









# **Tractor Operator**

QP Code: AGR/Q1101

Version: 3.0

NSQF Level: 4

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# **AGR/Q1101: Tractor Operator**

#### **Brief Job Description**

A Tractor Operator operates a tractor for various farm operations, uses additional machinery and implements according to the task, and performs basic repair and maintenance to keep the tractor operational.

#### **Personal Attributes**

The individual must be able to work independently and possess problem-solving skills. The person must be physically fit to work in outdoor settings for long hours with an ability to work as per instructions.

#### **Applicable National Occupational Standards (NOS)**

#### **Compulsory NOS:**

- 1. AGR/N1101: Operate tractor for farm operations
- 2. AGR/N1102: Perform regular maintenance and basic repair of tractor
- 3. AGR/N9903: Maintain health and safety at the workplace
- 4. DGT/VSQ/N0102: Employability Skills (60 Hours)

#### **Qualification Pack (QP) Parameters**

Sector	Agriculture
Sub-Sector	Agriculture Crop Production
Occupation	Farm Machinery, Equipment Operation and Maintenance
Country	India
NSQF Level	4
Credits	13
Aligned to NCO/ISCO/ISIC Code	NCO-2015/8341.0101









Minimum Educational Qualification & Experience	OR Completed 2nd year of the 3-year diploma after 10 (and pursuing regular diploma) OR 10th grade pass (plus 2-year NTC) OR 10th grade pass (plus 1-year NTC plus 1 year NAC) OR 8th grade pass with 2 year NTC plus 1 year NAC plus 1 year CITS OR 10th grade pass and pursuing continuous schooling OR 10th grade pass with 2 Years of experience relevant experience OR Previous relevant Qualification of NSQF Level (Level 3.0 with minimum education as 8th Grade pass) with 3 Years of experience relevant experience OR Previous relevant Qualification of NSQF Level (Level 3.5 with 1.5- year relevant experience)
Minimum Level of Education for Training in School	10th Class
Pre-Requisite License or Training	NA
Minimum Job Entry Age	18 Years
Last Reviewed On	NA
Next Review Date	30/04/2025
NSQC Approval Date	30/12/2021
Version	3.0
Reference code on NQR	QG-04-AG-00283-2023-V1.1-ASCI
NQR Version	1.1









### AGR/N1101: Operate tractor for farm operations

#### **Description**

This OS is about performing pre-start checks, preparing and operating a tractor for various farm operations.

#### Scope

The scope covers the following:

- Perform pre-start checks and maintenance
- Make the necessary adjustments
- Operate the tractor to carry out farm operations
- Optimise resource utilisation

#### **Elements and Performance Criteria**

#### Perform pre-start checks and maintenance

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

- PC1. inspect the tractor for any signs of cracks/ damages
- **PC2.** check the engine oil, hydraulic oil, transmission oil, steering box oil, coolant and fuel levels
- **PC3.** inspect for any kind of fluid and oil leakage
- **PC4.** examine the tyres for prescribed air pressure and any cuts or breaks in the tread or sidewalls
- **PC5.** check the tie rod ends, steering spindles, front axle pivot pins, clutch linkages, throttle linkage hand, foot linkage and all hinges for adequate lubrication
- **PC6.** ensure the battery has clean connections, is firmly placed and sufficiently charged for the field operations
- **PC7.** check the fan's drive belt for the recommended level of tension
- **PC8.** test the tractor head and tail lights for functioning as expected
- **PC9.** check nuts, bolts and other parts for the prescribed torque and locking
- **PC10.** test all gauges and controls for correct functioning
- PC11. check the wheel toe-in using a wheel toe gauge to ensure it is as recommended
- **PC12.** carry out repair and maintenance for any issues identified during checks
- PC13. maintain the record of pre-start checks and maintenance

#### Make the necessary adjustments

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

- **PC14.** adjust brake and clutch free play as per the requirement
- **PC15.** adjust wheel toe alignment as per the operator's manual
- **PC16.** adjust the tractor's 3-point linkage

