



Hydropower Apprenticeship Program

Program Overview

U.S. ARMY CORPS OF ENGINEERS

BUILDING STRONG®

Our apprenticeship applies to the mechanical, electrical and operator crafts. It is a self-paced program that is based on a correspondence-course type of curriculum augmented by other methods of instruction.

The program is divided into eight phases. Each phase lasts about four months for co-operative students (also known as CoOps who are enrolled in local community colleges). Program phases last about six months for non-CoOp students, containing specific hydropower systems research and academic courses that must be completed during each phase.

On-the-job training (OJT) comprises more than 75 percent of the program's training plan. There are individual progressive tests and semi-formal OJT evaluations on a regular basis, as well as a comprehensive exam containing written, practical and oral segments administered at the end of each phase.

Training includes temporary assignments to other power generating facilities within the District. These training assignments provide apprentices the opportunity to increase their trade skills and broaden their understanding of hydropower operations and maintenance. Other forms of instruction have been integrated into the program, including: computer based training, hands-on lab training, partnering with community colleges and contract instruction.

Upon graduation, apprentices will be placed in journeyman positions at one of the District's six hydropower facilities.



Defining the Eight Phases

Phase One: The focus of the first phase is to expose the trainees to all aspects of operations and maintenance of hydroelectric, power generating facilities. *Principles of Hydropower* and *Hydroelectric Power Plant Operations* are two courses that are used to provide an in-depth overview of how systems in the hydroelectric power generation industry work. During this time, nearly all of the safety training requirements are completed. Also, during this phase, apprentices work in all shops on a rotation for the first year, not only for indoctrination, but primarily to better understand the interaction between work centers.

Phase Two: The focus is general, which provides a broad vision of the power-generation field. The *Principles of Hydropower* course is completed and work on the basic correspondence course portion of the program begins. In this phase, trainees prepare and present a briefing on selected hydropower systems.

Phases Three to Five: Apprentices focus on their selected craft: electrical, mechanical or operations. Correspondence courses and some off-site training may be arranged. Study time (either academic study or systems research) occurs one day per week. For the remainder of the program apprentices work three days a week in their assigned shops. Temporary assignments to other hydropower facilities begin in Phase Five.

Phases Six to Eight: Apprentices complete the correspondence course and assignments in their selected crafts, studying one day per week. Independent work is assigned. More off-site and specialized training is possible, if needed.

Work Schedule

Monday through Thursday, 6:30 a.m. to 5 p.m.

Once in Phase Three, operators work a 12-hour rotating shift: 6 a.m. to 6 p.m., or 6 p.m. to 6 a.m.

U.S. ARMY CORPS OF ENGINEERS – WALLA WALLA DISTRICT

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www.nww.usace.army.mil/Apprenticeship_Program/default.htm