



Chargehand-Facade Installation

QP Code: CON/Q1108

Version: 2.0

NSQF Level: 4

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Contents

CON/Q1108: Chargehand-Facade Installation	3
<i>Brief Job Description</i>	3
Applicable National Occupational Standards (NOS)	3
<i>Compulsory NOS</i>	3
<i>Qualification Pack (QP) Parameters</i>	3
CON/N1124: Interpret drawing specifications and mark layout for facade installation work	5
CON/N1136: Install semi-unitized/unitized curtain walls	9
CON/N1137: Install facade for sloped / curved glazing/ spider glazing	13
CON/N8001: Work effectively in a team to deliver desired results at the workplace	19
CON/N8002: Plan and organize work to meet expected outcomes	23
CON/N9001: Work according to personal health, safety and environment protocols at construction site	28
Assessment Guidelines and Weightage	33
<i>Assessment Guidelines</i>	33
<i>Assessment Weightage</i>	34
Acronyms	36
Glossary	37



CON/Q1108: Chargehand-Facade Installation

Brief Job Description

This job role is responsible for carrying out markings and installing facades for unitized curtain wall and sloped glazing as per specification and standards.

Personal Attributes

The Chargehand-Facade Installation is expected to be physically fit to work across various locations with varied environmental conditions. The person should be organized, diligent, methodical, safety-conscious, and a prompt decision-maker. In addition to being a team player, the individual should have good communication skills.

Applicable National Occupational Standards (NOS)

Compulsory NOS:

1. [CON/N1124: Interpret drawing specifications and mark layout for facade installation work](#)
2. [CON/N1136: Install semi-unitized/unitized curtain walls](#)
3. [CON/N1137: Install facade for sloped / curved glazing/ spider glazing](#)
4. [CON/N8001: Work effectively in a team to deliver desired results at the workplace](#)
5. [CON/N8002: Plan and organize work to meet expected outcomes](#)
6. [CON/N9001: Work according to personal health, safety and environment protocols at construction site](#)

Qualification Pack (QP) Parameters

Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Interior & Exterior Finishes
Country	India
NSQF Level	4
Credits	NA



Qualification Pack



Aligned to NCO/ISCO/ISIC Code	NCO-2015/7122.9900
Minimum Educational Qualification & Experience	8th Class with 9 Years of experience experience in same occupation for non- trained worker OR 8th Class with 3 Years of experience experience as a certified Facade Installer NSQF Level 4
Minimum Level of Education for Training in School	
Pre-Requisite License or Training	NIL
Minimum Job Entry Age	18 Years
Last Reviewed On	21/09/2021
Next Review Date	21/09/2025
NSQC Approval Date	
Version	2.0



CON/N1124: Interpret drawing specifications and mark layout for facade installation work

Description

This unit describes the skills and knowledge required to read and interpret drawing specifications and carry out layout marking for facade installation work

Scope

The scope covers the following :

- Interpret schematic drawings and technical specifications for facade installation
- Mark layout for fixing facade grid layout as per the design requirement

Elements and Performance Criteria

Interpret schematic drawings and technical specifications for facade installation

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

- PC1.** interpret the details relevant to facade installations from architectural drawings
- PC2.** interpret the scope of work including type of facade, brackets, anchors, insulations, vapour barrier, pressure equalization, smoke and fire barrier, secondary framing elements, operable vents etc
- PC3.** interpret manufacturer's specification regarding the elements of frame and panel and it's installation
- PC4.** interpret method statement and shop drawings for facade installation
- PC5.** estimate the type, shape and quantity of panels required to install the facade

Mark layout for fixing facade grid layout as per the design requirement

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

- PC6.** check the adequacy of structure for accommodating wall panels and report any discrepancies to the superiors
- PC7.** measure field for wall framing members on exterior surface of structure
- PC8.** calculate corner panel width as per appropriate methodology
- PC9.** identify panel orientation(vertical/horizontal) as per drawing requirement
- PC10.** mark grid layout for installing the facade
- PC11.** provide markings for cutouts in panel maintaining appropriate provisions for doors, windows, etc. for the facade installation

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1.** standard procedures for facade installation works
- KU2.** safety rules and regulations for handling and storing relevant tools and equipment and materials for facade installation works



