









Information and Communication Technology (ICT) Technician

QP Code: TEL/Q6206

Version: 4.0

NSQF Level: 4

Telecom Sector Skill Council || 3rd Floor, Plot No 126, Sector - 44 Gurgaon - 122003







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TEL/Q6206: Information and Communication Technology (ICT) Technician

Brief Job Description

The individual at work installs and maintains the ICT (Information and Communication Technology) at all times, observes and repairs Level-1 faults or issues in installed ICT equipment at site, carries out specified preventive and corrective maintenance procedures and reports relevant network incidents to the supervisor in-time for information as well as response.

Personal Attributes

The individual in this job is required to be action-oriented, self-disciplined, effective communicator and a team player with strong analytical and problem solving skills. They should be capable of working in high pressure situations in remote areas over the entire geography covered by the network.

Applicable National Occupational Standards (NOS)

Compulsory NOS:

1. TEL/N6222: Manage Information and Communication Technology (ICT) Site Hygiene

2. <u>TEL/N6223</u>: Perform Preventive and Corrective Maintenance at Information and Communication <u>Technology (ICT) Nodes</u>

- 3. TEL/N6224: Manage Information and Communication Technology (ICT) Site for Optimal Operation
- 4. TEL/N9101: Organize Work and Resources as per Health and Safety Standards
- 5. TEL/N9102: Interact Effectively with Team Members and Customers
- 6. DGT/VSQ/N0102: Employability Skills (60 Hours)

Qualification Pack (QP) Parameters

Sector	Telecom
Sub-Sector	Network Managed Services
Occupation	Network Operation and Maintenance
Country	India
NSQF Level	4









Credits	18
Aligned to NCO/ISCO/ISIC Code	NCO-2015/3114.0802
Minimum Educational Qualification & Experience	12th grade Pass OR Completed 2nd year of the 3-year diploma after 10 OR Completed 2nd year of the 3-year diploma after 10 (OR Pursuing 2nd year of 3-year regular Diploma (after 10th) OR 10th grade pass (with two years of any combination of NTC/NAC/CITS or equivalent) OR 8th pass plus 1-year NTC plus 1-Year NAC plus CITS OR 10th grade pass and pursuing continuous schooling (With No Experience required) OR Previous relevant Qualification of NSQF Level (3) with 3 Years of experience
Minimum Level of Education for Training in School	
Pre-Requisite License or Training	NA
Minimum Job Entry Age	17 Years
Last Reviewed On	NA
Next Review Date	27/01/2025
NSQC Approval Date	27/01/2022
Version	4.0
Reference code on NQR	QG-04-TL-00449-2023-V1.1-TSSC
NQR Version	1.1







TEL/N6222: Manage Information and Communication Technology (ICT) Site Hygiene

Description

This OS unit is about maintaining the site hygiene including maintenance of ICT equipment and other critical aspects such as mechanical stability, rack positioning/layout and power consumption patterns.

Scope

The scope covers the following :

- Maintain basic site hygiene
- Maintain documentation for site layout
- Report problems to the supervisor

Elements and Performance Criteria

Maintain basic site hygiene

To be competent, the user/individual on the job must be able to:

- PC1. implement steps to maintain cleanliness of ICT equipment as per the standards
- PC2. ensure proper placement and mechanical stability of equipment racks at the ICT site
- PC3. monitor power consumption to identify patterns
- PC4. report any unusual consumption to the supervisor
- **PC5.** maintain various equipment like Base Transceiver Station (BTS), nodeB, router, transmission equipment like Synchronous Digital Hierarchy (SDH), Dense Wavelength Division Multiplexing (DWDM) as per ICT standards

Maintain documentation for site layout

To be competent, the user/individual on the job must be able to:

- **PC6.** maintain the required list of equipment, racks etc.
- PC7. prepare equipment maintenance report and record
- PC8. document the site layout as per organisation standards
- PC9. maintain the escalation matrix in case of reporting

Report issues to the supervisor

To be competent, the user/individual on the job must be able to:

- PC10. report identified faults and issues in the equipment as per organisation policy
- **PC11.** report emergency situations like system failure, fire, power failure etc. to the supervisors and higher management, if required

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

KU1. instructions and checklists for preventive maintenance and site hygiene as per ICT standards









- KU2. Standard Operating Procedure (SOP) of ICT equipment
- KU3. asset layout as per organisation standards
- KU4. calculation of power consumption, power cost and site up-time
- **KU5.** fundamentals and correct usage of the ICT equipment like weight, size requirement etc.
- **KU6.** functioning of ICT nodes login applications like Secure CRT, Hyper terminal etc.
- **KU7.** Synchronous Digital Hierarchy (SDH) and Dense Wavelength Division Multiplexing (DWDM) technology
- KU8. organisation documents and reporting procedure

Generic Skills (GS)

User/individual on the job needs to know how to:

- **GS1.** read company policies, documents, instructions and other text material on equipment and component level etc.
- GS2. communicate effectively in local language
- GS3. effectively communicate with colleagues and supervisors
- GS4. prioritise and execute tasks in a high-pressure environment
- **GS5.** anticipate emergencies and take preventive measures
- GS6. analyse emergency situations and provide required corrective maintenance









Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Maintain basic site hygiene	17	30	-	5
PC1. implement steps to maintain cleanliness of ICT equipment as per the standards	3	6	-	1
PC2. ensure proper placement and mechanical stability of equipment racks at the ICT site	4	6	-	1
PC3. monitor power consumption to identify patterns	3	6	-	1
PC4. report any unusual consumption to the supervisor	3	5	-	1
PC5. maintain various equipment like Base Transceiver Station (BTS), nodeB, router, transmission equipment like Synchronous Digital Hierarchy (SDH), Dense Wavelength Division Multiplexing (DWDM) as per ICT standards	4	7	-	1
Maintain documentation for site layout	10	18	-	3
PC6. maintain the required list of equipment, racks etc.	3	4	-	-
PC7. prepare equipment maintenance report and record	2	5	-	1
PC8. document the site layout as per organisation standards	3	4	-	1
PC9. maintain the escalation matrix in case of reporting	2	5	-	1
Report issues to the supervisor	8	7	-	2
PC10. report identified faults and issues in the equipment as per organisation policy	4	4	-	1
PC11. report emergency situations like system failure, fire, power failure etc. to the supervisors and higher management, if required	4	3	-	1









Assessment Criteria for Outcomes	Theory	Practical	Project	Viva
	Marks	Marks	Marks	Marks
NOS Total	35	55	-	10









National Occupational Standards (NOS) Parameters

NOS Code	TEL/N6222
NOS Name	Manage Information and Communication Technology (ICT) Site Hygiene
Sector	Telecom
Sub-Sector	Network Managed Services
Occupation	Network Operation and Maintenance
NSQF Level	4
Credits	5
Version	4.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022









TEL/N6223: Perform Preventive and Corrective Maintenance at Information and Communication Technology (ICT) Nodes

Description

This OS unit is about carrying out preventive maintenance of the network to reduce the downtime, corrective maintenance, troubleshooting and testing effectiveness.

Scope

The scope covers the following :

- Perform preventive maintenance
- Respond to network alarms/ trouble tickets
- Rectify fault conditions

Elements and Performance Criteria

Perform Preventive Maintenance (PM)

To be competent, the user/individual on the job must be able to:

- PC1. obtain PM schedule from the supervisor with respect to various devices
- PC2. check on site up-time and make the logs
- **PC3.** notify the Network Operations Center (NOC) team or supervisor as per the laid plan prior to undertaking the PM activities
- **PC4.** conduct physical maintenance tasks like checking temperatures, fan working condition, earthing, equipment grounding, distribution of cables etc.
- **PC5.** carry out logical maintenance tasks like checking alarm status, system availability parameters, logical redundancy etc.
- PC6. troubleshoot and perform rectification using the standard ICT troubleshooting techniques
- PC7. prepare a report of the activities performed in coordination with ICT Engineer/NOC team

Respond to network alarms/Trouble Tickets (TT)

To be competent, the user/individual on the job must be able to:

- PC8. obtain alarm information from the NOC team to explore nature of the alarm
- PC9. identify Root Cause Analysis (RCA) of the alarm by seeking advice from relevant parties
- PC10. prioritise actions on alarms based on severity and maximising rectification of calls
- PC11. escalate faults/issues at site to the supervisor

Rectify fault condition

To be competent, the user/individual on the job must be able to:

- **PC12.** perform login to the system and equipment using console cable
- **PC13.** diagnose the need for Corrective Maintenance (CM) based on system parameters and performance
- **PC14.** undertake rectification tasks for ICT nodes as per guiding documents with NOC or ICT Engineer instruction
- PC15. assist ICT Engineer and NOC in filling the corrective maintenance checklists/reports









Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1. PM norms as per the organisation policy
- KU2. repair and maintenance guidelines of the company
- **KU3.** usage and maintenance policy of power checking tools and mechanical equipment
- KU4. standard logical and physical maintenance tasks for the ICT nodes
- **KU5.** guidelines for alarm coding and interpretation of fault
- KU6. alarm monitoring and clearance process
- KU7. fault rectification procedure
- KU8. functioning of installed ICT equipment
- KU9. rectification tasks for ICT nodes as per guiding document with NOC instruction or ICT Engineer

Generic Skills (GS)

User/individual on the job needs to know how to:

- GS1. read and comprehend organisation polices and guidelines to conduct timely PM activities
- GS2. communicate effectively with colleagues and supervisors
- GS3. resolve work related problems on time
- GS4. comprehend formats and checklists









Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Perform Preventive Maintenance (PM)	15	32	-	4
PC1. obtain PM schedule from the supervisor with respect to various devices	2	3	-	1
PC2. check on site up-time and make the logs	2	3	-	-
PC3. notify the Network Operations Center (NOC) team or supervisor as per the laid plan prior to undertaking the PM activities	2	5	-	1
PC4. conduct physical maintenance tasks like checking temperatures, fan working condition, earthing, equipment grounding, distribution of cables etc.	2	5	-	-
PC5. carry out logical maintenance tasks like checking alarm status, system availability parameters, logical redundancy etc.	2	6	-	1
PC6. troubleshoot and perform rectification using the standard ICT troubleshooting techniques	2	6	-	1
PC7. prepare a report of the activities performed in coordination with ICT Engineer/NOC team	3	4	-	-
Respond to network alarms/Trouble Tickets (TT)	8	17	-	3
PC8. obtain alarm information from the NOC team to explore nature of the alarm	2	5	-	1
PC9. identify Root Cause Analysis (RCA) of the alarm by seeking advice from relevant parties	2	5	-	-
PC10. prioritise actions on alarms based on severity and maximising rectification of calls	3	4	-	1
PC11. escalate faults/issues at site to the supervisor	1	3	-	1
Rectify fault condition	7	11	-	3
PC12. perform login to the system and equipment using console cable	1	3	-	1









