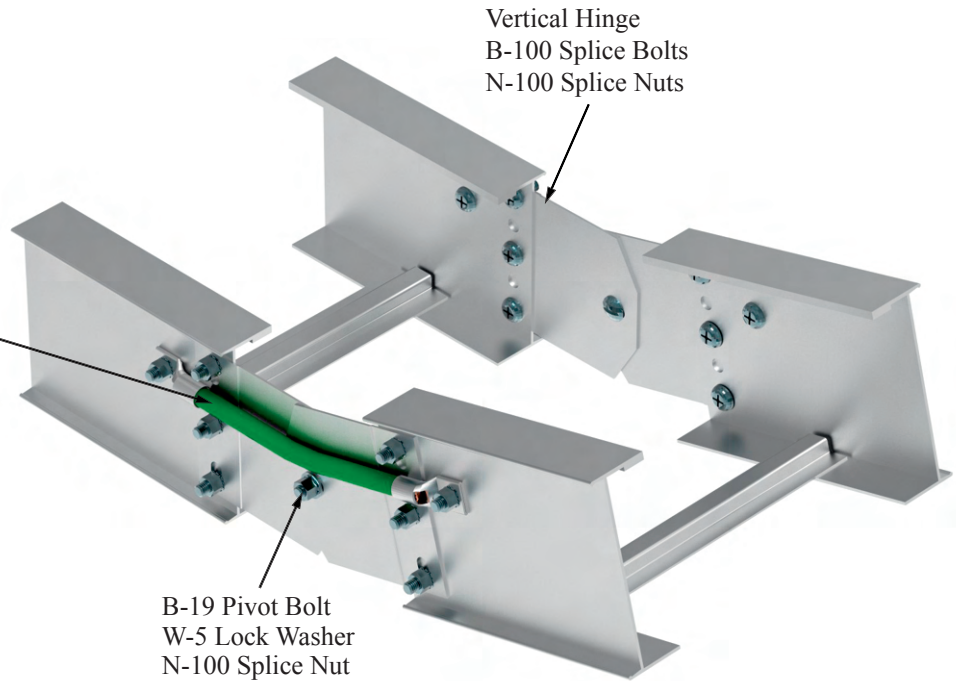


DETAILS

Detail C: Vertical Hinge

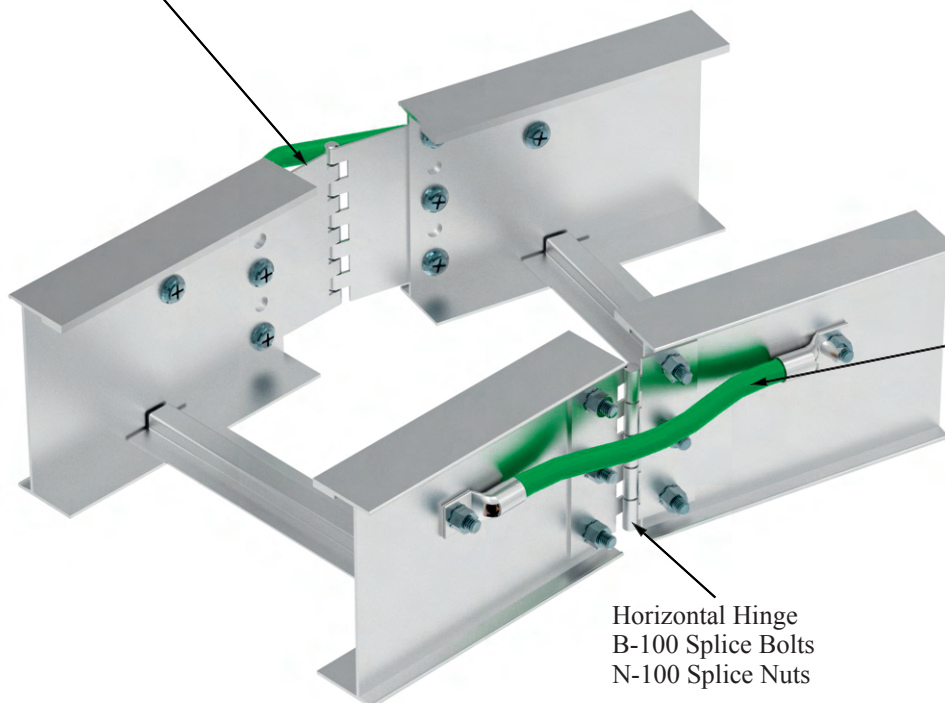
Hinge Splices should be supported within two feet of the joint on both sides.

Bonding Jumpers should be installed on both sides of the tray.



Detail D: Horizontal Hinge

Long Horizontal Hinge is field drilled once the angle is fixed.

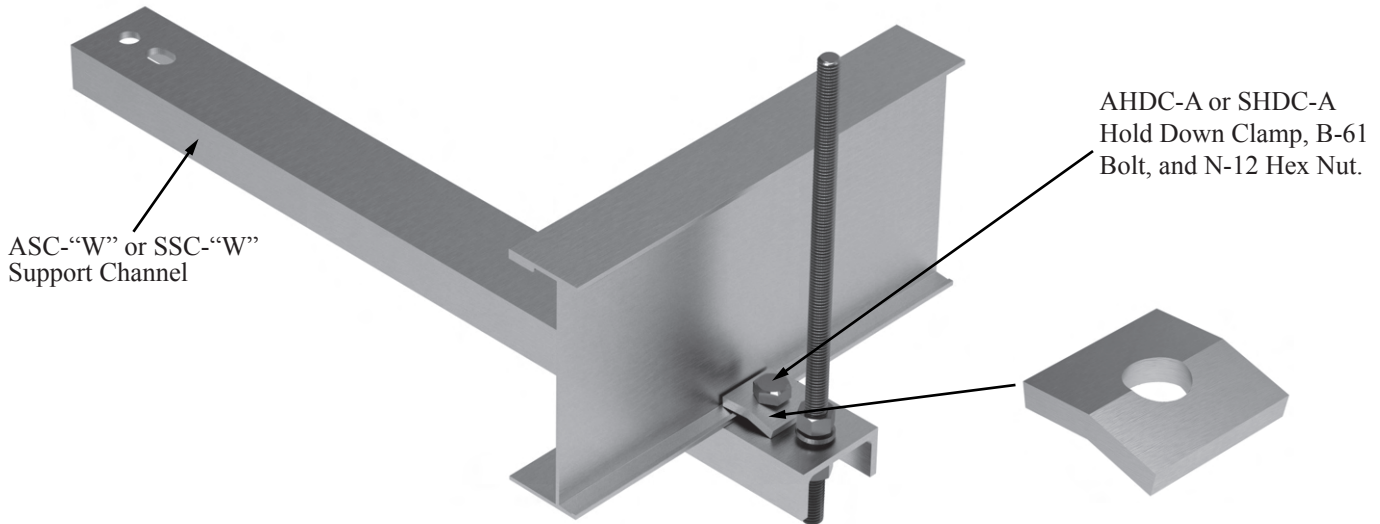


Hinge Splices should be supported within two feet of the joint on both sides.

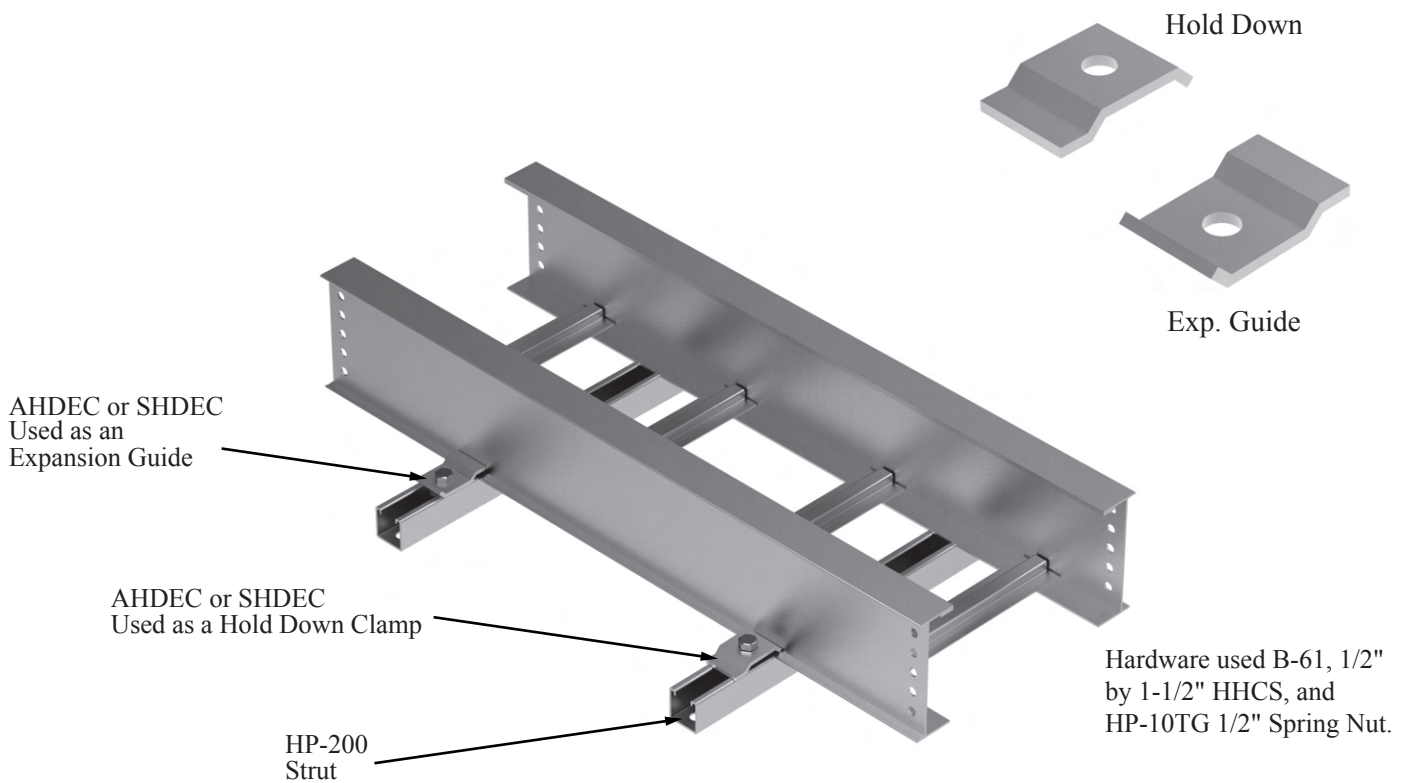
Bonding Jumpers should be installed on both sides of the tray. Angles over 30 degrees may require a 16" long Bonding Jumper across the outside hinge. 12" Bonding Jumpers will work across the inside hinge.

DETAILS

Detail E: Hold Down Clamp

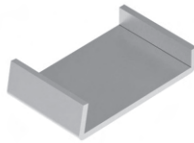


Detail F: Universal Hold Down Clamp/Expansion Guide



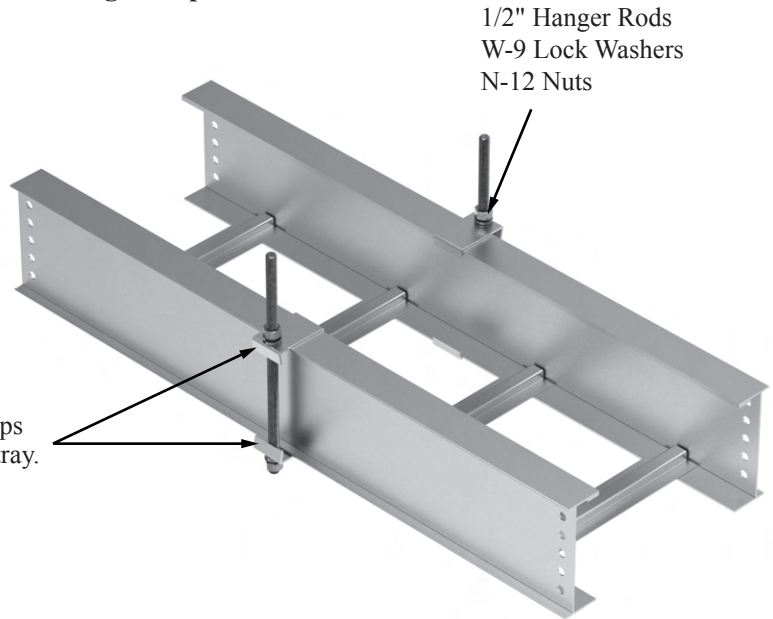
DETAILS

Detail G: Hanger Clip Set



SHC-IXB

SHC-IXB Hanger Clips  
used to hang A9IXC tray.

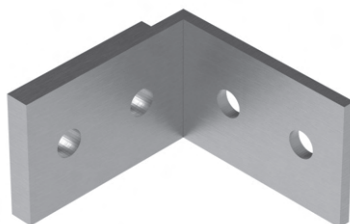


1/2" Hanger Rods  
W-9 Lock Washers  
N-12 Nuts

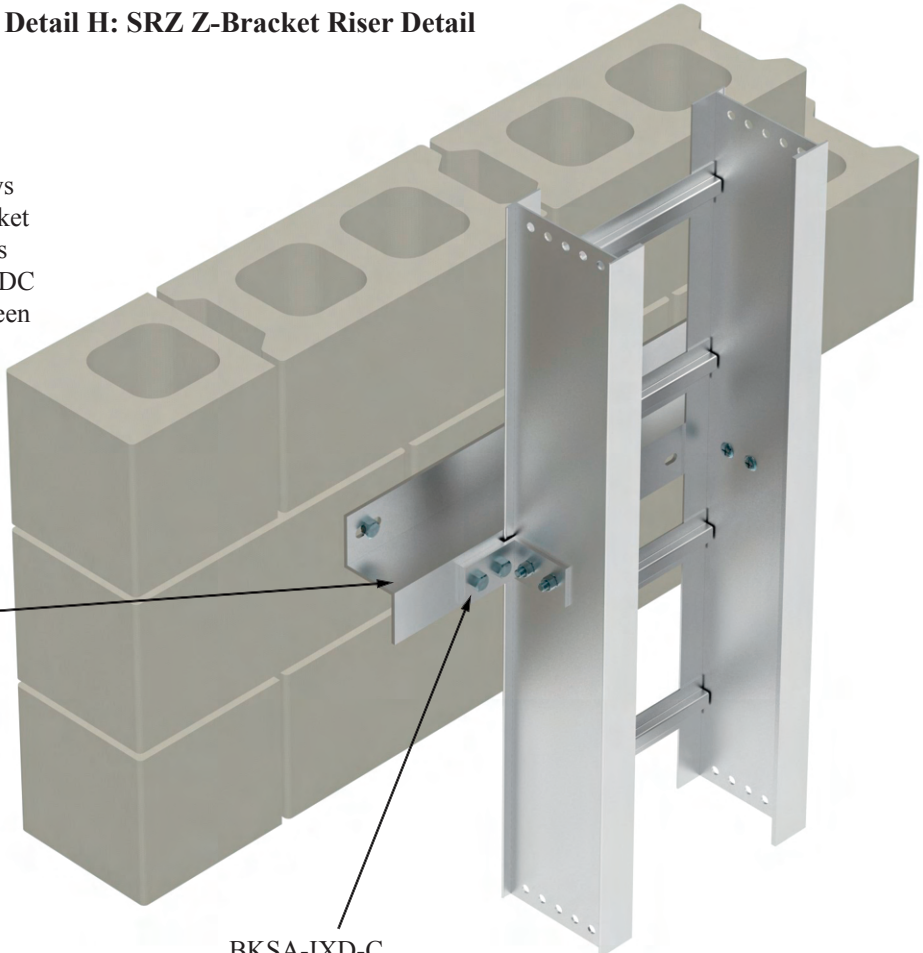
Detail H: SRZ Z-Bracket Riser Detail

SRZ Z-Bracket supports will mount a tray or trays 3" off of a wall or other surface. This support system is ideal to support trays running up a wall or structure. The Z-Bracket is available for single tray runs or two trays side-by-side. For two trays, a BKSA-IXD-DC double angle clip is available for use between the two trays.

SRZ "W"  
Z-Bracket



BKSA-IXD-C

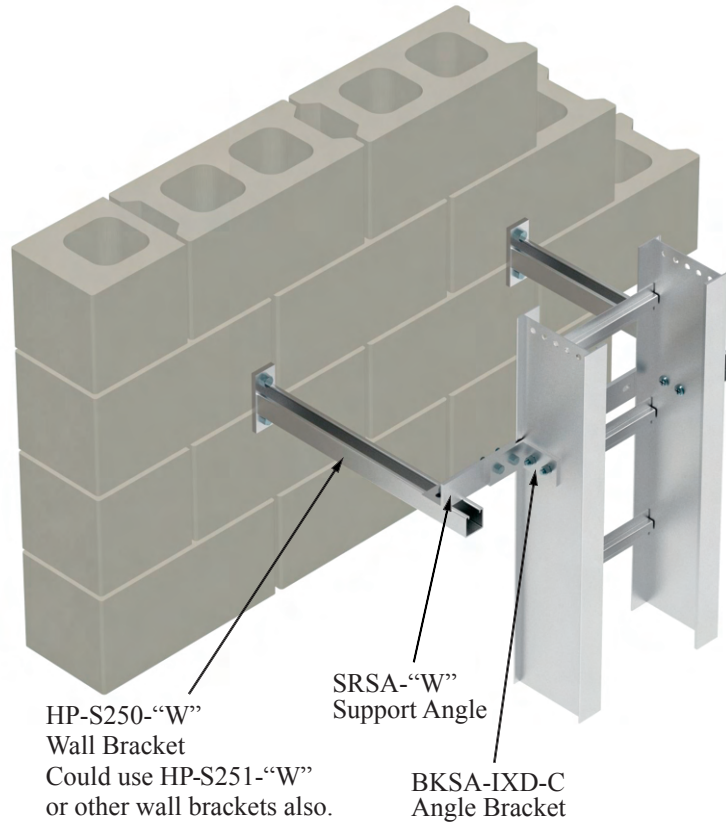


BKSA-IXD-C  
Support Angle Clips

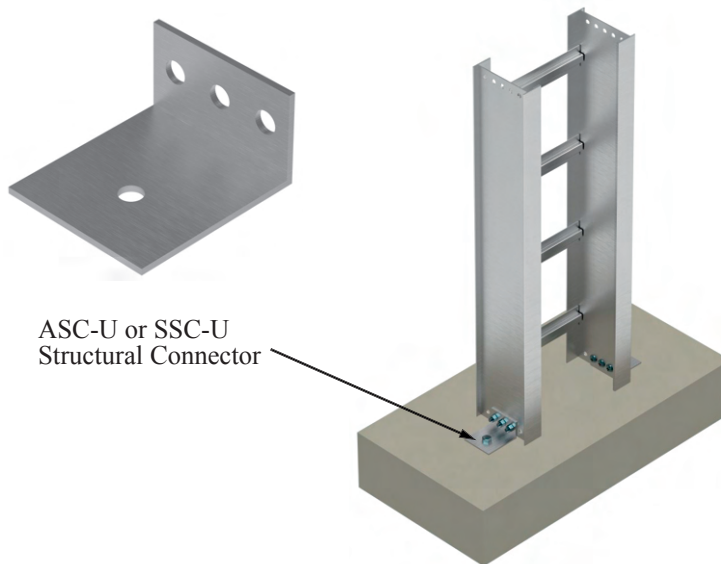


## DETAILS

### Detail I: SRSA & Wall Brackets Riser Detail



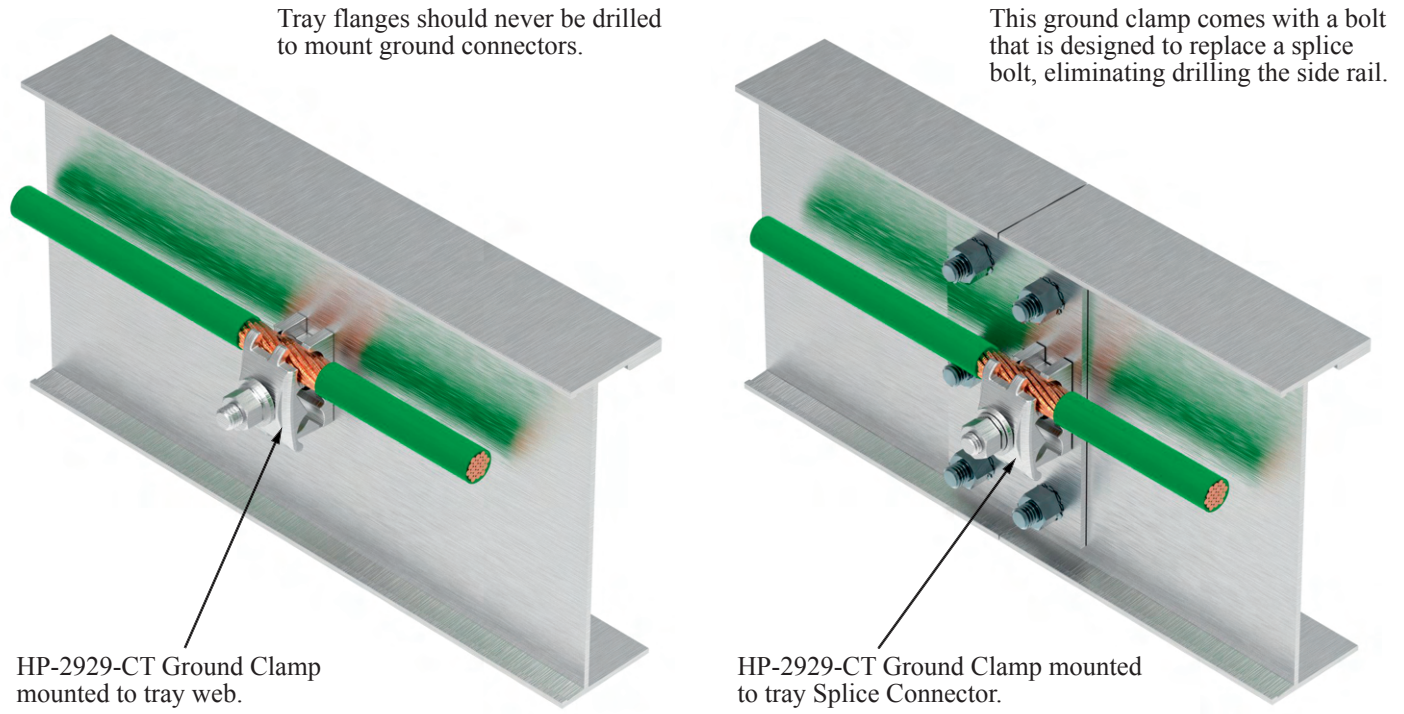
### Detail J: ASC-U Structural Connector



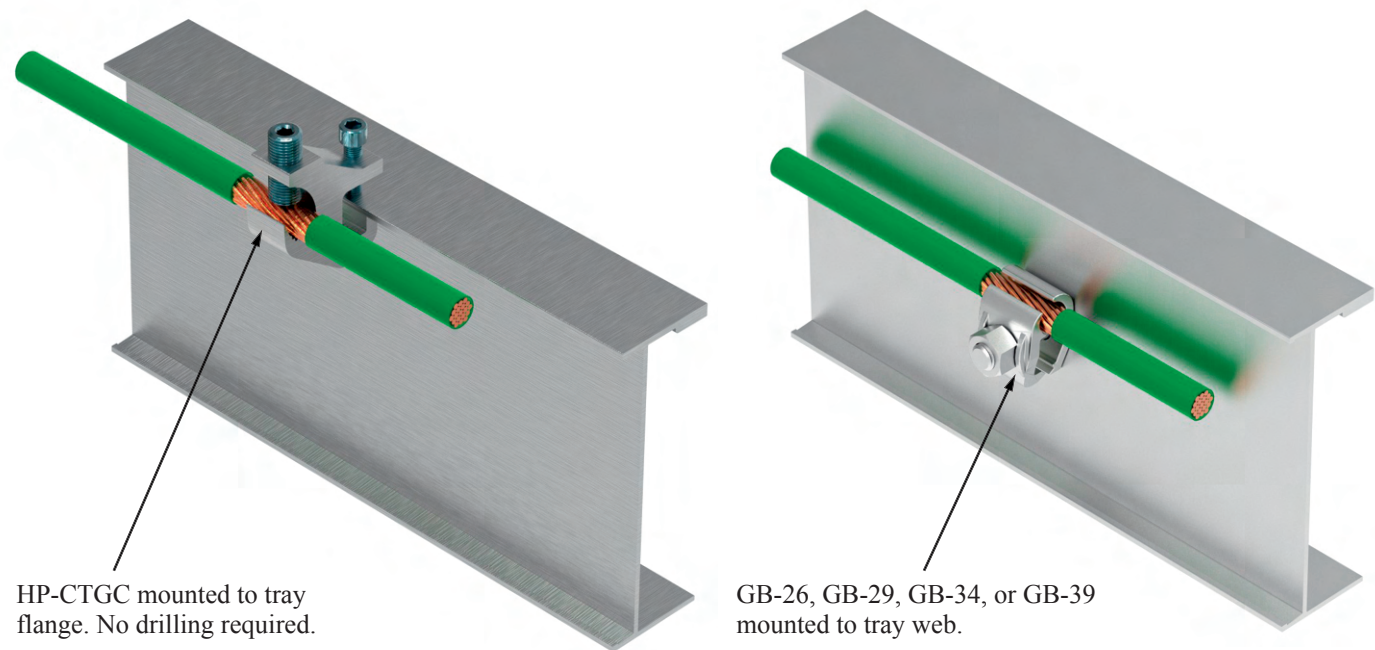
ASC-U or SSC-U Structural Connectors can be used to fasten trays to floors, walls or cabinets and boxes. They mount to the splice holes of a cable tray and use a single 1/2" diameter bolt to fasten to the other structure. Sold in single units so two units are required to make a connection.

