





Transforming the skill landscape



Quality Inspector - Manufactured Components

QP Code: CSC/Q0601

Version: 2.0

NSQF Level: 4

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CSC/Q0601: Quality Inspector - Manufactured Components

Brief Job Description

The incumbent in the job is responsible for conducting inspection and maintaining quality of the forged, casted and machined components at various stages of manufacturing, such as before production, intermediate and after production.

Personal Attributes

The person should be patient, organised, team-oriented and have the ability to work for long hours in adverse conditions. They should be keen observers and have an eye for detail and quality.

Applicable National Occupational Standards (NOS)

Compulsory NOS:

- 1. <u>CSC/N1335: Follow the health and safety practices at the workplace</u>
- 2. CSC/N1336: Coordinate with co-workers to achieve work efficiency
- 3. CSC/N0601: Inspect quality and dimensional accuracy of manufactured components

Qualification Pack (QP) Parameters

Sector	Capital Goods
Sub-Sector	 Machine Tools Dies, Moulds and Press Tools Plastics Manufacturing Machinery Textile Manufacturing Machinery Process Plant Machinery Electrical and Power Machinery Light Engineering Goods
Occupation	Quality Inspection
Country	India
NSQF Level	4
Aligned to NCO/ISCO/ISIC Code	NCO-2015/7543.2001







Minimum Educational Qualification & Experience	 10th Class Pass with 2 Years of relevant experience in production or quality Or 10th Class Pass + ITI in Mechanical (2 years) Or 12th Class Pass with 6 months experience in the
	relevant field
Minimum Level of Education for Training in School	
Pre-Requisite License or Training	NA
Minimum Job Entry Age	18 Years
Last Reviewed On	
Next Review Date	
Deactivation Date	
NSQC Approval Date	
Version	2.0
Reference code on NQR	
NQR Version	2.0







CSC/N1335: Follow the health and safety practices at work

Description

This OS unit is about following the appropriate health and safety practices at work. It covers responsibilities towards self and others to ensure a safe work environment.

Scope

This unit/task covers the following:

- Maintain personal health and safety
- Assist in hazard management
- Check the first aid box, firefighting and safety equipment
- Assist in waste management
- Follow the fire safety guidelines
- Follow the emergency and first-aid procedures
- Carry out relevant documentation and review

Elements and Performance Criteria

Maintain personal health and safety

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

- **PC1.** follow the recommended practices to ensure protection from infections and transmission to others, such as the use of hand sanitiser and face mask
- **PC2.** check the work conditions, assess the potential health and safety risks, and take appropriate measures to mitigate them
- **PC3.** select and use the appropriate Personal Protective Equipment (PPE) relevant to the task and work conditions
- PC4. follow the recommended techniques while lifting and moving heavy objects to avoid injury
- **PC5.** follow the manufacturer's instructions and workplace safety guidelines while working on heavy machinery, tools and equipment

Assist in hazard management

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

- PC6. identify existing and potential hazards at work
- **PC7.** assess the potential risks and injuries associated with the identified hazards
- PC8. coordinate with the supervisor or other relevant personnel to prevent or minimise the identified hazards
- PC9. handle hazardous materials safely and store them in the designated storage

Check the first aid box, firefighting and safety equipment

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

- PC10. check the first aid box to ensure it is updated with the relevant first aid supplies
- PC11. check and test the firefighting and various safety equipment to ensure they are in usable condition







PC12. coordinate with the supervisor for the repair and replacement of firefighting and safety equipment

Assist in waste management

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

- PC13. segregate waste into appropriate categories
- PC14. recycle the recyclable waste appropriately
- PC15. dispose of the non-recyclable waste in an environment-friendly manner, complying with the applicable regulations

Follow the fire safety guidelines

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

- PC16. use the appropriate type of fire extinguisher to extinguish different types of fires safely
- PC17. follow the recommended practices for a safe rescue during a fire emergency
- PC18. coordinate with the fire department to request assistance to extinguish a serious fire