Qualification Pack



- KU3.** personal protection including the use of the related safety gears and safety equipment
- KU4.** service request procedures for tools, materials and equipment
- KU5.** statutory compliance requirements related to working at height
- KU6.** principle of measurement, advance geometry and arithmetic
- KU7.** schematic drawings and sketches for facade installation
- KU8.** how to check for alignment, straightness and plumb
- KU9.** tools and tackles used for carrying out field measurements
- KU10.** significance of laying panels vertically or horizontally as per requirements of specific structure
- KU11.** how to carry out markings of facades to guide activities of subordinates
- KU12.** manufacturer's instructions for facade installation
- KU13.** different types of frame materials like timber, steel, aluminum, PVCu, composites etc
- KU14.** different types of curtain walls such as panelized curtain wall, unitised curtain wall, stick system curtain wall, rain screens etc
- KU15.** types of paneling material (aluminum composite panel, glass, glass fiber reinforced concrete, stone, ceramic) and their respective properties and applications
- KU16.** appropriate fastening methods to be used (clips & screws, backside attachment, etc)
- KU17.** impact of temperature, vapour, etc. on facade
- KU18.** tolerance limits for uniformity of joints
- KU19.** different types of joints to be used in frames including butt joint, etc
- KU20.** different flashing and interface and their construction as per drawings and specifications
- KU21.** transom drained curtain wall and mullion drained curtain wall
- KU22.** components of different type of curtain wall
- KU23.** allowable tolerance limits for panel positioning

Generic Skills (GS)

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

- GS1.** write in one or more language, preferably in the local language of the site and basic english
- GS2.** read sketches/instructions provided for the work, and various signboards, safety rules, safety tags, exit route information in one or more languages, preferably in the local language of the site
- GS3.** speak in one or more language, preferably one of the local language at the site
- GS4.** communicate orally and effectively with team members
- GS5.** analyze the safety aspect of the workplace
- GS6.** plan work and organize required resource effectively
- GS7.** complete work as per agreed time schedule and quality parameters
- GS8.** resolve any conflict within the teammates
- GS9.** evaluate the complexity of the tasks
- GS10.** identify any violation of safety norms during the work



Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Interpret schematic drawings and technical specifications for facade installation</i>	12	23	-	-
PC1. interpret the details relevant to facade installations from architectural drawings	-	-	-	-
PC2. interpret the scope of work including type of facade, brackets, anchors, insulations, vapour barrier, pressure equalization, smoke and fire barrier, secondary framing elements, operable vents etc	-	-	-	-
PC3. interpret manufacturer's specification regarding the elements of frame and panel and it's installation	-	-	-	-
PC4. interpret method statement and shop drawings for facade installation	-	-	-	-
PC5. estimate the type, shape and quantity of panels required to install the facade	-	-	-	-
<i>Mark layout for fixing facade grid layout as per the design requirement</i>	18	47	-	-
PC6. check the adequacy of structure for accommodating wall panels and report any discrepancies to the superiors	-	-	-	-
PC7. measure field for wall framing members on exterior surface of structure	-	-	-	-
PC8. calculate corner panel width as per appropriate methodology	-	-	-	-
PC9. identify panel orientation(vertical/horizontal) as per drawing requirement	-	-	-	-
PC10. mark grid layout for installing the facade	-	-	-	-
PC11. provide markings for cutouts in panel maintaining appropriate provisions for doors, windows, etc. for the facade installation	-	-	-	-
NOS Total	30	70	-	-



Qualification Pack



National Occupational Standards (NOS) Parameters

NOS Code	CON/N1124
NOS Name	Interpret drawing specifications and mark layout for facade installation work
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Interior & Exterior Finishes
NSQF Level	4
Credits	TBD
Version	2.0
Last Reviewed Date	21/09/2021
Next Review Date	21/09/2025



CON/N1136: Install semi-unitized/unitized curtain walls

Description

This unit describes the skills and knowledge required to install semi-unitized/unitized curtain walls

Scope

The scope covers the following :

- Carry out installation of semi-unitized/unitized curtain walls

Elements and Performance Criteria

Carry out installation of semi-unitized/unitized curtain walls

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

- PC1.** identify various components of semi-unitized /unitized curtain wall system including hardware components
- PC2.** check that wall members are cut to appropriate length prior to installation
- PC3.** assemble glass and aluminum curtain wall as per applicability at yard
- PC4.** identify and use appropriate lifting devices for lifting glass panels to various floors as per applicability
- PC5.** install the prefabricated and assembled panels in shingle fashion, starting from the bottom of the building and going around each floor and up the building
- PC6.** install panels for semi-unitized curtain wall system
- PC7.** fasten the panel using fasteners as per specifications
- PC8.** apply joint sealant as per specification
- PC9.** install different types of semi-unitized/unitized curtain wall system as per applicability
- PC10.** ensure window and door openings are provided as per specification
- PC11.** attach pressure plates and cover as per applicability
- PC12.** ensure drainage track is free from debris

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1.** standard practices for installing semi-unitized/unitized curtain walls
- KU2.** safety rules and regulations for handling and storing relevant tools, equipment, and materials required for relevant works in accordance with organizational norms
- KU3.** importance of personal protection including the use of related safety gears and equipment in accordance with organizational norms
- KU4.** service request procedures for tools, materials and equipment as per organizational norms
- KU5.** procedure for maintenance of tools and equipment
- KU6.** schematic drawings and sketches for facade installation
- KU7.** manufacturer's instructions for facade installation