#### Operate the tractor to carry out farm operations

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









- **PC17.** select the appropriate tractor implements according to the task and field conditions and attach them to the tractor to utilise its Power Take-Off (PTO)
- PC18. operate PC and DC levers as per the need and in combination for mixed control / blending
- **PC19.** use ballasting and isolator valve as per the requirements
- **PC20.** engage differential lock to regulate the movement of wheels
- **PC21.** select appropriate gear and engine speed according to the field conditions
- **PC22.** ensure appropriate field conditions for operating the tractor
- PC23. perform primary and secondary tillage
- PC24. level the farmland using tractor
- PC25. perform intercultural operations
- **PC26.** carry out fertilizer side-dressing of crop
- PC27. haul the harvested crop using the tractor
- **PC28.** operate tractor with or without trailer according to the task
- PC29. maintain the prescribed Power Take-Off (PTO) speed

#### Optimise resource utilisation

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

- **PC30.** select the appropriate tractor implements according to the task and field conditions and attach them to the tractor to utilise its Power Take-Off (PTO)
- **PC31.** optimise usage of material including water in various tasks/ activities/ processes
- **PC32.** optimise usage of water/ electricity/energy in various tasks/ activities/ processes
- PC33. plug spills/ leakages and escalate to the appropriate authority if unable to rectify

#### **Knowledge and Understanding (KU)**

The individual on the job needs to know and understand:

- **KU1.** relevant record-keeping requirements in the job role
- **KU2.** various tractor components and their use, such as fuel shut knob, hazard switch, hand throttle, clutch pedal, hydraulic position control lever, hydraulic draft control lever, gear-shaft lever, PTO clutch lever, range shaft lever, etc.
- **KU3.** different implements used with a tractor for various farm operations
- **KU4.** various pre-start checks before operating the tractor
- **KU5.** correct method of attaching and detaching implements
- **KU6.** appropriate field conditions for operating a tractor
- **KU7.** various adjustments required in a tractor for various farm operations
- **KU8.** preparation of the tractor and implements for various farm operations
- **KU9.** appropriate gear, speed and Revolution Per Minute (RPM) of a tractor engine for farm operations
- **KU10.** importance of following environmental and ecological best practice to minimise the impact on the environment
- **KU11.** benefits of resource optimisation
- **KU12.** advantages and use of the tractor's Power take-off (TOP)









- **KU13.** process to measure wheel alignment using a wheel toe gauge
- KU14. correct way of matching the implement hitch with tractor drawbar

#### **Generic Skills (GS)**

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

- **GS1.** write work-related notes and observations
- **GS2.** read the relevant literature to get latest updates about the field of work
- **GS3.** listen attentively to understand the instructions being given
- **GS4.** communicate clearly and politely
- **GS5.** co-ordinate with co-workers to achieve work objectives
- **GS6.** identify problems that may arise in carrying out tasks and take preventive action
- GS7. plan and schedule tasks for effective time-management
- **GS8.** take quick decisions to deal with workplace emergencies/ accidents