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC13. diagnose the need for Corrective Maintenance (CM) based on system parameters and performance	2	3	-	1
PC14. undertake rectification tasks for ICT nodes as per guiding documents with NOC or ICT Engineer instruction	2	3	-	-
PC15. assist ICT Engineer and NOC in filling the corrective maintenance checklists/reports	2	2	-	1
NOS Total	30	60	-	10









National Occupational Standards (NOS) Parameters

NOS Code	TEL/N6223
NOS Name	Perform Preventive and Corrective Maintenance at Information and Communication Technology (ICT) Nodes
Sector	Telecom
Sub-Sector	Network Managed Services
Occupation	Network Operation and Maintenance
NSQF Level	4
Credits	4
Version	3.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022







TEL/N6224: Manage Information and Communication Technology (ICT) Site for Optimal Operation

Description

This OS unit is about carrying out site management at Information and Communication Technology (ICT) sites to ensure optimal operation.

Scope

The scope covers the following :

- Maintain the site operations
- Attend alarms generated at the site
- Coordinate and assist superiors for work plan development

Elements and Performance Criteria

Maintain site operations

To be competent, the user/individual on the job must be able to:

- **PC1.** receive change requests from the Configuration Management team or the Network Operations Center (NOC) team
- PC2. identify criticality and timelines for carrying out the changes with supervisors and NOC team
- PC3. carry out the changes as per the received change request
- PC4. ensure site operations as per the change request

Attend alarms generated at the site

To be competent, the user/individual on the job must be able to:

PC5. check number of alarms active at the site

PC6. attend alarms within the defined Service level Agreement (SLA)

Coordinate and assist superiors for work plan development

To be competent, the user/individual on the job must be able to:

- PC7. assist the ICT Engineer in developing work plan and identify dependencies
- PC8. escalate the issues to the ICT Engineer well in-time, if any
- PC9. assist ICT Engineer and NOC in filling the corrective maintenance checklists/reports

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- **KU1.** change management process
- **KU2.** functional knowledge of all installed ICT equipment
- KU3. tools and techniques to interpret and identify criticalities of change request
- KU4. fault rectification and alarm handling process
- **KU5.** procedure to develop work plan









- KU6. documentation and reporting procedure of the organisation
- KU7. records to be maintained and implications of non-maintenance of the same

Generic Skills (GS)

User/individual on the job needs to know how to:

- **GS1.** read and interpret change requests, work plan, policies, procedures etc.
- **GS2.** prioritise activities to effectively manage the ICT site
- GS3. manage resources efficiently to execute the change request
- GS4. communicate effectively with colleagues and supervisors
- **GS5.** manage time to meet deadlines
- GS6. comprehend formats and checklists







Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Maintain site operations	12	20	-	7
PC1. receive change requests from the Configuration Management team or the Network Operations Center (NOC) team	3	5	_	2
PC2. identify criticality and timelines for carrying out the changes with supervisors and NOC team	5	5	-	2
PC3. carry out the changes as per the received change request	2	6	-	2
PC4. ensure site operations as per the change request	2	4	-	1
Attend alarms generated at the site	9	12	-	4
PC5. check number of alarms active at the site	4	6	-	2
PC6. attend alarms within the defined Service level Agreement (SLA)	5	6	-	2
Coordinate and assist superiors for work plan development	14	18	-	4
PC7. assist the ICT Engineer in developing work plan and identify dependencies	5	6	-	2
PC8. escalate the issues to the ICT Engineer well in-time, if any	4	6	-	1
PC9. assist ICT Engineer and NOC in filling the corrective maintenance checklists/reports	5	6	-	1
NOS Total	35	50	-	15









National Occupational Standards (NOS) Parameters

NOS Code	TEL/N6224
NOS Name	Manage Information and Communication Technology (ICT) Site for Optimal Operation
Sector	Telecom
Sub-Sector	Network Managed Services
Occupation	Network Operation and Maintenance
NSQF Level	4
Credits	4
Version	3.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022







TEL/N9101: Organize Work and Resources as per Health and Safety Standards

Description

This OS unit is about planning work and following sustainable as well as healthy practices for safety and optimal use of resources.

Scope

The scope covers the following :

- Perform work as per quality standards
- Maintain safe, healthy and secure working environment
- Conserve material/energy/electricity
- Use effective waste management/recycling practices

Elements and Performance Criteria

Perform work as per quality standards

To be competent, the user/individual on the job must be able to:

- **PC1.** keep workspace clean and tidy
- **PC2.** perform individual role and responsibilities as per the job role while taking accountability for the work
- **PC3.** record/document tasks completed as per the requirements within specific timelines
- PC4. implement schedules to ensure timely completion of tasks
- PC5. identify the cause of a problem related to own work and validate it
- **PC6.** analyse problems accurately and communicate different possible solutions to the problem *Maintain safe, healthy and secure working environment*

To be competent, the user/individual on the job must be able to:

- PC7. comply with organisation's current health, safety, security policies and procedures
- **PC8.** check for water spills in and around the work space and escalate these to the appropriate authority
- **PC9.** report any identified breaches in health, safety, and security policies and procedures to the designated person
- **PC10.** use safety materials such as goggles, gloves, ear plugs, caps, ESD pins, covers, shoes, etc.
- **PC11.** avoid damage of components due to negligence in ESD procedures or any other loss due to safety negligence
- **PC12.** identify hazards such as illness, accidents, fires or any other natural calamity safely, as per organisation's emergency procedures, within the limits of individual's authority
- **PC13.** participate regularly in fire drills or other safety related workshops organised by the company
- **PC14.** report any hazard outside the individual's authority to the relevant person in line with organisational procedures and warn others who may be affected