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- KU8.** use of different types of tools for facade installation
- KU9.** different types of windows like fixed, side hung, projecting side, top hung, tilt turn, vertical slider, horizontal slider, vertical pivot, horizontal pivot etc.
- KU10.** different types of glass used for panels
- KU11.** different types of frame materials like timber, steel, aluminum, PVCu, composites etc.
- KU12.** different types of curtain walls such as panelized curtain wall, semi-unitized/ unitised curtain wall, stick system curtain wall, rain screens etc.
- KU13.** types of paneling material (aluminum composite panel, glass, glass fiber reinforced concrete, stone, ceramic) and their respective properties and applications
- KU14.** components of semi-unitised /unitised system curtain wall
- KU15.** hardware components for semi-unitised/ unitised wall curtain system including anchors, aluminum connectors, setting blocks, corner blocks, pressure plates, caps, gaskets and sealants
- KU16.** applications of different curtain wall systems
- KU17.** procedure for installing semi-unitised/ unitised wall curtain
- KU18.** appropriate fastening methods to be used (clips & screws, backside attachment, etc.
- KU19.** impact of temperature, vapour, etc. on facade
- KU20.** tolerance limits for uniformity of joints
- KU21.** different type of joints in facade works
- KU22.** different sealants and gaskets used for weatherproofing and drainage system
- KU23.** how to arrange suitable lifting equipment in place at point of installation
- KU24.** use of suitable lifting devices for lifting heavy panels to the required places

Generic Skills (GS)

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

- GS1.** write in one or more languages, preferably in the local language of the site
- GS2.** read sketches/instructions provided for the work, and various signboards, safety rules, safety tags, exit route information in one or more languages, preferably in the local language of the site
- GS3.** speak in one or more language, preferably one of the local language at the site
- GS4.** communicate orally and effectively with team members
- GS5.** analyze the safety aspect of the workplace
- GS6.** plan work and organize required resource effectively
- GS7.** complete work as per agreed time schedule and quality parameters
- GS8.** resolve any conflict within the teammates
- GS9.** evaluate the complexity of the tasks
- GS10.** identify any violation of safety norms during the work



Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Carry out installation of semi-unitized/unitized curtain walls</i>	30	70	-	-
PC1. identify various components of semi-unitized /unitized curtain wall system including hardware components	-	-	-	-
PC2. check that wall members are cut to appropriate length prior to installation	-	-	-	-
PC3. assemble glass and aluminum curtain wall as per applicability at yard	-	-	-	-
PC4. identify and use appropriate lifting devices for lifting glass panels to various floors as per applicability	-	-	-	-
PC5. install the prefabricated and assembled panels in shingle fashion, starting from the bottom of the building and going around each floor and up the building	-	-	-	-
PC6. install panels for semi-unitized curtain wall system	-	-	-	-
PC7. fasten the panel using fasteners as per specifications	-	-	-	-
PC8. apply joint sealant as per specification	-	-	-	-
PC9. install different types of semi-unitized/unitized curtain wall system as per applicability	-	-	-	-
PC10. ensure window and door openings are provided as per specification	-	-	-	-
PC11. attach pressure plates and cover as per applicability	-	-	-	-
PC12. ensure drainage track is free from debris	-	-	-	-
NOS Total	30	70	-	-



Qualification Pack



National Occupational Standards (NOS) Parameters

NOS Code	CON/N1136
NOS Name	Install semi-unitized/unitized curtain walls
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Interior and Exterior Finishes
NSQF Level	4
Credits	TBD
Version	1.0
Last Reviewed Date	21/09/2021
Next Review Date	21/09/2025



CON/N1137: Install facade for sloped / curved glazing/ spider glazing

Description

This unit describes the skills and knowledge required to install facades for sloped / curved glazing/spider glazing

Scope

The scope covers the following :

- Carry out preparatory checks prior to fixing sloped panels
- Fix sloped panels (Aluminum Composite Panel, Glass, Glass Fiber Reinforced Concrete, stone, ceramic) to framing members
- Fix spider glazing

Elements and Performance Criteria

Carry out preparatory checks prior to fixing sloped panels

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

- PC1.** interpret schematic drawings for facade installation
- PC2.** interpret method statement and scope of work for facade installation
- PC3.** check that panels are of correct material and type as per specifications, to handle moisture, sunlight and other elements
- PC4.** check that panels are not damaged and replace panels that are not fit for installation
- PC5.** mark points as per the profile of the sloped /curved glazing for fixing facade on sloped/curved surfaces
- PC6.** verify that a functioning weep system is present
- PC7.** verify that openings for glazing are correctly sized and within tolerance

Fix sloped panels (Aluminum Composite Panel, Glass, Glass Fiber Reinforced Concrete, stone, ceramic) to framing members