DETAILS

**Detail K: HP-2525-CT, HP-2626-CT & HP-2929-CT Ground Clamp Details**



**Detail L: HP-CTGC, GB-26, GB-29, GB-34 & GB-39 Ground Clamp Details**

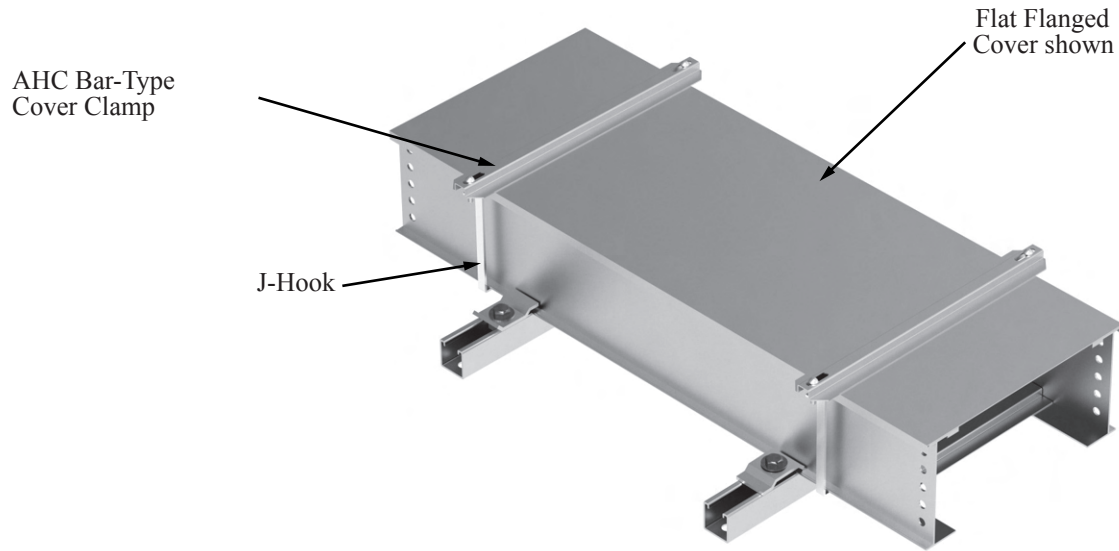


The installations above show proper installation where the copper wire does not come in direct contact with the aluminum cable tray. Tray and cable contact is through a Tin-Plated connector. Oxidation Inhibitor (O.I.) can be used on connections.

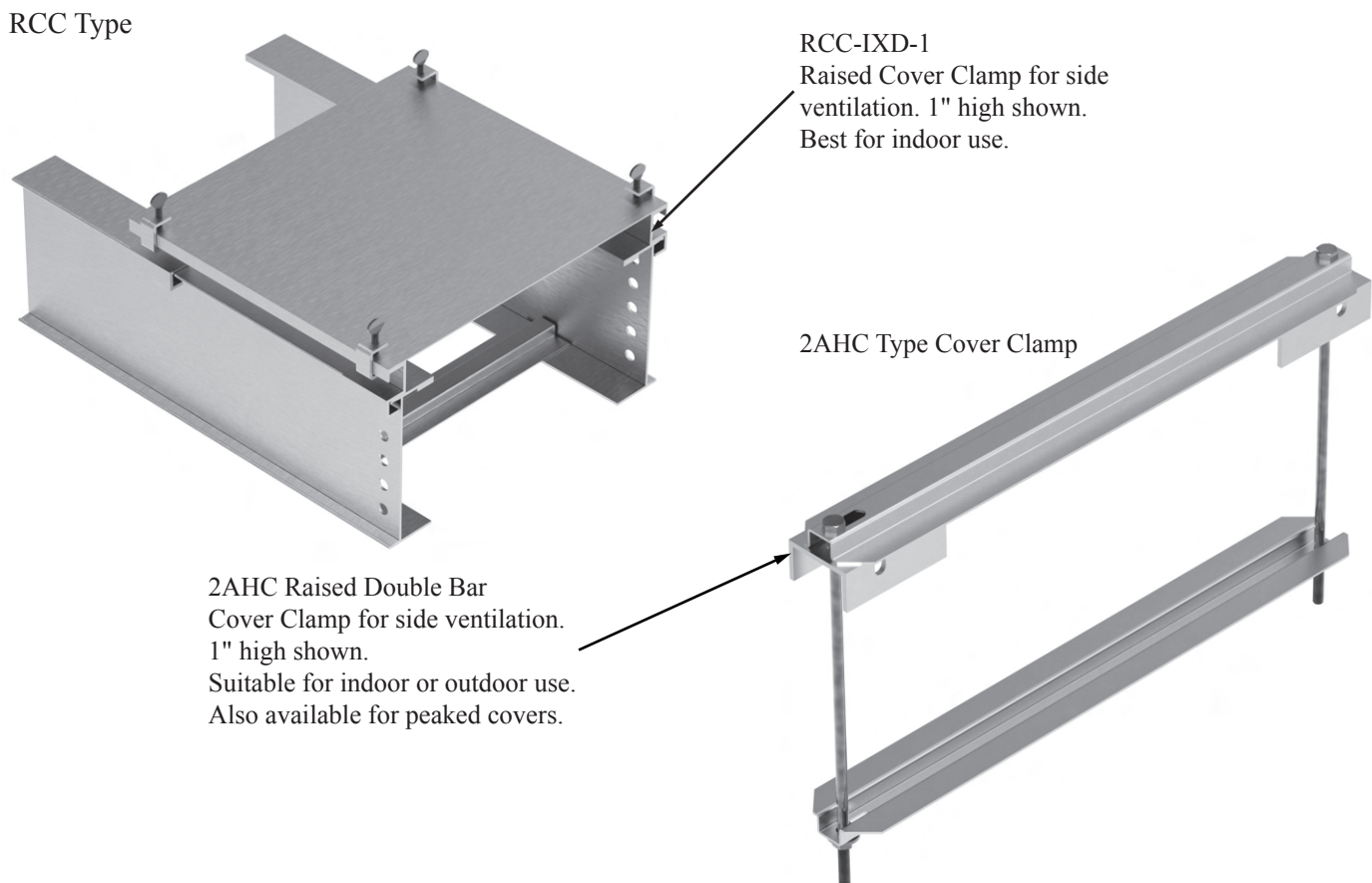


DETAILS

Detail M: HC Bar Type Cover Clamp

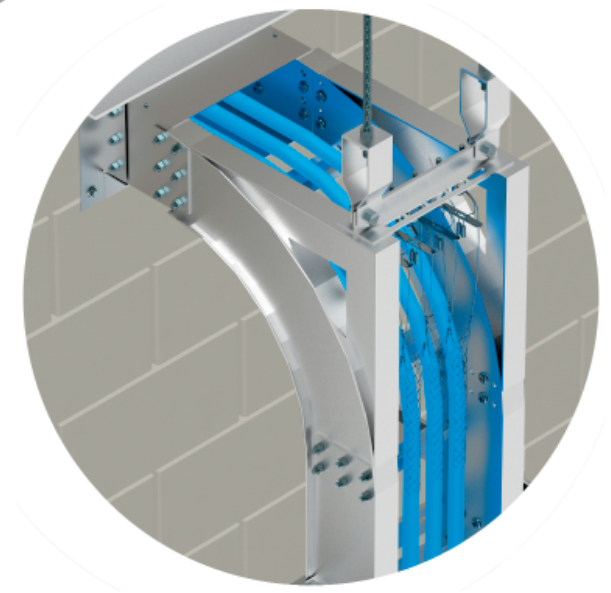
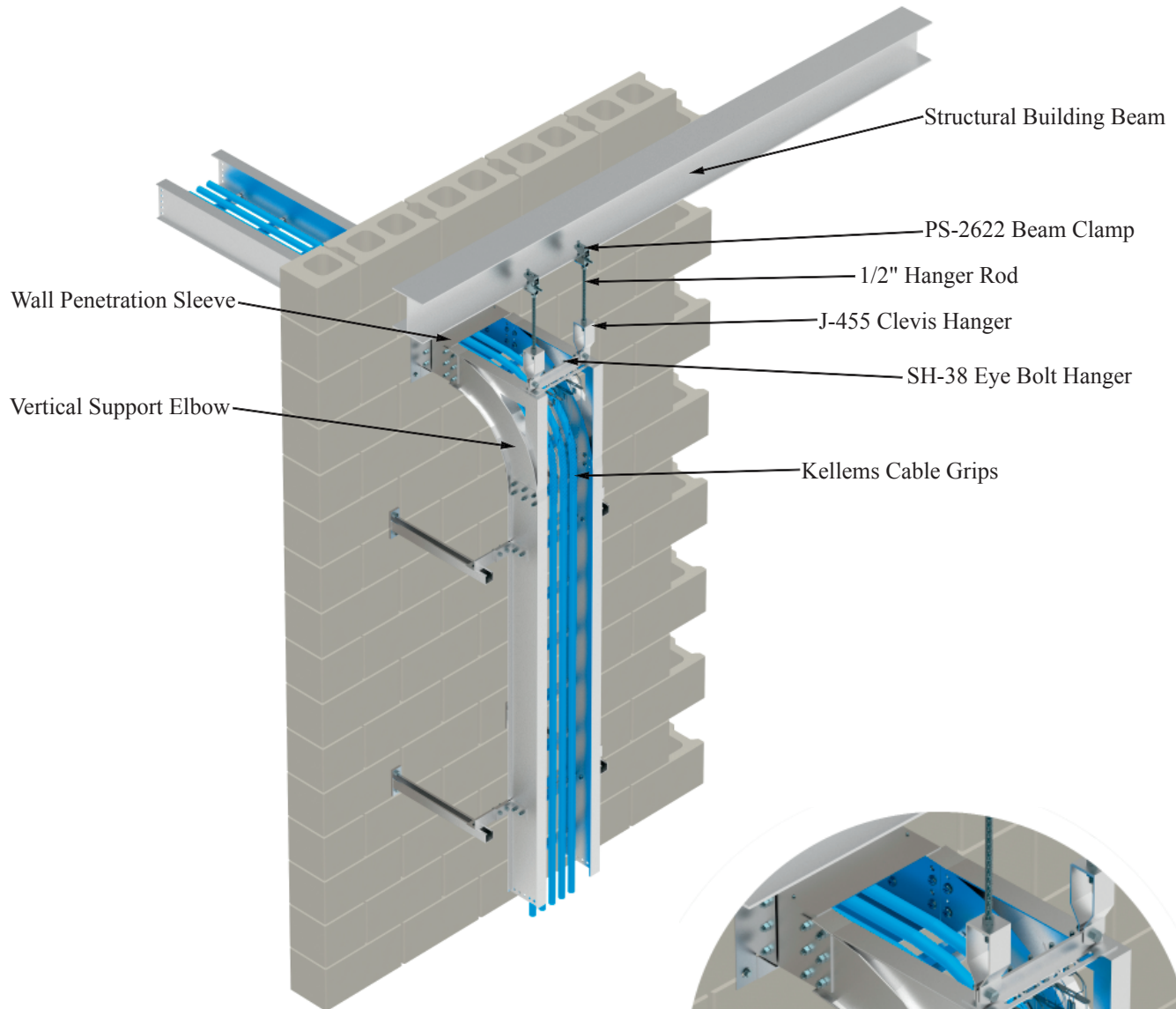


Detail N: RCC & 2AHC Raised Cover Clamps



DETAILS

Detail O: Vertical Tray Supports



Enlarged Detail

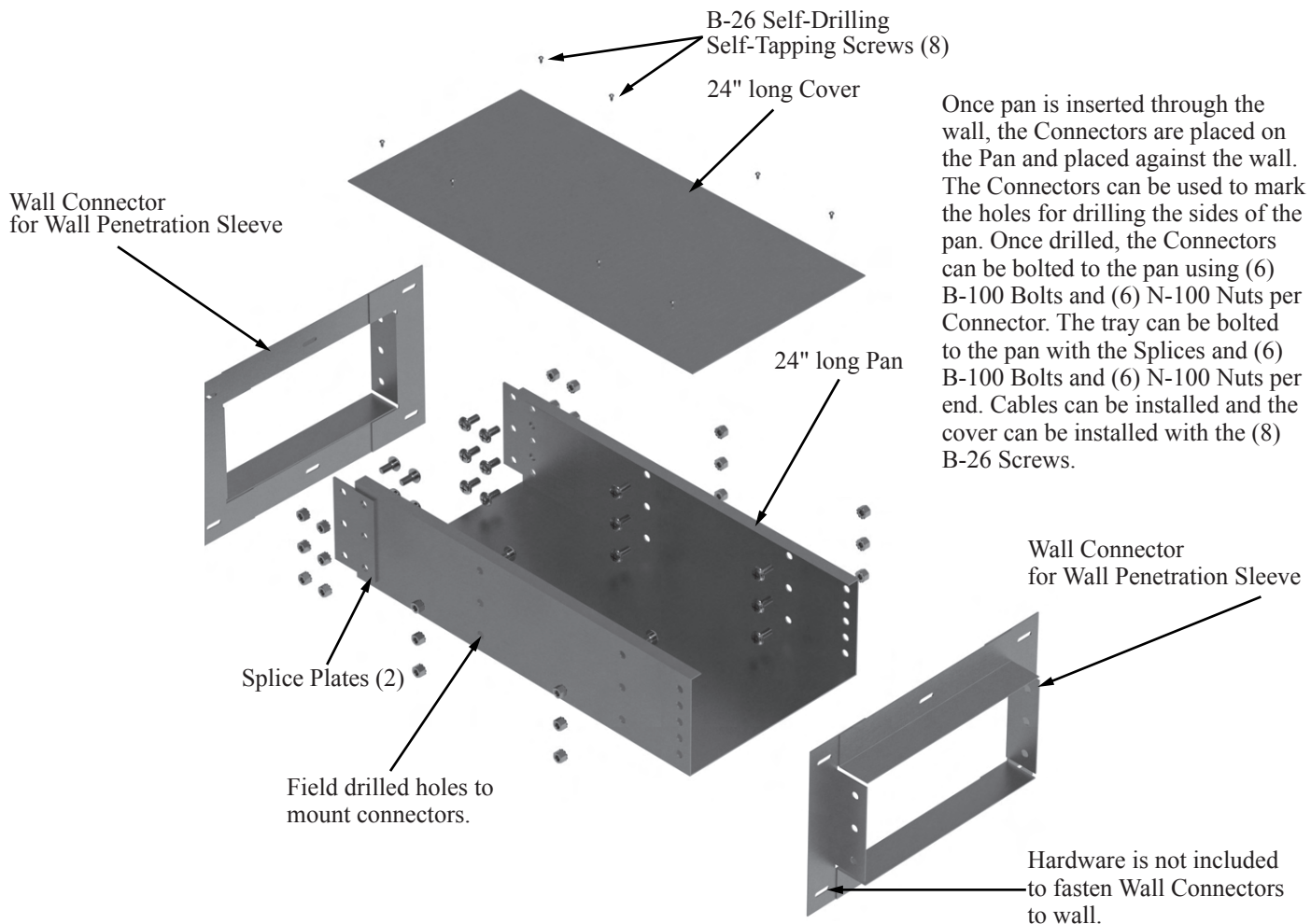
## DETAILS

## Detail P: Wall Penetration Sleeve

## PARTS:

- (1) 24" Long Brake Formed Pan
- (1) 24" Long Cover
- (2) Wall Connectors With (6) B-100 Bolts & (6) N-100 Nuts For Each Connector
- (2) Splice Plates With (6) B-100 Bolts & (6) N-100 Nuts For Each Splice Plate
- (8) B-26 Self Drilling Self Taping Sheet Metal Cover Screws

Insert the Pan through the hole in the wall. Place a Wall Connector over each end of the tray and slide against the wall. When wall Connectors are in position mark the holes on the side of the pan. Field drill the mounting holes for mounting the Wall Connectors to the Pan. Mount wall connectors to wall (*hardware NOT included*). Attach trays to the ends of the Pan using Splice Connectors to continue the runs on both sides of the wall. Install cables and then put the covers on the pan with the Self-Drilling Screws.



Note: Hardware quantity shown based on 6" High Tray

## **I-BEAM LADDER SPECIFICATION**

### **1.0 Specification for Aluminum I-Beam Ladder**

#### **2.0 General**

- 2.1 Cable tray systems shall be of the design of one manufacturer and shall be designed so that there are no burrs, projections, or sharp edges to damage cable insulation.
- 2.2 Fittings shall have the same load-carrying capacity as straight sections. Fittings shall be of the continuous arc type with a 12, 18, 24, 36, or 48-inch radius, unless otherwise shown on the drawings.
- 2.3 Ladder type tray straight sections shall be 10' - 0", 12' - 0", 20' - 0", or 24' - 0" long and shall be of the width indicated on the drawings to provide the planned cable capacity.

#### **3.0 Material and Construction**

- 3.1 Ladder-type cable tray longitudinal members shall be 4-1/2", 5", 6", 7", or 8" deep extruded aluminum I-Beam construction of 6063-T6 aluminum alloy.
- 3.2 Transverse members (rungs) shall be of extruded aluminum alloy 6063-T6 and shall be designed to prevent collection pockets for moisture or contaminant materials.
- 3.3 Transverse members (rungs) shall be clinched and/or welded to the side rails. Transverse members shall be located on 6", 9", 12", or 18" spacing.

#### **4.0 Splice Joints**

- 4.1 Resistance across any splice connection shall not exceed 330 microhms.
- 4.2 Splice connector design shall be universal for use on straight sections and fittings.
- 4.3 Splice connectors shall be of the high pressure bolted type with a minimum of four bolts per connector.

#### **5.0 Loading**

- 5.1 Ladder-type cable tray shall have a load safety factor of 1.5 based on the destruction load capacity as defined within NEMA Standard VE-1.
- 5.2 The ladder-type cable tray shall meet or exceed the following NEMA load classification:

8A (50 lbs per ft/8 ft span)	16A (50 lbs per ft/16 ft span)
8B (75 lbs per ft/8 ft span)	16B (75 lbs per ft/16 ft span)
8C (100 lbs per ft/8 ft span)	16C (100 lbs per ft/16 ft span)
12A (50 lbs per ft/12 ft span)	20A (50 lbs per ft/20 ft span)
12B (75 lbs per ft/12 ft span)	20B (75 lbs. per ft/20 ft span)
12C (100 lbs per ft/12 ft span)	20C (100 lbs per ft/20 ft span)

#### **6.0 UL**

- 6.1 The cable tray system shall be classified for use as an equipment ground and requires that the minimum cross-sectional area be shown on the tray labels. The industry standard is to mark each straight section and fitting with its own cross-sectional area. It is the responsibility of the installer and/or user to assure that the capacity of the overall system is adequate to meet the anticipated ground fault of the system.

#### **7.0 Manufacture and Data**

- 7.1 The following data shall be provided with the quotation:
  - (a) Simple beam load and deflection tables
  - (b) Drawings illustrating tray quoted and splice connection
- 7.2 Tray shall be manufactured in accordance with, and by a member of, NEMA VE-1.

#### **8.0 Installation**

- 8.1 Tray shall be installed in accordance with NEMA VE-2.

## I-BEAM TROUGH SPECIFICATION

**1.0 Specification for Aluminum I-Beam Trough****2.0 General**

- 2.1 Cable tray systems shall be of the design of one manufacturer and shall be designed so that there are no burrs, projections, or sharp edges to damage cable insulation.
- 2.2 Fittings shall have the same load-carrying capacity as straight sections. Fittings shall be of the continuous arc type with a 12, 18, 24, 36, or 48-inch radius, unless otherwise shown on the drawings.
- 2.3 Trough-type tray straight sections shall be 10' - 0", 12' - 0", 20' - 0", or 24' - 0" long and shall be of the width indicated on the drawings to provide the planned cable capacity.

**3.0 Material and Construction**

- 3.1 Trough-type cable tray longitudinal members shall be 4-1/2", 5", 6", 7", or 8" deep extruded aluminum I-Beams of 6063-T6 aluminum alloy.
- 3.2 The transverse members (rungs) shall be of extruded aluminum alloy 6063-T6.
- 3.3 Trough bottom inserts shall be made of the following types: Corrugated, Bump Bottom, & Flat Sheet-type.

**3.4 Trough Bottom Construction Methods**

- (a) Ventilated & solid trough bottom shall be constructed with transverse members (rungs) and bottom inserts (Corrugation, Bump & Flat Sheet) between the transverse members & on each end of the trough. The transverse members shall be located on 12" spacing. Transverse members shall be clinched and/or welded to the side rail. The bottom inserts shall be made of aluminum and shall be attached to the bottom flange of the I-Beam shaped longitudinal member by means of clinching or welding at a minimum of 2 places per side of the bottom inserts (one on each end of each side).
- (b) Ventilated trough bottom shall be constructed with transverse members (rungs). The transverse members shall be located on 4" spacing. Transverse members shall be clinched and/or welded to the side rail.

**3.5 Ventilated & Solid Trays Types**

- (a) Solid Trough (Corrugated): Construction method (a) for widths of 6" - 24" wide
- (b) Solid Trough (Bump): Construction method (a) for widths of 6" - 36" wide
- (c) Solid Trough (Flat): Construction method (a) for widths 6" - 36" wide
- (d) Ventilated Trough (Corrugated): Construction method (a) for widths of 6" - 24" wide
- (e) Ventilated Trough (Flat): Construction method (a) for widths of 6" - 36" wide
- (f) Ventilated Trough (4" Rung Spacing): Construction method (b) for widths of 6" - 36" wide

**4.0 Splice Joints**

- 4.1 Resistance across any splice connection shall not exceed 330 microhms.
- 4.2 Splice connector design shall be universal for use on straight sections and fittings.
- 4.3 Splice connectors shall be of the high pressure bolted type with a minimum of four bolts per connector.

## I-BEAM TROUGH SPECIFICATION

### 5.0 Loading

5.1 Trough-type cable tray shall have a load safety factor of 1.5 based on the destruction load capacity as defined within NEMA Standard VE-1.

5.2 The trough-type cable tray shall meet or exceed the following NEMA load classification:

8A (50 lbs per ft/8 ft span)	16A (50 lbs per ft/16 ft span)
8B (75 lbs per ft/8 ft span)	16B (75 lbs per ft/16 ft span)
8C (100 lbs per ft/8 ft span)	16C (100 lbs per ft/16 ft span)
12A (50 lbs per ft/12 ft span)	20A (50 lbs per ft/20 ft span)
12B (75 lbs per ft/12 ft span)	20B (75 lbs per ft/20 ft span)
12C (100 lbs per ft/12 ft span)	20C (100 lbs per ft/20 ft span)

### 6.0 UL

6.1 The cable tray system shall be classified for use as an equipment ground and requires that the minimum cross-sectional area be shown on the tray labels. The industry standard is to mark each straight section and fitting with its own cross-sectional area. It is the responsibility of the installer and/or user to assure that the capacity of the overall system is adequate to meet the anticipated ground fault of the system.

### 7.0 Manufacture and Data

7.1 The following data shall be provided with the quotation:

- (a) Simple beam load and deflection tables
- (b) Drawings illustrating tray quoted and splice connection

7.2 Tray shall be manufactured in accordance with, and by a member of, NEMA VE-1.

### 8.0 Installation

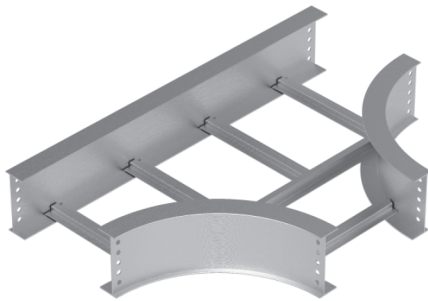
8.1 Tray shall be installed in accordance with NEMA VE-2.



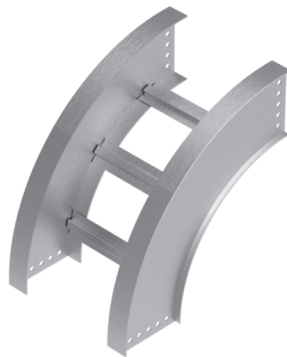




Horizontal 60



Horizontal Tee



Vertical Outside 90

# I-BEAM FITTING LAYOUT DIMENSIONS (*Except I6 & I8*)

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

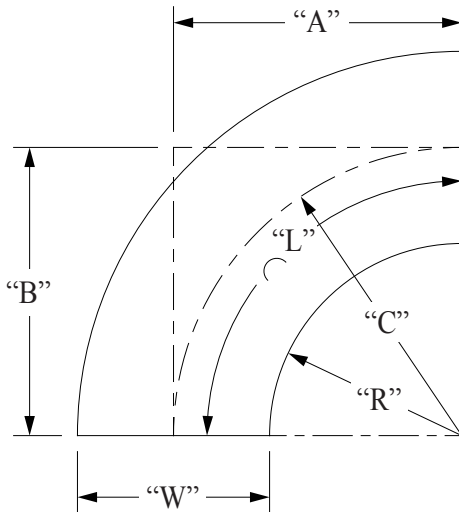
*CSA Classified Trays Available*

Table of Contents	Page
Horizontal Fittings	172 - 176
Horizontal Tees	177 - 182
Horizontal Crosses	183 - 189
Vertical Fittings	190 - 193
Vertical Support Elbows	194
Vertical Tees	195
Reducers	196



# mphusky

## HORIZONTAL 90 DEGREE FITTING LAYOUT DIMENSIONS (Except 16 & 18)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12H90-24

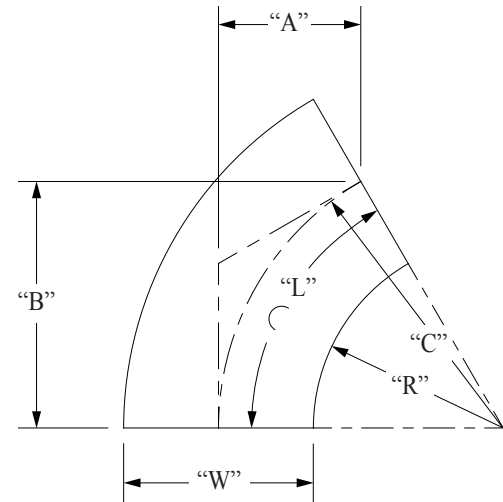
FITTING LAYOUT DIMENSIONS

Width (W)	Select Tray Prefix	Horizontal 90°	Rad (in)	A (in)	B (in)	C (in)	L (in)
6"		-6H90-12	12	15	15	15	23-9/16
		-6H90-24	24	27	27	27	42-3/4
		-6H90-36	36	39	39	39	61-1/4
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9H90-12	12	16-1/2	16-1/2	16-1/2	25-7/8
		-9H90-24	24	28-1/2	28-1/2	28-1/2	44-3/4
		-9H90-36	36	40-1/2	40-1/2	40-1/2	63-5/8
12"	A(L)IYA A(L)IYB A(L)IYC	-12H90-12	12	18	18	18	28-1/4
		-12H90-24	24	30	30	30	47-1/8
		-12H90-36	36	42	42	42	66
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18H90-12	12	21	21	21	33
		-18H90-24	24	33	33	33	51-13/16
		-18H90-36	36	45	45	45	70-11/16
24"	A(L)IMB A(L)IMC A(L)IMD	-24H90-12	12	24	24	24	37-11/16
		-24H90-24	24	36	36	36	56-9/16
		-24H90-36	36	48	48	48	75-7/16
30"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30H90-12	12	27	27	27	42-7/16
		-30H90-24	24	39	39	39	61-1/4
		-30H90-36	36	51	51	51	80-1/8
36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36H90-12	12	30	30	30	47-1/8
		-36H90-24	24	42	42	42	66
		-36H90-36	36	54	54	54	84-13/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "A" for Length of back-to-back fittings or "B" for Offset Change of back-to-back fittings.