- PC15. maintain appropriate posture while sitting/standing for long hours
- PC16. handle heavy and hazardous materials with care, while maintaining appropriate posture
- **PC17.** sanitize workstation and equipment regularly
- PC18. clean hands with soap, alcohol-based sanitizer regularly
- **PC19.** avoid contact with anyone suffering from communicable diseases and take necessary precautions
- **PC20.** take safety precautions while travelling e.g. maintain 1m distance from others, sanitize hands regularly, wear masks, etc.
- PC21. report hygiene and sanitation issues to appropriate authority
- **PC22.** follow recommended personal hygiene and sanitation practices, for example, washing/sanitizing hands, covering face with a bent elbow while coughing/sneezing, using PPE, etc.

Conserve material/energy/electricity

To be competent, the user/individual on the job must be able to:

- PC23. optimize usage of material including water in various tasks/activities/processes
- PC24. use resources such as water, electricity and others responsibly
- PC25. carry out routine cleaning of tools, machine and equipment
- PC26. optimize use of electricity/energy in various tasks/activities/processes
- **PC27.** perform periodic checks of the functioning of the equipment/machine and rectify wherever required
- **PC28.** report malfunctioning and lapses in maintenance of equipment

PC29. use electrical equipment and appliances properly

Use effective waste management/recycling practices

To be competent, the user/individual on the job must be able to:

- PC30. identify recyclable, non-recyclable and hazardous waste
- PC31. deposit recyclable and reusable material at identified location
- PC32. dispose non-recyclable and hazardous waste as per recommended processes

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- **KU1.** strategies pertinent to their field (such as internet searches, asking peers and managers, enrolling for courses and certifications, etc.) that can be used to pursue an advancement in their skills
- **KU2.** key performance indicators for the new tasks
- KU3. feedback processes and formats
- **KU4.** timelines and goals as well as their relevance to work allocated
- KU5. importance of quality and timely delivery of the product/service
- KU6. escalation matrix and its importance, especially in case of emergencies
- **KU7.** ways of time and cost management
- **KU8.** rules/regulation for maintaining health and safety at workplace









- **KU9.** meaning of hazard, different types of health and safety hazards found in the workplace, risks and threats based on the nature of work
- **KU10.** relevant signage, warnings, labels or descriptions on equipment, etc. while carrying out work activities
- KU11. procedures to report breaches in health, safety and security
- **KU12.** organisation's procedures for different emergency situations and the importance of following the same
- **KU13.** different methods of cleaning, disinfection, sterilization, and sanitization
- **KU14.** significance of personal hygiene practice including hand hygiene
- KU15. path of disease transmission
- KU16. correct method of donning and doffing of PPE
- KU17. ways of managing resources and material efficiently
- KU18. common electrical problems and common practices of conserving electricity
- **KU19.** categorization of waste into dry, wet, recyclable, non-recyclable and items of single-use plastics and use of different colours of dustbins
- KU20. organisation's procedures for minimizing waste
- KU21. waste management and methods of waste disposal
- KU22. common sources of pollution and ways to minimize it

Generic Skills (GS)

User/individual on the job needs to know how to:

- **GS1.** improve and modify work practices
- GS2. complete tasks efficiently and accurately within stipulated time
- GS3. develop skills and mastery of the technologies prevalent in the industry
- **GS4.** write in at least one language and complete written work with attention to detail
- **GS5.** utilize time and manage workload efficiently
- **GS6.** read and comprehend instructions and documents
- **GS7.** accept feedback in a constructive way
- GS8. seek clarifications from superior about the job requirement
- **GS9.** read and comprehend statutory documents relevant to safety and hygiene
- **GS10.** refer all anomalies to the concerned persons
- GS11. analyze situations and make appropriate decisions
- **GS12.** decide the most suitable course of action for completing the task within resources







Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Perform work as per quality standards	4	9	-	2
PC1. keep workspace clean and tidy	-	1	-	-
PC2. perform individual role and responsibilities as per the job role while taking accountability for the work	1	1	-	1
PC3. record/document tasks completed as per the requirements within specific timelines	-	1	-	1
PC4. implement schedules to ensure timely completion of tasks	-	2	-	-
PC5. identify the cause of a problem related to own work and validate it	2	2	-	-
PC6. analyse problems accurately and communicate different possible solutions to the problem	1	2	-	-
Maintain safe, healthy and secure working environment	16	27	-	4
PC7. comply with organisation's current health, safety, security policies and procedures	1	1	-	-
PC8. check for water spills in and around the work space and escalate these to the appropriate authority	1	2	-	1
PC9. report any identified breaches in health, safety, and security policies and procedures to the designated person	1	2	-	1
PC10. use safety materials such as goggles, gloves, ear plugs, caps, ESD pins, covers, shoes, etc.	1	2	-	1
PC11. avoid damage of components due to negligence in ESD procedures or any other loss due to safety negligence	2	3	-	1
PC12. identify hazards such as illness, accidents, fires or any other natural calamity safely, as per organisation's emergency procedures, within the limits of individual's authority	2	1	-	_









