



CALIFORNIA DEPARTMENT OF HUMAN RESOURCES

ASSISTANT & ASSOCIATE TELECOMMUNICATIONS (ENGINEER)

Agency: 7500 Class Code: 3643 Exam Code: 0PB40

This multi-level examination is for:

107500-00103643-0pb40 ASSISTANT TELECOMMUNICATIONS ENGINEER
107500-00103640-0PB40 ASSOCIATE TELECOMMUNICATIONS ENGINEER

Department(s):	CalHR/Statewide for all State Departments
Opening Date:	12/22/2010 8:15:00 AM
Closing Date:	Continuous
Cut-off Date:	10/15/2015
Type of Examination:	SERVICEWIDE OPEN
Salary:	MONTHLY-RANGED-SALARY - \$5,586.00 to \$8379.00
Employment Type:	Permanent Full-time Permanent Part-time Permanent Intermittent Limited Term Full-time Limited Term Part-Time Limited Term Intermittent

EEO

An equal opportunity employer to all regardless of race, color, religion, sex, gender identity or expression, national origin, age, ancestry, disability, marital status, political affiliation, sexual orientation, or genetic information.

DRUG FREE STATEMENT

It is an objective of the state of California to achieve a drug-free state work place. Any applicant for state employment will be expected to behave in accordance with this objective because the use of illegal drugs is inconsistent with the law of the state, the rules governing

civil service and the special trust placed in public servants.

WHO SHOULD APPLY?

Candidates who meet the minimum qualifications as stated below may apply for this examination at any time. Once you have taken the examination, you may not reapply for six (6) months. All applicants must meet the education and/or experience requirements as stated on this examination announcement.

FILING INSTRUCTIONS

Final File Date: Continuous

Where to Apply: Click on the Examination link at the bottom of this bulletin.

SPECIAL TESTING ARRANGEMENTS

If you have a disability and need special assistance or special testing arrangements, contact the California Department of Human Resources (CalHR), Examinations Services at (866) 844-8671, or via the California Relay Service for the Deaf or Hard of Hearing at (800) 735-2929 from TTY Phones, and (800) 735-2922 from voice phones.

SALARY INFORMATION

Assistant Telecommunications Engineer \$5586.00 - \$6787.00

Associate Telecommunications Engineer \$6897.00 - \$8379.00

ELIGIBLE LIST INFORMATION

An OPEN, MERGED eligible list will be established by the State of California. The names of successful competitors will be merged onto the eligible list in order of final scores regardless of test date. Eligibility expires 12 months after it is established. Competitors must then retake the Training and Experience Evaluation to reestablish eligibility.

MINIMUM QUALIFICATIONS

ASSISTANT TELECOMMUNICATIONS ENGINEER

Either I:

One year of experience in the California state service performing the duties of a Junior Electrical Engineer in the telecommunications field.

OR II

Two years of electrical engineering experience, one year of which shall have been in the

telecommunications field.

AND

Education: Candidates applying under non-State requirements must meet the following education requirements: Equivalent to graduation from college with major work in electrical, electronic, or communications engineering. (Additional qualifying experience may be substituted for the required education on a year-for year basis.) (A Master's Degree in Electrical Engineering with specialization in electronics or communications may be substituted for the required experience for Assistant Telecommunications Engineer. Applicants who are pursuing graduate work toward a master's degree will be admitted to the examination, but they must receive the degree before they will be considered for the appointment.

ASSOCIATE TELECOMMUNICATIONS ENGINEER

Either I

Two years of experience performing the duties of an Assistant Telecommunications Engineer.

OR II

Three years of engineering experience in the field of telecommunications which must have included two years in design and construction, or maintenance of radio communications systems or wire communications systems.

AND

Education: Candidates applying under non-State requirements must meet the following education requirements: Equivalent to graduation from college with major work in electrical, electronic, or communications engineering. (Additional qualifying experience may be substituted for the required education on a year-for year basis.) (A Master's Degree in Electrical Engineering with specialization in electronics or communications may be substituted for the required experience for Assistant Telecommunications Engineer. Applicants who are pursuing graduate work toward a master's degree will be admitted to the examination, but they must receive the degree before they will be considered for the appointment.

POSITION DESCRIPTION

Assistant Telecommunications Engineer

This is the lower level of journeyman in this series. Under supervision, incumbents perform engineering work of average difficulty and assist in making telecommunications engineering surveys and studies.

Associate Telecommunications Engineer

This is the full journeyman professional level engineer in the series. Under direction, incumbents perform difficult telecommunications engineering work or act as a leadperson over subordinate staff members in connection with design, installation, maintenance and operation of statewide telecommunications systems; and independently make or supervise telecommunication engineering surveys and studies.

EXAMINATION INFORMATION

Training and Experience Examination- Weighted 100%

This examination will consist of a Training and Experience Examination weighted 100%. In order to obtain a position on the eligible list, a minimum of 70% must be obtained.

[Click here to view Training and Experience Questions](#)

KNOWLEDGE AND ABILITIES

Assistant & Associate Telecommunications Engineer:

Knowledge of:

1. The theory and principles of telecommunications and electronics for the installation, maintenance, modification, and repair of equipment and systems.
2. The design, uses, and functions of telecommunication systems and equipment (e.g., wire line, radio, fiber, satellite, data communications, telephone systems).
3. The principles, practices, methods, terminology and trends in telecommunication systems engineering.
4. The field of electromagnetic wave propagation to effectively design and test telecommunications systems.
5. The mathematical principles used in design and implementation of telecommunication systems.