HORIZONTAL 60 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

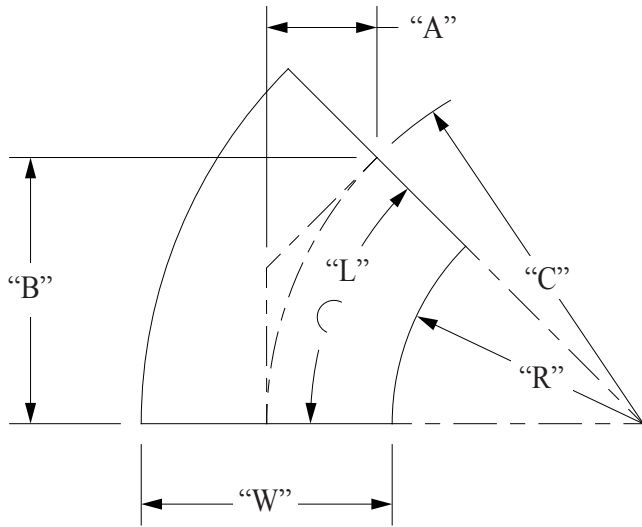
Sample Catalog Number	
Prefix	Fitting
ALIJC	-12H60-24



Width (W)	Select Tray Prefix	Horizontal 60°	Rad (in)	A (in)	B (in)	C (in)	L (in)
6"		-6H60-12	12	7-1/2	13	15	15-11/16
		-6H60-24	24	13-1/2	23-3/8	27	28-1/4
		-6H60-36	36	19-1/2	33-3/4	39	40-13/16
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9H60-12	12	8-1/4	14-5/16	16-1/2	17-1/4
		-9H60-24	24	14-1/4	24-11/16	28-1/2	29-13/16
		-9H60-36	36	20-1/4	36-1/16	40-1/2	42-3/8
12"	A(L)IYA A(L)IYB A(L)IYC	-12H60-12	12	9	15-9/16	18	18-7/8
		-12H60-24	24	15	26	30	31-7/16
		-12H60-36	36	21	36-3/8	42	44
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5  A(L)IMB A(L)IMC A(L)IMD	-18H60-12	12	10-1/2	18-3/16	21	22
		-18H60-24	24	16-1/2	28-9/16	33	34-9/16
		-18H60-36	36	22-1/2	39	45	47-1/8
24"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-24H60-12	12	12	20-3/4	24	25-1/8
		-24H60-24	24	18	31-3/16	36	37-11/16
		-24H60-36	36	24	41-9/16	48	50-1/4
30"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-30H60-12	12	13-1/2	23-3/8	27	28-1/4
		-30H60-24	24	19-1/2	33-3/4	39	40-13/16
		-30H60-36	36	25-1/2	44-3/16	51	53-3/8
36"		-36H60-12	12	15	26	30	31-7/16
		-36H60-24	24	21	36-3/8	42	44
		-36H60-36	36	27	46-3/4	54	56-9/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.

## HORIZONTAL 45 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12H45-24

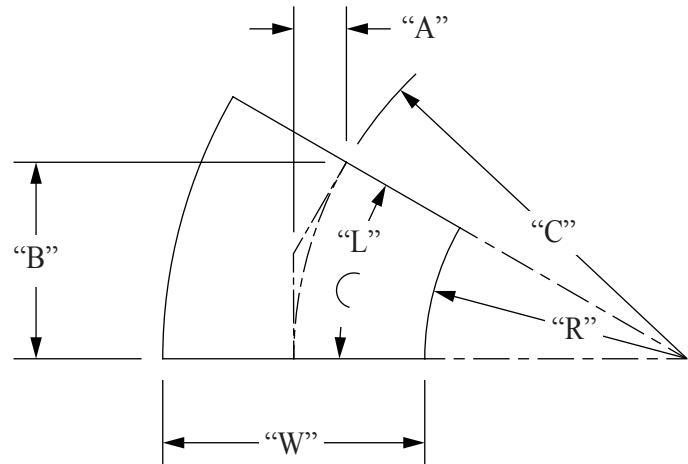
FITTING LAYOUT DIMENSIONS

Width (W)	Select Tray Prefix	Horizontal 45°	Rad (in)	A (in)	B (in)	C (in)	L (in)
6"		-6H45-12	12	4-3/8	10-5/8	15	11-3/4
		-6H45-24	24	7-15/16	19-1/16	27	21-3/16
		-6H45-36	36	11-7/16	27-9/16	39	30-5/8
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9H45-12	12	4-13/16	11-11/16	16-1/2	12-15/16
		-9H45-24	24	8-3/8	20-11/16	28-1/2	22-3/8
		-9H45-36	36	11-7/8	28-5/8	40-1/2	31-13/16
12"	A(L)IYA A(L)IYB A(L)IYC	-12H45-12	12	5-1/4	12-3/4	18	14-1/8
		-12H45-24	24	8-13/16	21-3/16	30	23-9/16
		-12H45-36	36	12-5/16	29-11/16	42	33
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18H45-12	12	6-1/8	14-7/8	21	16-1/2
		-18H45-24	24	9-11/16	23-5/16	33	25-15/16
		-18H45-36	36	13-3/16	31-13/16	45	35-5/16
24"	A(L)IMB A(L)IMC A(L)IMD	-24H45-12	12	7	17	24	18-7/8
		-24H45-24	24	10-9/16	25-7/16	36	28-1/4
		-24H45-36	36	14-1/16	33-15/16	48	37-11/16
30"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30H45-12	12	7-7/8	19-1/8	27	21-3/16
		-30H45-24	24	11-7/16	27-5/8	39	30-5/8
		-30H45-36	36	14-15/16	36-1/16	51	40-1/16
36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36H45-12	12	8-7/8	21-3/16	30	23-9/16
		-36H45-24	24	12-5/16	29-11/16	42	33
		-36H45-36	36	15-13/16	38-3/16	54	42-7/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.

HORIZONTAL 30 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12H30-24

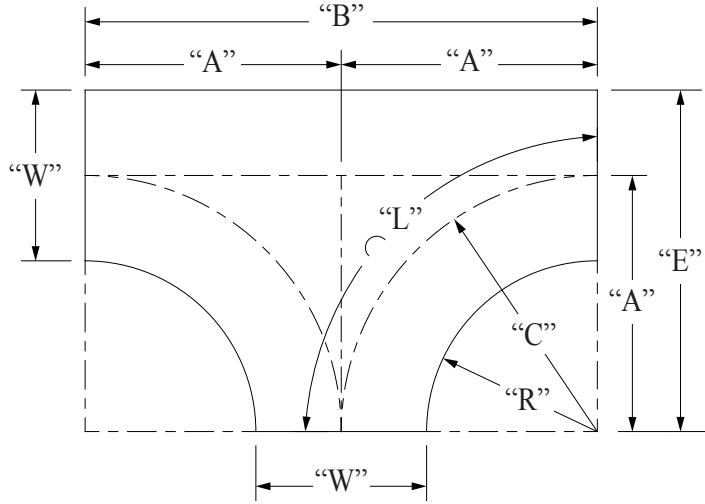


Width (W)	Select Tray Prefix	Horizontal 30°	Rad (in)	A (in)	B (in)	C (in)	L (in)
6"		-6H30-12	12	2	7-1/2	15	7-7/8
		-6H30-24	24	3-5/8	13-1/2	27	14-1/8
		-6H30-36	36	5-1/4	19-1/2	39	20-7/8
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9H30-12	12	2-3/16	8-1/4	16-1/2	8-5/8
		-9H30-24	24	3-13/16	14-1/4	28-1/2	14-7/8
		-9H30-36	36	5-7/16	20-1/4	40-1/2	21-1/4
12"	A(L)IYA A(L)IYB A(L)IYC	-12H30-12	12	2-7/16	9	18	9-7/16
		-12H30-24	24	4	15	30	15-11/16
		-12H30-36	36	5-5/8	21	42	22
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18H30-12	12	2-13/16	10-1/2	21	11
		-18H30-24	24	4-7/16	16-1/2	33	17-1/4
		-18H30-36	36	6	22-1/2	45	23-9/16
24"	A(L)IMB A(L)IMC A(L)IMD	-24H30-12	12	3-3/16	12	24	12-9/16
		-24H30-24	24	4-13/16	18	36	18-7/8
		-24H30-36	36	6-7/16	24	48	25-1/8
30"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30H30-12	12	3-5/8	13-1/2	27	14-1/8
		-30H30-24	24	5-1/4	19-1/2	39	20-7/16
		-30H30-36	36	6-13/16	25-1/2	51	26-3/4
36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36H30-12	12	4	15	30	15-11/16
		-36H30-24	24	5-5/8	21	42	22
		-36H30-36	36	7-1/4	27	54	28-1/4

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.



## HORIZONTAL TEE FITTING LAYOUT DIMENSIONS (Except 16 & 18)



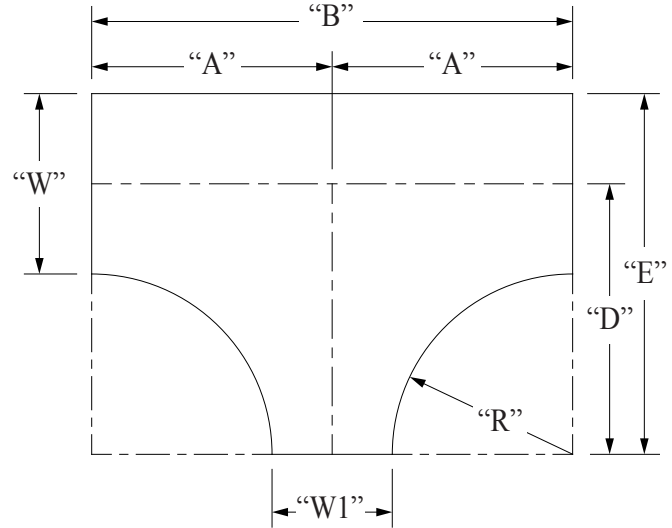
Sample Catalog Number	
Prefix	Fitting
ALIJC	-12T-24

Width (W)	Select Tray Prefix	Horizontal Tee	Rad (in)	A (in)	B (in)	C (in)	E (in)	L (in)
6"		-6T-12	12	15	30	15	18	23-9/16
		-6T-24	24	27	54	27	30	42-3/8
		-6T-36	36	39	78	39	42	61-1/4
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9T-12	12	16-1/2	33	16-1/2	21	25-15/16
		-9T-24	24	28-1/2	57	28-1/2	33	44-3/4
		-9T-36	36	40-1/2	81	40-1/2	45	63-5/8
12"	A(L)IYA A(L)IYB A(L)IYC	-12T-12	12	18	36	18	24	28-1/4
		-12T-24	24	30	60	30	36	47-1/8
		-12T-36	36	42	84	42	48	66
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18T-12	12	21	42	21	30	33
		-18T-24	24	33	66	33	42	51-13/16
		-18T-36	36	45	90	45	54	70-11/16
24"	A(L)IMB A(L)IMC A(L)IMD	-24T-12	12	24	48	24	36	37-11/16
		-24T-24	24	36	72	36	48	59-9/16
		-24T-36	36	48	96	48	60	75-7/16
30"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30T-12	12	27	54	27	42	42-7/16
		-30T-24	24	39	78	39	54	61-1/4
		-30T-36	36	51	102	51	66	80-1/8
36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36T-12	12	30	60	30	48	47-1/8
		-36T-24	24	42	84	42	60	66
		-36T-36	36	54	108	54	72	84-13/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12T9-24

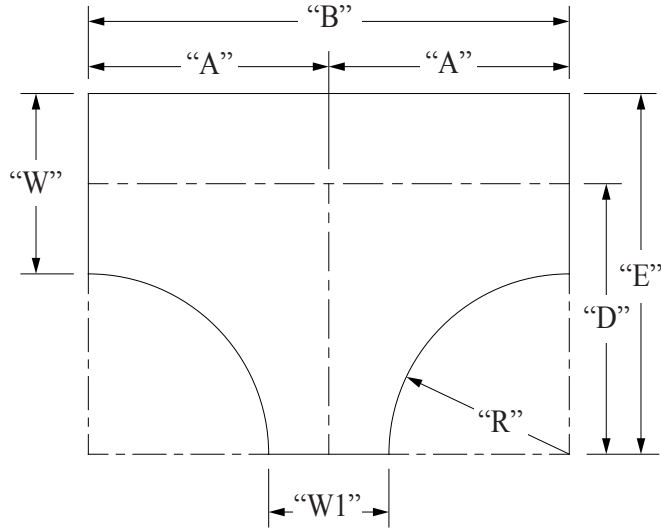


FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
9"	6"		-9T6-12	12	15	30	16-1/2	21
			-9T6-24	24	27	54	28-1/2	33
			-9T6-36	36	39	78	40-1/2	45
12"	6"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-12T6-12	12	15	30	18	24
			-12T6-24	24	27	54	30	36
			-12T6-36	36	39	78	42	48
12"	9"	A(L)IYA A(L)IYB A(L)IYC	-12T9-12	12	16-1/2	33	18	24
			-12T9-24	24	28-1/2	57	30	36
			-12T9-36	36	40-1/2	81	42	48
18"	6"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18T6-12	12	15	30	21	30
			-18T6-24	24	27	54	33	42
			-18T6-36	36	39	78	45	54
18"	9"	A(L)IMB A(L)IMC A(L)IMD	-18T9-12	12	16-1/2	33	21	30
			-18T9-24	24	28-1/2	57	21	30
			-18T9-36	36	40-1/2	81	45	54
18"	12"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-18T12-12	12	18	36	21	30
			-18T12-24	24	30	60	33	42
			-18T12-36	36	42	84	45	54
24"	6"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-24T6-12	12	15	30	24	36
			-24T6-24	24	27	54	36	48
			-24T6-36	36	39	78	48	60

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

## HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-24T9-24

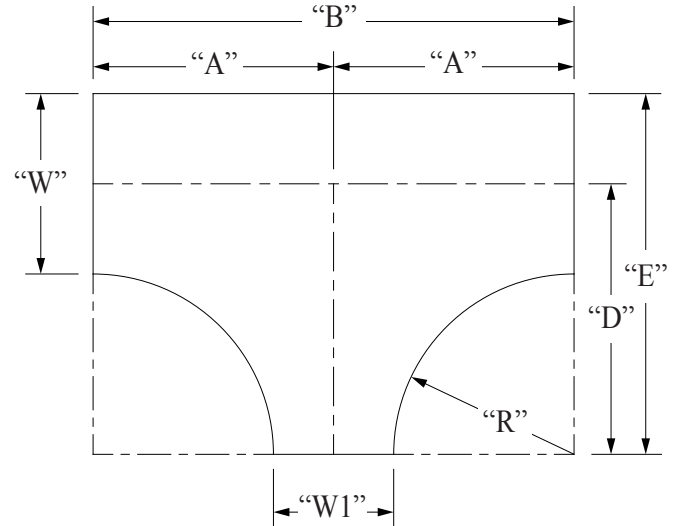
FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
24"	9"		-24T9-12	12	16-1/2	33	24	36
			-24T9-24	24	28-1/2	57	36	48
			-24T9-36	36	40-1/2	81	48	60
24"	12"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-24T12-12	12	18	36	24	36
			-24T12-24	24	30	60	36	48
			-24T12-36	36	42	84	48	60
24"	18"	A(L)IYA A(L)IYB A(L)IYC	-24T18-12	12	21	42	24	36
			-24T18-24	24	33	66	36	48
			-24T18-36	36	45	90	48	60
30"	6"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-30T6-12	12	15	30	27	42
			-30T6-24	24	27	54	39	54
			-30T6-36	36	39	78	51	66
30"	9"	A(L)IMB A(L)IMC A(L)IMD	-30T9-12	12	16-1/2	33	27	42
			-30T9-24	24	28-1/2	57	39	54
			-30T9-36	36	40-1/2	81	51	66
30"	12"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30T12-12	12	18	36	27	42
			-30T12-24	24	30	60	39	54
			-30T12-36	36	42	84	51	66
30"	18"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-30T18-12	12	21	42	27	42
			-30T18-24	24	33	66	39	54
			-30T18-36	36	45	90	51	66

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

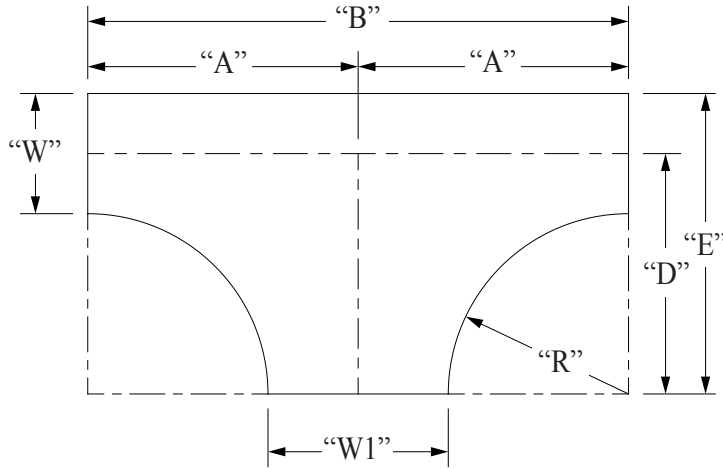
Sample Catalog Number	
Prefix	Fitting
ALIJC	-36T12-12



Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
30"	24"		30T24-12	12	24	48	27	42
			-30T24-24	24	36	72	39	54
			-30T24-36	36	48	96	51	66
36"	6"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-36T6-12	12	15	30	30	48
			-36T6-24	24	27	54	42	60
			-36T6-36	36	39	78	54	72
36"	9"	A(L)IYA A(L)IYB A(L)IYC	-36T9-12	12	16-1/2	33	30	48
			-36T9-24	24	28-1/2	57	42	60
			-36T9-36	36	40-1/2	81	54	72
36"	12"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-36T12-12	12	18	36	30	48
			-36T12-24	24	30	60	42	60
			-36T12-36	36	42	84	54	72
36"	18"	A(L)IMB A(L)IMC A(L)IMD	-36T18-12	12	21	42	30	48
			-36T18-24	24	33	66	42	60
			-36T18-36	36	45	90	54	72
36"	24"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-36T24-12	12	24	48	30	48
			-36T24-24	24	36	72	42	60
			-36T24-36	36	48	96	54	72
36"	30"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36T30-12	12	27	54	30	48
			-36T30-24	24	39	78	42	60
			-36T30-36	36	51	102	54	72

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

## HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-6T36-36

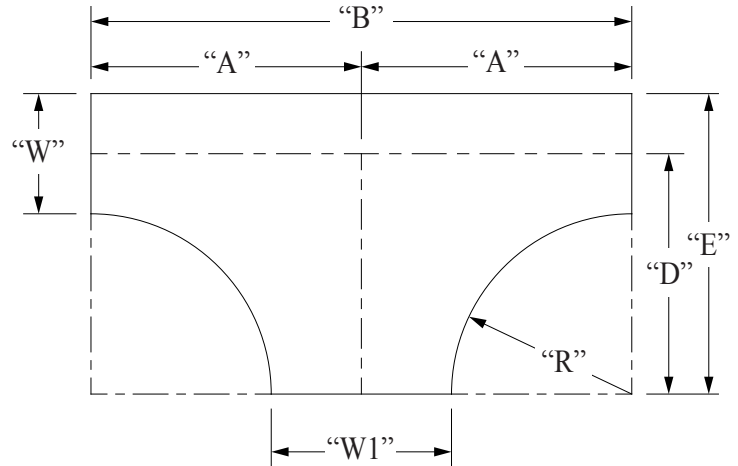
FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
6"	9"		-6T9-12	12	16-1/2	33	15	18
			-6T9-24	24	28-1/2	57	27	30
			-6T9-36	36	40-1/2	81	39	42
6"	12"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-6T12-12	12	18	36	15	18
			-6T12-24	24	30	60	27	30
			-6T12-36	36	42	84	39	42
6"	18"	A(L)IYA A(L)IYB A(L)IYC	-6T18-12	12	21	42	15	18
			-6T18-24	24	33	66	27	30
			-6T18-36	36	45	90	39	42
6"	24"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-6T24-12	12	24	48	15	18
			-6T24-24	24	36	72	27	30
			-6T24-36	36	48	96	39	42
6"	30"	A(L)IMB A(L)IMC A(L)IMD	-6T30-12	12	27	54	15	18
			-6T30-24	24	39	78	27	30
			-6T30-36	36	51	102	39	42
6"	36"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-6T36-12	12	30	60	15	18
			-6T36-24	24	42	84	27	30
			-6T36-36	36	54	108	39	42
9"	12"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-9T12-12	12	18	36	16-1/2	21
			-9T12-24	24	30	60	28-1/2	33
			-9T12-36	36	42	84	40-1/2	45

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12T30-24

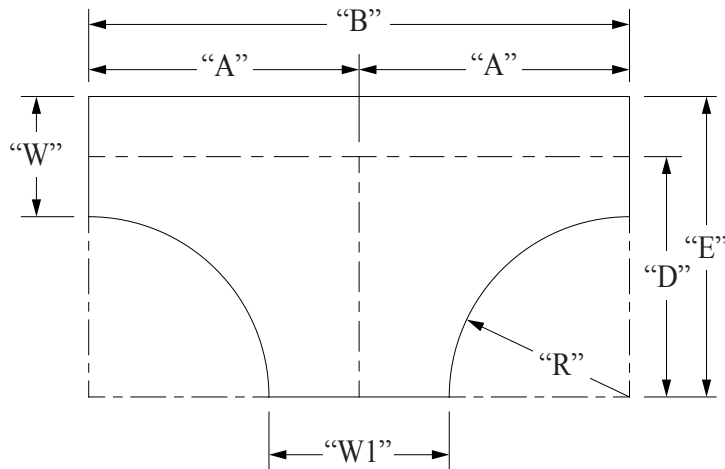


Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
9"	18"		-9T18-12	12	21	42	16-1/2	21
			-9T18-24	24	33	66	28-1/2	33
			-9T18-36	36	45	90	40-1/2	45
9"	24"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9T24-12	12	24	48	16-1/2	21
			-9T24-24	24	36	72	28-1/2	33
			-9T24-36	36	48	96	40-1/2	45
9"	30"	A(L)IYA A(L)IYB A(L)IYC	-9T30-12	12	27	54	16-1/2	21
			-9T30-24	24	39	78	28-1/2	33
			-9T30-36	36	51	102	40-1/2	45
9"	36"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-9T36-12	12	30	60	16-1/2	21
			-9T36-24	24	42	84	28-1/2	33
			-9T36-36	36	54	108	40-1/2	45
12"	18"	A(L)IMB A(L)IMC A(L)IMD	-12T18-12	12	21	42	18	24
			-12T18-24	24	33	66	30	36
			-12T18-36	36	45	90	42	48
12"	24"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-12T24-12	12	24	48	18	24
			-12T24-24	24	36	72	30	36
			-12T24-36	36	48	96	42	48
12"	30"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-12T30-12	12	27	54	18	24
			-12T30-24	24	39	78	30	36
			-12T30-36	36	51	102	42	48

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough



HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-18T24-24

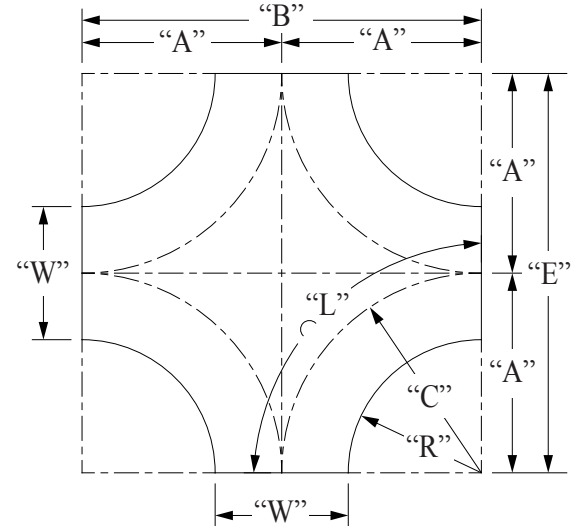
FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)
12"	36"		-12T36-12	12	30	60	18	24
			-12T36-24	24	42	84	30	36
			-12T36-36	36	54	108	42	48
18"	24"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-18T24-12	12	24	48	21	30
			-18T24-24	24	36	72	33	42
			-18T24-36	36	48	96	45	54
18"	30"	A(L)IYA A(L)IYB A(L)IYC	-18T30-12	12	27	54	21	30
			-18T30-24	24	39	78	33	42
			-18T30-36	36	51	102	45	54
18"	36"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18T36-12	12	30	60	21	30
			-18T36-24	24	42	84	33	42
			-18T36-36	36	54	108	45	54
24"	30"	A(L)IMB A(L)IMC A(L)IMD	-24T30-12	12	27	54	24	36
			-24T30-24	24	39	78	36	48
			-24T30-36	36	51	102	48	60
24"	36"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-24T36-12	12	30	60	24	36
			-24T36-24	24	42	84	36	48
			-24T36-36	36	54	108	48	60
30"	36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-30T36-12	12	30	60	27	36
			-30T36-24	24	42	84	39	48
			-30T36-36	36	54	108	51	60

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL CROSS FITTING LAYOUT DIMENSIONS (Except I6 & I8)

