

How to Use this Manual

In This Chapter. . . .
— Introduction

Introduction

The purpose of this manual The purpose of our manual is simple. We want to make it easy get your *DirectNET* network up and running as soon as possible. Since we understand your time is money, our goal is to keep the documentation simple and concise.

This manual focuses on the details of the *DirectNET* network. The manual provides a general overview of *DirectNET* along with an explanation of all the steps required to implement a network.

Since we constantly try to improve our product line, we occasionally issue addenda documenting new features and changes to the products. If there are addenda included with this manual, please read through them to see which areas of the manual or product are affected.

Who should read this manual If you understand data networks this manual will provide all the information you need to get and keep your network up and running. We will use examples and explanations from time to time to clarify our meaning and perhaps help you brush up on specific features used in *DirectNET* communications. This manual is not intended to be a generic network training manual, but rather a user reference manual for *DirectNET*.

Where to begin If you are in a hurry and already understand the basics of master / slave networks, use the chart on the next page and proceed on to the chapter that pertains to your needs. Be sure to keep this manual handy for reference when you run into questions. If you are new to networking, we suggest starting at Chapter 2, so you can understand the wide variety of network components and configurations available with *DirectNET*. We believe you will be pleasantly surprised with how much can be accomplished with *DirectNET*.

How this manual is organized

Ch 2: Getting Started with *DirectNET* – provides an overview of *DirectNET* and all the network components and configurations. It does not provide extensive information on each network component, but instead highlights some of the basic features of *DirectNET*.

Ch 3: Network Design and Setup – shows how to prepare for network installation, and gives you cable diagrams for the various types of network master and slave stations.

Ch 4: Communication Parameters – provides detailed information about setting the master and slave station communication parameters. This is the place to look if you need to know how to set the communication baud rate, station addresses, etc.

Ch 5: RLL Communications Programs – provides a description of the Relay Ladder Logic (RLL) instructions used to initiate communications in a network that uses a PLC as the master station.

Ch 6: *DirectLink* Communications Programs – If you're writing your own host software program or operator interface driver, you'll find the *DirectNET* protocol information in this chapter.

Ch 7: Network Operation and Troubleshooting – provides information on network startup and troubleshooting techniques.

Appendix A – provides a step by step example of a PLC master / slave network.

Appendix B – provides a step by step example of a PLC peer master network.

Appendix C – provides a step by step example of a host master network.

Appendix D – explains the data types and memory ranges for the DL405 products.

Appendix E – explains the data types and memory ranges for the DL305 products.

Appendix F – explains the data types and memory ranges for the DL205 products.

Supplemental Manuals

There are other manuals occasionally referenced by this manual. These manuals are not absolutely necessary to install the network, but they do provide additional details on several products that can be used with *DirectNET*.

- DL405 User Manual (D4-USER-M)
- DL405 Data Communication Modules (D4-DCM-M)
- DL305 User Manual (D3-USER-M)
- DL305 Data Communications Unit (D3-DCU-M)
- DL205 User Manual (D2-User-M)

Now, you have the material necessary to quickly understand the features and requirements of *DirectNET*. So, let's get started!