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

- PC8.** install glass, sealants, gaskets and other glazing materials using the recommendations of manufacturers
- PC9.** verify that insulating glass (IG) unit secondary seal is compatible with glazing sealants
- PC10.** install setting blocks in rabbets as per requirements
- PC11.** provide bite on glass, minimum edge ,face clearances and glazing material tolerances as per requirement
- PC12.** provide weep holes as per drawing/requirement in the facade
- PC13.** set glass lights in each series with uniform pattern, draw, bow and similar characteristics
- PC14.** check that the weight of the glass unit is distributed along the edge rather than at the corner

Fix spider glazing

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

- PC15.** install glass , sealants, and spider fittings as per recommendations and type of spider glazing
- PC16.** install setting blocks as per requirements



PC17. provide weep system as per requirement

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1.** standard procedures for facade installation for sloped/ curved glazing /spider glazing
- KU2.** safety rules and regulations for handling and storing relevant tools, equipment, and materials required for relevant works in accordance with organizational norms
- KU3.** importance of personal protection including the use of related safety gears and equipment in accordance with organizational norms
- KU4.** service request procedures for tools, materials and equipment as per organizational norms
- KU5.** procedure for maintenance of tools and equipment
- KU6.** statutory compliance requirements related to working at height
- KU7.** principle of measurement, advance geometry and arithmetic
- KU8.** schematic drawings and sketches for facade installation in sloped/ curved glazing /spider glazing
- KU9.** manufacturer's instructions for facade installation for sloped/ curved glazing /spider glazing
- KU10.** use of different tools used in sloped/ curved glazing /spider glazing
- KU11.** how to check for alignment, straightness and plumb
- KU12.** various fastening methods (clips & screws, backside attachment etc.) used in facade installation works
- KU13.** impact of temperature, vapour, etc. on facade
- KU14.** tolerance limits for uniformity of joints
- KU15.** unique requirements of overhead sloped glazing in terms of stress, deflection of wind load etc.
- KU16.** applications of overhead glazing (walkways, atria, etc.)
- KU17.** specific drainage requirements for overhead sloped glazing
- KU18.** different types of glass used for panels
- KU19.** different types of frame materials like timber, steel, aluminum, PVCu, composites etc.
- KU20.** different types of curtain walls such as panelized curtain wall, unitised curtain wall, stick system curtain wall, rain screens etc.
- KU21.** types of paneling material (aluminum composite panel, glass, glass fiber reinforced concrete, stone, ceramic) and their respective properties and applications
- KU22.** importance of spider glazing
- KU23.** uses of spider glazing
- KU24.** process of installation of various types of spider glazing
- KU25.** various fittings used in spider glazing
- KU26.** accessories used in glazing
- KU27.** glass thickness used in spider glazing
- KU28.** different types of joints to be used in frames including butt joint, etc.
- KU29.** different flashing and interface and their construction as per drawings and specifications
- KU30.** transom drained curtain wall and mullion drained curtain wall



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- KU31.** components of different type of curtain wall
- KU32.** use of glazing gaskets
- KU33.** use of different type of tools for cutting and drilling in panels
- KU34.** allowable tolerance limits for panel positioning
- KU35.** how to keep the panels flat & straight with appropriate no. of screws per sheet
- KU36.** principles of water and air tightness and concept of drained facades, ventilated facades and pressure equalized facades
- KU37.** process of sealing of windows to surrounding wall

Generic Skills (GS)

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

- GS1.** write in one or more languages, preferably in the local language of the site and basic English
- GS2.** read sketches/instructions provided for the work, and various signboards, safety rules, safety tags, exit route information in one or more languages, preferably in the local language of the site
- GS3.** speak in one or more language, preferably one of the local language at the site
- GS4.** communicate orally and effectively with team members
- GS5.** analyze the safety aspect of the workplace
- GS6.** plan work and organize required resource effectively
- GS7.** complete work as per agreed time schedule and quality parameters
- GS8.** resolve any conflict within the teammates
- GS9.** evaluate the complexity of the tasks
- GS10.** identify any violation of safety norms during the work



Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Carry out preparatory checks prior to fixing sloped panels</i>	12	28	-	-
PC1. interpret schematic drawings for facade installation	-	-	-	-
PC2. interpret method statement and scope of work for facade installation	-	-	-	-
PC3. check that panels are of correct material and type as per specifications, to handle moisture, sunlight and other elements	-	-	-	-
PC4. check that panels are not damaged and replace panels that are not fit for installation	-	-	-	-
PC5. mark points as per the profile of the sloped /curved glazing for fixing facade on sloped/curved surfaces	-	-	-	-
PC6. verify that a functioning weep system is present	-	-	-	-
PC7. verify that openings for glazing are correctly sized and within tolerance	-	-	-	-
<i>Fix sloped panels (Aluminum Composite Panel, Glass, Glass Fiber Reinforced Concrete, stone, ceramic) to framing members</i>	9	21	-	-
PC8. install glass, sealants, gaskets and other glazing materials using the recommendations of manufacturers	-	-	-	-
PC9. verify that insulating glass (IG) unit secondary seal is compatible with glazing sealants	-	-	-	-
PC10. install setting blocks in rabbets as per requirements	-	-	-	-
PC11. provide bite on glass, minimum edge ,face clearances and glazing material tolerances as per requirement	-	-	-	-
PC12. provide weep holes as per drawing/requirement in the facade	-	-	-	-