Follow the emergency and first-aid procedures

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

- PC19. follow the organisational health and safety guidelines during workplace emergencies to ensure own and co-workers' safety
- PC20. follow the recommended practices to minimise loss to organisational property during an emergency
- PC21. follow the recommended procedure to free a person from electrocution
- PC22. administer appropriate first aid to the injured personnel
- PC23. perform Cardiopulmonary Resuscitation (CPR) on a potential victim of cardiac arrest
- **PC24.** coordinate with the emergency services to request medical assistance for seriously injured/ ill personnel requiring professional medical attention or hospitalisation

Carry out relevant documentation and review

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

- PC25. carry out appropriate documentation following a health and safety incident at work, including all the required information
- PC26. coordinate with the relevant personnel to review health and safety conditions at work regularly or following an incident
- PC27. assist in implementing appropriate changes to improve the health and safety conditions at work

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- **KU1.** the recommended practices to be followed to ensure protection from infections and transmission to others, such as the use of hand sanitiser and face mask
- **KU2.** the importance and process of checking the work conditions, assessing the potential health and safety risks, and take appropriate measures to mitigate them

KU3. the importance and process of selecting and using the appropriate PPE relevant to the task Capital Goods Skill Council 6



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Qualification Pack

and work conditions

- **KU4.** the recommended techniques to be followed while lifting and moving heavy objects to avoid injury
- **KU5.** the importance of following the manufacturer's instructions and workplace safety guidelines while working on heavy machinery, tools and equipment
- KU6. the importance and process of identifying existing and potential hazards at work
- KU7. the process of assessing the potential risks and injuries associated with the various hazards
- KU8. how to prevent or minimise different types of hazards
- KU9. how to handle and store hazardous materials safely
- KU10. the importance of ensuring the first aid box is updated with the relevant first aid supplies
- KU11. the process of checking and testing the firefighting and various safety equipment to ensure they are in a usable condition
- KU12. the criteria for segregating waste into appropriate categories
- KU13. the appropriate methods for recycling the recyclable waste
- KU14. the process of disposing of the non-recyclable waste safely and the applicable regulations
- KU15. use of different types of fire extinguishers to extinguish different types of fires
- KU16. the recommended practices to be followed for a safe rescue during a fire emergency
- KU17. how to request assistance from the fire department to extinguish a serious fire
- **KU18.** the appropriate practices to be followed during workplace emergencies to ensure safety and minimise loss to organisational property
- KU19. common health and safety hazards present in a work environment, associated risks, and how to mitigate them
- KU20. safe working practices to be followed while working at various hazardous sites and using electrical equipment
- KU21. the importance of ensuring easy access to firefighting and safety equipment
- **KU22.** the appropriate preventative and remedial actions to be taken in the case of exposure to toxic materials, such as poisonous chemicals and gases
- KU23. various causes of fire in different work environments and the recommended precautions to be taken to prevent fire accidents
- KU24. different methods of extinguishing fire
- KU25. different materials used for extinguishing fire, such as sand, water, foam, CO2, dry powder, etc.
- KU26. the applicable rescue techniques to be followed during a fire emergency
- KU27. the importance of placing safety signs and instructions at strategic locations in a workplace and following them
- KU28. different types of first aid treatment to be provided for different types of injuries
- KU29. potential injuries associated with incorrect manual handling
- KU30. how to move an injured person safely
- KU31. various hazards associated with the use of various machinery, tools, implements, equipment and materials
- KU32. the importance of ensuring no obstruction and free access to fire exits

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- KU33. how to free a person from electrocution safely
- KU34. how to administer appropriate first aid to an injured person
- KU35. how to perform Cardiopulmonary Resuscitation (CPR)
- KU36. the importance of coordinating with the emergency services to request urgent medical assistance for persons requiring professional medical attention or hospitalisation
- **KU37.** the appropriate documentation to be carried out following a health and safety incident at work, and the relevant information to be included
- KU38. the importance and process of reviewing the health and safety conditions at work regularly or following an incident
- KU39. the importance and process of implementing appropriate changes to improve the health and safety conditions at work