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC13. participate regularly in fire drills or other safety related workshops organised by the company	1	3	-	-
PC14. report any hazard outside the individual's authority to the relevant person in line with organisational procedures and warn others who may be affected	1	3	-	-
PC15. maintain appropriate posture while sitting/standing for long hours	1	1	-	-
PC16. handle heavy and hazardous materials with care, while maintaining appropriate posture	1	1	-	-
PC17. sanitize workstation and equipment regularly	1	2	-	-
PC18. clean hands with soap, alcohol-based sanitizer regularly	-	1	-	-
PC19. avoid contact with anyone suffering from communicable diseases and take necessary precautions	-	1	-	-
PC20. take safety precautions while travelling e.g. maintain 1m distance from others, sanitize hands regularly, wear masks, etc.	1	2	-	-
PC21. report hygiene and sanitation issues to appropriate authority	1	1	-	-
PC22. follow recommended personal hygiene and sanitation practices, for example, washing/sanitizing hands, covering face with a bent elbow while coughing/sneezing, using PPE, etc.	1	1	-	_
Conserve material/energy/electricity	7	16	-	3
PC23. optimize usage of material including water in various tasks/activities/processes	1	2	-	-
PC24. use resources such as water, electricity and others responsibly	1	2	-	1
PC25. carry out routine cleaning of tools, machine and equipment	1	2	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC26. optimize use of electricity/energy in various tasks/activities/processes	1	3	-	1
PC27. perform periodic checks of the functioning of the equipment/machine and rectify wherever required	1	3	-	1
PC28. report malfunctioning and lapses in maintenance of equipment	1	2	-	-
PC29. use electrical equipment and appliances properly	1	2	-	-
Use effective waste management/recycling practices	3	8	-	1
PC30. identify recyclable, non-recyclable and hazardous waste	1	2	-	1
PC31. deposit recyclable and reusable material at identified location	1	3	-	-
PC32. dispose non-recyclable and hazardous waste as per recommended processes	1	3	-	-
NOS Total	30	60	-	10









National Occupational Standards (NOS) Parameters

NOS Code	TEL/N9101
NOS Name	Organize Work and Resources as per Health and Safety Standards
Sector	Telecom
Sub-Sector	Generic
Occupation	Generic
NSQF Level	4
Credits	1
Version	2.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022









TEL/N9102: Interact Effectively with Team Members and Customers

Description

This OS unit is about interacting with superiors and colleagues as well as customers and other stakeholders in own or other work groups within as well as outside the organisation.

Scope

The scope covers the following :

- Interact effectively with superiors
- Interact effectively with colleagues and customers
- Respect differences of gender and ability

Elements and Performance Criteria

Interact effectively with superiors

To be competent, the user/individual on the job must be able to:

- PC1. receive work requirements from superiors and customers and interpret them correctly
- PC2. inform the supervisor and/or concerned person about any unforeseen disruptions or delays
- **PC3.** participate in decision making by providing facts and figures, giving/accepting constructive suggestions
- **PC4.** rectify errors as per feedback and ensure the errors are not repeated

Interact effectively with colleagues and customers

To be competent, the user/individual on the job must be able to:

- PC5. comply with organisation's policies and procedures for working with team members
- **PC6.** communicate professionally using appropriate mode of communication such as face-to-face, telephonic and written
- PC7. respond to queries and seek/provide clarifications if required
- **PC8.** co-ordinate with team to integrate work as per requirements
- PC9. resolve conflicts within the team/with customers to achieve smooth workflow
- PC10. recognize emotions accurately in self and others to build good relationships
- PC11. prioritize team and organization goals above personal goals

Respect differences of gender and ability

To be competent, the user/individual on the job must be able to:

- **PC12.** maintain a conducive environment for all the genders at the workplace
- PC13. encourage appropriate behavior and conduct with people across gender
- PC14. assist team members with disability in overcoming any challenges faced in work
- **PC15.** practice appropriate verbal and non-verbal communication while interacting with People with Disability (PwD)
- PC16. ensure equal participation of the people across genders in discussions

Knowledge and Understanding (KU)







The individual on the job needs to know and understand:

- **KU1.** organisation's policies on dress code, workplace timings, workplace behaviour, performance management, incentives, delivery standards, information security, etc.
- **KU2.** organisation's hierarchy and escalation matrix
- KU3. importance of establishing good working relationships with colleagues and superiors
- **KU4.** importance of helping colleagues with problems, in order to meet quality and time standards as a team
- KU5. different means and methods of communication
- **KU6.** different types of information that colleagues might need and the importance of providing this information in an appropriate manner
- KU7. organisation's policies and procedures for working with colleagues and superiors
- **KU8.** importance of understanding consequences of gender biased behaviour
- KU9. gender based concepts, issues and legislation
- **KU10.** organisation standards and guidelines to be followed for PwD and knowledge about laws, acts and provisions defined for PwD by the statutory bodies and the right way to use them including various medical conditions associated with PwD
- KU11. health and safety requirements at workplace for PwD
- **KU12.** process of recruiting people for a particular job profile w.r.t PwD and gender
- **KU13.** various government/private schemes and benefits available for PwD and information about various institutes working for PwD to enable in providing livelihood opportunities for PwD

Generic Skills (GS)

User/individual on the job needs to know how to:

- GS1. read and comprehend forms, documents and records
- GS2. read and write in English and/or local language
- GS3. complete work with attention to detail
- **GS4.** listen effectively and orally communicate information
- GS5. work as per customer requirements
- GS6. communicate with empathy across genders and PwD
- **GS7.** improve and modify work practices
- GS8. maintain positive and effective relationships with colleagues and customers
- **GS9.** evaluate the possible solution(s) to the problem