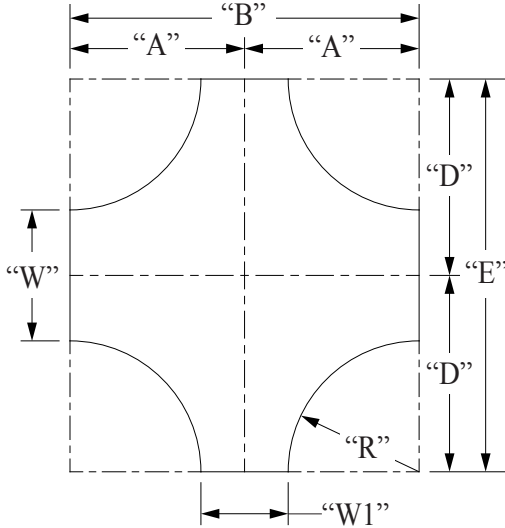
Sample Catalog Number	
Prefix	Fitting
ALIJC	-12X-24



Width (W)	Select Tray Prefix	Horizontal Cross	Rad (in)	A (in)	B (in)	C (in)	E (in)	L (in)
6"		-6X-12	12	15	30	15	30	23-9/16
		-6X-24	24	27	54	27	54	42-3/8
		-6X-36	36	39	78	39	78	61-1/4
9"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9X-12	12	16-1/2	33	16-1/2	33	25-7/8
		-9X-24	24	28-1/2	57	28-1/2	57	44-3/4
		-9X-36	36	40-1/2	81	40-1/2	81	63-5/8
12"	A(L)IYA A(L)IYB A(L)IYC	-12X-12	12	18	36	18	36	28-1/4
		-12X-24	24	30	60	30	60	47-1/8
		-12X-36	36	42	84	42	84	66
18"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18X-12	12	21	42	21	42	33
		-18X-24	24	33	66	33	66	51-13/16
		-18X-36	36	45	90	45	90	70-11/16
24"	A(L)IMB A(L)IMC A(L)IMD	-24X-12	12	24	48	24	48	37-11/16
		-24X-24	24	36	72	36	72	59-9/16
		-24X-36	36	48	96	48	96	75-7/16
30"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30X-12	12	27	54	27	54	42-7/16
		-30X-24	24	39	78	39	78	61-1/4
		-30X-36	36	51	102	51	102	80-1/8
36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36X-12	12	30	60	30	60	47-1/8
		-36X-24	24	42	84	42	84	66
		-36X-36	36	54	108	54	108	84-13/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS (Except 16 & 18)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-9X6-24

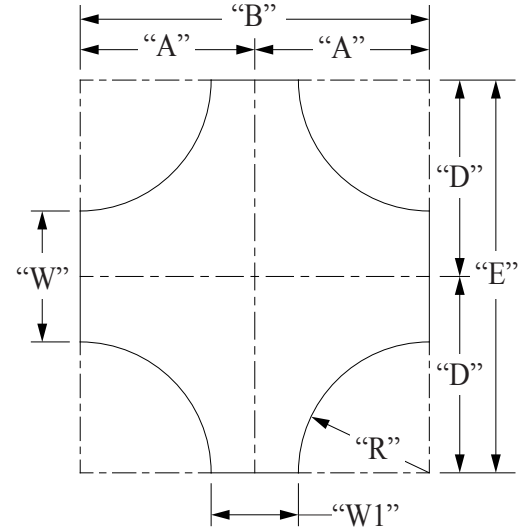
FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
9"	6"		-9X6-12	12	15	30	16-1/2	33
			-9X6-24	24	27	54	28-1/2	57
			-9X6-36	36	39	78	40-1/2	81
12"	6"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-12X6-12	12	15	30	18	36
			-12X6-24	24	27	54	30	60
			-12X6-36	36	39	78	42	84
12"	9"	A(L)IYA A(L)IYB A(L)IYC	-12X9-12	12	16-1/2	33	18	36
			-12X9-24	24	28-1/2	57	30	60
			-12X9-36	36	40-1/2	81	42	84
18"	6"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18X6-12	12	15	30	21	42
			-18X6-24	24	27	54	33	66
			-18X6-36	36	39	78	45	90
18"	9"	A(L)IMB A(L)IMC A(L)IMD	-18X9-12	12	16-1/2	33	21	42
			-18X9-24	24	28-1/2	57	33	66
			-18X9-36	36	40-1/2	81	45	90
18"	12"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-18X12-12	12	18	36	21	42
			-18X12-24	24	30	60	33	66
			-18X12-36	36	42	84	45	90
24"	6"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-24X6-12	12	15	30	24	48
			-24X6-24	24	27	54	36	72
			-24X6-36	36	39	78	48	96

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS (Except 16 & 18)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-24X12-24

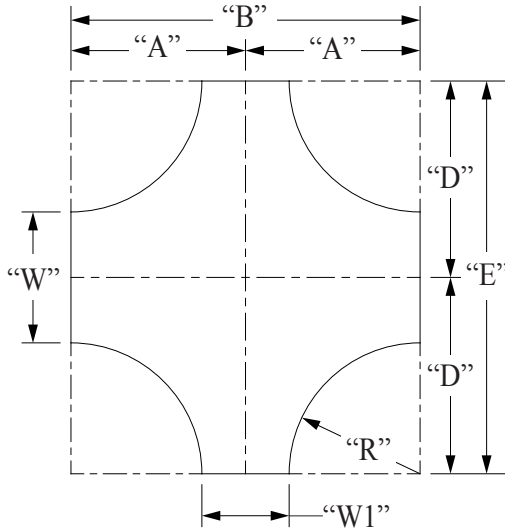


FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
24"	9"		-24X9-12	12	16-1/2	33	24	48
			-24X9-24	24	28-1/2	57	36	72
			-24X9-36	36	40-1/2	81	48	96
24"	12"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-24X12-12	12	18	36	24	48
			-24X12-24	24	30	60	36	72
			-24X12-36	36	42	84	48	96
24"	18"	A(L)IYA A(L)IYB A(L)IYC	-24X18-12	12	21	42	24	48
			-24X18-24	24	33	66	36	72
			-24X18-36	36	45	90	48	96
30"	6"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-30X6-12	12	15	30	27	54
			-30X6-24	24	27	54	39	78
			-30X6-36	36	39	78	51	102
30"	9"	A(L)IMB A(L)IMC A(L)IMD	-30X9-12	12	16-1/2	33	27	54
			-30X9-24	24	28-1/2	57	39	78
			-30X9-36	36	40-1/2	81	51	102
30"	12"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30X12-12	12	18	36	27	54
			-30X12-24	24	30	60	39	78
			-30X12-36	36	42	84	51	102
30"	18"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-30X18-12	12	21	42	27	54
			-30X18-24	24	33	66	39	78
			-30X18-36	36	45	90	51	102

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

## HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS (Except 16 & 18)



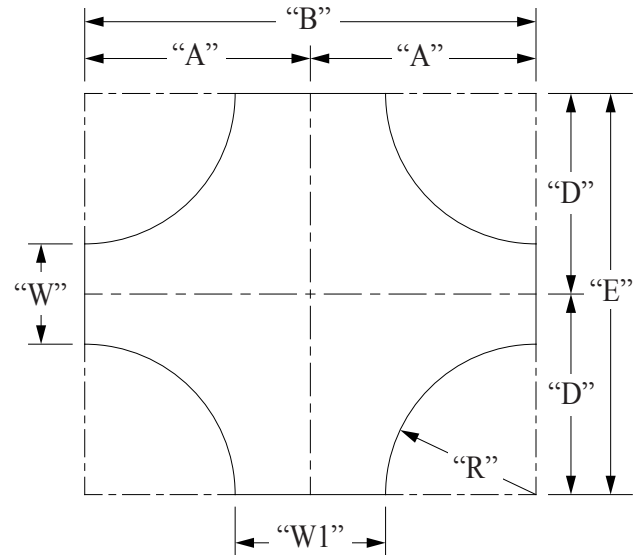
Sample Catalog Number	
Prefix	Fitting
ALIJC	-36X18-12

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
30"	24"		-30X24-12	12	24	48	27	54
			-30X24-24	24	36	72	39	78
			-30X24-36	36	48	96	51	102
36"	6"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-36X6-12	12	15	30	30	60
			-36X6-24	24	27	54	42	84
			-36X6-36	36	39	78	54	108
36"	9"	A(L)IYA A(L)IYB A(L)IYC	-36X9-12	12	16-1/2	33	30	60
			-36X9-24	24	28-1/2	57	42	84
			-36X9-36	36	40-1/2	81	54	108
36"	12"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-36X12-12	12	18	36	30	60
			-36X12-24	24	30	60	42	84
			-36X12-36	36	42	84	54	108
36"	18"	A(L)IMB A(L)IMC A(L)IMD	-36X18-12	12	21	42	30	60
			-36X18-24	24	33	66	42	84
			-36X18-36	36	45	90	54	108
36"	24"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-36X24-12	12	24	48	30	60
			-36X24-24	24	36	72	42	84
			-36X24-36	36	48	96	54	108
36"	30"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-36X30-12	12	27	54	30	60
			-36X30-24	24	39	78	42	84
			-36X30-36	36	51	102	54	108

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS (Except I6 & I8)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-6X9-24

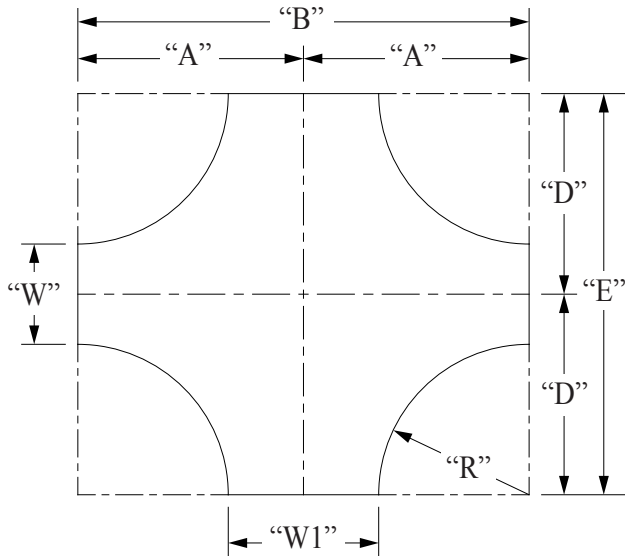


Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
6"	9"		-6X9-12	12	16-1/2	33	15	30
			-6X9-24	24	28-1/2	57	27	54
			-6X9-36	36	40-1/2	81	39	78
6"	12"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-6X12-12	12	18	36	15	30
			-6X12-24	24	30	60	27	54
			-6X12-36	36	42	84	39	78
6"	18"	A(L)IYA A(L)IYB A(L)IYC	-6X18-12	12	21	42	15	30
			-6X18-24	24	33	66	27	54
			-6X18-36	36	45	90	39	78
6"	24"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-6X24-12	12	24	48	15	30
			-6X24-24	24	36	72	27	54
			-6X24-36	36	48	96	39	78
6"	30"	A(L)IMB A(L)IMC A(L)IMD	-6X30-12	12	27	54	15	30
			-6X30-24	24	39	78	27	54
			-6X30-36	36	51	102	39	78
6"	36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-6X36-12	12	30	60	15	30
			-6X36-24	24	42	84	27	54
			-6X36-36	36	54	108	39	78
9"	12"		-9X12-12	12	18	36	16-1/2	33
			-9X12-24	24	30	60	28-1/2	57
			-9X12-36	36	42	84	40-1/2	81

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough



## HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-9X30-24

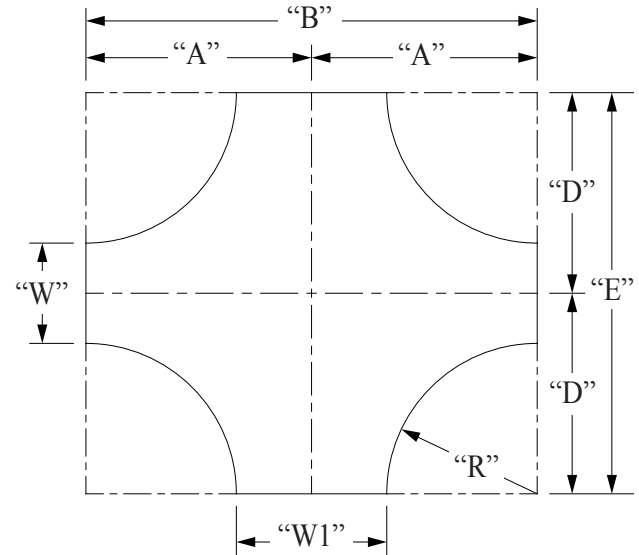
FITTING LAYOUT DIMENSIONS

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
9"	18"		-9X18-12	12	21	42	16-1/2	33
			-9X18-24	24	33	66	28-1/2	57
			-9X18-36	36	45	90	40-1/2	81
9"	24"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9X24-12	12	24	48	16-1/2	33
			-9X24-24	24	36	72	28-1/2	57
			-9X24-36	36	48	96	40-1/2	81
9"	30"	A(L)IYA A(L)IYB A(L)IYC	-9X30-12	12	27	54	16-1/2	33
			-9X30-24	24	39	78	28-1/2	57
			-9X30-36	36	51	102	40-1/2	81
9"	36"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-9X36-12	12	30	60	16-1/2	33
			-9X36-24	24	42	84	28-1/2	57
			-9X36-36	36	54	108	40-1/2	81
12"	18"	A(L)IMB A(L)IMC A(L)IMD	-12X18-12	12	21	42	18	36
			-12X18-24	24	33	66	30	60
			-12X18-36	36	45	90	42	84
12"	24"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-12X24-12	12	24	48	18	36
			-12X24-24	24	36	72	30	60
			-12X24-36	36	48	96	42	84
12"	30"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-12X30-12	12	27	54	18	36
			-12X30-24	24	39	78	30	60
			-12X30-36	36	51	102	42	84

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS (Except I6 & I8)

Sample Catalog Number	
Prefix	Fitting
ALIJC	-24X36-24

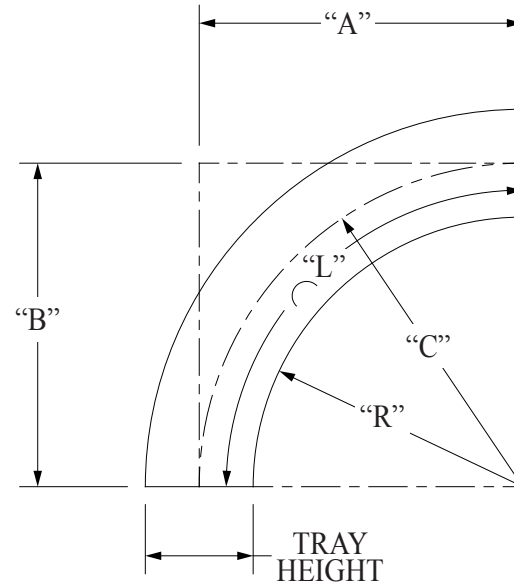
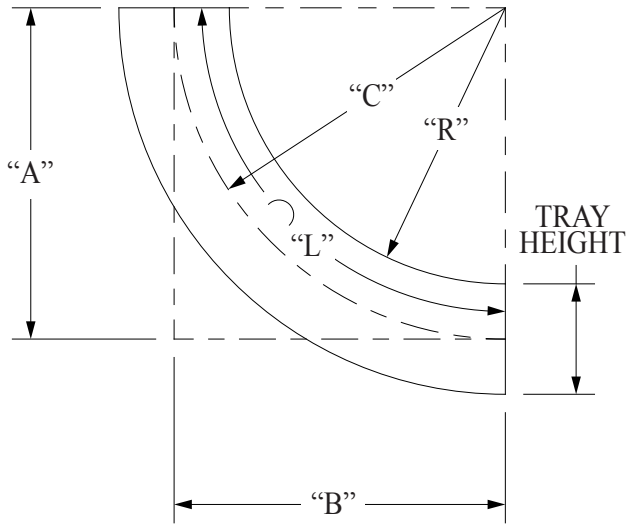


Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)
12"	36"		-12X36-12	12	30	60	18	36
			-12X36-24	24	42	84	30	60
			-12X36-36	36	54	108	42	84
18"	24"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-18X24-12	12	24	48	21	42
			-18X24-24	24	36	72	33	66
			-18X24-36	36	48	96	45	90
18"	30"	A(L)IYA A(L)IYB A(L)IYC	-18X30-12	12	27	54	21	42
			-18X30-24	24	39	78	33	66
			-18X30-36	36	51	102	45	90
18"	36"	A(L)IJC5 A(L)IYB5 A(L)IYC5	-18X36-12	12	30	60	21	42
			-18X36-24	24	42	84	33	66
			-18X36-36	36	54	108	45	90
24"	30"	A(L)IMB A(L)IMC A(L)IMD	-24X30-12	12	27	54	24	48
			-24X30-24	24	39	78	36	72
			-24X30-36	36	51	102	48	96
24"	36"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-24X36-12	12	30	60	24	48
			-24X36-24	24	42	84	36	72
			-24X36-36	36	54	108	48	96
30"	36"	A(L)IMC7 A(L)IXC7 A(L)IXD7	-30X36-12	12	30	60	27	54
			-30X36-24	24	42	84	39	78
			-30X36-36	36	54	108	51	102

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

VERTICAL 90 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VI90-24

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VO90-24

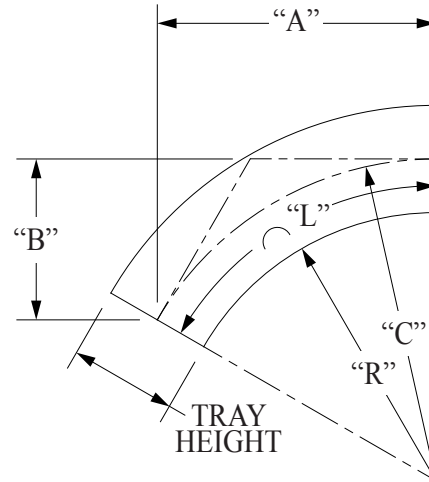
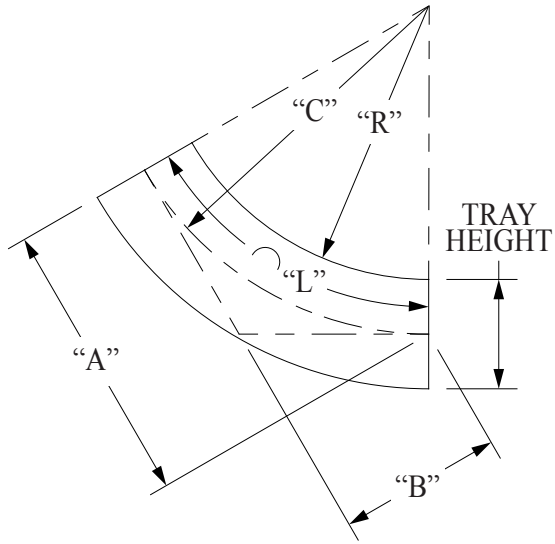
Tray Height	Select Tray Prefix	Vertical Inside 90°	Vertical Outside 90°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VI90-12	-(W)VO90-12	12	11-7/8	14-1/8	14-1/8	14-1/8	22-3/16
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	24-3/4	24-3/4	24-3/4	38-7/8
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	36-7/8	36-7/8	36-7/8	57-15/16
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VI90-12	-(W)VO90-12	12	11-7/8	14-3/8	14-3/8	14-3/8	22-9/16
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	25	25	25	39-1/4
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	37-1/8	37-1/8	37-1/8	58-5/16
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VI90-12	-(W)VO90-12	12	11-7/8	14-7/8	14-7/8	14-7/8	23-3/8
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	25-1/2	25-1/2	25-1/2	40-1/16
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	37-5/8	37-5/8	37-5/8	57-1/2
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VI90-12	-(W)VO90-12	12	11-7/8	15-3/8	15-3/8	15-3/8	24-5/32
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	26	26	26	40-7/8
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	38-1/8	38-1/8	38-1/8	59-3/4

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.

VERTICAL 60 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VI60-24

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VO60-24

Tray Height	Select Tray Prefix	Vertical Inside 60°	Vertical Outside 60°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VI60-12	-(W)VO60-12	12	11-7/8	12-1/4	7-1/16	14-1/8	14-13/16
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	21-7/16	12-3/8	24-3/4	25-15/16
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	31-13/16	18-3/8	36-7/8	38-1/2
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VI60-12	-(W)VO60-12	12	11-7/8	12-7/16	7-3/16	14-1/8	15-1/16
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	21-21/32	12-1/2	24-3/4	26-3/16
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	32-5/32	18-9/16	36-7/8	38-7/8
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VI60-12	-(W)VO60-12	12	11-7/8	12-7/8	7-7/16	14-1/8	15-9/16
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	22-1/16	12-3/4	24-3/4	26-11/16
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	32-1/2	18-3/4	36-7/8	38-1/4
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VI60-12	-(W)VO60-12	12	11-7/8	13-5/16	7-11/16	14-1/8	16-1/8
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	22-1/2	13	24-3/4	27-1/4
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	32-15/16	19	36-7/8	39-13/16

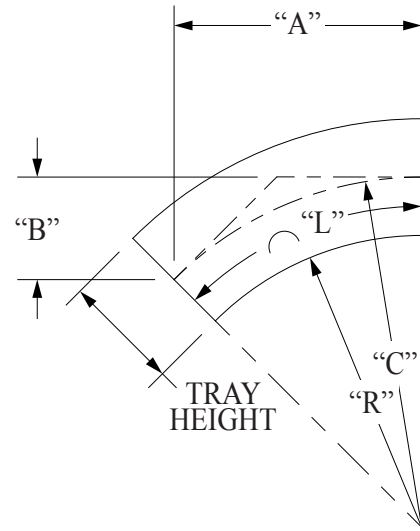
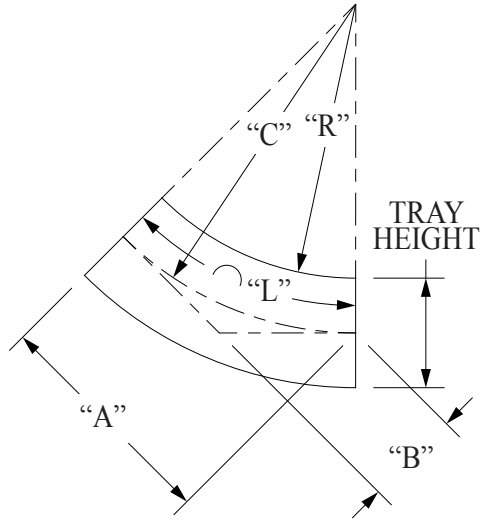
(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.

VERTICAL 45 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)

FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VI45-24

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VO45-24

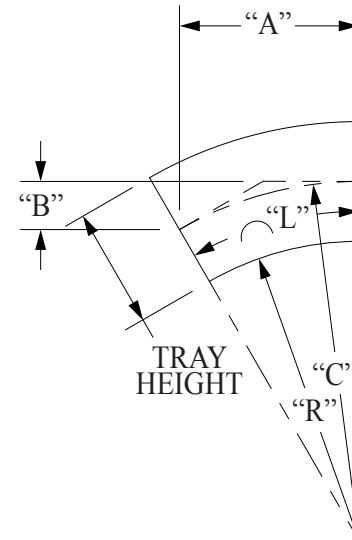
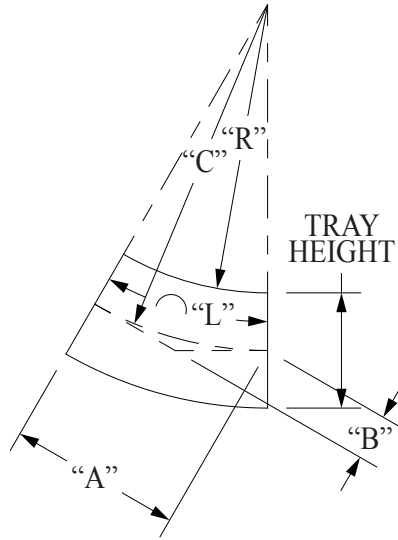
Tray Height	Select Tray Prefix	Vertical Inside 45°	Vertical Outside 45°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VI45-12	-(W)VO45-12	12	11-7/8	10	4-1/8	14-1/8	11-1/8
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	17-1/2	7-1/4	24-3/4	19-7/16
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	26	10-3/4	36-7/8	28-7/8
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VI45-12	-(W)VO45-12	12	11-7/8	10-5/32	4-7/32	14-1/8	11-9/32
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	17-11/16	7-5/16	24-3/4	19-5/8
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	26-1/4	10-7/8	36-7/8	29-5/32
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VI45-12	-(W)VO45-12	12	11-7/8	10-1/2	4-3/8	14-1/8	11-11/16
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	18	7-1/2	24-3/4	20
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	26-1/2	11	36-7/8	29-7/16
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VI45-12	-(W)VO45-12	12	11-7/8	10-7/8	4-1/2	14-1/8	12-1/16
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	18-3/8	7-5/8	24-3/4	20-7/16
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	26-7/8	11-1/8	36-7/8	29-13/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.

VERTICAL 30 DEGREE FITTING LAYOUT DIMENSIONS (Except I6 & I8)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VI30-24

Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VO30-24

Tray Height	Select Tray Prefix	Vertical Inside 30°	Vertical Outside 30°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VI30-12	-(W)VO30-12	12	11-7/8	7-1/16	1-7/8	14-1/8	7-3/8
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	12-3/8	3-5/16	24-3/4	12-15/16
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	18-3/8	4-15/16	36-7/8	19-1/4
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VI30-12	-(W)VO30-12	12	11-7/8	7-3/16	1-15/16	14-1/8	7-17/32
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	12-1/2	3-11/32	24-3/4	13-3/32
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	18-9/16	4-31/32	36-7/8	19-7/16
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VI30-12	-(W)VO30-12	12	11-7/8	7-7/16	2	14-1/8	7-3/4
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	12-3/4	3-7/16	24-3/4	13-5/16
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	18-3/4	5	36-7/8	19-5/8
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VI30-12	-(W)VO30-12	12	11-7/8	7-11/16	2-1/16	14-1/8	8-1/16
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	13	3-1/2	24-3/4	13-5/8
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	19	5-1/8	36-7/8	19-7/8

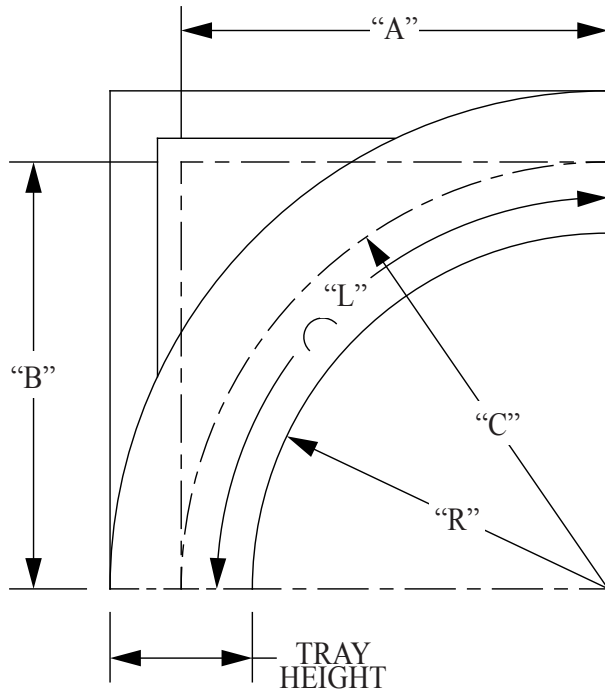
(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.