Generic Skills (GS)

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

- GS1. maintain work-related notes and records
- GS2. communicate clearly and politely with co-workers and clients
- GS3. read the relevant literature to get the latest updates about the field of work
- GS4. listen attentively to understand the information being shared
- GS5. plan and prioritise tasks to ensure timely completion
- GS6. take quick decisions to deal with workplace emergencies and accidents
- GS7. identify possible disruptions to work and take appropriate preventive measures
- GS8. coordinate with the co-workers to achieve the work objectives
- GS9. evaluate all possible solutions to a problem to select the best one







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ssessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Maintain personal health and safety	7	12	-	-
PC1. follow the recommended practices to ensure protection from infections and transmission to others, such as the use of hand sanitiser and face mask	2	3	-	-
PC2. check the work conditions, assess the potential health and safety risks, and take appropriate measures to mitigate them		2	-	-
PC3. select and use the appropriate Personal Protective Equipment (PPE) relevant to the task and work conditions		2	-	-
PC4. follow the recommended techniques while lifting and moving heavy objects to avoid injury	1	3	-	-
PC5. follow the manufacturer's instructions and workplace safety guidelines while working on heavy machinery, tools and equipment		2	-	_
Assist in hazard management	4	10	-	-
PC6. identify existing and potential hazards at work	1	1	-	-
PC7. assess the potential risks and injuries associated with the identified hazards	1	3	-	-
PC8. coordinate with the supervisor or other relevant personnel to prevent or minimise the identified hazards		3	-	-
PC9. handle hazardous materials safely and store them in the designated storage	1	3	-	-
Check the first aid box, firefighting and safety equipmen	at 3	7	-	-
PC10. check the first aid box to ensure it is updated with the relevant first aid supplies	1	2	-	-
PC11. check and test the firefighting and various safety equipment to ensure they are in usable condition		3	-	-
PC12. coordinate with the supervisor for the repair and replacement of firefighting and safety equipment		2	-	-
Assist in waste management	3	8	-	-
PC13. segregate waste into appropriate categories	1	3	-	-







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PC14.recycle the recyclable waste appropriately	1	3	-	-
PC15.dispose of the non-recyclable waste in an environment-friendly manner, complying with the applicable regulations	1	2	-	-
Follow the fire safety guidelines	3	12	-	-
PC16. use the appropriate type of fire extinguisher to extinguish different types of fires safely	1	4	-	-
PC17. follow the recommended practices for a safe rescue during a fire emergency	1	4	-	-
PC18. coordinate with the fire department to request assistance to extinguish a serious fire	1	4	-	-
Follow the emergency and first-aid procedures	7	12	-	-
PC19. follow the organisational health and safety guidelines during workplace emergencies to ensure own and co-workers' safety	1	2	-	-
PC20. follow the recommended practices to minimise loss to organisational property during an emergency	1	3	-	-
PC21. follow the recommended procedure to free a person from electrocution	1	2	-	-
PC22.administer appropriate first aid to the injured personnel	1	2	-	-
PC23.perform Cardiopulmonary Resuscitation (CPR) on a potential victim of cardiac arrest	1	2	-	-
PC24.coordinate with the emergency services to request medical assistance for seriously injured/ ill personnel requiring professional medical attention or hospitalisation	2	1	-	_
Carry out relevant documentation and review	3	9	-	-
PC25. carry out appropriate documentation following a health and safety incident at work, including all the required information	1	3	-	-
PC26. coordinate with the relevant personnel to review health and safety conditions at work regularly or following an incident	1	3	-	-
PC27. assist in implementing appropriate changes to improve the health and safety conditions at work	1	3	-	-
NOS Total	30	70	_	_







