Amusement Repair Training Class
Five-Day Class

Come spend five days with Randy Fromm.
You don't have to be a genius to fix power supplies and monitors. No previous electronics experience required.

This is a "fast-track" class for people who want to learn the quick and easy way to fix monitors and power supplies without having to learn a lot of electronic theory or mathematics.

It's usually pretty easy to fix amusement electronics
There are three parts to a successful repair:
1. Find the bad part(s) and remove them
2. Obtain replacement or substitution component(s)
3. Install the part(s)

The Parts

There is no single trick to repair but it's not usually too difficult once you learn a few basics. During the class we will really stress component identification and testing so you'll learn how to find most bad parts (resistors, capacitors, transistors, etc.) yourself. This is an important part of the class. You absolutely must know what the parts are and how to test them to see if they are good or bad. Each student will receive his/her own digital multimeter (for testing components and making measurements) as part of their classroom materials package. We'll spend two full days on this.

During the class, you'll learn the easy way to locate and purchase replacement components at reasonable prices. You'll learn how to make substitutions too, when the exact replacement component is unavailable.

Component Removal and Replacement

All this doesn't amount to a hill of beans if you can't remove and replace the components without butchering the printed circuit board. That's why we spend two afternoons in a hands-on soldering lab. If you cannot solder properly, you are useless as an electronic technician. Worse than useless, you can cause hundreds or thousands of dollars worth of damage and/or lost revenue if you're not careful.

Theory of Operation

The class will cover the theory of operation of power supplies and monitors as it is very interesting how this stuff works. But knowing how it works and fixing it are often two different things and the name of this five-day class is repair. Do you really care how something works if all you want is to get it fixed?

With that in mind, you will learn the most common failures in power supplies and monitors so you can repair them quickly and easily without having to spend a lot of time troubleshooting. You will learn some tricks that will allow you to make repairs in minutes that would otherwise take an hour or more.

CLASS SCHEDULE

Class begins at 9:00 am and typically ends at around 4:00 pm daily with an hour break for lunch at noon.

Day One
Beginning Electronics for Amusements

This segment assumes that you have no previous electronics training and takes you through a simple, NO MATH look at electronic components.

Using a Digital Multimeter

The DMM is the single most important piece of test equipment you can use. This class shows you how to use the meter to make the tests and measurements necessary for troubleshooting.

Electronic Components

The individual components are introduced.

Afternoon

Soldering Lab

Good soldering technique takes practice but there are some tricks that can really help speed things along and minimize the chance of damage. Each student will be provided with their own soldering iron, solder and desoldering supplies. This equipment will be theirs to keep. We will be assembling a fun practice kit that includes all of the electronic components we have just studied.

Day Two
Electronic circuits, schematic diagrams and more!

Understanding electronics is easy when you learn the basics of how circuits and components operate. Students learn how the components function and how to test them for proper operation using the digital multimeter or other test equipment. Students will have ample opportunities to practice their testing skills during the hands-on component testing labs.

Afternoon

Soldering Lab

Following the first day's soldering practice, we will be constructing a component tester which will be a valuable tool for your repairs.

Day Three
Power Supplies

Power supply failure is common. This segment covers the theory of operation of power supplies, including the power supplies used in CRT and LCD monitors. The emphasis is on common failures and repairs.

LCD Monitor Repair

LCD Monitor repair is generally pretty easy thanks to their modular design. This segment covers the theory of operation of LCD monitors. There will be a presentation on repair techniques including CCFL replacement with LEDs. Repair of inverter PCBs and A/D boards will be covered.

Day Four/Five
CRT Monitor Repair + Hands-On Monitor Repair Lab

The Amusement Industry is the last home for the CRT monitor. This session covers CRT monitor theory of operation, including detailed circuit analysis with a special emphasis on what fails and shortcuts for quick and accurate troubleshooting.

Bring your bad monitors in for diagnoses.
Repair NOT guaranteed as we may need parts.

Cost of the Program

$995.00
Includes Digital Multimeter
Soldering iron, tools and soldering supplies
Sample components
Soldering Instruction Kit
Component Tester
Textbook

To reserve dates for your class, please contact:
Randy Fromm
401 W. Lexington Ave. #777
El Cajon, CA 92022
mobile.619.838.7111
randy@randyfromm.com

Class times: 9:00 am to 4:00 pm

Enrollment Form

Please mark your desired class location:

This training is offered by:
Randy Fromm
401 W, Lexington #777
El Cajon, CA 92022
tel.619.838.7111
e-mail randyfromm@gmail.com

[   ] **The Netherlands - June 19-23, 2024**
National Videogame Museum
Located in: Shopping Center Stadshart Zoetermeer
Address: Luxemburglaan 1, 2711 BD Zoetermeer, Netherlands

[   ] **Los Angeles, CA - August 5-9, 2024**
Primetime Amusements
13920 Mica St. Santa Fe Springs, CA 90670

Company Name: _____

Name of attendee(s) - Attach a list if necessary

_____

_____

Address _____

Address _____

City _____ **State/Prov.** _____

Country _____ **Zip/Postal Code** _____

Telephone _____

E-mail _____

Enrollment fee is $995.00 per person. Payment by credit card, check, PayPal to randyfromm@gmail.com

[   ] **American Express**
[   ] **Discover**
[   ] **MasterCard**
[   ] **Visa**

Account Number: _____

**Please complete this enrollment form and return it.
Enrollment is limited.**

Credit Card Security Code _____

Expiration Date: _____