Ability to:

1. Apply the theory and principles of telecommunications and electronics for the installation, maintenance, modification, and repair of equipment and systems.
2. Write clearly and concisely using proper spelling, grammar, syntax and sentence structure.
3. Verbally communicate information and ideas so others will understand.
4. Use computers and network equipment to configure, monitor, test, and/or operate telecommunication systems.
5. Develop and maintain constructive and cooperative working relationships.
6. Write technical reports to communicate complex information to various audiences.
7. Actively listen to others facilitate an open exchange of ideas and provide for effective communication.
8. Apply mathematical principles and statistical analysis to design and evaluate

telecommunication systems.

Additional Knowledge and Abilities for Associate Telecommunications Engineer:

Knowledge of:

1. Signal strength measurements and tolerances to effectively design, test, and maintain telecommunications systems.
2. Techniques (e.g., soldering, connectorizing, interpreting schematic diagrams) used in the installation and modification of telecommunications equipment and systems down to the component level.
3. Statistical analysis techniques in order to interpret data and make recommendations.

Ability to:

1. Detect, eliminate, and prevent problems with telecommunication systems down to the component level to ensure operability of equipment.
2. Detect, eliminate, and prevent sources of radio frequency interference using test equipment on radio frequency interference using test equipment on radi, microwave, and communications systems to assure proper operation.
3. Interpret and apply provisions of State and federal rules and regulations affecting the design, implementation, and operation of telecommunications systems.
4. Modify and assemble telecommunications equipment to properly interface with communications systems in accordance with manufacturer specifications and engineering instructions.
5. Effectively communicate in front of groups to facilitate an open exchange of ideas.

BENEFITS

To learn more about the comprehensive benefit package please visit the website at:

<http://www.calpers.ca.gov>

VETERANS' PREFERENCE

Veterans Preference will be granted in this examination. Effective January 1, 2014, in accordance with Government Code 18973.1 and 18973.5, whenever any veteran, widow or widower of a veteran, or spouse of a 100 percent disabled veteran achieves a passing score on an open examination, he or she shall be ranked in the top rank of the resulting eligibility list. This section shall not apply to any veteran who has been dishonorably discharged or released.

CAREER CREDITS

Career credits will not be added to the final score of this examination.

CONTACT INFORMATION

If you have any questions concerning this examination bulletin, please contact:

California Department of Human Resources
Attn: Examination Services
1515 S Street
Sacramento, CA 95811

Phone: 1-866-844-8671

California Relay Service: 1-800-735-2929 (TTY), 1-800-735-2922 (Voice)

TTY is a Telecommunications Device for the Deaf, and is reachable only from phones equipped with a TTY Device.: 1-800-735-2929.

GENERAL INFORMATION

Applications are available at: jobs.ca.gov and at local offices of the Employment Development Department.

If you meet the requirements stated on this examination bulletin, you may take this examination, which is competitive. Possession of the entrance requirements does not assure a place on the eligible list. Your performance in the examination described on this bulletin will be rated against a predetermined job-related rating, and all candidates who pass will be ranked according to their scores.

CalHR reserves the right to revise the examination plan to better meet the needs of the service, if the circumstances under which this examination was planned change. Such revision will be in accordance with civil service laws and rules and all competitors will be notified.

General Qualifications: Candidates must possess essential personal qualifications including integrity, initiative, dependability, good judgment, and ability to work cooperatively with others; and a state of health consistent with the ability to perform the assigned duties of the class. A medical examination may be required. In open examinations, investigation may be made of employment records and personal history and fingerprinting may be required.

Eligible Lists: Eligible lists established by competitive examination, regardless of date, must be used in the following order: 1) sub-divisional promotional, 2) departmental promotional, 3) multi-departmental promotional, 4) service-wide promotional, 5) departmental open, 6) open. When there are two lists of the same kind, the older must be used first. Eligible lists will expire in one to four years unless otherwise stated on the bulletin.

Veterans' Preference: Effective January 1, 2014, in accordance with Government Code 18973.1 and 18973.5, Veterans' Preference will be awarded as follows: 1.) Any veteran, widow or widower of a veteran, or spouse of a 100 percent disabled veteran, who achieves a passing score in an entrance examination, shall be ranked in the top rank of the resulting eligibility list. Any veteran who has been dishonorably discharged or released is not eligible for Veterans' Preference. 2.) An entrance examination is defined, under the law, as any open competitive examination. And 3.) Veterans' Preference is not granted once a person achieves permanent civil service status.

Veteran status is verified by the California Department of Human Resources (CalHR). Directions to apply for Veterans' Preference are on the Veterans' Preference Application (Std.

Form 1093), which is available at <http://jobs.ca.gov/Job/VeteransInformation>, and the Department of Veterans Affairs

Career Credits: Career Credits **will not be granted** in this Assistant and Associate Telecommunications Engineer series examination as it does not meet the requirements to qualify for Career Credits.

TAKING THE EXAM

When you click the link below, you will be directed to the Training and Experience Evaluation. At the end of the Training and Experience Evaluation, it will be instantly scored.

[Click here to take examination](#)