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Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC13. set glass lights in each series with uniform pattern, draw, bow and similar characteristics	-	-	-	-
PC14. check that the weight of the glass unit is distributed along the edge rather than at the corner	-	-	-	-
<i>Fix spider glazing</i>	9	21	-	-
PC15. install glass , sealants, and spider fittings as per recommendations and type of spider glazing	-	-	-	-
PC16. install setting blocks as per requirements	-	-	-	-
PC17. provide weep system as per requirement	-	-	-	-
NOS Total	30	70	-	-



Qualification Pack



National Occupational Standards (NOS) Parameters

NOS Code	CON/N1137
NOS Name	Install facade for sloped / curved glazing/ spider glazing
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Interior and Exterior Finishes
NSQF Level	4
Credits	TBD
Version	1.0
Last Reviewed Date	21/09/2021
Next Review Date	21/09/2025



CON/N8001: Work effectively in a team to deliver desired results at the workplace

Description

This unit describes the skills and knowledge required to work effectively within a team to achieve the desired results

Scope

The scope covers the following :

- Interact and communicate in an effective manner
- Support co-workers to execute the project requirements
- Practice inclusion

Elements and Performance Criteria

Interact and communicate in an effective manner

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

- PC1.** pass on work related information/ requirement clearly to the team members
- PC2.** inform co-workers and superiors about any kind of deviations from work
- PC3.** report any unresolved problem to the supervisor immediately
- PC4.** obtain instructions from superiors and respond on the same
- PC5.** communicate to team members/subordinates for appropriate work technique and method
- PC6.** seek clarification and advice as per the requirement

Support co-workers to execute the project requirements

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

- PC7.** hand over the required material, tools, tackles, equipment and work fronts timely to interfacing teams
- PC8.** work together with co-workers in a synchronized manner

Practice inclusion

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

- PC9.** maintain cultural inclusivity at work place
- PC10.** maintain disability friendly work practices
- PC11.** follow gender neutral practices at workplace
- PC12.** address discriminatory and offensive behaviour in a professional manner as per organizational policy

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

- KU1.** own roles and responsibilities
- KU2.** importance of effective communication



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- KU3.** the consequence of poor teamwork on project outcomes, timelines, safety at the construction site, etc.
- KU4.** different modes of communication used at workplace
- KU5.** importance of creating healthy and cooperative work environment among the gangs of workers
- KU6.** different activities within the work area where interaction with other workers is required
- KU7.** applicable techniques of work, properties of materials used, tools and tackles used, safety standards that co-workers might need as per the requirement
- KU8.** importance of proper and effective communication and the expected adverse effects in case of failure relating to quality, timeliness, safety, risks at the construction project site
- KU9.** importance and need of supporting co-workers facing problems for the smooth functioning of work
- KU10.** the fundamental concept of gender equality
- KU11.** how to recognise and be sensitive to issues of disability, culture and gender
- KU12.** legislation, policies, and procedures relating to gender sensitivity and cultural diversity including their impact on the area of operation

Generic Skills (GS)

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

- GS1.** write in at least one language, preferably in the local language of the site
- GS2.** read the communication regarding work completion, materials used, tools and tackles used, the resource required, etc,
- GS3.** speak in one or more languages, preferably in one of the local language of the site
- GS4.** listen and follow instructions / communication shared by superiors/ co-workers regarding team requirements or interfaces during work processes
- GS5.** communicate orally and effectively with co-workers considering their educational and social background
- GS6.** decide on what information is to be shared with co-workers within the team or to the interfacing gang of workers
- GS7.** plan work and organize the required resources in coordination with team members
- GS8.** complete all assigned task in coordination with team members
- GS9.** take initiative in resolving issues among co-workers or report the same to superiors
- GS10.** ensure best ways of coordination among team members
- GS11.** evaluate the complexity of task and determine if any guidance is required from superiors

Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Interact and communicate in an effective manner</i>	18	42	-	-
PC1. pass on work related information/ requirement clearly to the team members	-	-	-	-
PC2. inform co-workers and superiors about any kind of deviations from work	-	-	-	-
PC3. report any unresolved problem to the supervisor immediately	-	-	-	-
PC4. obtain instructions from superiors and respond on the same	-	-	-	-
PC5. communicate to team members/subordinates for appropriate work technique and method	-	-	-	-
PC6. seek clarification and advice as per the requirement	-	-	-	-
<i>Support co-workers to execute the project requirements</i>	6	14	-	-
PC7. hand over the required material, tools, tackles, equipment and work fronts timely to interfacing teams	-	-	-	-
PC8. work together with co-workers in a synchronized manner	-	-	-	-
<i>Practice inclusion</i>	6	14	-	-
PC9. maintain cultural inclusivity at work place	-	-	-	-
PC10. maintain disability friendly work practices	-	-	-	-
PC11. follow gender neutral practices at workplace	-	-	-	-
PC12. address discriminatory and offensive behaviour in a professional manner as per organizational policy	-	-	-	-
NOS Total	30	70	-	-



