

GENERATION CONTROL & PERFORMANCE ANALYST  
(System Operations/Transmission Reliability)

PRIMARY FUNCTION

Under general direction, oversees, coordinates, plans and integrates generation resource plans by maintaining load-interchange-generation balance within the District control area; maintains interconnection frequency and control performance compliance; coordinates and communicates with power generation facilities personnel to ensure tariff contract compliance; administers contract provisions, including reconciliation of metering and actual generation, energy balancing and ancillary services.

DISTINGUISHING CHARACTERISTICS

The incumbent carries out responsibilities in accordance with the NERC, WECC and FERC standards, directives and applicable laws; interacts and participates in regional planning meetings and/or other governmental entities outside of the District.

This classification is a progression from power dispatcher (transmission) classifications.

Note: Incumbent is expected to be available on a 24-hour basis to respond to questions regarding system operations.

ESSENTIAL DUTIES AND RESPONSIBILITIES

1. Oversees District transmission tariffs with multiple privately owned power generation facilities; communicates with District internal power generation facilities to maintain and coordinate contracts to resolve problems, and to ensure contractual compliance provisions and obligations are met on a daily basis.
2. Oversees schedules, creates contracts, and reconciles District metering interface of power generation facilities generation against generation and production from power generators and directs dispatchers as required.
3. Reviews and prepares monthly settlement of power generation facilities generation, discrepancies or corrective actions, and ancillary services to reconcile base billing on contractual terms.

4. Develops resource plans including budgeting and controls for power generation facilities transmission, generation, line loss recovery and ancillary service plans for use of the District's transmission system.
5. Makes recommendations on metering interface standards to power generation facilities.
6. Receives and implements operational plans and commitments from generation operators within the District control area; coordinates events with regional reliability coordinators to analyze; directs generators operators to implement re-dispatch for congestion management as directed by the reliability authority.
7. Directs personnel, manages generator resources to ensure generation balance in real time; deploys interconnected operations services to ensure balance in coordination with the reliability authority.
8. Calculates area control error and frequency response parameters within the District control area.
9. Monitors and reports control performance standards and disturbance recovery ensuring compliance with reliability management system contractual criteria.

#### MARGINAL DUTIES AND RESPONSIBILITIES

1. Directs power dispatchers to determine real-time hourly power generation facilities generation, and ramp schedules and forecasts of expected geothermal generation; approves transactions from ramping ability perspective.
2. Performs other duties as assigned.

#### SUPERVISORY RESPONSIBILITIES

Functionally provides direction to power dispatchers regarding generation balancing activities.

#### QUALIFICATIONS REQUIREMENTS

To perform this job successfully, an individual must be able to perform each essential duty satisfactorily. The requirements listed below are representative of the knowledge, skill, and/or ability required. Reasonable accommodations may be made to enable individuals with disabilities to perform the essential functions.

#### Education and Experience

B. S. degree or equivalent in business, economics or engineering and two years of increasingly responsible experience in electrical power system transmission and distribution operations.

A combination of directly related electrical power system experience may be substituted for required education at the ratio of two years experience for one year of education.

#### Knowledge of

Power system operations; mathematics; North American Electric Reliability Council; Federal Electric Regulatory Commission; and Western Electricity Coordinating Council standards and regulations; independent system operator congestion, unscheduled flow conditions and day-ahead transmission markets; power accounting principles and practices as well as metering and generation reconciliation processes; power plan economics; current industry trends, technical industry advancement, regulatory changes, industry reliability standards and regulations; energy management system; power generation facilities transmission contracts, electrical rates, and electrical theory and practice as applied to power transmission lines and associated equipment; Imperial Irrigation District power system and facility locations.

#### General Abilities

Follow current North American Electric Reliability Council, Western Electric Coordinating Council regulations and guidelines; exercise sound judgment and reasoning ability under normal and emergency conditions; perform computation and record data accurately; maintain personal computer database records; convey instructions accurately and expeditiously during emergency situations; maintain current knowledge of industry trends, technical industry advancements, regulatory changes, adherence to industry or District reliability standards and changes to the utility or regional system reliability standards or regulations; understand safety rules and regulations and work safely; be prompt and regular in attendance; maintain effective relations with general public, private and/or public agencies or utilities and District staff; and work courteously and cooperatively with District employees, public and private agency representatives, utility representatives, vendors, consultants, brokers, and the general public.

#### Tools and Equipment Used

Personal computer, monitor, keyboard, mouse, printer, internet web-based vendor products by open access technology international such as WebOAIS, WebTrans, WebSAS, and energy trading systems, southwest

reserve sharing group program, sunguard energy accounting application, advanced control system energy management systems; MS windows operating systems, windows NT, Microsoft office, excel, work, PowerPoint, access, world wide web, internet web browsers, e-mail application, telephone, beeper, cellular telephone, work desk, fax machine, copy machine, file cabinet, pen, pencil, computer printout, manuals, code books, reference books, sedan.

### Licensing

A valid driver's license issued by the State of California, Department of Motor Vehicles is required.

Certified as a system operator under the North American Electric Reliability Council, and Western Electricity Coordinating Council.

### Language Skills

Ability to read, analyze, and interpret general business periodicals, professional journals, technical procedures, legal documents, or governmental regulations. Ability to write reports and narratives. Ability to effectively present information and respond to questions from utility representatives, vendors, consultants, geothermal representatives, customers and the general public.

### Mathematical Skills

Ability to calculate figures and amounts such as reductions, interest, proportions, percentages, area, circumference and energy accounting. Ability to apply concepts of basic algebra and geometry.

### Reasoning Ability

Ability to define problems, collect data, establish facts, and draw valid conclusions. Ability to interpret an extensive variety of technical instructions in mathematical or diagram form and deal with several abstract and concrete variables.

### Other Skills and Abilities

Must travel extensively by air or land transportation outside of service area. Required to stay overnight at lodging and attend conferences, seminars and public hearings.

Imperial Irrigation District Substation Awareness Certification.

Degree of Physical Effort - 2

WORK ENVIRONMENT

The work environment characteristics described here are representative of those an employee encounters while performing the essential functions of this job. Reasonable accommodations may be made to enable qualified individuals with disabilities to perform the essential functions.

While performing the duties of this job, the employee frequently is required to work in well-lighted large office environment with climatically controlled temperatures; the employee occasionally works near moving mechanical parts; the employee is occasionally exposed to outside weather conditions; the employee is occasionally exposed to fumes, smoke and airborne particles; the employee is occasionally exposed to risk of electrical shock.

The noise level in the work environment is usually quiet.

PHYSICAL DEMANDS

The physical demands described here are representative of those that must be met by an employee to successfully perform the essential functions of this job. Reasonable accommodations may be made to enable qualified individuals with disabilities to perform the essential functions.

While performing the duties of this job, the employee is occasionally required to talk; the employee is frequently required to hear and listen to alarms, instructions, direction and information in person, over two-way radio and telephone; the employee is frequently required to sit in front of console monitoring screen; the employee is frequently required to use hands to finger, handle or feel objects, tools or controls; the employee is frequently required to reach forward with hands and arms; the employee is occasionally required to stand on carpet, tile, concrete and asphalt surfaces; the employee is occasionally required to walk on carpet, tile, concrete and asphalt surfaces.

The employee must occasionally lift and/or move up to 25 pounds. Specific vision abilities required by this job include close vision, distance vision, color vision, peripheral vision, depth perception, and the ability to adjust focus.