### **Assessment Criteria**

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Perform pre-start checks and maintenance	10	15	-	10
<b>PC1.</b> inspect the tractor for any signs of cracks/damages	-	-	-	-
<b>PC2.</b> check the engine oil, hydraulic oil, transmission oil, steering box oil, coolant and fuel levels	-	-	-	-
PC3. inspect for any kind of fluid and oil leakage	-	-	-	-
<b>PC4.</b> examine the tyres for prescribed air pressure and any cuts or breaks in the tread or sidewalls	-	-	-	-
<b>PC5.</b> check the tie rod ends, steering spindles, front axle pivot pins, clutch linkages, throttle linkage hand, foot linkage and all hinges for adequate lubrication	-	-	-	-
<b>PC6.</b> ensure the battery has clean connections, is firmly placed and sufficiently charged for the field operations	-	-	-	-
<b>PC7.</b> check the fan's drive belt for the recommended level of tension	-	-	-	-
<b>PC8.</b> test the tractor head and tail lights for functioning as expected	-	-	-	-
<b>PC9.</b> check nuts, bolts and other parts for the prescribed torque and locking	-	-	-	-
<b>PC10.</b> test all gauges and controls for correct functioning	-	-	-	-
<b>PC11.</b> check the wheel toe-in using a wheel toe gauge to ensure it is as recommended	-	-	-	-
PC12. carry out repair and maintenance for any issues identified during checks	-	-	-	-
<b>PC13.</b> maintain the record of pre-start checks and maintenance	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Make the necessary adjustments	10	10	-	10
<b>PC14.</b> adjust brake and clutch free play as per the requirement	-	-	-	-
PC15. adjust wheel toe alignment as per the operator's manual	-	-	-	-
PC16. adjust the tractor's 3-point linkage	-	-	-	-
Operate the tractor to carry out farm operations	7	10	-	5
<b>PC17.</b> select the appropriate tractor implements according to the task and field conditions and attach them to the tractor to utilise its Power Take-Off (PTO)	-	-	-	-
<b>PC18.</b> operate PC and DC levers as per the need and in combination for mixed control / blending	-	-	-	-
<b>PC19.</b> use ballasting and isolator valve as per the requirements	-	-	-	-
<b>PC20.</b> engage differential lock to regulate the movement of wheels	-	-	-	-
<b>PC21.</b> select appropriate gear and engine speed according to the field conditions	-	-	-	-
<b>PC22.</b> ensure appropriate field conditions for operating the tractor	-	-	-	-
PC23. perform primary and secondary tillage	-	-	-	-
PC24. level the farmland using tractor	-	-	-	-
PC25. perform intercultural operations	-	-	-	-
PC26. carry out fertilizer side-dressing of crop	-	-	-	-
PC27. haul the harvested crop using the tractor	-	-	-	-
PC28. operate tractor with or without trailer according to the task	-	-	-	-
PC29. maintain the prescribed Power Take-Off (PTO) speed	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Optimise resource utilisation	3	5	-	5
<b>PC30.</b> select the appropriate tractor implements according to the task and field conditions and attach them to the tractor to utilise its Power Take-Off (PTO)	-	-	-	-
<b>PC31.</b> optimise usage of material including water in various tasks/ activities/ processes	-	-	-	-
<b>PC32.</b> optimise usage of water/ electricity/energy in various tasks/ activities/ processes	-	-	-	-
<b>PC33.</b> plug spills/ leakages and escalate to the appropriate authority if unable to rectify	-	-	-	-
NOS Total	30	40	-	30









# **National Occupational Standards (NOS) Parameters**

NOS Code	AGR/N1101
NOS Name	Operate tractor for farm operations
Sector	Agriculture
Sub-Sector	Agriculture Crop Production
Occupation	Farm Machinery, Equipment Operation and Maintenance
NSQF Level	4
Credits	5
Version	2.0
Next Review Date	29/09/2026









### AGR/N1102: Perform regular maintenance and basic repair of tractor

#### **Description**

This OS is about performing various types of repair and maintenance activities to keep a tractor in optimal working condition.

#### Scope

The scope covers the following:

- Prepare to carry out repair and maintenance
- Carry out repair and maintenance
- Perform waste management

#### **Elements and Performance Criteria**

#### Prepare to carry out repair and maintenance

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

- **PC1.** identify the repair and maintenance needs of the tractor such as broken nut/bolts, damaged hoses etc.
- **PC2.** organise manufacturer-approved spare parts, tools and equipment to carry out repair and maintenance
- **PC3.** follow the instructions given in the operator's manual to carry out repair and maintenance *Carry out repair and maintenance*