Qualification Pack



National Occupational Standards (NOS) Parameters

NOS Code	CON/N8001
NOS Name	Work effectively in a team to deliver desired results at the workplace
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Generic 2
NSQF Level	4
Credits	TBD
Version	6.0
Last Reviewed Date	31/03/2022
Next Review Date	31/03/2025
NSQC Clearance Date	31/03/2022



CON/N8002: Plan and organize work to meet expected outcomes

Description

This unit describes the knowledge and the skills required for an individual to plan and organize own work in order to meet expected outcome

Scope

The scope covers the following :

- Plan and prepare for work
- Organise required resources as per work plan
- Complete work as per the plan

Elements and Performance Criteria

Plan and prepare for work

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

- PC1.** identify the targets and timelines set by superiors
- PC2.** determine the work requirements corresponding to task(drawings/schedules/instructions/methodology), safety, tools and equipment prior to commencement of task
- PC3.** plan the work by analyzing the required outcomes, work procedures, allotted time, resource availability and known priorities
- PC4.** prepare the work areas in coordination with team members
- PC5.** plan for waste collection and disposal prior to and after completion of work

Organise required resources as per work plan

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

- PC6.** arrange the required manpower prior to commencement of work
- PC7.** organize the required materials, tools and tackles required for the task

Complete work as per the plan

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

- PC8.** engage allocated manpower in an appropriate manner
- PC9.** employ correct tools, tackles and equipment for the desired work
- PC10.** provide guidance to the subordinates to obtain desired outcome
- PC11.** use resources in an optimum manner to avoid any unnecessary wastage
- PC12.** use tools, tackles and equipment carefully to avoid damage
- PC13.** ensure the work processes adopted are in line with the specified standards and instructions
- PC14.** complete the work with the allocated resources within specified time
- PC15.** clean and organise the workplace after completion of task

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:



Qualification Pack



- KU1.** importance of proper housekeeping including safe waste disposal
- KU2.** policies, procedures and work targets set by superiors
- KU3.** how to identify work activities that need to be planned and organized
- KU4.** how to determine the task requirements
- KU5.** how to determine the quality requirements related to the task
- KU6.** how to undertake all aspect of planning and organizing the task, including interpretation of task, reading drawing/schedules, arranging resources, reporting problems etc.
- KU7.** how to implement the planned activities
- KU8.** how to use available resources in a judicious and appropriate manner to minimize wastages or damage

Generic Skills (GS)

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

- GS1.** write in one or more language, preferably the local language at the site
- GS2.** read communication from co-workers, superiors and notices from other departments as per requirement of the level
- GS3.** speak in one or more language, preferably one of the local language at the site
- GS4.** follow communication shared by co-workers regarding standard work processes, resources available, timelines, etc.
- GS5.** communicate effectively with co-workers and subordinates
- GS6.** decide on what sequence is to be adopted for execution of work
- GS7.** plan and organize the materials, tools, tackles and equipment required to execute the work
- GS8.** complete all assigned task with proper planning and organizing
- GS9.** analyze areas of work which could result in a delay of work, wastage of material or damage to tools and tackles
- GS10.** evaluate potential solutions to minimize avoidable delays and wastages at the construction site



Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Plan and prepare for work</i>	9	21	-	-
PC1. identify the targets and timelines set by superiors	-	-	-	-
PC2. determine the work requirements corresponding to task(drawings/schedules/instructions/methodology), safety, tools and equipment prior to commencement of task	-	-	-	-
PC3. plan the work by analyzing the required outcomes, work procedures, allotted time, resource availability and known priorities	-	-	-	-
PC4. prepare the work areas in coordination with team members	-	-	-	-
PC5. plan for waste collection and disposal prior to and after completion of work	-	-	-	-
<i>Organise required resources as per work plan</i>	6	14	-	-
PC6. arrange the required manpower prior to commencement of work	-	-	-	-
PC7. organize the required materials, tools and tackles required for the task	-	-	-	-
<i>Complete work as per the plan</i>	15	35	-	-
PC8. engage allocated manpower in an appropriate manner	-	-	-	-
PC9. employ correct tools, tackles and equipment for the desired work	-	-	-	-
PC10. provide guidance to the subordinates to obtain desired outcome	-	-	-	-
PC11. use resources in an optimum manner to avoid any unnecessary wastage	-	-	-	-
PC12. use tools, tackles and equipment carefully to avoid damage	-	-	-	-
PC13. ensure the work processes adopted are in line with the specified standards and instructions	-	-	-	-