VERTICAL CABLE SUPPORT ELBOW LAYOUT DIMENSIONS (Except I6 & I8)

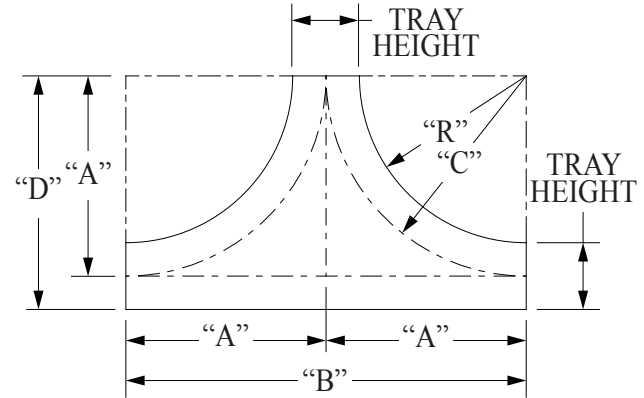
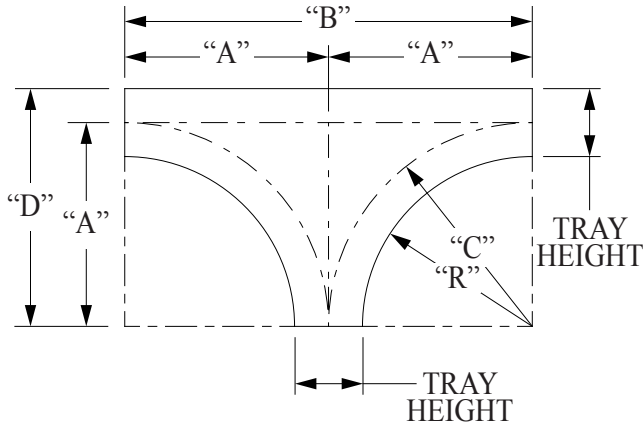


Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VS-24

Tray Height	Select Tray Prefix	Vertical Support Elbow 90°	Rad (in)	R (in)	A (in)	B/C (in)	L (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VS-12	12	11-7/8	14-1/8	14-1/8	22-3/16
		-(W)VS-24	24	22-1/2	24-3/4	24-3/4	38-7/8
		-(W)VS-36	36	34-5/8	36-3/4	36-3/4	57-3/4
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VS-12	12	11-7/8	14-3/8	14-3/8	22-9/16
		-(W)VS-24	24	22-1/2	25	25	39-9/32
		-(W)VS-36	36	34-5/8	37-1/8	37-1/8	58-5/16
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VS-12	12	11-7/8	14-7/8	14-7/8	23-3/8
		-(W)VS-24	24	22-1/2	25-1/2	25-1/2	40-1/16
		-(W)VS-36	36	34-5/8	37-1/2	37-1/2	58-15/16
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VS-12	12	11-7/8	15-3/8	15-3/8	24-5/32
		-(W)VS-24	24	22-1/2	26	26	40-7/8
		-(W)VS-36	36	34-5/8	38	38	59-11/16

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36).

VERTICAL TEE LAYOUT DIMENSIONS (Except 16 & 18)



Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VT-24

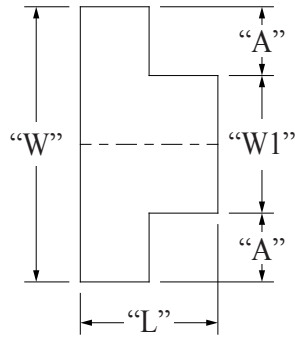
Sample Catalog Number	
Prefix	Fitting
ALIJC	-12VTU-24

Tray Height	Select Tray Prefix	Vertical Tee Down	Vertical Tee Up	Rad (in)	R (in)	A (in)	B (in)	C (in)	D (in)
4.5"	A(L)IJA, A(L)IJB, A(L)IJC, A(L)IJD, A(L)IYA, A(L)IYB, A(L)IYC	-(W)VT-12	-(W)VTU-12	12	11-7/8	14-1/8	28-1/4	14-1/8	16-3/8
		-(W)VT-24	-(W)VTU-24	24	22-1/2	24-3/4	49-1/2	24-3/4	27
		-(W)VT-36	-(W)VTU-36	36	34-5/8	36-7/8	73-3/4	36-7/8	39-1/8
5"	A(L)IJC5, A(L)IYB5, A(L)IYC5	-(W)VT-12	-(W)VTU-12	12	11-7/8	14-3/8	28-3/4	14-3/8	16-7/8
		-(W)VT-24	-(W)VTU-24	24	22-1/2	25	50	25	27-1/2
		-(W)VT-36	-(W)VTU-36	36	34-5/8	37-1/8	74-1/4	37-1/8	39-5/8
6"	A(L)IMB, A(L)IMC, A(L)IMD, A(L)IXA, A(L)IXB, A(L)IXC, A(L)IXD	-(W)VT-12	-(W)VTU-12	12	11-7/8	14-7/8	29-3/4	14-7/8	17-7/8
		-(W)VT-24	-(W)VTU-24	24	22-1/2	25-1/2	51	25-1/2	28-1/2
		-(W)VT-36	-(W)VTU-36	36	34-5/8	37-5/8	75-1/4	37-5/8	40-5/8
7"	A(L)IMC7, A(L)IXC7, A(L)IXD7	-(W)VT-12	-(W)VTU-12	12	11-7/8	15-3/8	30-3/4	15-3/8	18-7/8
		-(W)VT-24	-(W)VTU-24	24	22-1/2	26	52	26	29-1/2
		-(W)VT-36	-(W)VTU-36	36	34-5/8	38-1/8	76-1/4	38-1/8	41-5/8

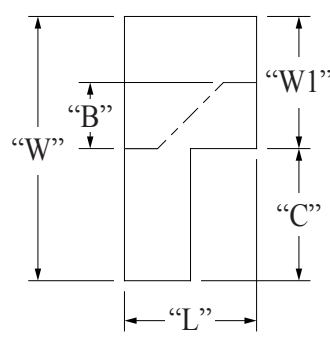
(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough  
(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36).

## REDUCER LAYOUT DIMENSIONS (Except I6 & I8)

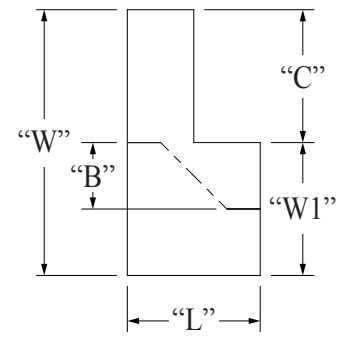
Straight (Concentric) Reducer



Left Hand Reducer



Right Hand Reducer



Sample Catalog Number

Prefix	Fitting
ALIJC	-36R24

Sample Catalog Number

Prefix	Fitting
ALIJC	-36RL24

Sample Catalog Number

Prefix	Fitting
ALIJC	-36RR24

Width (W)	Width (W1)	Select Tray Prefix	Reducer Straight	Reducer Left Hand	Reducer Right Hand	A/B (in)	C (in)
9"	6"	A(L)IJA A(L)IJB A(L)IJC A(L)IJD	-9R6	-9RL6	-9RR6	1-1/2	3
12"	6"		-12R6	-12RL6	-12RR6	3	6
12"	9"		-12R9	-12RL9	-12RR9	1-1/2	3
18"	6"		-18R6	-18RL6	-18RR6	6	12
18"	9"	A(L)IYA A(L)IYB A(L)IYC A(L)IYD	-18R9	-18RL9	-18RR9	4-1/2	9
18"	12"		-18R12	-18RL12	-18RR12	3	6
24"	6"		-24R6	-24RL6	-24RR6	9	18
24"	9"		-24R9	-24RL9	-24RR9	7-1/2	15
24"	12"	A(L)IJC5 A(L)IYB5 A(L)IYC5 A(L)IYD5	-24R12	-24RL12	-24RR12	6	12
24"	18"		-24R18	-24RL18	-24RR18	3	6
30"	6"		-30R6	-30RL6	-30RR6	12	24
30"	9"		-30R9	-30RL9	-30RR9	10-1/2	21
30"	12"	A(L)IXA A(L)IXB A(L)IXC A(L)IXD	-30R12	-30RL12	-30RR12	9	18
30"	18"		-30R18	-30RL18	-30RR18	6	12
30"	24"		-30R24	-30RL24	-30RR24	3	6
36"	6"		-36R6	-36RL6	-36RR6	15	30
36"	9"	A(L)IMC7 A(L)IXC7 A(L)IXD7 A(L)IXE7	-36R9	-36RL9	-36RR9	13-1/2	27
36"	12"		-36R12	-36RL12	-36RR12	12	24
36"	18"		-36R18	-36RL18	-36RR18	9	18
36"	24"		-36R24	-36RL24	-36RR24	6	12
36"	30"		-36R30	-36RL30	-36RR30	3	6

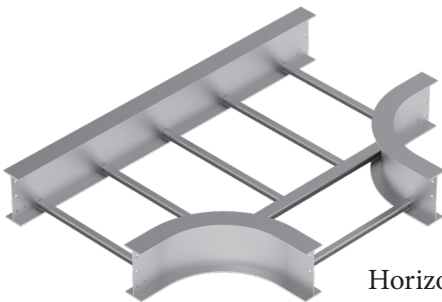
"L" = 12" Long

(L) = Ladder, (S) for Solid Bottom Trough, ( ) Blank for Ventilated Trough or (4) for 4" Rung Spacing on 6" - 36" wide Ventilated Trough

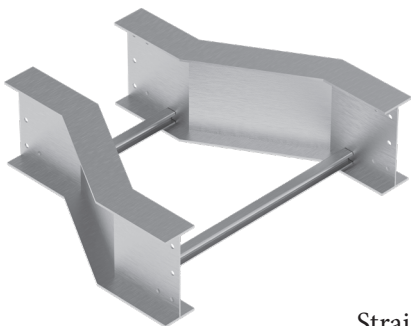
# I-BEAM FITTING LAYOUT DIMENSIONS (For I6 & I8)



Horizontal 90



Horizontal Tee



Straight Reducer

*Manufactured & Tested In  
Accordance With NEMA VE-1*

*Classified By UL As An Equipment  
Grounding Conductor*

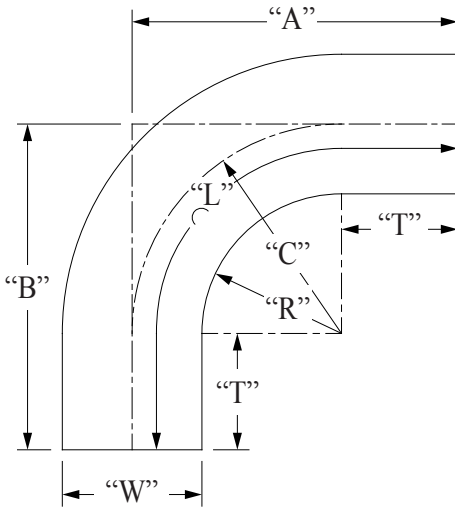
*CSA Classified Trays Available*

Table of Contents	Page
Horizontal Fittings	198 - 201
Horizontal Tees	202 - 208
Horizontal Crosses	209 - 215
Vertical Fittings	216 - 217
Vertical Support Elbows	218
Vertical Tees	218
Reducers	219



**mphusky**

## 16 & 18 HORIZONTAL 90 DEGREE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12H90-24

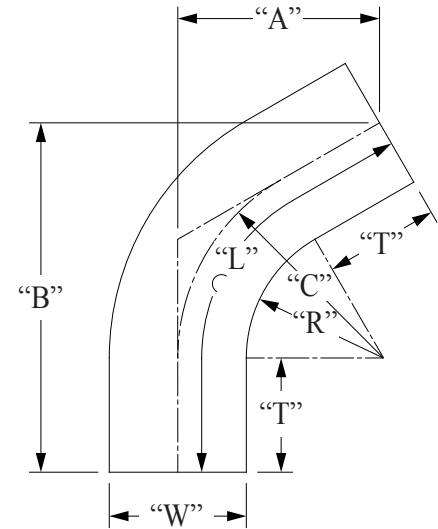
16 & 18 FITTING LAYOUT DIM

Width (W)	Select Tray Prefix	Horizontal 90°	Rad (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	-6H90-12	12	20	20	15	33-9/16	5
		-6H90-24	24	32	32	27	52-3/4	5
		-6H90-36	36	44	44	39	71-1/4	5
9"		-9H90-12	12	21-1/2	21-1/2	16-1/2	35-7/8	5
		-9H90-24	24	33-1/2	33-1/2	28-1/2	54-3/4	5
		-9H90-36	36	45-1/2	45-1/2	40-1/2	73-5/8	5
12"		-12H90-12	12	23	23	18	38-1/4	5
		-12H90-24	24	35	35	30	57-1/8	5
		-12H90-36	36	47	47	42	76	5
18"		-18H90-12	12	26	26	21	43	5
		-18H90-24	24	38	38	33	61-13/16	5
		-18H90-36	36	50	50	45	80-11/16	5
24"		-24H90-12	12	29	29	24	47-11/16	5
		-24H90-24	24	41	41	36	66-9/16	5
		-24H90-36	36	53	53	48	85-7/16	5
30"		-30H90-12	12	32	32	27	52-7/16	5
		-30H90-24	24	44	44	39	71-1/4	5
		-30H90-36	36	56	56	51	90-1/8	5
36"		-36H90-12	12	35	35	30	57-1/8	5
		-36H90-24	24	47	47	42	76	5
		-36H90-36	36	59	59	54	94-13/16	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.

I6 & I8 HORIZONTAL 60 DEGREE FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-12H60-24



I6 & I8 FITTING LAYOUT DIM

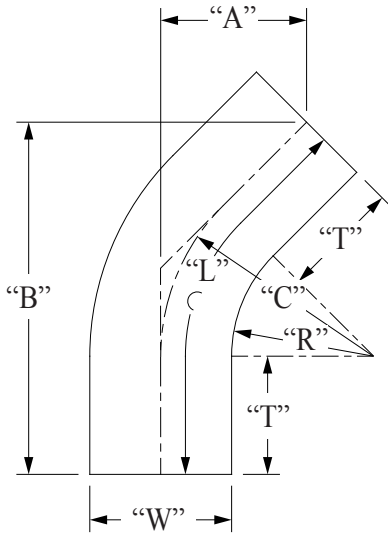
Width (W)	Select Tray Prefix	Horizontal 60°	Rad (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	-6H60-12	12	11-27/32	20-1/2	15	25-11/16	5
		-6H60-24	24	17-27/32	30-7/8	27	38-9/32	5
		-6H60-36	36	23-27/32	41-9/32	39	50-27/32	5
9"		-9H60-12	12	12-19/32	21-25/32	16-1/2	27-9/32	5
		-9H60-24	24	18-19/32	32-3/16	28-1/2	39-27/32	5
		-9H60-36	36	24-19/32	42-9/16	40-1/2	52-13/32	5
12"		-12H60-12	12	13-11/32	23-3/32	18	28-27/32	5
		-12H60-24	24	19-11/32	33-15/32	30	41-13/32	5
		-12H60-36	36	25-11/32	43-7/8	42	54	5
18"		-18H60-12	12	14-27/32	25-11/16	21	32	5
		-18H60-24	24	20-27/32	36-3/32	33	44-9/16	5
		-18H60-36	36	26-27/32	46-15/32	45	57-1/8	5
24"		-24H60-12	12	16-11/32	28-9/32	24	35-1/8	5
		-24H60-24	24	22-11/32	38-11/16	36	47-11/16	5
		-24H60-36	36	28-11/32	49-1/16	48	60-1/4	5
30"		-30H60-12	12	17-27/32	30-7/8	27	38-9/32	5
		-30H60-24	24	23-27/32	41-9/32	39	50-27/32	5
		-30H60-36	36	29-27/32	51-21/32	51	63-13/32	5
36"		-36H60-12	12	19-11/32	33-15/32	30	41-13/32	5
		-36H60-24	24	25-11/32	43-7/8	42	54	5
		-36H60-36	36	31-11/32	54-1/4	54	66-9/16	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.



## 16 & 18 HORIZONTAL 45 DEGREE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12H45-24

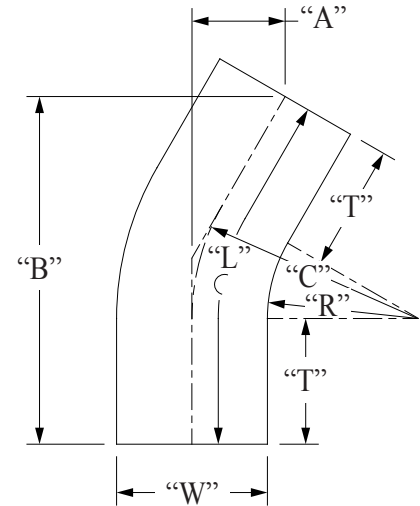
16 & 18 FITTING LAYOUT DIM

Width (W)	Select Tray Prefix	Horizontal 45°	Rad (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	6H45-12	12	7-15/16	19-5/32	15	21-25/32	5
		-6H45-24	24	11-7/16	27-5/8	27	31-7/32	5
		-6H45-36	36	14-31/32	36-1/8	39	40-5/8	5
9"		-9H45-12	12	8-3/8	20-3/16	16-1/2	22-31/32	5
		-9H45-24	24	11-7/8	28-11/16	28-1/2	32-3/8	5
		-9H45-36	36	15-13/32	37-3/16	40-1/2	41-13/16	5
12"		-12H45-12	12	8-13/16	21-1/4	18	24-1/8	5
		-12H45-24	24	12-5/16	29-3/4	30	33-9/16	5
		-12H45-36	36	15-27/32	38-7/32	42	43	5
18"		-18H45-12	12	9-11/16	23-3/8	21	26-1/2	5
		-18H45-24	24	13-3/16	31-7/8	33	35-29/32	5
		-18H45-36	36	16-23/32	40-11/32	45	45-11/32	5
24"		-24H45-12	12	10-9/16	25-1/2	24	28-27/32	5
		-24H45-24	24	14-3/32	34	36	38-9/32	5
		-24H45-36	36	17-19/32	42-15/32	48	47-11/16	5
30"		-30H45-12	12	11-7/16	27-5/8	27	31-7/32	5
		-30H45-24	24	14-31/32	36-1/8	39	40-5/8	5
		-30H45-36	36	18-15/32	44-19/32	51	50-1/16	5
36"		-36H45-12	12	12-5/16	29-3/4	30	33-9/16	5
		-36H45-24	24	15-27/32	38-7/32	42	43	5
		-36H45-36	36	19-11/32	46-23/32	54	52-13/32	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough  
Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.

I6 & I8 HORIZONTAL 30 DEGREE FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-12H30-24



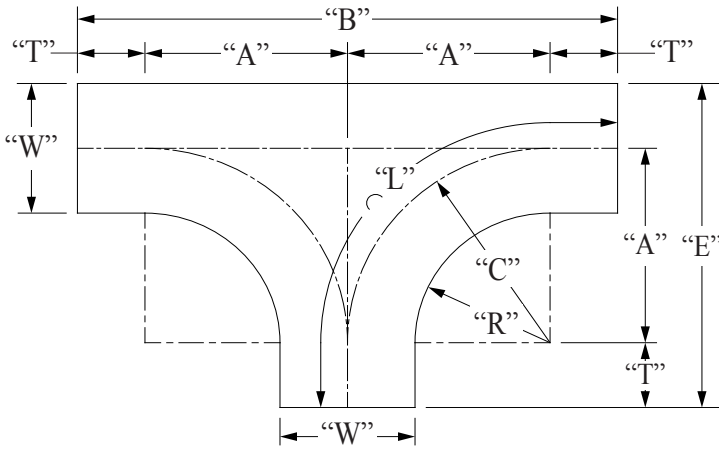
I6 & I8 FITTING LAYOUT DIM

Width (W)	Select Tray Prefix	Horizontal 30°	Rad (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	-6H30-12	12	4-1/2	16-27/32	15	17-27/32	5
		-6H30-24	24	6-1/8	22-27/32	27	24-1/8	5
		-6H30-36	36	7-23/32	28-27/32	39	30-7/16	5
9"		-9H30-12	12	4-23/32	19-19/32	16-1/2	18-5/8	5
		-9H30-24	24	6-5/16	23-19/32	28-1/2	24-15/16	5
		-9H30-36	36	7-15/16	29-19/32	40-1/2	31-7/32	5
12"		-12H30-12	12	4-29/32	18-11/32	18	19-7/16	5
		-12H30-24	24	6-17/32	24-11/32	30	25-11/16	5
		-12H30-36	36	8-1/8	30-11/32	42	32	5
18"		-18H30-12	12	5-5/16	19-27/32	21	21	5
		-18H30-24	24	6-29/32	25-27/32	33	27-9/32	5
		-18H30-36	36	8-17/32	31-27/32	45	33-9/16	5
24"		-24H30-12	12	5-23/32	21-11/32	24	22-9/16	5
		-24H30-24	24	7-5/16	27-11/32	36	28-27/32	5
		-24H30-36	36	8-15/16	33-27/32	48	35-1/8	5
30"		-30H30-12	12	6-1/8	22-27/32	27	24-1/8	5
		-30H30-24	24	7-23/32	28-27/32	39	30-7/16	5
		-30H30-36	36	9-11/32	34-27/32	51	36-11/16	5
36"		-36H30-12	12	6-17/32	24-11/32	30	25-23/32	5
		-36H30-24	24	8-1/8	30-11/32	42	32	5
		-36H30-36	36	9-3/4	36-11/32	54	38-9/32	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

Double "B" for Length of back-to-back fittings or "A" for Offset Change of back-to-back fittings.

