IMPERIAL PITCH PULLEY

The “Inch” System

Imperial (American) Pitch Pulleys are based in the "inch" system of measurement. The tooth profile of these common pulleys is trapezoidal and is shaped like the image of the tooth profile on the right.

20XL037-6FA4 - 1. (20) 2. (XL) 3. (037) 4. (-) 6. (A) 7. (4)

1. Number of Teeth: Can be 1-3 digits in length and will always be a direct reflection of the number of teeth on the pulley. The example pulley above would have 20 teeth.

2. Pulley Pitch: Pitch refers to the distance from the center of a pulley tooth to the center of the next tooth. For imperial pitches, B&B Manufacturing® uses an abbreviated code to express the pitch for part numbering purposes. Common imperial pitches and their codes can be found below. The example pulley's pitch is XL (0.200") pitch.

3. Belt Width: This code indicates the width of the toothed section of a timing pulley and directly corresponds to the width of the belt intended to run on the pulley. When measuring the toothed section of a pulley to determine its code, remember the width of the toothed section will be slightly larger than the belt intended to run on that section. Common belt width codes for imperial pitch pulleys can be found below. The example pulley is for 3/8" wide belts.

Common Pitch Codes

MP (MXL) = 0.080" pitch
LT (40 DP) = 0.0816" pitch
XL = 0.200" pitch
L = 0.375"
H = 0.500" pitch
XH = 0.875" pitch
XXH = 1.250" pitch

Common Belt Width Codes

012 = 1/8" belt (.125")
019 = 3/16" belt (.1875")
025 = 1/4" belt (.250")
031 = 5/16" belt (.3125")
037 = 3/8" belt (.375")
050 = 1/2" belt (.500")
075 = 3/4" belt (.750")
100 = 1" belt (1.000")
150 = 1.5" belt (1.500")
200 = 2" belt (2.000")
300 = 3" belt (3.000")
400 = 4" belt (4.000")

4. Inch/Metric Designations: This code component has only two possibilities: "-" and "M". This code component will clarify our interpretation of the final character in our part number. When the "-" character is used, the final part number section will be interpreted using the inch system of measurement. When the "M" character is used, the final part number section will be interpreted using the metric system. We will go into further detail shortly, when discussing the final coded section. The example pulley has an "inch" bore.

5. Pulley Appearance: This section of code will help you determine the physical appearance of the pulley, and the components used to assemble the pulley. These codes will be used throughout B&B's part numbering system. Common pulley appearance codes are displayed below. The example pulley has a hub and flanges.

6. Pulley Material: This section of code indicates the material from which the pulley was made. The vast majority of our standard product line (using this type of part number) will be either aluminum or steel and use one of the codes below. The example part is made from aluminum.

7. Bore Sizes: The final section of code in our part number indicates the bore size of the pulley. As we noted earlier, the fourth section of code will determine how this final section is interpreted. If the fourth sectionis a "-", we will use a code to indicate our bore size in inches. If the fouth section is a "m", we will use a code to indicate our bore size in millimeters. The inch codes are issued based on common bore sizes, from smallest to largest. The metric bores are typically a direct reflection of the bore size in millimeters. In our example above, the "-" and "4" indicates a 5/16 inch bore.

Common Pulley Materials

A = Aluminum
S = Steel
P = Plastic
I = Cast Iron
SS = Stainless Steel

Common Metric Bores

3 = 3mm 10 = 10mm
4 = 4mm 12 = 12mm
5 = 5mm 15 = 15mm
6 = 6mm
8 = 8mm

Common Inch Bores

1 = .125" 6 = .500"
2 = .1875" 7 = .625"
3 = .250" 8 = .750"
4 = .3125" 9 = .875"
5 = .375" 10 = 1.000"

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