National Occupational Standards (NOS) Parameters

NOS Code	CSC/N1335
NOS Name	Follow the health and safety practices at the work
Sector	Capital Goods
Sub-Sector	Generic
Occupation	Generic
NSQF Level	3
Credits	TBD
Version	2.0
Last Reviewed Date	
Next Review Date	
Deactivation Date	
NSQC Clearance Date	







CSC/N1336: Coordinate with co-workers to achieve work efficiency

Description

This OS unit is about working in coordination with co-workers to achieve the work objectives efficiently. It also covers practising inclusion at work.

Scope

This unit/task covers the following:

- Work effectively with co-workers
- Communicate effectively with co-workers
- Practice inclusion at work

Elements and Performance Criteria

Work effectively with co-workers

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

- PC1. plan daily tasks at work to ensure their timely completion and efficient use of time
- PC2. carry out work responsibilities adhering to the limits of authority
- **PC3.** follow the supervisor's instructions to ensure adherence to the applicable quality standards and timescales
- PC4. coordinate with the co-workers to achieve the work objectives efficiently
- **PC5.** prepare the relevant documents and reports as per the supervisor's instructions, providing appropriate information clearly and systematically
- PC6. coordinate with the supervisor or relevant personnel to deal with out of authority tasks and concerns
- PC7. mentor and assist subordinates in the execution of their work responsibilities
- **PC8.** identify possible disruptions to work through coordination with the relevant stakeholders and take appropriate preventive measures
- PC9. use various resources efficiently to ensure maximum utilisation and minimum wastage
- PC10. follow the recommended practices to avoid and resolve conflicts at work
- PC11. follow the relevant organisational policies to ensure disciplined behaviour with maximum productivity at work

Communicate effectively with co-workers

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

- PC12. follow the organisational policy for the efficient and timely dissemination of information to the authorised personnel
- PC13. communicate clearly and politely to ensure effective communication with co-workers
- PC14. follow the appropriate techniques for active listening during interactions

Practice inclusion at work

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

PC15. empathise with Persons with Disabilities (PwD)

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PC16. adopt gender-neutral behaviour at work

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1. the importance and process of effective communication in the workplace
- KU2. the barriers to effective communication and how to overcome them
- KU3. the importance of teamwork in an organisation's and individual's success
- KU4. the importance of active listening in the work environment
- KU5. the appropriate techniques to be followed for active listening
- KU6. importance of tone and pitch in effective communication
- **KU7.** importance of avoiding casual expletives and unpleasant terms while communicating professional circles
- KU8. the importance of maintaining discipline and ethical behaviour at work
- KU9. the common reasons for interpersonal conflict and how to resolve them
- KU10. the importance of developing effective working relationships for professional success
- KU11. how expressing and addressing grievances appropriately and effectively
- KU12. the importance and process of planning daily tasks to ensure their timely completion and efficient use of time
- KU13. the importance of adhering to the limits of authority at work
- KU14. the importance of following the applicable quality standards and timescales at work
- KU15. the importance of coordinating with the co-workers to achieve the work objectives efficiently
- KU16. the relevant documentation requirements
- KU17. the importance of providing appropriate information clearly and systematically in work documents
- KU18. the escalation matrix to be followed to deal with out of authority tasks and concerns
- KU19. the importance and process of mentoring and assisting subordinates in the execution of their work responsibilities
- KU20. how to identify possible disruptions to work prevent them
- KU21. how to use various resources efficiently to ensure maximum utilisation and minimum wastage
- KU22. the recommended practices to be followed at work to avoid and resolve conflicts at work
- KU23. the importance and process of efficient and timely dissemination of information to the authorised personnel
- KU24. how to communicate clearly and politely to ensure effective communication
- KU25. the importance of following the recommended practices to ensure an inclusive environment for PwD and all genders at work

Generic Skills (GS)