## 16 &amp; 18 HORIZONTAL TEE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12T-24

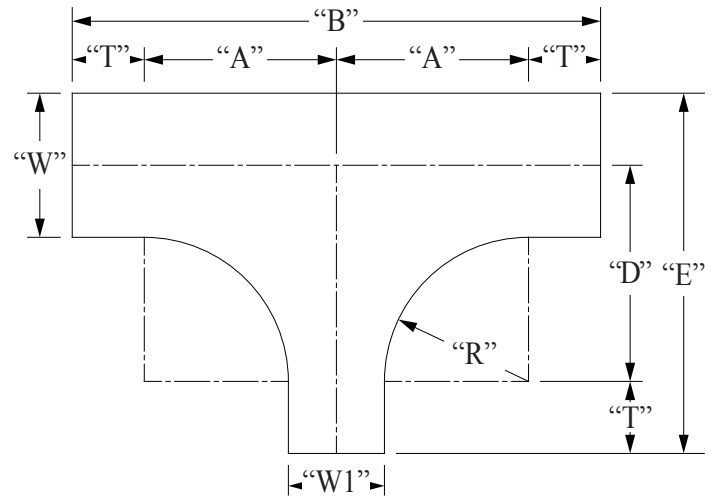
16 &amp; 18 FITTING LAYOUT DIM

Width (W)	Select Tray Prefix	Horizontal Tee	Rad (in)	A (in)	B (in)	C (in)	E (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	-6T-12	12	15	40	15	23	33-9/16	5
		-6T-24	24	27	64	27	35	52-13/32	5
		-6T-36	36	39	88	39	47	71-1/4	5
9"		-9T-12	12	16-1/2	43	16-1/2	26	35-29/32	5
		-9T-24	24	28-1/2	67	28-1/2	38	54-3/4	5
		-9T-36	36	40-1/2	91	40-1/2	50	73-5/8	5
12"		-12T-12	12	18	46	18	29	38-9/32	5
		-12T-24	24	30	70	30	41	57-1/8	5
		-12T-36	36	42	94	42	53	75-31/32	5
18"		-18T-12	12	21	52	21	35	43	5
		-18T-24	24	33	76	33	47	61-27/32	5
		-18T-36	36	45	100	45	59	80-11/16	5
24"		-24T-12	12	24	58	24	41	47-11/16	5
		-24T-24	24	36	82	36	53	66-9/16	5
		-24T-36	36	48	106	48	65	85-13/32	5
30"		-30T-12	12	27	64	27	47	52-13/32	5
		-30T-24	24	39	88	39	59	71-1/4	5
		-30T-36	36	51	112	51	71	90-1/8	5
36"		-36T-12	12	30	70	30	53	57-1/8	5
		-36T-24	24	42	94	42	65	75-31/32	5
		-36T-36	36	54	118	54	77	94-13/16	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

I6 & I8 HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-12T9-24

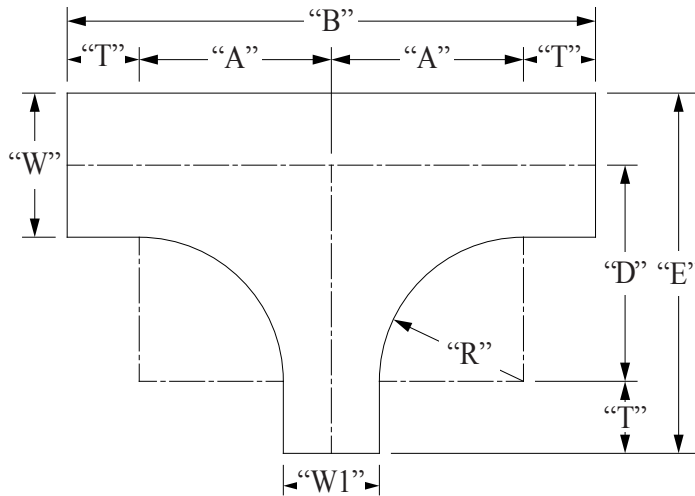


I6 & I8 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
9"	6"	A(L)I6  A(L)I8	-9T6-12	12	15	40	16-1/2	26	5
			-9T6-24	24	27	64	28-1/2	38	5
			-9T6-36	36	39	88	40-1/2	50	5
12"	6"		-12T6-12	12	15	40	18	29	5
			-12T6-24	24	27	64	30	41	5
			-12T6-36	36	39	88	42	53	5
12"	9"		-12T9-12	12	16-1/2	43	18	29	5
			-12T9-24	24	28-1/2	67	30	41	5
			-12T9-36	36	40-1/2	91	42	53	5
18"	6"		-18T6-12	12	15	40	21	35	5
			-18T6-24	24	27	64	33	47	5
			-18T6-36	36	39	88	45	59	5
18"	9"		-18T9-12	12	16-1/2	43	21	35	5
			-18T9-24	24	28-1/2	67	33	47	5
			-18T9-36	36	40-1/2	91	45	59	5
18"	12"		-18T12-12	12	18	46	21	35	5
			-18T12-24	24	30	70	33	47	5
			-18T12-36	36	42	94	45	59	5
24"	6"		-24T6-12	12	15	40	24	41	5
			-24T6-24	24	27	64	36	53	5
			-24T6-36	36	39	88	48	65	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

## I6 & I8 HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-24T9-24

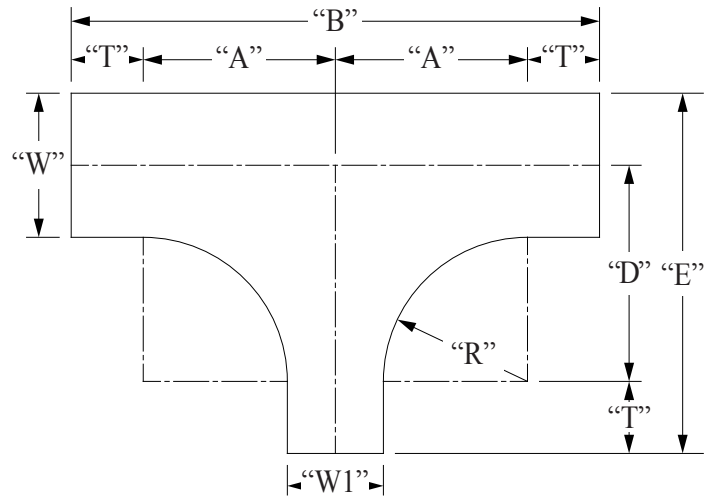
I6 & I8 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
24"	9"	A(L)I6  A(L)I8	-24T9-12	12	16-1/2	43	24	41	5
			-24T9-24	24	28-1/2	67	36	53	5
			-24T9-36	36	40-1/2	91	48	65	5
24"	12"		-24T12-12	12	18	46	24	41	5
			-24T12-24	24	30	70	36	53	5
			-24T12-36	36	42	94	48	65	5
24"	18"		-24T18-12	12	21	52	24	41	5
			-24T18-24	24	33	76	36	53	5
			-24T18-36	36	45	100	48	65	5
30"	6"		-30T6-12	12	15	40	27	47	5
			-30T6-24	24	27	64	39	59	5
			-30T6-36	36	39	88	51	71	5
30"	9"		-30T9-12	12	16-1/2	43	27	47	5
			-30T9-24	24	28-1/2	67	39	59	5
			-30T9-36	36	40-1/2	91	51	71	5
30"	12"		-30T12-12	12	18	46	27	47	5
			-30T12-24	24	30	70	39	59	5
			-30T12-36	36	42	94	51	71	5
30"	18"		-30T18-12	12	21	52	27	47	5
			-30T18-24	24	33	76	39	59	5
			-30T18-36	36	45	100	51	71	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

16 & 18 HORIZONTAL REDUCING TEE FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-36T6-12



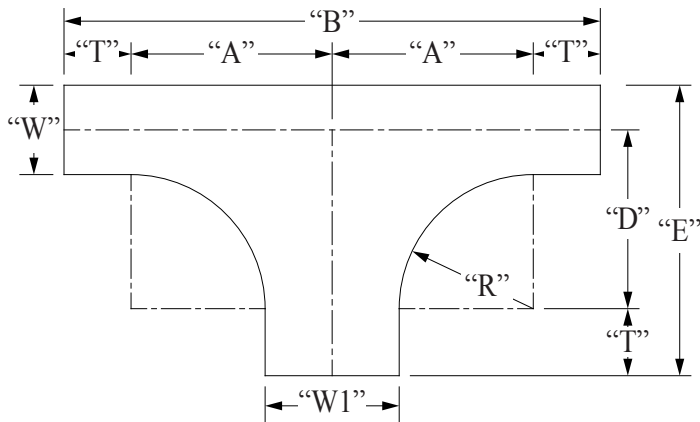
16 & 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
30"	24"	A(L)I6  A(L)I8	-30T24-12	12	24	58	27	47	5
			-30T24-24	24	36	82	39	59	5
			-30T24-36	36	48	106	51	71	5
36"	6"		-36T6-12	12	15	40	30	53	5
			-36T6-24	24	27	64	42	65	5
			-36T6-36	36	39	88	54	77	5
36"	9"		-36T9-12	12	16-1/2	43	30	53	5
			-36T9-24	24	28-1/2	67	42	65	5
			-36T9-36	36	40-1/2	91	54	77	5
36"	12"		-36T12-12	12	18	46	30	53	5
			-36T12-24	24	30	70	42	65	5
			-36T12-36	36	42	94	54	77	5
36"	18"		-36T18-12	12	21	52	30	53	5
			-36T18-24	24	33	76	42	65	5
			-36T18-36	36	45	100	54	77	5
36"	24"		-36T24-12	12	24	58	30	53	5
			-36T24-24	24	36	82	42	65	5
			-36T24-36	36	48	106	54	77	5
36"	30"		-36T30-12	12	27	64	30	53	5
			-36T30-24	24	39	88	42	65	5
			-36T30-36	36	51	112	54	77	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough



## 16 &amp; 18 HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-6T36-24

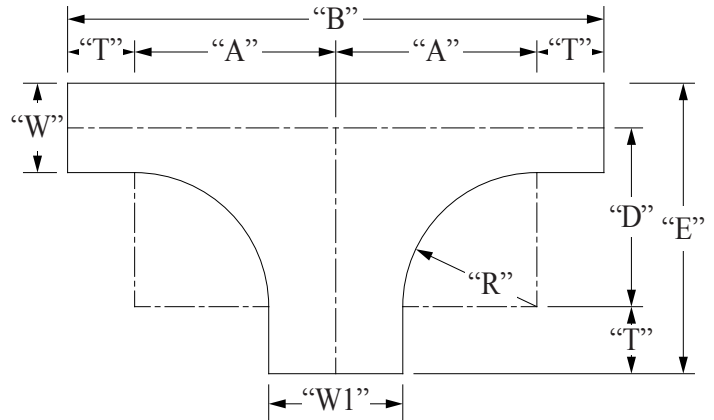
16 &amp; 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
6"	9"	A(L)I6  A(L)I8	-6T9-12	12	16-1/2	43	15	23	5
			-6T9-24	24	28-1/2	67	27	35	5
			-6T9-36	36	40-1/2	91	39	47	5
6"	12"		-6T12-12	12	18	46	15	23	5
			-6T12-24	24	30	70	27	35	5
			-6T12-36	36	42	94	39	47	5
6"	18"		-6T18-12	12	21	52	15	23	5
			-6T18-24	24	33	76	27	35	5
			-6T18-36	36	45	100	39	47	5
6"	24"		-6T24-12	12	24	58	15	23	5
			-6T24-24	24	36	82	27	35	5
			-6T24-36	36	48	106	39	47	5
6"	30"		-6T30-12	12	27	64	15	23	5
			-6T30-24	24	39	88	27	35	5
			-6T30-36	36	51	112	39	47	5
6"	36"		-6T36-12	12	30	70	15	23	5
			-6T36-24	24	42	94	27	35	5
			-6T36-36	36	54	118	39	47	5
9"	12"		-9T12-12	12	18	46	16-1/2	26	5
			-9T12-24	24	30	70	28-1/2	38	5
			-9T12-36	36	42	94	40-1/2	50	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

I6 & I8 HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-12T36-24

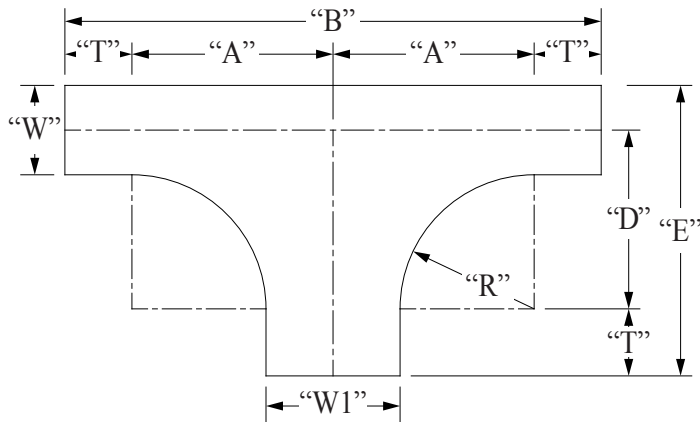


I6 & I8 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
9"	18"	A(L)I6  A(L)I8	-9T18-12	12	21	52	16-1/2	26	5
			-9T18-24	24	33	76	28-1/2	38	5
			-9T18-36	36	45	100	40-1/2	50	5
9"	24"		-9T24-12	12	24	58	16-1/2	26	5
			-9T24-24	24	36	82	28-1/2	38	5
			-9T24-36	36	48	106	40-1/2	50	5
9"	30"		-9T30-12	12	27	64	16-1/2	26	5
			-9T30-24	24	39	88	28-1/2	38	5
			-9T30-36	36	51	112	40-1/2	50	5
9"	36"		-9T36-12	12	30	70	16-1/2	26	5
			-9T36-24	24	42	94	28-1/2	38	5
			-9T36-36	36	54	118	40-1/2	50	5
12"	18"		-12T18-12	12	21	52	18	29	5
			-12T18-24	24	33	76	30	41	5
			-12T18-36	36	45	100	42	53	5
12"	24"		-12T24-12	12	24	58	18	29	5
			-12T24-24	24	36	82	30	41	5
			-12T24-36	36	48	106	42	53	5
12"	30"		-12T30-12	12	27	64	18	29	5
			-12T30-24	24	39	88	30	41	5
			-12T30-36	36	51	112	42	53	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

16 & 18 HORIZONTAL ENLARGING TEE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-18T30-36

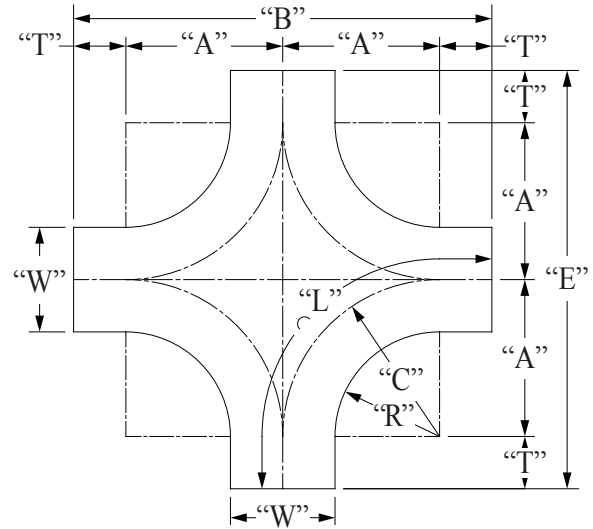
16 & 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Tee	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
12"	36"	A(L)I6  A(L)I8	-12T36-12	12	30	70	18	29	5
			-12T36-24	24	42	94	30	41	5
			-12T36-36	36	54	118	42	53	5
18"	24"		-18T24-12	12	24	58	21	35	5
			-18T24-24	24	36	82	33	47	5
			-18T24-36	36	48	106	45	59	5
18"	30"		-18T30-12	12	27	64	21	35	5
			-18T30-24	24	39	88	33	47	5
			-18T30-36	36	51	112	45	59	5
18"	36"		-18T36-12	12	30	70	21	35	5
			-18T36-24	24	42	94	33	47	5
			-18T36-36	36	54	118	45	59	5
24"	30"		-24T30-12	12	27	64	24	41	5
			-24T30-24	24	39	88	36	53	5
			-24T30-36	36	51	112	48	65	5
24"	36"		-24T36-12	12	30	70	24	41	5
			-24T36-24	24	42	94	36	53	5
			-24T36-36	36	54	118	48	65	5
30"	36"		-30T36-12	12	30	70	27	47	5
			-30T36-24	24	42	94	39	59	5
			-30T36-36	36	54	118	51	71	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

16 & 18 HORIZONTAL CROSS FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-12X-24

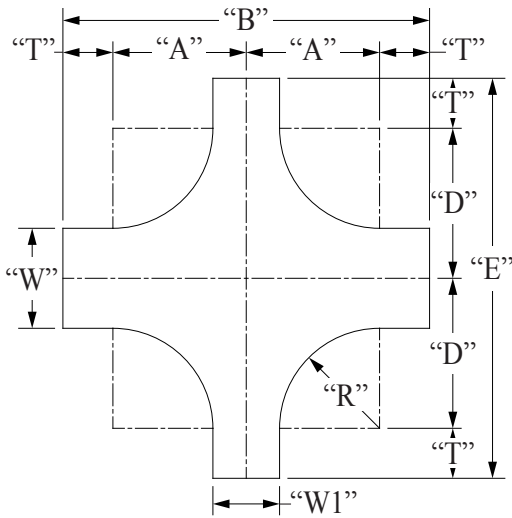


16 & 18 FITTING LAYOUT DIM

Width (W)	Select Tray Prefix	Horizontal Cross	Rad (in)	A (in)	B/E (in)	C (in)	L (in)	T (in)
6"	A(L)I6  A(L)I8	-6X-12	12	15	40	15	33-9/16	5
		-6X-24	24	27	64	27	52-3/8	5
		-6X-36	36	39	88	39	71-1/4	5
9"		-9X-12	12	16-1/2	43	16-1/2	35-15/16	5
		-9X-24	24	28-1/2	67	28-1/2	54-3/4	5
		-9X-36	36	40-1/2	91	40-1/2	73-5/8	5
12"		-12X-12	12	18	46	18	38-1/4	5
		-12X-24	24	30	70	30	57-1/8	5
		-12X-36	36	42	94	42	76	5
18"		-18X-12	12	21	52	21	43	5
		-18X-24	24	33	76	33	61-13/16	5
		-18X-36	36	45	100	45	80-11/16	5
24"		-24X-12	12	24	58	24	47-11/16	5
		-24X-24	24	36	82	36	69-9/16	5
		-24X-36	36	48	106	48	85-7/16	5
30"		-30X-12	12	27	64	27	52-7/16	5
		-30X-24	24	39	88	39	71-1/4	5
		-30X-36	36	51	112	51	90-1/8	5
36"		-36X-12	12	30	70	30	57-1/8	5
		-36X-24	24	42	94	42	76	5
		-36X-36	36	54	118	54	94-13/16	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

16 & 18 HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-9X6-24

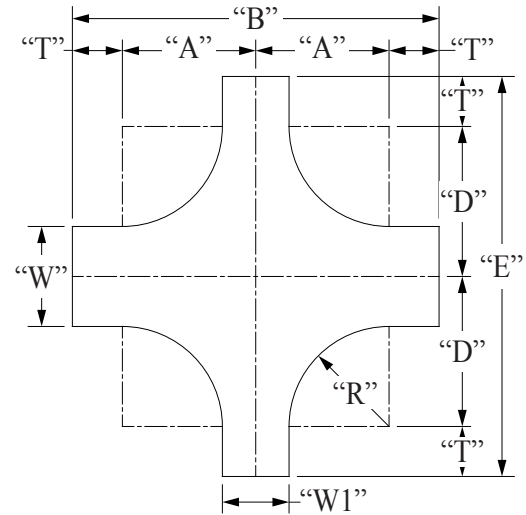
16 & 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
9"	6"	A(L)I6  A(L)I8	-9X6-12	12	15	40	16-1/2	43	5
			-9X6-24	24	27	64	28-1/2	67	5
			-9X6-36	36	39	88	40-1/2	91	5
12"	6"		-12X6-12	12	15	40	18	46	5
			-12X6-24	24	27	64	30	70	5
			-12X6-36	36	39	88	42	94	5
12"	9"		-12X9-12	12	16-1/2	43	18	46	5
			-12X9-24	24	28-1/2	67	30	70	5
			-12X9-36	36	40-1/2	91	42	94	5
18"	6"		-18X6-12	12	15	40	21	52	5
			-18X6-24	24	27	64	33	76	5
			-18X6-36	36	39	88	45	100	5
18"	9"		-18X9-12	12	16-1/2	43	21	52	5
			-18X9-24	24	28-1/2	67	33	76	5
			-18X9-36	36	40-1/2	91	45	100	5
18"	12"		-18X12-12	12	18	46	21	52	5
			-18X12-24	24	30	70	33	76	5
			-18X12-36	36	42	94	45	100	5
24"	6"		-24X6-12	12	15	40	24	58	5
			-24X6-24	24	27	64	36	82	5
			-24X6-36	36	39	88	48	106	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

16 & 18 HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-24X18-24



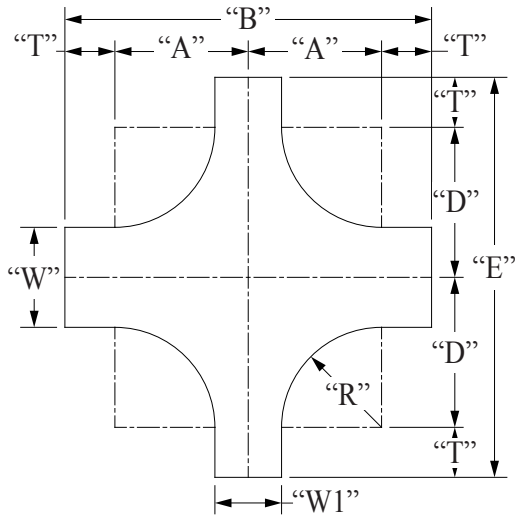
16 & 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
24"	9"	A(L)I6  A(L)I8	-24X9-12	12	16-1/2	43	24	58	5
			-24X9-24	24	28-1/2	67	36	82	5
			-24X9-36	36	40-1/2	91	48	106	5
24"	12"		-24X12-12	12	18	46	24	58	5
			-24X12-24	24	30	70	36	82	5
			-24X12-36	36	42	94	48	106	5
24"	18"		-24X18-12	12	21	52	24	58	5
			-24X18-24	24	33	76	36	82	5
			-24X18-36	36	45	100	48	106	5
30"	6"		-30X6-12	12	15	40	27	64	5
			-30X6-24	24	27	64	39	88	5
			-30X6-36	36	39	88	51	112	5
30"	9"		-30X9-12	12	16-1/2	43	27	64	5
			-30X9-24	24	28-1/2	67	39	88	5
			-30X9-36	36	40-1/2	91	51	112	5
30"	12"		-30X12-12	12	18	46	27	64	5
			-30X12-24	24	30	70	39	88	5
			-30X12-36	36	42	94	51	112	5
30"	18"		-30X18-12	12	21	52	27	64	5
			-30X18-24	24	33	76	39	88	5
			-30X18-36	36	45	100	51	112	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough



16 & 18 HORIZONTAL REDUCING CROSS FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-36X24-36

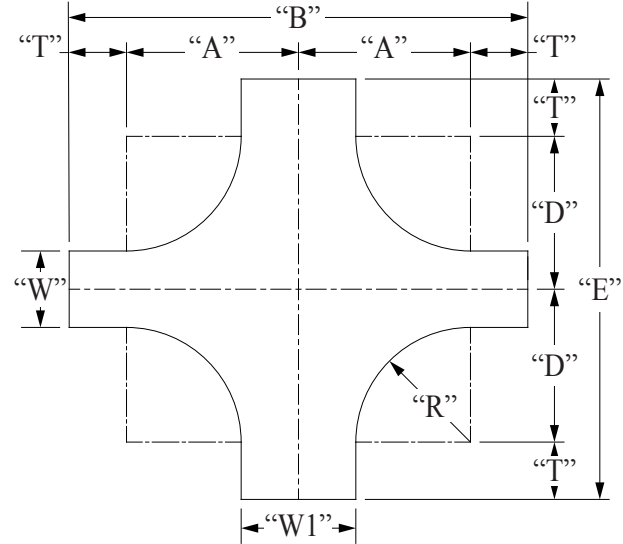
16 & 18 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Reducing Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
30"	24"	A(L)I6  A(L)I8	-30X24-12	12	24	58	27	64	5
			-30X24-24	24	36	82	39	88	5
			-30X24-36	36	48	106	51	112	5
36"	6"		-36X6-12	12	15	40	30	70	5
			-36X6-24	24	27	64	42	94	5
			-36X6-36	36	39	88	54	118	5
36"	9"		-36X9-12	12	16-1/2	43	30	70	5
			-36X9-24	24	28-1/2	67	42	94	5
			-36X9-36	36	40-1/2	91	54	118	5
36"	12"		-36X12-12	12	18	46	30	70	5
			-36X12-24	24	30	70	42	94	5
			-36X12-36	36	42	94	54	118	5
36"	18"		-36X18-12	12	21	52	30	70	5
			-36X18-24	24	33	76	42	94	5
			-36X18-36	36	45	100	54	118	5
36"	24"		-36X24-12	12	24	58	30	70	5
			-36X24-24	24	36	82	42	94	5
			-36X24-36	36	48	106	54	118	5
36"	30"		-36X30-12	12	27	64	30	70	5
			-36X30-24	24	39	88	42	94	5
			-36X30-36	36	51	112	54	118	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

I6 & I8 HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-6X9-24

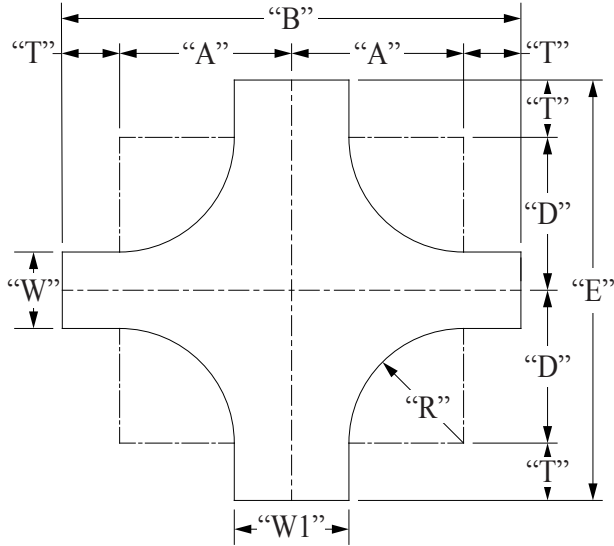


I6 & I8 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
6"	9"	A(L)I6  A(L)I8	-6X9-12	12	16-1/2	43	15	40	5
			-6X9-24	24	28-1/2	67	27	64	5
			-6X9-36	36	40-1/2	91	39	88	5
6"	12"		-6X12-12	12	18	46	15	40	5
			-6X12-24	24	30	70	27	64	5
			-6X12-36	36	42	94	39	88	5
6"	18"		-6X18-12	12	21	52	15	40	5
			-6X18-24	24	33	76	27	64	5
			-6X18-36	36	45	100	39	88	5
6"	24"		-6X24-12	12	24	58	15	40	5
			-6X24-24	24	36	82	27	64	5
			-6X24-36	36	48	106	39	88	5
6"	30"		-6X30-12	12	27	64	15	40	5
			-6X30-24	24	39	88	27	64	5
			-6X30-36	36	51	112	39	88	5
6"	36"		-6X36-12	12	30	70	15	40	5
			-6X36-24	24	42	94	27	64	5
			-6X36-36	36	54	118	39	88	5
9"	12"		-9X12-12	12	18	46	16-1/2	43	5
			-9X12-24	24	30	70	28-1/2	67	5
			-9X12-36	36	42	94	40-1/2	91	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

I6 & I8 HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS



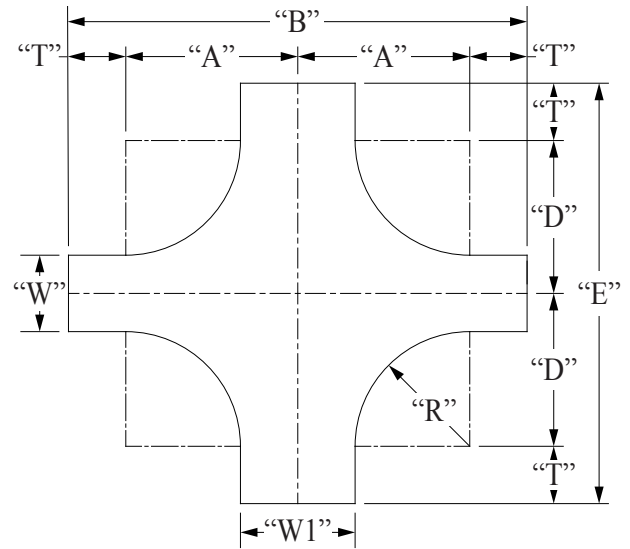
Sample Catalog Number	
Prefix	Fitting
ALI6	-9X18-24

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
9"	18"	A(L)I6  A(L)I8	-9X18-12	12	21	52	16-1/2	43	5
			-9X18-24	24	33	76	28-1/2	67	5
			-9X18-36	36	45	100	40-1/2	91	5
9"	24"		-9X24-12	12	24	58	16-1/2	43	5
			-9X24-24	24	36	82	28-1/2	67	5
			-9X24-36	36	48	106	40-1/2	91	5
9"	30"		-9X30-12	12	27	64	16-1/2	43	5
			-9X30-24	24	39	88	28-1/2	67	5
			-9X30-36	36	51	112	40-1/2	91	5
9"	36"		-9X36-12	12	30	70	16-1/2	43	5
			-9X36-24	24	42	94	28-1/2	67	5
			-9X36-36	36	54	118	40-1/2	91	5
12"	18"		-12X18-12	12	21	52	18	46	5
			-12X18-24	24	33	76	30	70	5
			-12X18-36	36	45	100	42	94	5
12"	24"		-12X24-12	12	24	58	18	46	5
			-12X24-24	24	36	82	30	70	5
			-12X24-36	36	48	106	42	94	5
12"	30"		-12X30-12	12	27	64	18	46	5
			-12X30-24	24	39	88	30	70	5
			-12X30-36	36	51	112	42	94	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

