## **GETTING STARTED**



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## **MANUAL OVERVIEW**

## **OVERVIEW OF THIS PUBLICATION**

The IronHorse Helical Bevel Gearbox User Manual describes the installation, operation, and preventive maintenance of IronHorse Helical Bevel Gearboxes.

## WHO SHOULD READ THIS MANUAL

This manual contains important information for people who will install, maintain, and/or operate any of the IronHorse Helical Bevel Gearboxes.

## **TECHNICAL SUPPORT**

Our technical support group is glad to work with you to answer your questions. Please call the technical support group if you need technical assistance, or visit our web site. Our website contains technical and non-technical information about our products and our company.

By telephone: (770) 844-4200 (Mon – Fri, 9:00 am – 6:00 pm ET) On the Web: www.automationdirect.com

#### SPECIAL SYMBOLS



When you see the "notepad" icon in the left-hand margin, the paragraph to its immediate right will be a special note.



WHEN YOU SEE THE "EXCLAMATION MARK" ICON IN THE LEFT-HAND MARGIN, THE PARAGRAPH TO ITS IMMEDIATE RIGHT WILL BE A WARNING. THIS INFORMATION COULD PREVENT INJURY, LOSS OF PROPERTY, OR EVEN DEATH (IN EXTREME CASES).

## IRONHORSE<sup>®</sup> Helical Bevel Gearbox Introduction

## PURPOSE OF HELICAL BEVEL GEARBOXES

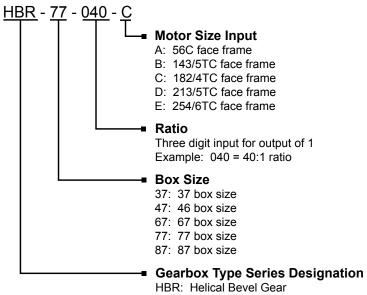
Gearboxes, also known as enclosed gear drives or speed reducers, are mechanical drive components that can control a load at a reduced fixed ratio of the motor speed. The output torque is also increased by the same ratio, while the horsepower remains the same (less efficiency losses). For example, a 10:1 ratio gearbox outputs approximately the same motor output horsepower, but motor speed is divided by 10 and motor torque is multiplied by 10. Helical bevel gearboxes use helical gears to provide quiet startup and smooth operation. IronHorse helical bevel gearboxes are manufactured in an ISO9001-certified plant by one of the leading and most internationally acclaimed gearbox manufacturers in the world today. Only the highest quality materials are tested, certified, and used in the manufacturing process. Strict adherence to and compliance with the toughest international and U.S. testing standards and manufacturing procedures assure you the highest quality products. We offer NEMA quill input, right-angle hollow-bore output Helical Bevel Gearboxes with cast-iron frames. The accessory output shafts are perpendicular to the input. These gearboxes utilize C-face and TC-face mounting interfaces for C-face and TC-face motors.

## PACKAGE CONTENTS

After receiving the IronHorse Helical Bevel Gearbox, please check for the following:

- Make sure the package includes the speed reducer and the vent plug.
- Inspect the unit to ensure that it was not damaged during shipment.
- Make sure that the part number on the gearbox nameplate is the same as the part number that you ordered.
- Gearboxes come prefilled with oil for an M1 mounting position. Check oil level and fill per instructions when changing to a different mounting position.

## **PART NUMBER EXPLANATION**



## **NAMEPLATE INFORMATION**

• REDUCER •	
TYPE HELICAL BEVEL	Gearbox Type
RATIO 40 / 1	Gearbox Ratio
BX SIZE 77	Gearbox Box Size
# HBR-77-040-C	Gearbox Model Number
O SERIAL NUMBER 123456789 Made In Taiwan	Gearbox Serial Number

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