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







- GS1. maintain work-related notes and records
- GS2. read work-related and other relevant literature
- GS3. communicate politely and -professionally
- GS4. listen attentively to understand the information or instructions being shared
- GS5. plan and prioritise tasks to ensure timely completion
- GS6. take prompt decisions to deal with workplace emergencies and accidents
- GS7. evaluate all possible solutions to a problem to select the best one



Assessment Criteria

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ssessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Work effectively with co-workers	20	24	-	-
PC1. plan daily tasks at work to ensure their timely completion and efficient use of time	2	4	_	-
PC2. carry out work responsibilities adhering to the limits of authority	2	4	-	-
PC3. follow the supervisor's instructions to ensure adherence to the applicable quality standards and timescales	2	4	-	-
PC4. coordinate with the co-workers to achieve the work objectives efficiently	2	4	-	-
PC5. prepare the relevant documents and reports as per the supervisor's instructions, providing appropriate information clearly and systematically	2	4	-	_
PC6. coordinate with the supervisor or relevant personnel to deal with out of authority tasks and concerns	2	4	-	-
PC7. mentor and assist subordinates in the execution of their work responsibilities	2	4	-	-
PC8. identify possible disruptions to work through coordination with the relevant stakeholders and take appropriate preventive measures	2	4	-	-
PC9. use various resources efficiently to ensure maximum utilisation and minimum wastage	2	4	-	-
PC10.follow the recommended practices to avoid and resolve conflicts at work	1	4	-	-
PC11.follow the relevant organisational policies to ensure disciplined behaviour with maximum productivity at work	1	3	-	-
Communicate effectively with co-workers	6	15	-	-
PC12. follow the organisational policy for the efficient and timely dissemination of information to the authorised personnel	2	5	-	-
PC13. communicate clearly and politely to ensure effective communication with co-workers	2	5	-	-
PC14. follow the appropriate techniques for active listening during interactions	2	5	-	-
Practice inclusion at work	4	12	-	_

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PC15. empathise with Persons with Disabilities (PwD) 2	6	-	-
PC16. adopt gender-neutral behaviour at work	2	6	-	-
NOS Total	30	70	-	-







National Occupational Standards (NOS) Parameters

NOS Code	CSC/N1336
NOS Name	Coordinate with co-workers to achieve work efficiency
Sector	Capital Goods
Sub-Sector	Generic
Occupation	Generic
NSQF Level	3
Credits	TBD
Version	2.0
Last Reviewed Date	
Next Review Date	
Deactivation Date	
NSQC Clearance Date	







CSC/N0601: Inspect quality and dimensional accuracy of manufactured components

Description

This OS unit is about inspecting the forged, casted and machined components and maintaining the dimensional accuracy and quality at various stages of manufacturing.

Scope

This unit/task covers the following:

- Prepare for inspecting the component
- Perform inspection of the component

Elements and Performance Criteria

Prepare for inspecting the component

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

- **PC1.** interpret the inspection check sheet, manufacturing drawings; client specifications/detail drawings; applicable national and international standards; welding procedure specification and coordinate with the superior for confirming inspection tasks and inspection criteria based on the standards for product/manufacturing process
- **PC2.** identify and arrange testing equipment, measuring instruments, gauges, parts etc. required during the quality inspection process
- **PC3.** ensure that tools, gauges and measuring instruments to be used for inspection process are calibrated and functioning properly
- PC4. prepare/collect different production/product related data required for inspection

Perform inspection of the component

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

- PC5. follow safety practices recommended by organisation during quality inspection process
- PC6. identify the product or equipment and its correct specification has to be inspected
- PC7. identify the features to be inspected for forged, casted or machined components
 Features: dimensions; geometrical specifications; weight; temperature; surface finish; hardness; chemical and mechanical properties (tensile strength, compressive strength)
- **PC8.** conduct the visual inspection of the product for any scratches, damages, packing etc. as per the norms and quality standards
- **PC9.** conduct the dimensional inspection of the product by using appropriate inspection equipment
- PC10. identify any defects or variations in the product by comparing its dimensions with the dimensions as prescribed in the WPS and engineering drawing
- PC11. record the observations of the inspection and update the reports such as inspection report, charts in graphical pattern and other documents, manually or electronically as per the SOP
- PC12. process the records as per organization policy and procedures (validation, reporting and processing, etc.)