I6 & I8 HORIZONTAL ENLARGING CROSS FITTING LAYOUT DIMENSIONS

Sample Catalog Number	
Prefix	Fitting
ALI6	-18X24-36

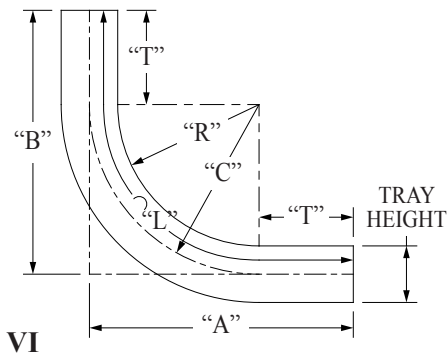


I6 & I8 FITTING LAYOUT DIM

Width (W)	Width (W1)	Select Tray Prefix	Horizontal Enlarging Cross	Rad (in)	A (in)	B (in)	D (in)	E (in)	T (in)
12"	36"	A(L)I6  A(L)I8	-12X36-12	12	30	70	18	46	5
			-12X36-24	24	42	94	30	70	5
			-12X36-36	36	54	118	42	94	5
18"	24"		-18X24-12	12	24	58	21	52	5
			-18X24-24	24	36	82	33	76	5
			-18X24-36	36	48	106	45	100	5
18"	30"		-18X30-12	12	27	64	21	52	5
			-18X30-24	24	39	88	33	76	5
			-18X30-36	36	51	112	45	100	5
18"	36"		-18X36-12	12	30	70	21	52	5
			-18X36-24	24	42	94	33	76	5
			-18X36-36	36	54	118	45	100	5
24"	30"		-24X30-12	12	27	64	24	58	5
			-24X30-24	24	39	88	36	82	5
			-24X30-36	36	51	112	48	106	5
24"	36"		-24X36-12	12	30	70	24	58	5
			-24X36-24	24	42	94	36	82	5
			-24X36-36	36	54	118	48	106	5
30"	36"		-30X36-12	12	30	70	27	64	5
			-30X36-24	24	42	94	39	88	5
			-30X36-36	36	54	118	51	112	5

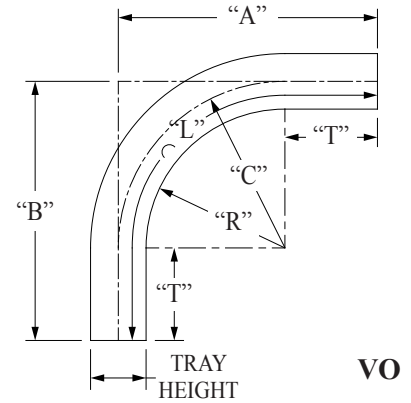
(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

## 16 & 18 VERTICAL 90 DEGREE FITTING LAYOUT DIMENSIONS



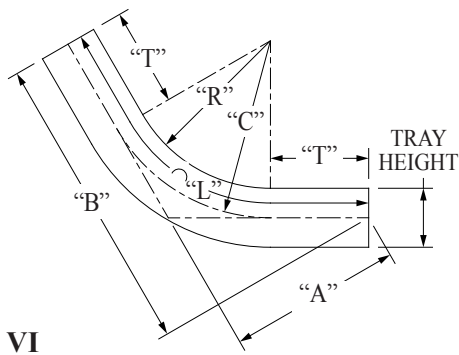
Sample Catalog Number	
Prefix	Fitting
ALI6	-12VI90-24

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VO90-24



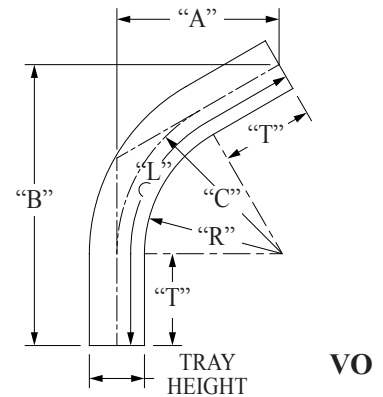
Tray Height	Select Tray Prefix	Vertical Inside 90°	Vertical Outside 90°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6	-(W)VI90-12	-(W)VO90-12	12	11-7/8	19-7/8	19-7/8	14-7/8	33-3/8	5
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	30-1/2	30-1/2	25-1/2	50-1/16	5
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	42-5/8	42-5/8	37-5/8	69-1/8	5
8"	A(L)I8	-(W)VI90-12	-(W)VO90-12	12	11-7/8	20-7/8	20-7/8	15-7/8	34-15/16	5
		-(W)VI90-24	-(W)VO90-24	24	22-1/2	31-1/2	31-1/2	26-1/2	51-5/8	5
		-(W)VI90-36	-(W)VO90-36	36	34-5/8	43-5/8	43-5/8	38-5/8	70-11/16	5

## 16 & 18 VERTICAL 60 DEGREE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12VI60-24

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VO60-24



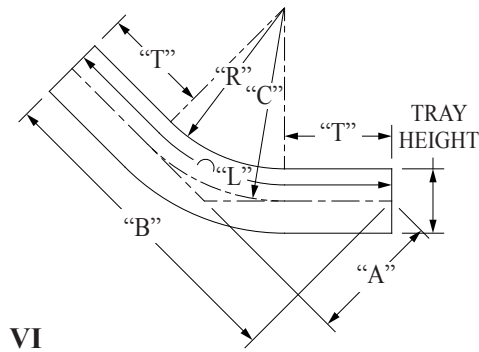
Tray Height	Select Tray Prefix	Vertical Inside 60°	Vertical Outside 60°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6	-(W)VI60-12	-(W)VO60-12	12	11-7/8	11-25/32	20-3/8	14-7/8	25-9/16	5
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	17-3/32	29-19/32	25-1/2	36-23/32	5
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	23-5/32	40-3/32	37-5/8	49-13/32	5
8"	A(L)I8	-(W)VI60-12	-(W)VO60-12	12	11-7/8	12-9/16	21-1/4	15-7/8	26-5/8	5
		-(W)VI60-24	-(W)VO60-24	24	22-1/2	17-19/32	30-7/16	26-1/2	37-3/4	5
		-(W)VI60-36	-(W)VO60-36	36	34-5/8	23-21/32	40-15/16	38-5/8	50-7/16	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.

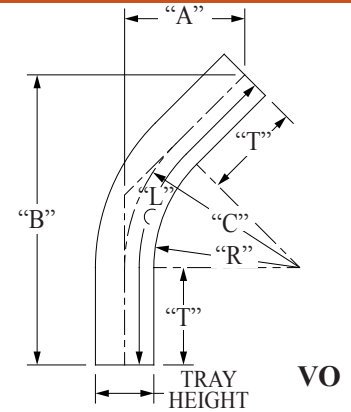
16 & 18 VERTICAL 45 DEGREE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12VI45-24

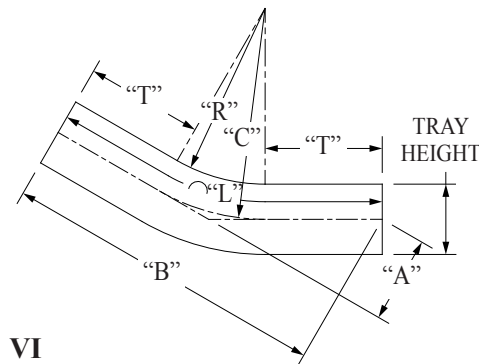
  

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VO45-24



Tray Height	Select Tray Prefix	Vertical Inside 45°	Vertical Outside 45°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6	-(W)VI45-12	-(W)VO45-12	12	11-7/8	7-29/32	19-1/16	14-7/8	21-11/16	5
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	11	26-9/16	25-1/2	30-1/32	5
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	14-9/16	35-1/8	37-5/8	39-9/16	5
8"	A(L)I8	-(W)VI45-12	-(W)VO45-12	12	11-7/8	8-3/16	19-3/4	15-7/8	22-15/16	5
		-(W)VI45-24	-(W)VO45-24	24	22-1/2	11-5/16	27-9/32	26-1/2	30-13/16	5
		-(W)VI45-36	-(W)VO45-36	36	34-5/8	14-27/32	35-27/32	38-5/8	40-11/32	5

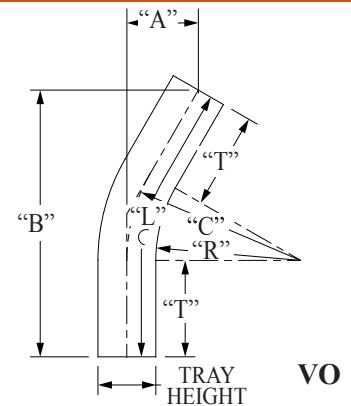
16 & 18 VERTICAL 30 DEGREE FITTING LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12VI30-24

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VO30-24



Tray Height	Select Tray Prefix	Vertical Inside 30°	Vertical Outside 30°	Rad (in)	R (in)	A (in)	B (in)	C (in)	L (in)	T (in)
6"	A(L)I6	-(W)VI30-12	-(W)VO30-12	12	11-7/8	4-1/2	16-25/32	14-7/8	7-25/32	5
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	5-29/32	22-3/32	25-1/2	23-3/8	5
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	7-11/32	28-5/32	37-5/8	29-11/16	5
8"	A(L)I8	-(W)VI30-12	-(W)VO30-12	12	11-7/8	4-5/8	17-9/32	15-7/8	18-5/16	5
		-(W)VI30-24	-(W)VO30-24	24	22-1/2	6-1/16	22-19/32	26-1/2	23-7/8	5
		-(W)VI30-36	-(W)VO30-36	36	34-5/8	7-11/16	28-21/32	38-5/8	30-7/32	5

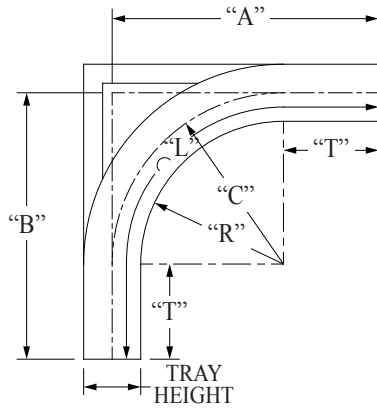
(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36)

Double "A" for Length of back-to-back fittings or "B" for Elevation Change of back-to-back fittings.



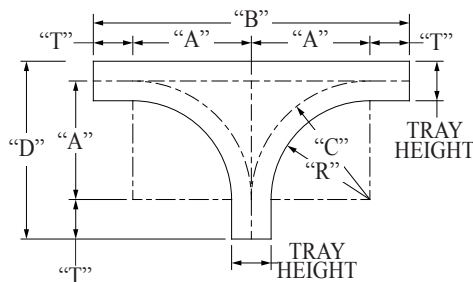
16 & 18 VERTICAL CABLE SUPPORT ELBOW LAYOUT DIMENSIONS



Sample Catalog Number	
Prefix	Fitting
ALI6	-12VS-24

Tray Height	Select Tray Prefix	Vertical Support Elbow	Rad (in)	R (in)	A/B (in)	C (in)	L (in)	T (in)
6"	A(L)I6	-(W)VS-12	12	11-7/8	19-7/8	14-7/8	33-3/8	5
		-(W)VS-24	24	22-1/2	30-1/2	25-1/2	50-1/16	5
		-(W)VS-36	36	34-5/8	42-5/8	37-5/8	69-1/8	5
8"	A(L)I8	-(W)VS-12	12	11-7/8	20-7/8	15-7/8	34-15/16	5
		-(W)VS-24	24	22-1/2	31-1/2	26-1/2	51-5/8	5
		-(W)VS-36	36	34-5/8	43-5/8	38-5/8	70-11/16	5

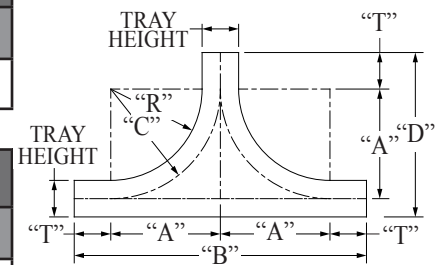
16 & 18 VERTICAL TEES LAYOUT DIMENSIONS



VT

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VT-24

Sample Catalog Number	
Prefix	Fitting
ALI6	-12VTU-24



VTU

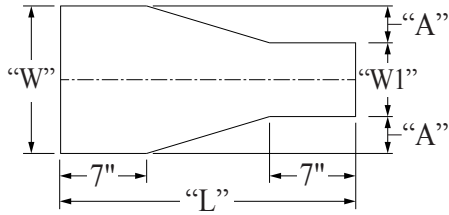
Tray Height	Select Tray Prefix	Vertical Tee Down	Vertical Tee Up	Rad (in)	R (in)	A (in)	B (in)	C (in)	D (in)	T (in)
6"	A(L)I6	-(W)VT-12	-(W)VTU-12	12	11-7/8	14-7/8	39-3/4	14-7/8	22-7/8	5
		-(W)VT-24	-(W)VTU-24	24	22-1/2	25-1/2	61	25-1/2	33-1/2	5
		-(W)VT-36	-(W)VTU-36	36	34-5/8	37-5/8	85-1/4	37-5/8	45-5/8	5
8"	A(L)I8	-(W)VT-12	-(W)VTU-12	12	11-7/8	15- 7/8	41-3/4	15-7/8	24-7/8	5
		-(W)VT-24	-(W)VTU-24	24	22-1/2	26-1/2	63	26-1/2	35-1/2	5
		-(W)VT-36	-(W)VTU-36	36	34-5/8	38-5/8	87-1/4	38-5/8	47-5/8	5

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

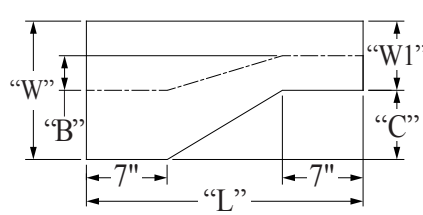
(W) = Insert Width (in) (6, 9, 12, 18, 24, 30, or 36).

I6 & I8 REDUCER LAYOUT DIMENSIONS

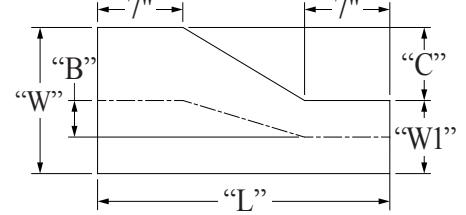
Straight (Concentric) Reducer



Left Hand Reducer



Right Hand Reducer



Sample Catalog Number	
Prefix	Fitting
ALI6	-36R24

Sample Catalog Number	
Prefix	Fitting
ALI6	-36RL24

Sample Catalog Number	
Prefix	Fitting
ALI6	-36RR24

Width (W)	Width (W1)	Select Tray Prefix	Reducer Straight	Reducer Left Hand	Reducer Right Hand	A/B (in)	C (in)
9"	6"	A(L)I6 A(L)I8	-9R6	-9RL6	-9RR6	1-1/2	3
12"	6"		-12R6	-12RL6	-12RR6	3	6
12"	9"		-12R9	-12RL9	-12RR9	1-1/2	3
18"	6"		-18R6	-18RL6	-18RR6	6	12
18"	9"		-18R9	-18RL9	-18RR9	4-1/2	9
18"	12"		-18R12	-18RL12	-18RR12	3	6
24"	6"		-24R6	-24RL6	-24RR6	9	18
24"	9"		-24R9	-24RL9	-24RR9	7-1/2	15
24"	12"		-24R12	-24RL12	-24RR12	6	12
24"	18"		-24R18	-24RL18	-24RR18	3	6
30"	6"		-30R6	-30RL6	-30RR6	12	24
30"	9"		-30R9	-30RL9	-30RR9	10-1/2	21
30"	12"		-30R12	-30RL12	-30RR12	9	18
30"	18"		-30R18	-30RL18	-30RR18	6	12
30"	24"		-30R24	-30RL24	-30RR24	3	6
36"	6"		-36R6	-36RL6	-36RR6	15	30
36"	9"		-36R9	-36RL9	-36RR9	13-1/2	27
36"	12"		-36R12	-36RL12	-36RR12	12	24
36"	18"		-36R18	-36RL18	-36RR18	9	18
36"	24"		-36R24	-36RL24	-36RR24	6	12
36"	30"		-36R30	-36RL30	-36RR30	3	6

(L) = Ladder or (4) for Rung Spacing on 6" - 36" wide Ventilated Trough

"L" = 24" Long

## INDEX

Technical Information	3-24	A(RS)IXA	6" High	37
Introduction	3	A(RS)IXB	6" High	37
Description & Selection	3-4	A(RS)IXC	6" High	37
Loading	5-6	A(RS)IXD	6" High	37
Quality Policy	7	A(RS)I6	6" High	38
Nuclear Program	8	A(RS)IMC7	7" High	39
Materials & Construction	9-11	A(RS)IXC7	7" High	39
Corrosion Resistance	12-15	A(RS)IXD7	7" High	39
Design Loading	16-18	A(RS)I8	8" High	40
Design Loading & Deflection	18-20	Ladder Loading & Deflection		41
Electrical Equipment & Grounding	20-21			
Tray Sizing	22	Cable Tray Straights (Ventilated Trough)		43-49
Formulas & Calculations	23-24	Straights (Ventilated Trough) e.g. "AIXC-12-240, AIXC-12-240-F04 & A4IXC-12-240"		
Convert Load For Shorter Span	23	Selection Tables		44
Convert 1.5 Safety Factor To 2.0 Safety Factor	24	A( )IJA	4.5" High	45
Side Rail, Rung & Bottom Profiles & Rung Options	25-31	A( )IJB	4.5" High	45
IJA	4.5" High	A( )IJC	4.5" High	45
IJB	4.5" High	A( )IJD	4.5" High	45
IJC	4.5" High	A( )IYA	4.5" High	45
IJD	4.5" High	A( )IYB	4.5" High	45
IYA	4.5" High	A( )IYC	4.5" High	45
IYB	4.5" High	A( )IJC5	5" High	46
IYC	4.5" High	A( )IYB5	5" High	46
IJC5	5" High	A( )IYC5	5" High	46
IYB5	5" High	A( )IMB	6" High	47
IYC5	5" High	A( )IMC	6" High	47
IMB	6" High	A( )IMD	6" High	47
IMC	6" High	A( )IXA	6" High	47
IMD	6" High	A( )IXB	6" High	47
IXA	6" High	A( )IXC	6" High	47
IXB	6" High	A( )IXD	6" High	47
IXC	6" High	A( )IMC7	7" High	48
IXD	6" High	A( )IXC7	7" High	48
I6	6" High	A( )IXD7	7" High	48
IMC7	7" High	Ventilated Trough Loading & Deflection		49
IXC7	7" High			
IXD7	7" High	Cable Tray Straights (Solid Bottom Trough)		51-49
I8	8" High	Straights (Solid Bottom Trough) e.g. "ASIXC-12-240, ASIXC-12-240-06C & ASIXC-12-240-F04"		
Hat Rung		Selection Tables		52
High Hat Rung		ASIJA	4.5" High	53
I-Beam Rung		ASIBJ	4.5" High	53
Strut Rung		ASIJC	4.5" High	53
Marine Slot Detail		ASIID	4.5" High	53
Ventilated Corrugated Bottom		ASIYA	4.5" High	53
Solid Corrugated Bottom		ASIYB	4.5" High	53
Ventilated Corrugated Slot Detail		ASIYC	4.5" High	53
06C Bump Bottom		ASIJC5	5" High	54
F04 Perforated Slot Detail		ASIYB5	5" High	54
F04 Perforated Bottom		ASIYC5	5" High	54
Rung Options		ASIMB	6" High	55
Electrical Properties of Cable Tray		ASIMC	6" High	55
Cable Tray Straights (Ladder)	33-41	ASIMD	6" High	55
Straights (Ladder) e.g. "A9IXC-12-240"		ASIXA	6" High	55
Selection Tables		ASIXB	6" High	55
A(RS)IJA	4.5" High	ASIXC	6" High	55
A(RS)IJB	4.5" High	ASIXD	6" High	55
A(RS)IJC	4.5" High	ASIMC7	7" High	56
A(RS)IJD	4.5" High	ASIXC7	7" High	56
A(RS)IYA	4.5" High	ASIXD7	7" High	56
A(RS)IYB	4.5" High	Solid Bottom Trough Loading & Deflection		57
A(RS)IYC	4.5" High			
A(RS)IJC5	5" High	Cable Tray Fittings (Ladder, Ventilated & Solid Bottom Trough)		59-70
A(RS)IYB5	5" High	Horizontal e.g. "A(L)IXC-12H90-24"		
A(RS)IYC5	5" High	Selection Tables (Horizontal)		60
A(RS)IMB	6" High	Horizontal (90, 60, 45, 30)	4.5"-8" High	62
A(RS)IMC	6" High	Vertical Inside e.g. "A(L)IXC-12VI90-24"		
A(RS)IMD	6" High	Selection Tables (Verticals)		60

## INDEX

Vertical Inside (90, 60)	4.5"-8" High	63	Trapeze Support Angle (hdgaf)	4.5"-8" High	76
Vertical Inside (45, 30)	4.5"-8" High	64	Trapeze Support Kit, Single Strut (mill galv)	4.5"-8" High	76
Vertical Outside e.g. "A(L)IXC-12VO90-24"			Trapeze Support Kit, Double Strut (mill galv)	4.5"-8" High	76
Selection Tables (Verticals)		60	Wall Penetration Sleeve (alum)	4.5"-8" High	77
Vertical Outside (90, 60)	4.5"-8" High	63	Mid-Span Splice	4.5"-8" High	78-79
Vertical Outside (45, 30)	4.5"-8" High	64	Quarter-Span Expansion Splice	4.5"-8" High	78-79
Horizontal Tee e.g. "A(L)IXC-12T-24"					
Selection Tables (Teas)		61	Engineered Cable Tray		81-100
Horizontal Tee	4.5"-8" High	65	Square Fittings		82
Horizontal Reducing Tee e.g. "A(L)IXC-12T9-24"			Large Radius Fittings		82
Selection Tables (Teas)		61	Cut-To-Length		83
Horizontal Reducing Tee	4.5"-8" High	65	Factory-Installed Splices		83
Horizontal Enlarging Tee e.g. "A(L)IXC-12T18-24"			Pre-Punched Ground Clamp Holes		83
Selection Tables (Teas)		61	Factory-Installed Separators		83
Horizontal Enlarging Tee	4.5"-8" High	65	Drop-In Rung Module		84
Horizontal Cross e.g. "A(L)IXC-12X-24"			Stadium Tray		85
Selection Tables (Crosses)		61	Walkable Covers		86
Horizontal Cross	4.5"-8" High	66			
Horizontal Reducing Cross e.g. "A(L)IXC-12X9-24"			I-Beam Straight Flat & Flanged Covers		87-90
Selection Tables (Crosses)		61	Selection Tables (Flat or Flanged)		88
Horizontal Reducing Cross	4.5"-8" High	66	Selection Tables (Peaked or Hat-Shaped)		88
Horizontal Enlarging Cross e.g. "A(L)IXC-12X18-24"			Straight Flanged Solid Cover e.g. "CA6F-24-144"		
Selection Tables (Crosses)		61	Selection Tables (Flanged)		88
Horizontal Enlarging Cross	4.5"-8" High	66	Straight Flange Solid Covers		89
Reducer Concentric (Straight) e.g. "A(L)IXC-24R12"			Straight Flanged Louvered Cover e.g. "CA6F-24-144-L"		
Selection Tables (Reducers)		61	Selection Tables (Flanged)		88
Reducer Concentric (Straight)	4.5"-8" High	67	Straight Flange Louvered Covers		89
Reducer Eccentric (Right Hand) e.g. "A(L)IXC-24RR12"			Straight Flanged Peaked Cover e.g. "C0P-A6F-24-144"		
Selection Tables (Reducers)		61	Selection Tables (Peaked)		88
Reducer Eccentric (Right Hand)	4.5"-8" High	67	Straight Flange Peaked Covers		89
Reducer Eccentric (Left Hand) e.g. "A(L)IXC-24RL12"			Straight Flat Solid Cover e.g. "CA6S-24-144"		
Selection Tables (Reducers)		61	Selection Tables (Flat)		88
Reducer Eccentric (Left Hand)	4.5"-8" High	67	Straight Flange Solid Covers		89
Vertical Tee (Turn Down) e.g. "A(L)IXC-12VT-24"			Straight Flat Louvered Cover e.g. "CA6S-24-144-L"		
Selection Tables (Verticals)		60	Selection Tables (Flat)		88
Vertical Tee (Turn Down)	4.5"-8" High	68	Straight Flange Louvered Covers		89
Vertical Tee (Turn Up) e.g. "A(L)IXC-12VTU-24"			Straight Flat Peaked Cover e.g. "C0P-A6S-24-144"		
Selection Tables (Verticals)		60	Selection Tables (Flat Peaked)		88
Vertical Tee (Turn Up)	4.5"-8" High	68	Straight Flange Peaked Covers		89
Vertical Support e.g. "A(L)IXC-12VS-24"					
Selection Tables (Verticals)		60	I-Beam Straight Flat Flanged Fitting Covers		87-90
Vertical Support	4.5"-8" High	69	Selection Tables (Horizontal & Verticals)		92
Vertical Cross e.g. "A(L)IXC-12VX-24"			Selection Tables (Teas, Crosses & Reducers)		92
Selection Tables (Verticals)		60			
Vertical Vertical Cross	4.5"-8" High	69	Flanged Solid Horizontal Cover e.g. "CA6F-12H90-24"		
			Selection Tables (Horizontal)		92
Alternate Fitting Support Locations		70	Horizontal (90, 60, 45, 30)	4.5"-8" High	93
I-Beam Cable Tray Accessories & Supports		71-79	Flanged Solid Vertical Inside Cover e.g. "CA6F-12V190-24"		
Splice Kit (Standard)	4.5"-8" High	72	Selection Tables (Verticals)		92
Expansion Splice Kits	4.5"-8" High	72	Verticals (90, 60)	4.5"-8" High	94
90 Degree Splice	4.5"-8" High	72	Verticals (45, 30)	4.5"-8" High	95
Horizontal Hinge Splice Kit	4.5"-8" High	72	Flanged Solid Vertical Outside Cover e.g. "CA6F-12VO90-24"		
Vertical Hinge Splice Kit	4.5"-8" High	72	Selection Tables (Verticals)		92
Offset Reducing Splice	4.5"-8" High	73	Verticals (90, 60)	4.5"-8" High	94
Dropout	4.5"-8" High	73	Verticals (45, 30)	4.5"-8" High	95
End Plate	4.5"-8" High	73	Flanged Solid Horizontal Tee Cover e.g. "CA6F-12T-24"		
Box Connector	4.5"-8" High	73	Selection Tables (Teas)		92
Straight Separator	4.5"-8" High	74	Horizontal Tee	4.5"-8" High	96
Horizontal Separator	4.5"-8" High	74	Flanged Solid Horizontal Reducing Tee Cover e.g. "CA6F-12T9-24"		
Vertical Inside Separator	4.5"-8" High	74	Selection Tables (Teas)		92
Vertical Outside Separator	4.5"-8" High	74	Horizontal Reducing Tee	4.5"-8" High	96
Hold Down/Expansion Clamp (zinc)	4.5"-8" High	74	Flanged Solid Horizontal Enlarging Tee Cover e.g. "CA6F-12T18-24"		
Hold Down/Expansion Clamp (alum)	4.5"-8" High	75	Selection Tables (Teas)		92
Heavy Duty Hold Down, 2 Bolt (alum)	4.5"-8" High	75	Horizontal Enlarging Tee	4.5"-8" High	96
Heavy Duty Hold Down, 4 Bolt (alum)	4.5"-8" High	75	Flanged Solid Horizontal Cross Cover e.g. "CA6F-12X-24"		
Hanger Clip, 1/2" Rod (zinc)	4.5"-8" High	75	Selection Tables (Crosses)		92
Trapeze Support Channel (hdgaf)	4.5"-8" High	75	Horizontal Cross	4.5"-8" High	97
Trapeze Support Channel (alum)	4.5"-8" High	76	Flanged Solid Horizontal Reducing Cross Cover e.g. "CA6F-12X9-24"		
			Selection Tables (Crosses)		92

