



## **Helping Tech Support Help You**

Our Technical Support groups take a significant number of calls per day. We handle support calls from very old products some manufactured as far back as 1970. We handle calls for AC drives, DC Drives, Communication products, Software programs dealing with a whole range of manufacturing applications. In order to help process your particular request or technical issue we have put together some ideas that could help you get the information you need and get thru your issue most efficiently.

### **The basics:**

**Who ?** It is not absolutely critical that we know your name or which company you are calling from right from the beginning of a conversation but it is helpful should we get disconnected. We maintain a customer database that enables us to look up past calls and general history. This information can be helpful in servicing you more quickly. This history allows us to re-connect you with your original Tech Support contact that you were working with that will help you by not having to repeat your original information.

### **What ? Drive Nameplate Information Motor Nameplate Data**

I know it will sound like an obvious thing but when you call try to have the Part Number or Model number of the Drive or product you are calling about ( the serial number is not very helpful unless we need to replace the drive under a warranty situation). At least once if not twice a day each of us gets a call about a drive that the person calling does not know the part number or model number. They often reply well it's green. Most of our drives are green so this doesn't help much except it would tend to indicate that it is one of ours. They may call concerning a Quantum III or Mentor II. When we ask which model they say 5-1000HP. It appears they are reading the cover of the manual. The manual covers the full range of the drives which is 5-1000HP. The reason we need to know this is because each size is a little different in how it is constructed and how it handles certain functions.

Have Motor Nameplate Data available. We often need to check drive settings and these are highly dependent on motor nameplate data. We often find that even on drives that have been "working for years", that they were never set up correctly for the motor.

The interrogation process between you and tech support will slow the process down if you call in without this information- you will have to go back out to the machine and call back in maybe waiting on hold until we can get free again.

### **When ?**

- When did the problem occur ?
- Is this problem occurring on an initial installation or start-up of a drive ?
- Or has the drive been running successfully for a period of time and just recently failed or exhibited some sort of anomaly ?
- Did the problem occur after a storm ?
- Did the problem occur after some maintenance work or product change ?
- Have you recently installed replacement parts to the unit?

This kind information is very important in how we proceed in the troubleshooting process.

## Other things:

### Email Address

We understand that not everyone has an email address but we often will send you information via email during a Tech Support issue to help you progress more rapidly through your situation. So even if you can provide an email address of an associate, it could prove quite useful.

### Internet Access

We understand that not everyone has Internet Access but usually someone in your office does. After listening to your situation we will regularly refer you to Google to obtain immediate assistance on topics that address your situation. These are often documents written for the Troubleshooting Technician and are full of color photographs providing quick reference reducing your time on the phone taking notes from us.

### Manuals/Schematics

When you call in have your product manual and any drive interconnect schematics at hand. We will often refer you to specific pages in the manual for reference during troubleshooting.

### Test Equipment

Eventually you will need to call us from the machine, so again, have your product manual and any drive interconnect schematics at hand. Other things to have on hand would be:

- A Voltmeter rated for the job - you may be possibly measuring 800vdc
- An AC clamp-on ammeter if calling in on AC Motor Drives
- A DC clamp-on ammeter if calling in on DC Motor Drives
- A couple small pieces of wire – say 22ga
- A small flat bladed Screwdriver (tweaker)



## Most Importantly - A portable phone

Is probably the single most useful tool for us. To get to the bottom of problems we need to use your fingers and eyes to let us look at parameters inside the drive and for you to tell us what you see at various locations. For this reason we need communications from in front of the drive. People try to do this from their office and go out to the drive and back and forth- this method is highly inefficient and can take a day or more versus perhaps an hour or less to get to the bottom of some problem.

- A long phone extension from a nearby office outlet is fine
- Wireless office phones are quite inexpensive today and can reach a couple hundred feet from a nearby office.
- Cell phones are fine also but may not work everywhere and are sometimes hard for you to hear us over the factory background noise. If you plan to use a cell phone have the **battery charger** handy. We often lose conversations midway due to battery depletion.



## **Headsets are fantastic on the factory floor**



A plug in headset is ideal. Having both hands free is safer and much easier for you. The models that have a wrap around to the mouth are rather directional and usually provide decent background noise immunity. A head set model that has a good sized cushioned earpiece help you hear us. Sometimes it helps to put an earplug in the opposite ear to keep out plant noise.

## **Self Help Troubleshooting**

If you call in and find yourself waiting on line or experiencing problems after normal working hours, you should know that we have a fairly good listing of information on our website that is available 24/7/365.

Click on the following links to go to these items:

[Troubleshooting Guides](#)

[Application Notes](#)

[Videos](#)

[Product Manuals](#)

Cover most all of our drive products. We would encourage you to check these out to see if the problem you are calling about is listed in these areas. These guides are in color and full of photographs for quick reference and are geared toward the Drive Technician.

## **Warranty Situations**

If you are calling to check on whether your product is still in warranty- when you call in you should indicate that immediately. Technical Support may be on the line but there are others in Customer Support who can check the status of drive warranty and in many instances help you along the process. They will need the Model number and Serial Number of the drive at a minimum to proceed however.

For a complete summary of our warranty procedure and what information you will need click the following link:

[Warranty Fulfillment Information](#)

[Other Warranty Information](#)

## **Repair Situations**

You should be aware that we have a guaranteed 5 day and 48hour repair turn-around service. Repairs are backed with a full 1 year warranty. To obtain more information on repairs, click the link below:

[Repair Information](#)