PC13. coordinate with the team to analyse the problem identified during inspection process and Capital Goods Skill Council 18







maintain the data as per organizational procedures

- PC14. coordinate with the respective process line leader/supervisor and implement corrective action for discrepancies identified in the inspection report
- PC15. report to the supervisor about any problems faced or anticipated during the complete process

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1. relevant quality inspection standards, policies, and procedures followed in the organization
- KU2. forging, casting and machining processes followed during manufacturing of product
- KU3. basic materials and their behaviour during forging, casting, fabrication and machining
- KU4. general principles of forging, casting or machining components and structures
- **KU5.** how to extract information required from drawings and forging, casting or machining procedure specifications
- KU6. general principles of quality control systems and procedures
 General principles: use of jigs, fixtures and manipulating devices; residual stresses and distortion; types of defect and their avoidance; quality control during manufacture
- **KU7.** methods and techniques (QC tools) involved in evaluating information including root cause analysis
- **KU8.** preparations to be undertaken before the fabrications and machining of components are inspected (such as access to produced component, cleanliness and physical condition of component)
- **KU9.** visual and dimensional inspection methods and techniques that are used for manufactured components/structures
- **KU10.** ways to carry out inspection checks i.e. visual inspection; physical measurements; chemical tests (knowledge only); checks against patterns, templates and guides; condition of consumables; leakage testing
- KU11. Standard Operating Procedures (SOP) recommended by OEM for using testing equipment, gauges and inspection equipment such as depth gauge, measuring tools and equipment; magnifying glass; adjustable square/protractor; mirror; portable lighting; means of marking defective areas; precision level; between centre table; surface plate/table; vee block; die penetrating spray for crack detection; hardness tester; coat meter; ultrasonic thickness gauges etc.
- KU12. how to measure system capability
- KU13. how to calculate allowances for gaps and shrinkage as per specifications
- KU14. acceptance criteria to be used and the influence of defects on the service performance of the fabricated or machined components/structures (including risks and consequences of failure)
- KU15. importance of carrying out the checks and recording the results in the appropriate documentation

Inspection documentation: inspection report, route card, customer specific documentation, concession/deviation report, check sheet, control chart, flow chart, run chart

KU16. importance of quality control procedures







- KU17. implications of not adhering to quality control procedures
- KU18. procedure to be followed when inspected products are out of specification
- KU19. basic use of office applications like spread sheet, word processor, presentations
- KU20. basic operation of software such as SAP, ERP etc.
- KU21. use of appropriate PPE, material handling equipment and tools for completing the inspection tasks

Generic Skills (GS)

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

- GS1. read and interpret drawings, work instructions, equipment manuals and process documents
- GS2. communicate the process requirements to the supervisor and co-workers
- GS3. attentively listen and comprehend the information given by the supervisor/team members
- GS4. write any work related information in English/regional language
- GS5. recognise a workplace problem and take suitable action
- **GS6.** analyse and apply the information gathered from observation, experience, reasoning or communication to act efficiently
- GS7. plan and organize tools, machines and consumables for carrying out welding job
- **GS8.** complete the assigned tasks with minimum supervision
- GS9. report to the supervisor or deal with a colleague individually, depending on the type of concern