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

- **PC4.** check the engine temperature and oil pressure for the prescribed levels
- **PC5.** check headlights, brake lights, plough lamp, horns and hour meter for correct functioning
- **PC6.** clean or replace the air cleaner filter/ diesel filter/ transmission filter/ hydraulic filter/ power steering filter/ fuel filter as per the maintenance schedule
- **PC7.** refill the engine, transmission, hydraulic, air cleaner and steering oil of the correct grade if these are below the recommended level
- **PC8.** apply the recommended grade of grease/ lubricant on clutch shaft, clutch release bearing, clutch pedal, brake pedal, king pin, tie rod, drag link, pivot pin, bell crank, levelling rod, frontwheel etc. using a grease nipple
- **PC9.** refill distilled water in the battery to maintain the electrolyte level
- PC10. remove carbon from the smoke-tube
- **PC11.** replace the worn-out/ damaged electrical fuses
- **PC12.** adjust the brakes and clutch free play as per the requirement
- **PC13.** apply new seals to fix any leakages
- **PC14.** install new fan belt and tyres if these are worn-out/ damaged
- **PC15.** maintain the record of repair and maintenance

#### Perform waste management

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









- PC16. segregate waste into different categories
- **PC17.** dispose non-recyclable waste appropriately
- **PC18.** deposit recyclable and reusable material at the identified location

#### **Knowledge and Understanding (KU)**

The individual on the job needs to know and understand:

- **KU1.** record-keeping requirements in the job role
- **KU2.** appropriate repair and maintenance tools and equipment and their correct handling
- **KU3.** the importance of using manufacturer-approved tools, equipment and spare parts
- **KU4.** how to detect common faults in a tractor
- **KU5.** maintenance procedure of various tractor parts such as clutch shaft, bearings, brake control, fan bearing, front-wheel, tie-rod, dynamo and starter, headlights, brake lights and horn, etc.
- **KU6.** the correct process to clean or replace air cleaner filter/ diesel filter/ transmission filter/ hydraulic filter/ power steering filter/ fuel filter and electrical fuses in the tractor
- **KU7.** the recommended grade of grease/ lubricant for various tractor parts and the correct way of using a grease nipple
- **KU8.** recommended engine temperature, oil pressure and fan belt tension
- **KU9.** appropriate electrolyte level to be maintained in the tractor's battery
- **KU10.** the correct way of refilling battery with distilled water
- **KU11.** recommended free play for tractor brakes and clutch
- KU12. recommended maintenance schedule for a tractor

#### **Generic Skills (GS)**

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

- **GS1.** prepare work-related notes and records
- **GS2.** read relevant literature to get updated information about the field of work
- **GS3.** communicate clearly and politely
- **GS4.** take appropriate decisions in the interest of business and clients
- **GS5.** identify problems that may arise during operations and take preventive action
- **GS6.** resolve problems through consultation and co-ordination with co-workers
- **GS7.** plan and schedule various activities for the best utilisation of time and resources
- GS8. apply domain knowledge and experience to improve the quality of work









