

GPL-GEN-JMB	OUTPUT FOCUS JOB DESCRIPTION		DEPARTMENT/DIVISION GENERATION/ OPERATIONS
Position: MECHANICAL ENGINEER	Grade: JM 'B'	Incumbent:	Supervisor: GENERATION O&M AND CONTRACTS MANAGER
Manages: Operations and Maintenance Superintendent; Maintenance Supervisor and Shift Supervisor			

JOB PURPOSE: To plan, organize and monitor installation, operation, maintenance and repairs of all power stations machinery and equipment including auxiliaries so as to ensure optimum performance.

KEY RESPONSIBILITY AREAS:

1. Read and interpret blueprints, technical drawings, schematics, and computer-generated reports.
2. Confer with operation and maintenance superintendent, supervisors to implement operating procedures, resolve system malfunction and provide technical information.
3. Perform thorough inspections of diesel power plant equipment, including engines, generators, cooling systems, fuel systems, exhaust systems, and auxiliary components.
4. Utilize diagnostic tools, instrumentation, and technical manuals to identify potential issues and assess the condition of critical components.
5. Possess knowledge of welding techniques and procedures to perform repairs or fabrication of metal components, including carbon steel, stainless steel, and non-ferrous alloys, using shielded metal arc welding (SMAW), gas tungsten arc welding (GTAW), or other welding processes.
6. Perform overhauls of diesel engines, including disassembly, inspection, repair, reassembly, and testing of components such as pistons, cylinders, cylinder heads, crankshaft, bearings, valves, and fuel injection systems.
7. Develop and execute preventative maintenance plans based on manufacturer recommendations, belt adjustments, and alignment checks, to ensure optimal operation and longevity of equipment.
8. Document all inspection findings, maintenance activities, and equipment performance data in service reports, maintenance logs, and computerized maintenance management systems.
9. Collaborate with internal teams, including engineering, procurement, and project management, to coordinate spare parts inventory, equipment upgrades, and warranty claims.
10. Ensure that system of accountability of inventories and assets are adhered to in accordance with accounting procedures.
11. Institute and organize on the job programs to improve the technical capability of all employees.
12. Interpret, summarize and compile monthly statistical report and quality objective report on plant and auxiliaries' performance.
13. Establish and coordinate the maintenance, operation and safety procedures, service schedule and supply of materials required to maintain the plant and auxiliaries in the prescribed condition.
14. Review costs and submit evaluation reports for sourcing of materials for plant and auxiliaries.
15. Investigate equipment failures and difficulties to diagnose fault operation of plant and auxiliaries and make recommendations.
16. Provides feedback as request by relevant department as it related to generation on problems and needs.
17. To prepare detailed equipment, materials' funding request and travel requirements for jobs as they are allocated and obtain approval of same when indicated.

18. To prepare Annual planned Maintenance Charts
19. Prepare and monitor the Department's Annual Budget
20. Conduct Performance Appraisals of subordinate staff, assess and determine training needs and makes recommendations.
21. Prepare and submit monthly Section's report by fifth day of the preceding month.
22. Perform other duties that may be assigned to you within the scope of your employment, from an Authorized Officer.

Required Competencies:

Core/Leadership	Skill Level & Importance		Description/Behaviours
Adaptability & Managing Change	3	H	<ul style="list-style-type: none"> • Helps others adapt to a changing work environment and to embrace change • Promotes the benefits of a proposed change • Takes time to question; understand and speak to the underlying needs of stakeholders beyond those initially expressed. • Makes/recommends changes to work processes or systems to improve business results. • Develops plans and prioritizes resources to effectively implement change • Remains focused on the desired outcome to help self and others implement change
Applying Learning	3	H	<ul style="list-style-type: none"> • Recognizes how prior knowledge and skills apply to complex or new circumstances. • Develops innovative ways of applying technical/ professional knowledge to handle new challenges. • Demonstrates commitment to continuous learning and growth to develop knowledge and expertise.
Communication	3	H	<ul style="list-style-type: none"> • Tailors the content of speech and written communication to suit the level, cultural background and experience of the audience. • Establishes communication plans and strategies. • Anticipates and prepares for others reactions, adapting tactics to create a specific impact. • Communicates complex issues clearly and credibly with widely varied audiences.
Creativity & Innovation	3	H	<ul style="list-style-type: none"> • Looks ahead and can spot opportunities/obstacles and to develop new approaches, products and services to meet organizational needs. • Encourages others to challenge traditional approaches. • Asks thought provoking questions to spark others' creativity. • Supports and works with others to produce innovative solutions. • Recognizes and rewards creative thinking and innovation.
Customer Service	1	L	<ul style="list-style-type: none"> • Ensures professional and courteous service. • Acts promptly to ensure customer expectations are met and problems are resolved. • Takes personal responsibility for providing excellent service. • Interacts well with all customers and understands that each customer is different.
Decision Making	3	H	<ul style="list-style-type: none"> • Makes complex decisions for which there are no set procedures. • Develops innovative solutions that address the root cause of the problem and prevent recurrence. • Aligns decisions with organizational goals, direction, ethics and values. • Anticipates obstacles and thinks ahead about steps.