C

Qualification Pack

Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Interact effectively with superiors	7	15	-	2
PC1. receive work requirements from superiors and customers and interpret them correctly	1	2	-	_
PC2. inform the supervisor and/or concerned person about any unforeseen disruptions or delays	2	4	-	1
PC3. participate in decision making by providing facts and figures, giving/accepting constructive suggestions	2	5	-	1
PC4. rectify errors as per feedback and ensure the errors are not repeated	2	4	-	_
Interact effectively with colleagues and customers	7	26	-	4
PC5. comply with organisation's policies and procedures for working with team members	1	2	-	-
PC6. communicate professionally using appropriate mode of communication such as face-to-face, telephonic and written	2	4	-	1
PC7. respond to queries and seek/provide clarifications if required	2	4	-	1
PC8. co-ordinate with team to integrate work as per requirements	-	3	-	-
PC9. resolve conflicts within the team/with customers to achieve smooth workflow	1	5	-	1
PC10. recognize emotions accurately in self and others to build good relationships	1	4	-	-
PC11. prioritize team and organization goals above personal goals	-	4	-	1
Respect differences of gender and ability	11	24	-	4
PC12. maintain a conducive environment for all the genders at the workplace	2	5	-	1









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC13. encourage appropriate behavior and conduct with people across gender	2	5	-	1
PC14. assist team members with disability in overcoming any challenges faced in work	3	4	-	1
PC15. practice appropriate verbal and non-verbal communication while interacting with People with Disability (PwD)	2	4	-	1
PC16. ensure equal participation of the people across genders in discussions	2	6	-	-
NOS Total	25	65	-	10









National Occupational Standards (NOS) Parameters

NOS Code	TEL/N9102
NOS Name	Interact Effectively with Team Members and Customers
Sector	Telecom
Sub-Sector	Generic
Occupation	Generic
NSQF Level	4
Credits	1
Version	2.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022







DGT/VSQ/N0102: Employability Skills (60 Hours)

Description

This unit is about employability skills, Constitutional values, becoming a professional in the 21st Century, digital, financial, and legal literacy, diversity and Inclusion, English and communication skills, customer service, entrepreneurship, and apprenticeship, getting ready for jobs and career development.

Scope

The scope covers the following :

- Introduction to Employability Skills
- Constitutional values Citizenship
- Becoming a Professional in the 21st Century
- Basic English Skills
- Career Development & Goal Setting
- Communication Skills
- Diversity & Inclusion
- Financial and Legal Literacy
- Essential Digital Skills
- Entrepreneurship
- Customer Service
- Getting ready for Apprenticeship & Jobs

Elements and Performance Criteria

Introduction to Employability Skills

To be competent, the user/individual on the job must be able to:

- PC1. identify employability skills required for jobs in various industries
- PC2. identify and explore learning and employability portals

Constitutional values - Citizenship

To be competent, the user/individual on the job must be able to:

- **PC3.** recognize the significance of constitutional values, including civic rights and duties, citizenship, responsibility towards society etc. and personal values and ethics such as honesty, integrity, caring and respecting others, etc.
- PC4. follow environmentally sustainable practices

Becoming a Professional in the 21st Century

To be competent, the user/individual on the job must be able to:

- PC5. recognize the significance of 21st Century Skills for employment
- **PC6.** practice the 21st Century Skills such as Self-Awareness, Behaviour Skills, time management, critical and adaptive thinking, problem-solving, creative thinking, social and cultural awareness, emotional awareness, learning to learn for continuous learning etc. in personal and professional life

Basic English Skills

To be competent, the user/individual on the job must be able to:









- **PC7.** use basic English for everyday conversation in different contexts, in person and over the telephone
- **PC8.** read and understand routine information, notes, instructions, mails, letters etc. written in English
- PC9. write short messages, notes, letters, e-mails etc. in English

Career Development & Goal Setting

To be competent, the user/individual on the job must be able to:

- PC10. understand the difference between job and career
- **PC11.** prepare a career development plan with short- and long-term goals, based on aptitude

Communication Skills

To be competent, the user/individual on the job must be able to:

- **PC12.** follow verbal and non-verbal communication etiquette and active listening techniques in various settings
- PC13. work collaboratively with others in a team

Diversity & Inclusion

To be competent, the user/individual on the job must be able to:

- PC14. communicate and behave appropriately with all genders and PwD
- PC15. escalate any issues related to sexual harassment at workplace according to POSH Act

Financial and Legal Literacy

To be competent, the user/individual on the job must be able to:

- PC16. select financial institutions, products and services as per requirement
- PC17. carry out offline and online financial transactions, safely and securely
- **PC18.** identify common components of salary and compute income, expenses, taxes, investments etc
- **PC19.** identify relevant rights and laws and use legal aids to fight against legal exploitation *Essential Digital Skills*

To be competent, the user/individual on the job must be able to:

- PC20. operate digital devices and carry out basic internet operations securely and safely
- PC21. use e- mail and social media platforms and virtual collaboration tools to work effectively
- PC22. use basic features of word processor, spreadsheets, and presentations

Entrepreneurship

To be competent, the user/individual on the job must be able to:

- **PC23.** identify different types of Entrepreneurship and Enterprises and assess opportunities for potential business through research
- **PC24.** develop a business plan and a work model, considering the 4Ps of Marketing Product, Price, Place and Promotion
- **PC25.** identify sources of funding, anticipate, and mitigate any financial/ legal hurdles for the potential business opportunity

Customer Service

To be competent, the user/individual on the job must be able to:

- **PC26.** identify different types of customers
- PC27. identify and respond to customer requests and needs in a professional manner.