Qualification Pack



Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC14. complete the work with the allocated resources within specified time	-	-	-	-
PC15. clean and organise the workplace after completion of task	-	-	-	-
NOS Total	30	70	-	-



Qualification Pack



National Occupational Standards (NOS) Parameters

NOS Code	CON/N8002
NOS Name	Plan and organize work to meet expected outcomes
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Generic 2
NSQF Level	4
Credits	TBD
Version	5.0
Last Reviewed Date	31/03/2022
Next Review Date	31/03/2025
NSQC Clearance Date	31/03/2022



CON/N9001: Work according to personal health, safety and environment protocols at construction site

Description

This NOS covers the skill and knowledge required for an individual to work according to personal health, safety and environmental protocols at construction site

Scope

The scope covers the following :

- Follow safety norms as defined by organization
- Adopt healthy & safe work practices
- Implement good housekeeping and environment protection process and activities
- Follow infection control guidelines as per applicability

Elements and Performance Criteria

Follow safety norms as defined by the organization

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

- PC1.** identify and report any hazards, risks or breaches in site safety to the appropriate authority
- PC2.** follow emergency and evacuation procedures in case of accidents, fires, natural calamities
- PC3.** follow recommended safe practices in handling construction materials, including chemical and hazardous material whenever applicable
- PC4.** follow all the protocols and safety techniques conveyed during safety awareness programs like Tool Box Talks, safety demonstrations and mock drills conducted at the site
- PC5.** select and operate different types of fire extinguishers corresponding to various types of fires as per EHS guideline
- PC6.** identify near miss, unsafe condition and unsafe act

Adopt healthy & safe work practices

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

- PC7.** use appropriate Personal Protective Equipment (PPE) as per work requirements for : Head Protection, Ear protection, Fall Protection ,Foot Protection, Face and Eye Protection, Hand and Body Protection , and Respiratory Protection (if required)
- PC8.** handle all required tools, tackles, materials and equipment safely
- PC9.** follow safe disposal of waste, harmful and hazardous materials as per EHS guidelines
- PC10.** check and install all safety equipment as per standard guidelines
- PC11.** follow safety protocols and practices as laid down by site EHS department
- PC12.** obtain "height pass" clearance for working at heights

Implement good housekeeping practices

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

- PC13.** collect, segregate and deposit construction waste into appropriate containers based on their toxicity or hazardous nature
- PC14.** apply ergonomic principles wherever required



Follow infection control guidelines as per applicability

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

PC15. follow recommended personal hygiene, workplace hygiene and sanitization practices

PC16. clean and disinfect all materials, tools and supplies before and after use

PC17. report immediately to concerned authorities regarding signs and symptoms of illness of self and others

Knowledge and Understanding (KU)

The individual on the job needs to know and understand:

KU1. reporting procedures in cases of breaches or hazards for site safety, accidents, and emergency situations as per guidelines

KU2. types of safety hazards at construction sites

KU3. basic ergonomic principles as per applicability

KU4. the procedure for responding to accidents and other emergencies at site

KU5. use of appropriate personal protective equipment based on various working conditions

KU6. importance of handling tools, equipment, and materials as per applicable norms

KU7. effect of construction material on health and environments as per applicability

KU8. various environmental protection methods as per applicability

KU9. storage of waste including non-combustible scrap material and debris, combustible scrap material and debris, general construction waste and trash (non-toxic, non-hazardous), any other hazardous wastes and any other flammable wastes at the appropriate location

KU10. how to keep the workplace neat and tidy so as to be safe

KU11. how to use hazardous material in a safe and appropriate manner as per applicability

KU12. types of fire

KU13. procedure of operating different types of fire extinguishers

KU14. safety relevant to tools, tackles, and equipment as per applicability

KU15. housekeeping activities relevant to task

KU16. ways of transmission of infection

KU17. ways to manage infectious risks at the workplace

KU18. different methods of cleaning, disinfection, sterilization, and sanitization

KU19. symptoms of infection like fever, cough, redness, swelling, and inflammation

Generic Skills (GS)

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

GS1. write in at least one language, preferably in the local language of the site

GS2. fill safety formats for near miss, unsafe conditions and safety suggestions

GS3. read in one or more language, preferably in the local language of the site

GS4. speak in one or more language, preferably in one of the local language of the site

GS5. listen to instructions/communication shared by site EHS and superiors regarding site safety, and conducting the toolbox talk



Qualification Pack



- GS6.** identify potential safety risks and report to the appropriate authority
- GS7.** assess and analyze areas which may affect health, safety and environment protocol on the site