			<ul style="list-style-type: none"> • Makes sound business decisions when faced with complex and contradictory alternatives • Defines, communicates and consistently exemplifies the organization's values & ethics.
Financial Responsibility	3	H	<ul style="list-style-type: none"> • Applies sound principles of financial and business management to identify and quantify potential risks and returns of options being evaluated. • Understands and communicates the implications of business decisions on the "bottom line". • Develops accurate financial plans and budgets. • Uses business case analysis models to evaluate alternatives. • Relates plans and estimates to operating and capital budget. • Regularly evaluates work unit efficiency using financial indicators.
Results Oriented	3	H	<ul style="list-style-type: none"> • Tackles difficult problems and takes personal responsibility for reaching solutions. • Sees obstacles as challenges and develops innovative strategies to overcome them. • Strives for continuous improvement and creative solutions. • Sets challenging goals and objectives and measures performance against these. • Demonstrates the ability to use corporate resources and expertise to achieve desired results.
Safety	3	H	<ul style="list-style-type: none"> • Serves as a model of safe behaviour. • Continuously builds awareness and understanding of safety issues. • Recommends and or improves occupational safety and health procedures to protect and maintain workers' physical and mental health. • Demonstrates and explains safety equipment and /or procedures. • Confronts others about safety concerns and/or violations.
Teamwork	3	H	<ul style="list-style-type: none"> • Proactively solicits ideas and opinions and shares information and learning with others. • Addresses conflicts or issues within the team in a positive and open manner. • Provides clear feedback to team members. • Uses understanding of different interests and agendas to achieve positive outcomes. • Engages others in collaborative problem solving, encouraging them to share their ideas and opinions. • Is open, sincere, and empathetic in dealing with all individuals and in all circumstances.
Leading & Developing Others	3	H	<ul style="list-style-type: none"> • Sets a strong example through own behaviour. • Encourages an environment that fosters mutual support. • Gives specific feedback and expresses expectations for future performance. • Encourages and acts upon feedback to self. • Provides guidance, counsel, direction, and assistance to employees. • Provides challenging assignments and specific opportunities to broaden employees' skills and experiences.

Technical/ Functional Competencies

Technical/Functional	Skill Level B, W, A,E	
Sound knowledge of generating mechanics, fluid mechanics, theory of machines, mathematics and electronics	E	3
Ability to conduct accurate numerical calculations / analysis	E	3
Must have high level of organizing and planning	A	3
Must have the ability to conduct problem solving analysis	A	3
High level performance in people management	A	3
Proficiency in the use of Microsoft Suite	A	3

MINIMUM REQUIRED EDUCATION AND EXPERIENCE

1. Bachelor of Science Degree in Mechanical Engineering with six (6) years relevant experience in the Operations and Maintenance of Diesel Power Plants.

OR

2. Diploma in Mechanical Engineering from the University of Guyana, City & Guilds, H.N.C. or H.T.D or O.T.D. with ten (10) years relevant experience.
3. **Alternatively:** Fifteen (15) years' experience in the relevant field

Legend:

H:	High Requirement. Required performance could not be achieved without demonstration of this competency.
M:	Medium Requirement. Required performance would be difficult to attain without demonstration of this competency.
L:	Low Requirement. Required performance is not dependent on demonstration of this competency.
I,II,III,I V:	The skill level required for effective performance. Skill levels are defined in the Competency Model
*	If a formal leader, all leadership competencies will apply. A formal leader is primarily responsible for the leadership and/or supervision of others. Duties are generally different than the duties of the others in the group.
B:	Basic – Brief, general familiarity. Understanding of where knowledge can be applied, but limited on-the-job application.
W:	Working – Detailed familiarity and understanding. Proficient in applying the knowledge and skills for regular job requirements
A:	Advanced – Comprehensive understanding (in-depth familiarity with fine points). Able to handle complex or non-routine applications.
E:	Expert – Comprehensive and conceptual understanding. Expert, “go to” resource, can handle highly complex problems or Situations

This document is validated as an accurate and true description of the job as signified above.

Employee Sign Date

Supervisor Sign Date

Date received in Human Resource Division

Head of Department/Division Sign Date

Date Created/revised