PC28. follow appropriate hygiene and grooming standards

Getting ready for apprenticeship & Jobs

To be competent, the user/individual on the job must be able to:

- PC29. create a professional Curriculum vitae (Résumé)
- **PC30.** search for suitable jobs using reliable offline and online sources such as Employment exchange, recruitment agencies, newspapers etc. and job portals, respectively
- PC31. apply to identified job openings using offline /online methods as per requirement
- **PC32.** answer questions politely, with clarity and confidence, during recruitment and selection
- PC33. identify apprenticeship opportunities and register for it as per guidelines and requirements

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1. need for employability skills and different learning and employability related portals
- KU2. various constitutional and personal values
- KU3. different environmentally sustainable practices and their importance
- KU4. Twenty first (21st) century skills and their importance
- **KU5.** how to use English language for effective verbal (face to face and telephonic) and written communication in formal and informal set up
- KU6. importance of career development and setting long- and short-term goals
- **KU7.** about effective communication
- KU8. POSH Act
- KU9. Gender sensitivity and inclusivity
- KU10. different types of financial institutes, products, and services
- **KU11.** how to compute income and expenditure
- KU12. importance of maintaining safety and security in offline and online financial transactions
- KU13. different legal rights and laws
- KU14. different types of digital devices and the procedure to operate them safely and securely
- **KU15.** how to create and operate an e- mail account and use applications such as word processors, spreadsheets etc.
- KU16. how to identify business opportunities
- KU17. types and needs of customers
- KU18. how to apply for a job and prepare for an interview
- KU19. apprenticeship scheme and the process of registering on apprenticeship portal

Generic Skills (GS)

User/individual on the job needs to know how to:

- GS1. read and write different types of documents/instructions/correspondence
- GS2. communicate effectively using appropriate language in formal and informal settings







- GS3. behave politely and appropriately with all
- **GS4.** how to work in a virtual mode
- GS5. perform calculations efficiently
- **GS6.** solve problems effectively
- **GS7.** pay attention to details
- **GS8.** manage time efficiently
- GS9. maintain hygiene and sanitization to avoid infection









Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Introduction to Employability Skills	1	1	-	-
PC1. identify employability skills required for jobs in various industries	-	-	-	-
PC2. identify and explore learning and employability portals	-	-	-	-
Constitutional values - Citizenship	1	1	-	-
PC3. recognize the significance of constitutional values, including civic rights and duties, citizenship, responsibility towards society etc. and personal values and ethics such as honesty, integrity, caring and respecting others, etc.	-	-	-	-
PC4. follow environmentally sustainable practices	-	-	-	-
Becoming a Professional in the 21st Century	2	4	-	-
PC5. recognize the significance of 21st Century Skills for employment	-	-	-	-
PC6. practice the 21st Century Skills such as Self-Awareness, Behaviour Skills, time management, critical and adaptive thinking, problem-solving, creative thinking, social and cultural awareness, emotional awareness, learning to learn for continuous learning etc. in personal and professional life	-	-	-	_
Basic English Skills	2	3	-	-
PC7. use basic English for everyday conversation in different contexts, in person and over the telephone	-	-	-	-
PC8. read and understand routine information, notes, instructions, mails, letters etc. written in English	-	-	-	-
PC9. write short messages, notes, letters, e-mails etc. in English	-	-	-	-
Career Development & Goal Setting	1	2	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC10. understand the difference between job and career	-	-	-	-
PC11. prepare a career development plan with short- and long-term goals, based on aptitude	-	-	-	-
Communication Skills	2	2	-	-
PC12. follow verbal and non-verbal communication etiquette and active listening techniques in various settings	-	-	-	-
PC13. work collaboratively with others in a team	-	-	-	-
Diversity & Inclusion	1	2	-	-
PC14. communicate and behave appropriately with all genders and PwD	-	-	-	-
PC15. escalate any issues related to sexual harassment at workplace according to POSH Act	-	-	-	-
Financial and Legal Literacy	2	3	-	-
PC16. select financial institutions, products and services as per requirement	-	-	-	-
PC17. carry out offline and online financial transactions, safely and securely	-	-	-	-
PC18. identify common components of salary and compute income, expenses, taxes, investments etc	-	-	-	-
PC19. identify relevant rights and laws and use legal aids to fight against legal exploitation	-	-	-	-
Essential Digital Skills	3	4	-	-
PC20. operate digital devices and carry out basic internet operations securely and safely	_	_	_	-
PC21. use e- mail and social media platforms and virtual collaboration tools to work effectively	_	-	_	-
PC22. use basic features of word processor, spreadsheets, and presentations	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Entrepreneurship	2	3	-	-
PC23. identify different types of Entrepreneurship and Enterprises and assess opportunities for potential business through research	-	-	-	-
PC24. develop a business plan and a work model, considering the 4Ps of Marketing Product, Price, Place and Promotion	-	-	-	-
PC25. identify sources of funding, anticipate, and mitigate any financial/ legal hurdles for the potential business opportunity	-	-	-	-
Customer Service	1	2	-	-
PC26. identify different types of customers	-	-	-	-
PC27. identify and respond to customer requests and needs in a professional manner.	-	-	-	-
PC28. follow appropriate hygiene and grooming standards	-	-	-	-
Getting ready for apprenticeship & Jobs	2	3	-	-
PC29. create a professional Curriculum vitae (Résumé)	-	-	-	-
PC30. search for suitable jobs using reliable offline and online sources such as Employment exchange, recruitment agencies, newspapers etc. and job portals, respectively	-	-	-	-
PC31. apply to identified job openings using offline /online methods as per requirement	-	-	-	-
PC32. answer questions politely, with clarity and confidence, during recruitment and selection	-	-	_	-
PC33. identify apprenticeship opportunities and register for it as per guidelines and requirements	-	-	-	-
NOS Total	20	30	-	-