Assessment Criteria

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<i>Follow safety norms as defined by the organization</i>	6	14	-	-
PC1. identify and report any hazards, risks or breaches in site safety to the appropriate authority	-	-	-	-
PC2. follow emergency and evacuation procedures in case of accidents, fires, natural calamities	-	-	-	-
PC3. follow recommended safe practices in handling construction materials, including chemical and hazardous material whenever applicable	-	-	-	-
PC4. follow all the protocols and safety techniques conveyed during safety awareness programs like Tool Box Talks, safety demonstrations and mock drills conducted at the site	-	-	-	-
PC5. select and operate different types of fire extinguishers corresponding to various types of fires as per EHS guideline	-	-	-	-
PC6. identify near miss, unsafe condition and unsafe act	-	-	-	-
<i>Adopt healthy & safe work practices</i>	15	35	-	-
PC7. use appropriate Personal Protective Equipment (PPE) as per work requirements for : Head Protection, Ear protection, Fall Protection ,Foot Protection, Face and Eye Protection, Hand and Body Protection , and Respiratory Protection (if required)	-	-	-	-
PC8. handle all required tools, tackles, materials and equipment safely	-	-	-	-
PC9. follow safe disposal of waste, harmful and hazardous materials as per EHS guidelines	-	-	-	-
PC10. check and install all safety equipment as per standard guidelines	-	-	-	-
PC11. follow safety protocols and practices as laid down by site EHS department	-	-	-	-



Qualification Pack



Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
PC12. obtain "height pass" clearance for working at heights	-	-	-	-
<i>Implement good housekeeping practices</i>	6	14	-	-
PC13. collect, segregate and deposit construction waste into appropriate containers based on their toxicity or hazardous nature	-	-	-	-
PC14. apply ergonomic principles wherever required	-	-	-	-
<i>Follow infection control guidelines as per applicability</i>	3	7	-	-
PC15. follow recommended personal hygiene, workplace hygiene and sanitization practices	-	-	-	-
PC16. clean and disinfect all materials, tools and supplies before and after use	-	-	-	-
PC17. report immediately to concerned authorities regarding signs and symptoms of illness of self and others	-	-	-	-
NOS Total	30	70	-	-



National Occupational Standards (NOS) Parameters

NOS Code	CON/N9001
NOS Name	Work according to personal health, safety and environment protocols at construction site
Sector	Construction
Sub-Sector	Real Estate and Infrastructure construction
Occupation	Generic Safety
NSQF Level	4
Credits	TBD
Version	6.0
Last Reviewed Date	31/03/2022
Next Review Date	31/03/2025
NSQC Clearance Date	31/03/2022

Assessment Guidelines and Assessment Weightage

Assessment Guidelines

1. Criteria for assessment for each Qualification Pack will be created by the Sector Skill Council. Each Performance Criteria (PC)/ Elements 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 PC/ Elements.
2. The assessment for the knowledge part will be based on knowledge bank of questions created by Assessment Bodies subject to approval by SSC
3. Individual assessment agencies will create unique question papers for knowledge/theory part for assessment of candidates as per assessment criteria given below
4. Individual assessment agencies will create unique evaluations for skill practical for every student at each examination/training center based on assessment criteria.
5. The passing percentage for each QP will be 70%. To pass the Qualification Pack, every trainee should score a minimum of 70% individually in each NOS.
6. The Assessor shall check the final outcome of the practices while evaluating the steps performed to achieve the final outcome.



Qualification Pack



7. The trainee shall be provided with a chance to repeat the test to correct his procedures in case of improper performance, with a deduction of marks for each iteration.
8. After the certain number of iteration as decided by SSC the trainee is marked as fail, scoring zero marks for the procedure for the practical activity.
9. In case of successfully passing only certain number of NOS's, the trainee is eligible to take subsequent assessment on the balance NOS's to pass the Qualification Pack within the specified time frame set by SSC.
10. Minimum duration of Assessment of each QP shall be of 4hrs/trainee.

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.)

Minimum Passing % at NOS Level: 70

(Please note: A Trainee must score the minimum percentage for each NOS separately as well as on the QP as a whole.)

Assessment Weightage

Compulsory NOS

National Occupational Standards	Theory Marks	Practical Marks	Project Marks	Viva Marks	Total Marks	Weightage
CON/N1124. Interpret drawing specifications and mark layout for facade installation work	30	70	-	-	100	12
CON/N1136. Install semi-unitized/unitized curtain walls	30	70	-	-	100	30
CON/N1137. Install facade for sloped / curved glazing/ spider glazing	30	70	-	-	100	30
CON/N8001. Work effectively in a team to deliver desired results at the workplace	30	70	-	-	100	8



Qualification Pack



National Occupational Standards	Theory Marks	Practical Marks	Project Marks	Viva Marks	Total Marks	Weightage
CON/N8002.Plan and organize work to meet expected outcomes	30	70	-	-	100	8
CON/N9001.Work according to personal health, safety and environment protocols at construction site	30	70	-	-	100	12
Total	180	420	-	-	600	100



Qualification Pack



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.



Qualification Pack



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.