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| **SKILLS FRAMEWORK FOR INFOCOMM TECHNOLOGY SKILLS MAP – DATA CENTRE OPERATIONS ENGINEER** | | | | | |
| **Sector** | Infocomm Technology | | | | |
| **Track** | Operations and Support | | | | |
| **Sub-track** | Data Centre and Operations Centre Support | | | | |
| **Occupation** | Data Centre Operations Engineer | | | | |
| **Job Role** | **Data Centre Operations Engineer** | | | | |
| **Job Role Description** | The Data Centre Operations Engineer provides support in data centre equipment installation, logging data regarding installed corporate server base, developing procedures for server installation, racking, un-racking, de-commissioning hardware and cable patching from server through to server farm switches. He/She manages the data centre performance and operations. He monitors data volume and performs troubleshooting of non-routine or novel issues with little precedence whenever required. He is required to be on standby with on-call availability with varied shifts including nights, weekends and holidays to resolve data centre related incidents.   He works in a team setting and is proficient in database administration, infrastructure concepts and database management related tools and techniques required by the organisation. He is also familiar with the relevant software platforms on which the database is deployed.   The Data Centre Operations Engineer is able to quickly and effectively solve issues as they arise. He is able to methodically identify the cause of the issue, evaluate it and develop a solution in collaboration with the team. He is able to communicate effectively and displays high service level standards. | | | | |
| **Critical Work Functions and Key Tasks** | **Critical Work Functions** | **Key Tasks** | | | |
| **Manage the set-up of the data centre** | Conduct technical feasibility studies to determine viability, cost, time required and compatibility with organisational needs and requirements | | | |
| Explore new concepts and ideas in data centre facilities and equipment | | | |
| Review and communicate requirements to senior stakeholders | | | |
| Analyse designs to ensure compliance with business requirements, predicted cooling, structural and operational concerns | | | |
| Conduct short- and long-term planning to meet organisation’s requirements and business needs | | | |
| **Manage data centre performance and**  **operations** | Oversee compliance with security policies, procedures and protocols | | | |
| Develop documentation, training and guidance procedures for the management of data centre operations | | | |
| Identify best practices in data centre operations and management for adoption | | | |
| Ensure compliance with security policies, procedures and protocols | | | |
| Evaluate services provided by vendors and recommend changes | | | |
| Recommend enhancements to improve availability and performance | | | |
| Analyse data centre facilities’ bandwidth, capacity requirements and system inter-dependencies | | | |
| Optimise the interfaces between the IT equipment and data centre | | | |
| **Mange data centre-related incidents and business continuity** | Develop disaster recovery plans for data centre operations | | | |
| Oversee the execution of disaster recovery drills and exercises | | | |
| Analyse incidents to determine patterns and propose recommendations to prevent future occurrences | | | |
| Simulate incidents to diagnose and resolve escalated data centre-related incidents | | | |
| Oversee resolution of data centre-related incidents involving vendors | | | |
| **Oversee service level agreements and service improvements** | Manage the development of service-level objectives and targets | | | |
| Monitor service level objectives to ensure that requirements are met or exceeded | | | |
| Develop client satisfaction metrics and service procedures | | | |
| Propose recommendations to improve performance and client satisfaction | | | |
| **Skills and Competencies** | **Technical Skills and Competencies** | | | **Generic Skills and Competencies** | |
| Business Needs Analysis | | Level 3 | Communication | Intermediate |
| Business Continuity | | Level 4 | Interpersonal Skills | Intermediate |
| Cyber and Data Breach Incident Management | | Level 3, Level 4 | Problem Solving | Basic |
| Data Centre Facilities Management | | Level 3 | Service Orientation | Basic |
| Disaster Recovery Management | | Level 4 | Teamwork | Intermediate |
| Infrastructure Support | | Level 3 |  | |
| IT Asset Management | | Level 3 |
| IT Strategy | | Level 4 |
| Learning and Development | | Level 4 |
| People and Performance Management | | Level 3 |
| Performance Management | | Level 4 |
| Problem Management | | Level 3 |
| Process Improvement and Optimisation | | Level 4 |
| Procurement | | Level 3 |
| Project Management | | Level 4 |
| Stakeholder Management | | Level 4 |
| Strategy Implementation | | Level 3 |
| System Integration | | Level 4 |
| **Programme Listing** | For a list of Training Programmes available for the ICT sector, please visit: www.skillsfuture.sg/skills-framework/ict | | | | |
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| The information contained in this document serves as a guide. | | | | | |