

# INDUSTRIAL TRAINING



Commit to *excellence*  
for your associates.

Our seminars meet the training needs of the manufacturing industry.  
Attendees value both the hands-on labs and the quality of our instructors.

**Personnel with better skills can provide  
your company with a competitive edge by:**

- ▶ Increasing plant production rates
- ▶ Delivering reduced downtime
- ▶ Decreasing maintenance costs
- ▶ Engaging and showing loyalty



Livingston & Haven is an innovative solutions provider and strives to be an essential partner in the successful future of U.S. Manufacturing.

**We are the experts in hydraulics and fluid power systems.**

**EXCELLENT!**  
Norfolk Southern

This training has saved us time and money with more thorough troubleshooting and fewer parts replacement.

**THANK YOU!**  
jetBlue Cargo

There was so much good information passed! We were the first airport to send someone for this class, now we can set a trend.

The nice thing about the Institute is they can do on-site training to fit our needs.



PRINCIPLES OF

## INDUSTRIAL HYDRAULICS

5  
DAYS

The go-to introduction for hydraulic competence.

From Pascal's Law through schematics and hands-on exercises to 10 fundamental circuits used at plants.

PRINCIPLES OF

## MOBILE HYDRAULICS

5  
DAYS

Hands-on focus for technicians with mobile hydraulic equipment responsibility.

From hydraulic principles and application to mobile equipment: pumps and controls, valves, actuators, schematics and circuits.

PRINCIPLES OF

## ELECTRICITY

4  
DAYS

Theory, practical knowledge and structured hands-on lab exercises with an industrial electrical focus.

From AC and DC theory to schematics. Measurement and hands-on problems with circuits and introduction to PLCs.

### NEW COURSES: 2016

PRINCIPLES OF

## PNEUMATICS

2  
DAYS

Safety, components, schematics, systems and maintenance in a busy hands-on course.

## HYDRAULIC PUMPS & CONTROLS

2  
DAYS

Understand hydraulic pump types and their controls; as used in industrial systems including maintenance considerations and troubleshooting.

## MECHATRONICS

4  
DAYS

Advanced training focusing on key concepts used in Mechatronic system design, troubleshooting and maintaining Mechatronic systems. Sizing, optimization, coding, multi-axis synchronization.

## LUBRICATION

2 / 3  
DAYS

Application, proper installation, selection, and safe troubleshooting are discussed and practiced through this combination of classroom and hands-on training.

## HYDRAULIC SYSTEM DESIGN

5  
DAYS

An advanced training seminar to understand system design and optimization.

Optimal design reduces equipment cost, energy, maintenance effort, and production outage.

\* Prerequisite

## HYDRAULIC SPECIALIST REVIEW & CERTIFICATION

3  
DAYS

International Fluid Power Society (IFPS) Hydraulic Specialists are recognized throughout the industry.

2.5 day review followed by the certification test. 80% pass rate in 2015.

## OSHA

2  
DAYS

Contact us to be included in our 10-hour course focusing on recognition, avoidance, and prevention of safety and health hazards in the workplace.

## UNDERSTANDING PROPORTIONAL VALVES

5  
DAYS

Learn the function and operation of electro-proportional hydraulic valves within a system.

Recommended for electrical and mechanical technicians and engineers.

## HYDRAULIC SYSTEM MAINTENANCE

5  
DAYS

Second-level training seminar for maintenance personnel who already have an understanding of hydraulic principles.

Hands-on work to improve efficiency, reliability, maintenance, troubleshooting and testing.

\* Prerequisite

## ON-SITE TRAINING

We will bring customized fluid power and lubrication training to your company to increase general understanding using **your** equipment and schematics.