## INDEX

Horizontal Reducing Cross	4.5"-8" High	97	Flat Solid Vertical Tee (Turn Down) Cover e.g. "CA6S-12VT-24"		
Flanged Solid Horizontal Enlarging Cross Cover e.g. "CA6F-12X18-24"			Selection Tables (Verticals)		102
Selection Tables (Crosses)		92	Vertical Tee (Turn Down)	4.5"-8" High	109
Horizontal Enlarging Cross	4.5"-8" High	97	Flat Solid Vertical Tee (Turn Up) Cover e.g. "CA6S-12VTU-24"		
Flanged Solid Reducer Concentric (Straight) Cover e.g. "CA6F-24R12"			Selection Tables (Verticals)		102
Selection Tables (Reducers)		92	Vertical Tee (Turn Up)	4.5"-8" High	109
Reducer Concentric (Straight)	4.5"-8" High	98	Flat Solid Vertical Support Cover e.g. "CA6S-12VS-24"		
Flanged Solid Reducer Eccentric (Right Hand) Cover e.g. "CA6F-24RR12"			Selection Tables (Verticals)		102
Selection Tables (Reducers)		92	Vertical Support	4.5"-8" High	110
Reducer Eccentric (Right Hand)	4.5"-8" High	98	Flat Solid Vertical Cross Cover e.g. "CA6S-12VX-24"		
Flanged Solid Reducer Eccentric (Left Hand) Cover e.g. "CA6F-24RL12"			Selection Tables (Verticals)		102
Selection Tables (Reducers)		92	Vertical Cross	4.5"-8" High	110
Reducer Eccentric (Left Hand)	4.5"-8" High	98	I-Beam Cover Clamps & Accessories		111-115
Flanged Solid Vertical Tee (Turn Down) Cover e.g. "CA6F-12VT-24"			Cover Clamps		112-113
Selection Tables (Verticals)		92	Cover Clips (316SS)		112
Vertical Tee (Turn Down)	4.5"-8" High	99	Cover Clamp, Bar Style (alum)		112
Flanged Solid Vertical Tee (Turn Up) Cover e.g. "CA6F-12VTU-24"			Cover Clamp, Double Bar Style (alum)		112
Selection Tables (Verticals)		92	Cover Clamp, Bar Style Peaked (alum)		112
Vertical Tee (Turn Up)	4.5"-8" High	99	Cover Clamp, Double Bar Style Peaked (alum)		113
Flanged Solid Vertical Support Cover e.g. "CA6F-12VS-24"			Cover Clamp, Double Bar Style Raised (alum)		113
Selection Tables (Verticals)		92	Cover Clamp, Double Bar Style Peaked Raised (alum)		113
Vertical Support	4.5"-8" High	100	Cover Clamp, Raised (mill galv)		113
Flanged Solid Vertical Cross Cover e.g. "CA6F-12VX-24"			Cover Hardware		114
Selection Tables (Verticals)		92	Cover Screw, #10 x 5/8" (410ss)		114
Vertical Cross	4.5"-8" High	100	Cover Screw, #8 x 1/2" (zinc)		114
I-Beam Straight Flat Solid Fitting Covers		101-110	Cover Screw, #8 x 1/2" (410ss)		114
Selection Tables (Horizontals & Verticals)		102	Cover Screw, #6 x 1/2" (zinc)		114
Selection Tables (Tees, Crosses & Reducers)		102	Cover Accessories		115
Flat Solid Horizontal Cover e.g. "CA6S-12H90-24"			Cover Splice, Slip-on		115
Selection Tables (Horizontals)		102	Cover End Cap, Peaked		115
Horizontals (90, 60, 45, 30)	4.5"-8" High	103	I-Beam Splice Connectors & Accessories		117-129
Flat Solid Vertical Inside Cover e.g. "CA6S-12VI90-24"			Splice Connectors		118-121
Selection Tables (Verticals)		102	Splice Connector		118
Verticals (90, 60)	4.5"-8" High	104	90° Degree Splice Connector		118
Verticals (45, 30)	4.5"-8" High	105	Expansion Splice Connector		118
Flat Solid Vertical Outside Cover e.g. "CA6S-12VO90-24"			Horizontal Hinge Splice Connector		119
Selection Tables (Verticals)		102	Vertical Hinge Splice Connector		119
Verticals (90, 60)	4.5"-8" High	104	Offset Reducing Splice Connector		119
Verticals (45, 30)	4.5"-8" High	105	Mid-Span Splice Connector		120
Flat Solid Horizontal Tee Cover e.g. "CA6S-12T-24"			Quarter-Span Expansion Splice Connector		120
Selection Tables (Tees)		102	Channel to Ladder or Trough Connector		120
Horizontal Tee	4.5"-8" High	106	Step Down Splice Connector		121
Flat Solid Horizontal Reducing Tee Cover e.g. "CA6S-12T9-24"			Hardware for Splice Connectors		121
Selection Tables (Tees)		102	Accessories		123-129
Horizontal Reducing Tee	4.5"-8" High	106	End Plates		123
Flat Solid Horizontal Enlarging Tee Cover e.g. "CA6S-12T18-24"			Dropouts		123
Selection Tables (Tees)		102	Conduit Side-Type Dropouts		123
Horizontal Enlarging Tee	4.5"-8" High	106	Bonding Jumper, Laminated (alum)		124
Flat Solid Horizontal Cross Cover e.g. "CA6S-12X-24"			Bonding Jumper, Braided (copper)		124
Selection Tables (Crosses)		102	Bonding Jumper, Green Insulated (copper)		124
Horizontal Cross	4.5"-8" High	107	Ground Clamps		125
Flat Solid Horizontal Reducing Cross Cover e.g. "CA6S-12X9-24"			Grounding Connectors		125
Selection Tables (Crosses)		102	Grounding Clamps		126
Horizontal Reducing Cross	4.5"-8" High	107	Double Cable Clamps		126
Flat Solid Horizontal Enlarging Cross Cover e.g. "CA6S-12X18-24"			Oxidation Inhibitor		126
Selection Tables (Crosses)		102	Separators, Straight		127
Horizontal Enlarging Cross	4.5"-8" High	107	Separators, Horizontal		127
Flat Solid Reducer Concentric (Straight) Cover e.g. "CA6S-24R12"			Separators, Vertical (Inside & Outside)		128
Selection Tables (Reducers)		102	Separator Fastener for Ladder Tray (Optional)		128
Reducer Concentric (Straight)	4.5"-8" High	108	Separator Splice		129
Flat Solid Reducer Eccentric (Right Hand) Cover e.g. "CA6S-24RR12"			Mini Trim		129
Selection Tables (Reducers)		102	Bottom Splice for Ventilated or Solid Bottom		129
Reducer Eccentric (Right Hand)	4.5"-8" High	108	I-Beam Hold Downs & Support Material		131-156
Flat Solid Reducer Eccentric (Left Hand) Cover e.g. "CA6S-24RL12"			Hold Downs		132-134
Selection Tables (Reducers)		102			
Reducer Eccentric (Left Hand)	4.5"-8" High	108			

INDEX

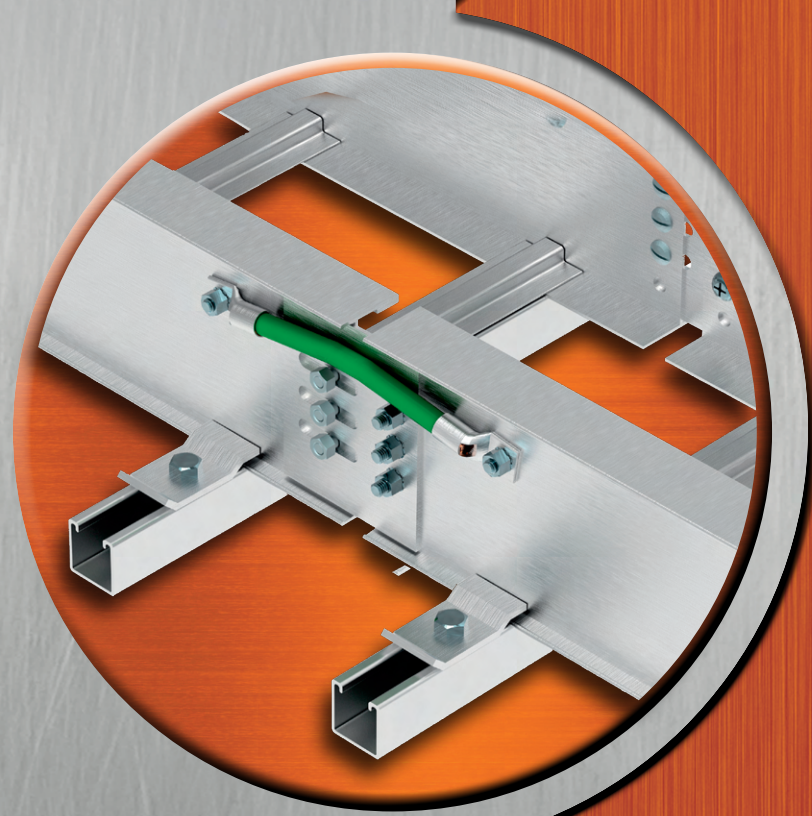
Single Hold Down Clips	132	Detail "D": Horizontal Hinge Splice	159
Single Hold Down Clamp	132	Detail "E": Hold Down Clamp	160
Expansion Guides for Ladder Tray	132	Detail "F": Universal Hold Down Clamp / Expansion Guide	160
Hold Down / Expansion Guides	133	Detail "G": Hanger Clip Set	161
Hold Down / Expansion Guides (C Channel/I Beams)	133	Detail "H": SRZ Z-Bracket Riser	161
Hold Down / Expansion Guides (C Channel/I Beams)	133	Detail "I": SRSA & Wall Brackets Riser	162
Nylon Insulating Pads	134	Detail "J": Structural Connector (ASC-U)	162
Heavy Duty Hold Down Clamp (double)	134	Detail "K": Ground Clamp Details (HP-( )-CT)	163
Heavy Duty Hold Down Clamp (single)	134	Detail "L": Ground Clamp Details (HP-CTGC & GB-( ))	163
Hangers & Trapeze Supports	135-137	Detail "M": Bar Type Cover Clamp (AHC)	164
Hanger Clips	135	Detail "N": Raised Cover Clamps (RCC & 2AHC)	164
Vertical Hangers	135	Detail "O": Vertical Tray Supports	165
Structural Connector for Ladder & Trough	135	Detail "P": Wall Penetration Sleeve	166
Trapeze Support Kits (except I6 & I8)	136	I-Beam Ladder Specification	167
Trapeze Support Kits (I6 & I8 only)	136	I-Beam Trough Specification	168-169
Trapeze Support Channels	137		
Trapeze Support Angles	137	I-Beam Fitting Layout Dimensions (except I6 & I8)	171-196
Hanger Rod, Hardware & Coupling	138	Horizontal 90°	172
Hanger Rod & Hardware	138	Horizontal 60°	173
Hanger Rod Couplings	138	Horizontal 45°	174
Beam Clamps	139-141	Horizontal 30°	175
I-Beam Clamp	139	Horizontal Tee	176
I-Beam Clamp with Swivel	139	Horizontal Reducing Tee	177-179
Beam C-Clamp	139	Horizontal Enlarging Tee	180-182
Beam Clamp	140	Horizontal Cross	183
Swivel Joints	140	Horizontal Reducing Cross	184-186
Bevel Washer	140	Horizontal Enlarging Cross	187-189
Channel Clamp	141	Vertical Inside 90°	190
HP Channel Clamp	141	Vertical Inside 60°	191
Brackets, Angles, Strut & Hardware	142-151	Vertical Inside 45°	192
Z-Bracket (single & double)	142	Vertical Inside 30°	193
Brackets Angles (single & double)	143	Vertical Outside 90°	190
Support Angle Clip	144	Vertical Outside 60°	191
Spanner Channel	144	Vertical Outside 45°	192
Wall Bracket, U2 (alum)	145	Vertical Outside 30°	193
Wall Bracket, SHDEC (alum)	145	Vertical Support	194
Wall Bracket, Medium-Weight (alum)	146	Vertical Tee	195
Wall Bracket, Heavy-Weight (alum)	146	Vertical Tee Upside Down	195
Wall Bracket, U2 (hdgaf)	147	Reducer Concentric (Straight)	196
Wall Bracket, SHDEC (hdgaf)	147	Reducer Eccentric (Left Hand)	196
Wall Bracket, Medium-Weight (hdgaf)	148	Reducer Eccentric (Right Hand)	196
Wall Bracket, Heavy-Weight (hdgaf)	148		
Wall Bracket, Single Strut (except I6 & I8)(hdgaf)	149	I-Beam Fitting Layout Dimensions (For I6 & I8)	197-169
Wall Bracket, Single Strut (I6 & I8 only)(hdgaf)	149	Horizontal 90°	198
Wall Bracket, Double Strut (except I6 & I8)(hdgaf)	149	Horizontal 60°	199
Wall Bracket, Double Strut (I6 & I8 only)(hdgaf)	149	Horizontal 45°	200
Strut-Style Support Channel, Single (solid)	150	Horizontal 30°	201
Strut-Style Support Channel, Single (slotted)	150	Horizontal Tee	202
Strut-Style Support Channel, Single (round holes)	150	Horizontal Reducing Tee	203-205
Strut-Style Support Channel, Double (solid)	150	Horizontal Enlarging Tee	206-208
Strut-Style Support Channel, Double (slotted)	150	Horizontal Cross	209
Strut-Style Support Channel, Double (round holes)	150	Horizontal Reducing Cross	210-212
Support Material Hardware	151	Horizontal Enlarging Cross	213-215
Roof Blocks	152-156	Vertical Inside 90°	216
Roof Blocks, C-Series	152	Vertical Inside 60°	216
Roof Blocks, C5 & C6-Series	152	Vertical Inside 45°	217
Roof Blocks, CE-Series	153	Vertical Inside 30°	217
Roof Blocks, CEW-Series	153	Vertical Outside 90°	216
Roof Blocks, CB-Series	154	Vertical Outside 60°	216
Roof Blocks, CW-Series	154	Vertical Outside 45°	217
Roof Blocks, CX & C5-Series	155	Vertical Outside 30°	217
Roof Blocks, CES-Series	155	Vertical Support	218
Roof Blocks, DSAW10-Series	156	Vertical Tee	218
Roof Blocks, DSAW12-Series	156	Vertical Tee Upside Down	218
I-Beam Details & Sample Specifications	157-169	Reducer Concentric (Straight)	219
Detail "A": Standard Splice	158	Reducer Eccentric (Left Hand)	219
Detail "B": Expansion Splice	158	Reducer Eccentric (Right Hand)	219
Detail "C": Vertical Hinge Splice	159		



NOTES



RELIABLE  
COST EFFECTIVE  
FLEXIBLE  
PROVEN



**mphusky.com**

1370 OLD STAGE ROAD  
SIMPSONVILLE, SC 29681

**864.234.4800**

Established in **1955**

mphusky

cable tray & cable bus

cable tray

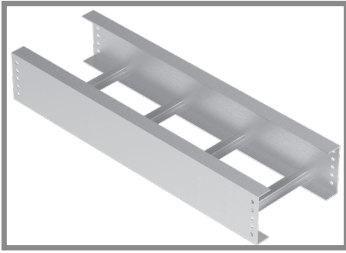
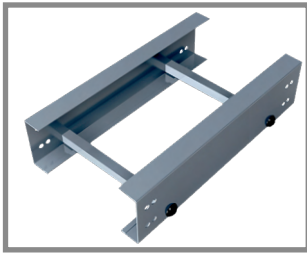
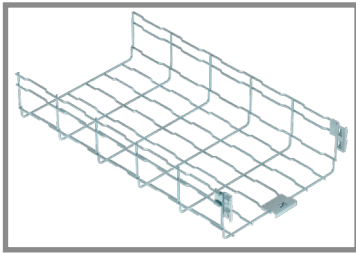
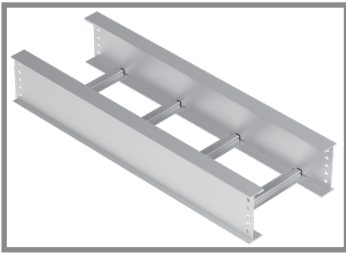


**mphusky**

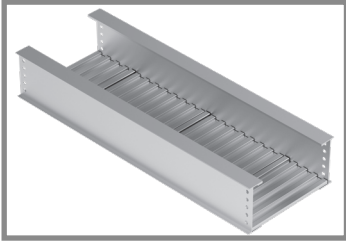
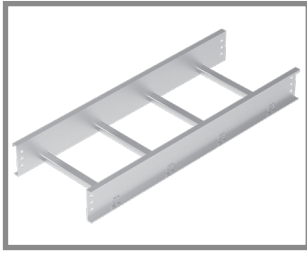


Cable Tray Systems

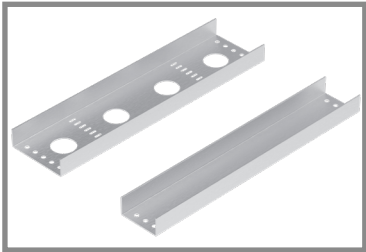
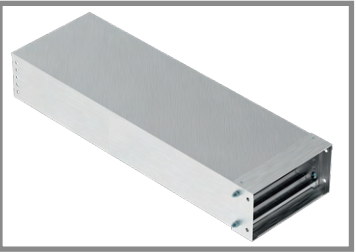
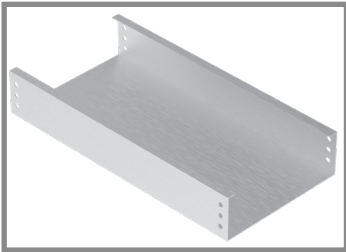
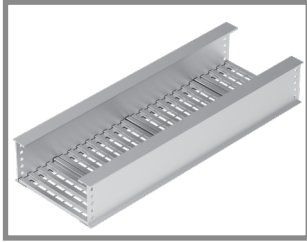
Engineered to Support Powerful Reputations



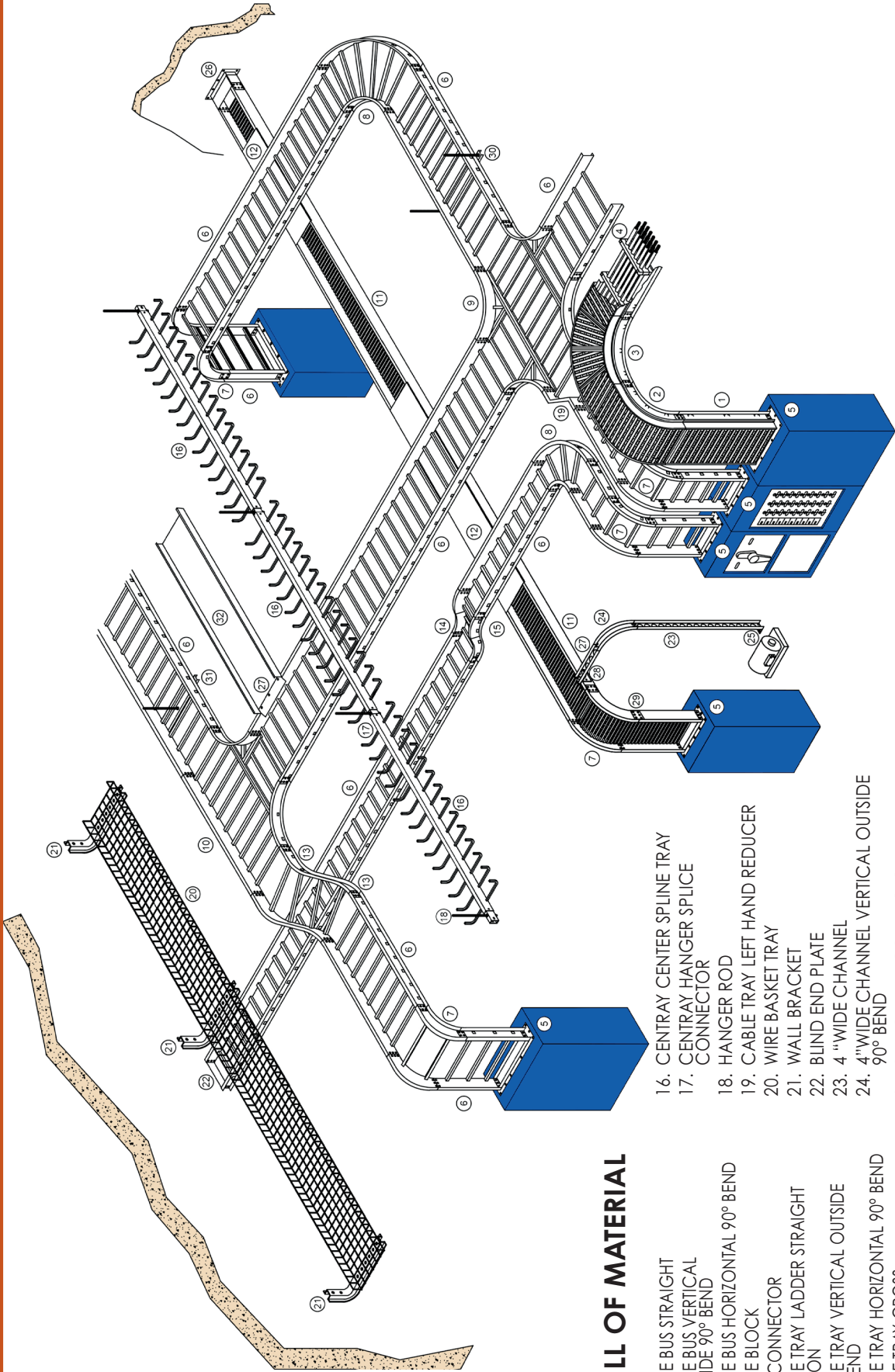
MP Husky was founded in 1952 and originally began operations as Husky Products. Over the following 60+ years of leadership and service MP Husky has gone through several transformations and mergers, including Husky/Burndy and Metal Products, thus leading to what is today MP Husky—America’s leading manufacturer of Cable Tray and Cable Bus Power Distribution Systems.



Throughout these changes one thing has remained constant—the Husky drive to be the most reliable, highest quality, cost effective and innovative manufacturer of Cable Support Systems and Cable Bus Power Distribution Systems. We have an unsurpassed commitment to customer satisfaction and service, and we are eager to earn your loyalty and trust. As we continue to build and strengthen our partnerships with our customers we look forward to the next years of service and support.



SAMPLE SYSTEM LAYOUT



BILL OF MATERIAL

1. CABLE BUS STRAIGHT

2. CABLE BUS VERTICAL OUTSIDE 90° BEND

3. CABLE BUS HORIZONTAL 90° BEND

4. CABLE BLOCK

5. BOX CONNECTOR

6. CABLE TRAY LADDER STRAIGHT SECTION

7. CABLE TRAY VERTICAL OUTSIDE 90° BEND

8. CABLE TRAY HORIZONTAL 90° BEND

9. CABLE TRAY CROSS

10. CABLE TRAY TREE

11. CABLE TRAY VENTILATED TROUGH

12. CABLE TRAY COVER

13. CABLE TRAY HORIZONTAL 45° BEND

14. CABLE TRAY VERTICAL INSIDE 45° BEND

15. CABLE TRAY VERTICAL OUTSIDE 45° BEND
16. CENTRAY CENTER SPINE TRAY

17. CENTRAY HANGER SPICE CONNECTOR

18. HANGER ROD

19. CABLE TRAY LEFT HAND REDUCER

20. WIRE BASKET TRAY

21. WALL BRACKET

22. BLIND END PLATE

23. 4 "WIDE CHANNEL

24. 4"WIDE CHANNEL VERTICAL OUTSIDE 90° BEND

25. STRUCTURAL CONNECTOR

26. WALL PENETRATION SLEEVE

27. CABLE DROPOUT

28. CHANNEL TO TRAY CONNECTOR

29. SPICE CONNECTOR

30. TRAPEZE SUPPORT

31. CENTER SUPPORT CHANNEL

32. CABLE WAY SOLID BOTTOM TRAY