National Occupational Standards (NOS) Parameters

NOS Code	DGT/VSQ/N0102
NOS Name	Employability Skills (60 Hours)
Sector	Cross Sectoral
Sub-Sector	Professional Skills
Occupation	Employability
NSQF Level	4
Credits	2
Version	1.0
Last Reviewed Date	NA
Next Review Date	27/01/2025
NSQC Clearance Date	27/01/2022

Assessment Guidelines and Assessment Weightage

Assessment Guidelines

1. Criteria for assessment for each Qualification Pack will be created by the Sector Skill Council. Each Element/ Performance Criteria (PC) will be assigned marks proportional to its importance in NOS. SSC will also lay down proportion of marks for Theory and Skills Practical for each Element/ PC.

2. The assessment for the theory part will be based on knowledge bank of questions created by the SSC.

3. Assessment will be conducted for all compulsory NOS, and where applicable, on the selected elective/option NOS/set of NOS.

4. Individual assessment agencies will create unique question papers for theory part for each candidate at each examination/training center (as per assessment criteria below).

5. Individual assessment agencies will create unique evaluations for skill practical for every student at each examination/ training center based on these criteria.

6. To pass the Qualification Pack assessment, every trainee should score the Recommended Pass % aggregate for the QP.

7. In case of unsuccessful completion, the trainee may seek reassessment on the Qualification Pack.









Minimum Aggregate Passing % at QP Level : 70

(**Please note**: Every Trainee should score a minimum aggregate passing percentage as specified above, to successfully clear the Qualification Pack assessment.)

Assessment Weightage

Compulsory NOS

National Occupational Standards	Theory Marks	Practical Marks	Project Marks	Viva Marks	Total Marks	Weightage
TEL/N6222.Manage Information and Communication Technology (ICT) Site Hygiene	35	55	-	10	100	20
TEL/N6223.Perform Preventive and Corrective Maintenance at Information and Communication Technology (ICT) Nodes	30	60	-	10	100	20
TEL/N6224.Manage Information and Communication Technology (ICT) Site for Optimal Operation	35	50	-	15	100	20
TEL/N9101.Organize Work and Resources as per Health and Safety Standards	30	60	-	10	100	15
TEL/N9102.Interact Effectively with Team Members and Customers	25	65	-	10	100	15
DGT/VSQ/N0102.Employability Skills (60 Hours)	20	30	-	-	50	10
Total	175	320	-	55	550	100







Acronyms

NOS	National Occupational Standard(s)
NSQF	National Skills Qualifications Framework
QP	Qualifications Pack
TVET	Technical and Vocational Education and Training







Glossary

Sector	Sector is a conglomeration of different business operations having similar business and interests. It may also be defined as a distinct subset of the economy whose components share similar characteristics and interests.
Sub-sector	Sub-sector is derived from a further breakdown based on the characteristics and interests of its components.
Occupation	Occupation is a set of job roles, which perform similar/ related set of functions in an industry.
Job role	Job role defines a unique set of functions that together form a unique employment opportunity in an organisation.
Occupational Standards (OS)	OS specify the standards of performance an individual must achieve when carrying out a function in the workplace, together with the Knowledge and Understanding (KU) they need to meet that standard consistently. Occupational Standards are applicable both in the Indian and global contexts.
Performance Criteria (PC)	Performance Criteria (PC) are statements that together specify the standard of performance required when carrying out a task.
National Occupational Standards (NOS)	NOS are occupational standards which apply uniquely in the Indian context.
Qualifications Pack (QP)	QP comprises the set of OS, together with the educational, training and other criteria required to perform a job role. A QP is assigned a unique qualifications pack code.
Unit Code	Unit code is a unique identifier for an Occupational Standard, which is denoted by an 'N'
Unit Title	Unit title gives a clear overall statement about what the incumbent should be able to do.
Description	Description gives a short summary of the unit content. This would be helpful to anyone searching on a database to verify that this is the appropriate OS they are looking for.
Scope	Scope is a set of statements specifying the range of variables that an individual may have to deal with in carrying out the function which have a critical impact on quality of performance required.









Knowledge and Understanding (KU)	Knowledge and Understanding (KU) are statements which together specify the technical, generic, professional and organisational specific knowledge that an individual needs in order to perform to the required standard.
Organisational Context	Organisational context includes the way the organisation is structured and how it operates, including the extent of operative knowledge managers have of their relevant areas of responsibility.
Technical Knowledge	Technical knowledge is the specific knowledge needed to accomplish specific designated responsibilities.
Core Skills/ Generic Skills (GS)	Core skills or Generic Skills (GS) are a group of skills that are the key to learning and working in today's world. These skills are typically needed in any work environment in today's world. These skills are typically needed in any work environment. In the context of the OS, these include communication related skills that are applicable to most job roles.
Electives	Electives are NOS/set of NOS that are identified by the sector as contributive to specialization in a job role. There may be multiple electives within a QP for each specialized job role. Trainees must select at least one elective for the successful completion of a QP with Electives.
Options	Options are NOS/set of NOS that are identified by the sector as additional skills. There may be multiple options within a QP. It is not mandatory to select any of the options to complete a QP with Options.