### **Assessment Criteria**

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Prepare to carry out repair and maintenance	15	20	-	10
<b>PC1.</b> identify the repair and maintenance needs of the tractor such as broken nut/bolts, damaged hoses etc.	-	-	-	-
<b>PC2.</b> organise manufacturer-approved spare parts, tools and equipment to carry out repair and maintenance	-	-	-	-
<b>PC3.</b> follow the instructions given in the operator's manual to carry out repair and maintenance	-	-	-	-
Carry out repair and maintenance	5	10	-	10
<b>PC4.</b> check the engine temperature and oil pressure for the prescribed levels	-	-	-	-
<b>PC5.</b> check headlights, brake lights, plough lamp, horns and hour meter for correct functioning	-	-	-	-
<b>PC6.</b> clean or replace the air cleaner filter/ diesel filter/ transmission filter/ hydraulic filter/ power steering filter/ fuel filter as per the maintenance schedule	-	-	-	-
<b>PC7.</b> refill the engine, transmission, hydraulic, air cleaner and steering oil of the correct grade if these are below the recommended level	-	-	-	-
PC8. apply the recommended grade of grease/ lubricant on clutch shaft, clutch release bearing, clutch pedal, brake pedal, king pin, tie rod, drag link, pivot pin, bell crank, levelling rod, front-wheel etc. using a grease nipple	-	-	-	-
<b>PC9.</b> refill distilled water in the battery to maintain the electrolyte level	-	-	-	-
PC10. remove carbon from the smoke-tube	-	-	-	-
PC11. replace the worn-out/ damaged electrical fuses	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<b>PC12.</b> adjust the brakes and clutch free play as per the requirement	-	-	-	-
PC13. apply new seals to fix any leakages	-	-	-	-
PC14. install new fan belt and tyres if these are worn-out/ damaged	-	-	-	-
<b>PC15.</b> maintain the record of repair and maintenance	-	-	-	-
Perform waste management	10	10	-	10
PC16. segregate waste into different categories	-	-	-	-
PC17. dispose non-recyclable waste appropriately	-	-	-	-
<b>PC18.</b> deposit recyclable and reusable material at the identified location	-	-	-	-
NOS Total	30	40	-	30









# **National Occupational Standards (NOS) Parameters**

NOS Code	AGR/N1102
NOS Name	Perform regular maintenance and basic repair of tractor
Sector	Agriculture
Sub-Sector	Agriculture Crop Production
Occupation	Farm Machinery, Equipment Operation and Maintenance
NSQF Level	4
Credits	2
Version	2.0
Next Review Date	29/09/2026









### AGR/N9903: Maintain health and safety at the workplace

#### **Description**

This OS is about maintaining health and safety of self and other co-workers at the workplace

#### Scope

The scope covers the following:

- Maintain personal hygiene
- Maintain clean and safe workplace
- Administer appropriate emergency procedures

#### **Elements and Performance Criteria**

#### Maintain personal hygiene

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

- **PC1.** wash hands, legs and face with soap/alcohol based sanitizer at reasonable intervals
- PC2. wash the worn clothes with soap and sun dry before use next time
- **PC3.** ensure the face is covered with mask or three layers of cloth-piece
- **PC4.** follow the workplace sanitization norms including distancing from sick people

#### Maintain clean and safe workplace

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

- **PC5.** carry out basic safety checks before operation of all tools, implements, and machinery and report identified hazards to the supervisor
- **PC6.** wear appropriate Personal Protective Equipment (PPE) while performing work in accordance with the workplace policy
- **PC7.** follow the instructions mentioned on the labels of chemicals/pesticides/fumigants etc to avoid hazards
- **PC8.** assess risks prior to performing manual handling jobs, and work according to currently recommended safe practices
- **PC9.** sanitize equipment, tools and machinery before and after use
- **PC10.** use equipment and materials safely and correctly and return the same to designated storage after use
- **PC11.** dispose waste safely and correctly in the designated area
- **PC12.** recognize risks to bystanders and take required action to reduce the risks
- **PC13.** work in a manner which minimizes environmental damage, ensuring all procedures and instructions for controlling risks are followed
- **PC14.** report any accidents, incidents or problems without delay to an appropriate person and take necessary immediate action to reduce further danger
- PC15. follow government / workplace advisories incase of outbreak of any disease/disaster

#### Administer appropriate emergency procedures

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









- **PC16.** follow procedures for dealing with accidents, fires and emergencies, including communicating location and directions to the location of emergency, as per the workplace requirements
- **PC17.** use emergency equipment in accordance with manufacturer's specifications and workplace requirements
- **PC18.** provide treatment appropriate to the patient's injuries in accordance with recognized first aid techniques
- **PC19.** recover (if practical), clean, inspect/test, refurbish, replace and store the first aid equipment as appropriate
- PC20. report details of first aid administered in accordance with workplace procedures

#### **Knowledge and Understanding (KU)**

The individual on the job needs to know and understand:

