Series Narrative
Building Automation Technicians perform a variety of duties related to the design, development, and improvement of building automation systems (BAS). They inspect, troubleshoot, and maintain BAS, involving trades or contract personnel when necessary to make repairs or adjustments. Building Automation Technicians also review the existing BAS and recommend, assist with the design of, or revise existing systems. All work pertaining to the operation of building mechanical systems is initiated by the Chief or Assistant Chief Plant Operating Engineer. Any other trades doing work for the Heat, Light, and Power Division, any shutdown, start-up, or adjustment of any heating-ventilating-air conditioning or building system will be accomplished by an Operating Engineer.

DESCRIPTION OF LEVELS OF WORK

Level I: Building Automation Technician I  4663(3882)
Employees in positions allocated to this level perform routine technical duties in troubleshooting and repairing building-automation-systems field cabinets, sensors, and controls. They typically work under the direct supervision of a higher level Building Automation Technician, foreman, Chief or Assistant Chief Plant Operating Engineer or other designated supervisor.

A Building Automation Technician I typically--

1. troubleshoots and repairs building-automation-system field cabinets, including communications equipment, printed circuit boards, power supplies, electrical/electronic controls, sensors, and transducers

2. assists the Building Automation Technician II in performing necessary commissioning, diagnostic, and maintenance procedures (such as field verification of system functions to ensure the proper operation of building automation systems

3. assists the Building Automation Technician II in editing computer programs for building-automation-system points (such as determining conversion patterns, defining point acronyms, and/or soliciting alarm specifications from operating personnel

4. assists the Building Automation Technician II in the implementation of energy conservation measures by utilizing and/or modifying the existing building automation-system features (such as mathematical computation and environmental controls)
records and maintains inventory records and cost summaries for leased equipment, including radios, pagers, and other communications equipment

prepares and maintains mechanical, instrumentation, and communications equipment inventory

prepares and revises building-automation-system equipment control methods

performs other related duties as assigned

Level II: Building Automation Technician II

Employees in positions allocated to this level develop and assist with the design of building automation systems. They typically supervise employees in Level I. Employees allocated to positions in Level II work under the general supervision of an engineer, Chief or Assistant Chief Plant Operating Engineer, or other designated supervisor.

A Building Automation Technician II typically--

1. assists an electronics engineer in the design and implementation of various building automation hardware and computer software systems

2. makes recommendations to an electronics engineer regarding revisions to the building automation hardware and associated building-automation system functions

3. coordinates university and contractor's personnel when needed for additions and modifications of building automation systems

4. coordinates standing order service contract work on the computer and associated peripherals

5. assists in the preparation of computer, communications, and security programs; also prepares project cost estimates

6. monitors work progress and job costs on building automation systems

7. supervises the work of the Building Automation Technician I

8. troubleshoots, repairs, or coordinates repair of building-automation-system console communications equipment including printed circuit boards, modems, and leased data circuits

9. prepares drawings and diagrams of system additions or revisions after installation

10. writes and debugs computer programs for the building automation system (such as energy consumption reports and utility distribution reports)

11. performs other related duties as assigned
BUILDING AUTOMATION TECHNICIAN SERIES

MINIMUM ACCEPTABLE QUALIFICATIONS REQUIRED FOR ENTRY INTO

Level I: Building Automation Technician I: 4663(3882)

CREDENTIALS TO BE VERIFIED BY PLACEMENT OFFICER

1. Two years of college/vocational/technical training in electronics that included course work in drafting, blueprint reading, basic computer programming, and algebra or other higher level mathematics

   or

   Two years of work experience specifically involving maintenance of a building automation system.

PERSONAL ATTRIBUTES NEEDED TO UNDERTAKE JOB

1. Good mathematical skills, including the ability to perform basic mathematical functions (such as addition, subtraction, multiplication, and division) and an aptitude for higher level functions (such as algebra, geometry, or trigonometry)

2. Basic electronics knowledge

3. Basic knowledge of computer hardware and software

4. Skill in reading blueprints and schematics

5. Analytical ability for problem solving

6. Record keeping skills

7. Ability to learn the buildings and general layout of the institution served

Level II: Building Automation Technician II 4664(3882)

CREDENTIALS TO BE VERIFIED BY PLACEMENT OFFICER

1. Possession of requirements for Level I of this series

2. Two years of work experience comparable to Level I of this series

PERSONAL ATTRIBUTES NEEDED TO UNDERTAKE JOB

1. Skill in higher level math functions (such as algebra, geometry, or trigonometry)

2. Skill in reading blueprints and schematics

3. Working knowledge of computer programming
4. in depth knowledge of electronics principles
5. ability to learn the buildings serviced by the building automation system
6. record keeping skills
7. supervisory ability
8. ability to help plan and design building automation systems