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Assessment	Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Prepare for inspecting the component	11	14	-	6
PC1. interpret the inspection check sheet, manufacturing drawings; client specifications/detail drawings; applicable national and international standards; welding procedure specification and coordinate with the superior for confirming inspection tasks and inspection criteria based on the standards for product/manufacturing process	2	3	-	1
PC2. identify and arrange testing equipment, measuring instruments, gauges, parts etc. required during the quality inspection process	5	3	-	2
PC3. ensure that tools, gauges and measuring instruments to be used for inspection process are calibrated and functioning properly	2	5	-	2
PC4. prepare/collect different production/product related data required for inspection	2	3	-	1
Perform inspection of the component	19	36	-	14
PC5. follow safety practices recommended by organisation during quality inspection process	1	2	-	-
PC6. identify the product or equipment and its correct specification has to be inspected	1	2	-	1
 PC7. identify the features to be inspected for forged, casted or machined components Features: dimensions; geometrical specifications; weight; temperature; surface finish; hardness; chemical and mechanical properties (tensile strength, compressive strength) 	1	2	-	1
PC8. conduct the visual inspection of the product for any scratches, damages, packing etc. as per the norms and quality standards	3	6	-	2
PC9. conduct the dimensional inspection of the product by using appropriate inspection equipment	3	6	-	3
PC10. identify any defects or variations in the product by comparing its dimensions with the dimensions as prescribed in the WPS and engineering drawing	2	4	-	2







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PC11. record the observations of the in update the reports such as inspe- charts in graphical pattern documents, manually or electron the SOP	and other 2	4	-	2
PC12. process the records as per organi and procedures (validation, re processing, etc.)		2	-	1
PC13.coordinate with the team to problem identified during inspect and maintain the data as per or procedures	tion process	3	-	1
PC14. coordinate with the respective leader/supervisor and implemen action for discrepancies identi inspection report	t corrective	3	-	1
PC15.report to the supervisor about a faced or anticipated during the process		2	-	-
NOS Total	30	50	-	20







National Occupational Standards (NOS) Parameters

NOS Code	CSC/N0601
NOS Name	Inspect quality and dimensional accuracy of manufactured components
Sector	Capital Goods
Sub-Sector	 Machine Tools Dies, Moulds and Press Tools Plastics Manufacturing Machinery Textile Manufacturing Machinery Process Plant Machinery Electrical and Power Machinery Light Engineering Goods
Occupation	Quality Inspection
NSQF Level	4
Credits	TBD
Version	2.0
Last Reviewed Date	
Next Review Date	
NSQC Clearance Date	







Assessment Guidelines and Assessment Weightage

Assessment Guidelines

1. Criteria for assessment for the Qualification Pack will be created by CGSC.

2. Performance Criteria (PC) have been assigned marks proportional to its importance in NOS. SSC will also lay down proportion of marks for Theory and Skills Practical for each PC.

3. The assessment for the theory part will/may be based on knowledge bank of questions approved CGSC.

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

5. Assessment Agencies will create Assessor Guides comprising of Theory and Practical Assessment Set and Guidelines for each examination/training centre (as per assessment criteria below). The same will be approved by CGSC for adequacy.

6. To successfully attain Certification on the Qualification Pack, the trainee must score a minimum of 70% in each Core NOS and minimum of 50% in all non-core NOS. In addition, a candidate needs to attain a minimum overall pass percentage of 70% for certification.

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
CSC/N1335.Use basic health and safety practicesat the workplace	30	70	-	-	100	15
CSC/N1336. Coordinate with co-workers to achieve work efficiency	30	70	-	-	100	15
CSC/N0601. Inspect quality and dimensional accuracy of manufactured component	30	50	-	20	100	70
Total	90	190	-	20	300	100







Acronyms

NOS	National Occupational Standard(s)
NSQF	National Skills Qualifications Framework
QP	Qualifications Pack
TVET	Technical and Vocational Education and Training
СММ	Co-Ordinate Measuring Machine
PPE	Personal Protective Equipment
QC	Quality Check
ERP	Enterprise Resource Planning
CO2	Carbon Dioxide
CPR	Cardiac Pulmonary Resuscitation







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.