- **KU1.** relevant legislation, standards, policies, and procedures at work
- **KU2.** relevant health and safety requirements applicable to the work environment
- **KU3.** own job role and responsibilities and sources of information pertaining to work
- **KU4.** who to approach for support in order to obtain work related information, clarifications and support
- **KU5.** importance of following health, hygiene, safety and quality standards and the impact of not following the standards on consumers and the business
- **KU6.** personal hygiene and fitness requirement
- **KU7.** importance of sanitization of the workplace
- **KU8.** types of Personal Protective Equipment (PPE) required at the workplace and their importance
- **KU9.** the correct and safe way to use materials and equipment required for the work
- **KU10.** the importance of good housekeeping at the workplace
- **KU11.** safe waste disposal methods
- KU12. methods for minimizing environmental damage during work
- **KU13.** the risks to health and safety including contagious diseases and the measures to be taken to control those risks in the area of work
- **KU14.** workplace procedures and requirements for the prevention and treatment of workplace injuries/illnesses.
- **KU15.** basic emergency first aid procedure
- **KU16.** local emergency services
- **KU17.** why accidents, incidents and problems should be reported and the appropriate actions to be taken

### **Generic Skills (GS)**

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

- **GS1.** record the data as per the requirement
- **GS2.** report problems to the appropriate personnel in a timely manner









- GS3. read instruction manual for hand tool and equipments
- GS4. communicate clearly and effectively with co-workers, and other stakeholders
- **GS5.** comprehend information shared by senior people and experts
- **GS6.** make decisions pertaining to personal hygiene and safety
- GS7. schedule daily activities and draw up priorities
- GS8. manage relationships with co-workers, manager and other stakeholders
- GS9. assess situation and identify appropriate control measures









### **Assessment Criteria**

Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Maintain personal hygiene	10	5	-	10
<b>PC1.</b> wash hands, legs and face with soap/alcohol based sanitizer at reasonable intervals	-	-	-	-
<b>PC2.</b> wash the worn clothes with soap and sun dry before use next time	-	-	-	-
<b>PC3.</b> ensure the face is covered with mask or three layers of cloth-piece	-	-	-	-
<b>PC4.</b> follow the workplace sanitization norms including distancing from sick people	-	-	-	-
Maintain clean and safe workplace	15	15	-	15
<b>PC5.</b> carry out basic safety checks before operation of all tools, implements, and machinery and report identified hazards to the supervisor	-	-	-	-
PC6. wear appropriate Personal Protective Equipment (PPE) while performing work in accordance with the workplace policy	-	-	-	-
<b>PC7.</b> follow the instructions mentioned on the labels of chemicals/pesticides/fumigants etc to avoid hazards	-	-	-	-
<b>PC8.</b> assess risks prior to performing manual handling jobs, and work according to currently recommended safe practices	-	-	-	-
<b>PC9.</b> sanitize equipment, tools and machinery before and after use	-	-	-	-
<b>PC10.</b> use equipment and materials safely and correctly and return the same to designated storage after use	-	-	-	-
<b>PC11.</b> dispose waste safely and correctly in the designated area	-	-	-	-
<b>PC12.</b> recognize risks to bystanders and take required action to reduce the risks	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
<b>PC13.</b> work in a manner which minimizes environmental damage, ensuring all procedures and instructions for controlling risks are followed	-	-	-	-
<b>PC14.</b> report any accidents, incidents or problems without delay to an appropriate person and take necessary immediate action to reduce further danger	-	-	-	-
PC15. follow government / workplace advisories incase of outbreak of any disease/disaster	-	-	-	-
Administer appropriate emergency procedures	15	5	-	10
<b>PC16.</b> follow procedures for dealing with accidents, fires and emergencies, including communicating location and directions to the location of emergency, as per the workplace requirements	-	-	-	-
<b>PC17.</b> use emergency equipment in accordance with manufacturer's specifications and workplace requirements	-	-	-	-
<b>PC18.</b> provide treatment appropriate to the patient's injuries in accordance with recognized first aid techniques	-	-	-	-
<b>PC19.</b> recover (if practical), clean, inspect/test, refurbish, replace and store the first aid equipment as appropriate	-	-	-	-
<b>PC20.</b> report details of first aid administered in accordance with workplace procedures	-	-	-	-
NOS Total	40	25	-	35









# **National Occupational Standards (NOS) Parameters**

NOS Code	AGR/N9903
NOS Name	Maintain health and safety at the workplace
Sector	Agriculture
Sub-Sector	Generic
Occupation	Generic
NSQF Level	4
Credits	1
Version	3.0
Last Reviewed Date	27/08/2024
Next Review Date	27/08/2027
NSQC Clearance Date	27/08/2024









### **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	-	-
<b>PC1.</b> 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	-	-
<b>PC5.</b> recognize the significance of 21st Century Skills for employment	-	-	-	-
<b>PC6.</b> 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	-	-
<b>PC7.</b> use basic English for everyday conversation in different contexts, in person and over the telephone	-	-	-	-
<b>PC8.</b> read and understand routine information, notes, instructions, mails, letters etc. written in English	-	-	-	-
<b>PC9.</b> 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
<b>PC10.</b> understand the difference between job and career	-	-	-	-
<b>PC11.</b> 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	-	-
<b>PC14.</b> 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	-	-
<b>PC16.</b> select financial institutions, products and services as per requirement	-	-	-	-
<b>PC17.</b> carry out offline and online financial transactions, safely and securely	-	-	-	-
<b>PC18.</b> 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	-	-
<b>PC20.</b> 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	-	-	-	-
<b>PC22.</b> use basic features of word processor, spreadsheets, and presentations	-	-	-	-









Assessment Criteria for Outcomes	Theory Marks	Practical Marks	Project Marks	Viva Marks
Entrepreneurship	2	3	-	-
<b>PC23.</b> identify different types of Entrepreneurship and Enterprises and assess opportunities for potential business through research	-	-	-	-
<b>PC24.</b> develop a business plan and a work model, considering the 4Ps of Marketing Product, Price, Place and Promotion	-	-	-	-
<b>PC25.</b> 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	-	-	-	-
<b>PC27.</b> 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)	-	-	-	-
<b>PC30.</b> search for suitable jobs using reliable offline and online sources such as Employment exchange, recruitment agencies, newspapers etc. and job portals, respectively	-	-	-	-
<b>PC31.</b> apply to identified job openings using offline /online methods as per requirement	-	-	-	-
<b>PC32.</b> answer questions politely, with clarity and confidence, during recruitment and selection	-	-	-	-
<b>PC33.</b> 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	18/02/2025
Next Review Date	18/02/2028
NSQC Clearance Date	18/02/2025

### 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) (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 PC.
- 2. The assessment for the theory part will be based on knowledge bank of questions created by the SSC.
- 3. Individual assessment agencies will create unique question papers for theory part for each candidate at each examination/training center (as per assessment criteria below).
- 4. Individual assessment agencies will create unique evaluations for skill practical for every student at each examination/ training center based on these criteria.
- 5. In case of successfully passing only certain number of NOSs, the trainee is eligible to take subsequent assessment on the balance NOS's to pass the Qualification Pack.
- 6. 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
AGR/N1101.Operate tractor for farm operations	30	40	-	30	100	45
AGR/N1102.Perform regular maintenance and basic repair of tractor	30	40	-	30	100	35
AGR/N9903.Maintain health and safety at the workplace	40	25	-	35	100	15
DGT/VSQ/N0102.Employability Skills (60 Hours)	20	30	0	0	50	5
Total	120	135	-	95	350	100









### **Acronyms**

NOS	National Occupational Standard(s)
NSQF	National Skills Qualifications Framework
QP	Qualifications Pack
TVET	Technical and Vocational Education and Training
PwD	Persons with Disabilities
PPE	Personal Protective Equipment
PPE	Personal Protective Equipment









# 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.