Model Curriculum

QP Name: Tropical/Sub-tropical Fruit Grower
(Options: Pomegranate/ Guava/ Ber/ Mango/ Banana/ Citrus Fruits)

QP Code: AGR/ Q0309

QP Version: 2.0

NSQF Level: 4

Model Curriculum Version: 2.0

Agriculture Skill Council of India (ASCI)
6th Floor, GNG building, Plot No.10, Sector-44
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Training Parameters

Sector	AGRICULTURE AND ALLIED
Sub-Sector	Agriculture Crop Production
Occupation	Fruit Crop Cultivation
Country	India
NSQF Level	4
Aligned to NCO/ISCO/ISIC Code	NCO-2015/6111.0800
Minimum Educational Qualification and Experience	Minimum Educational Qualification: 12th grade pass OR Completed 2nd year of 3-year diploma (after 10th) 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 pass plus 2-year NTC plus 1-Year NAC plus CITS OR 10th grade pass and pursuing continuous schooling OR 10th Grade Pass with 2-year relevant experience OR Previous relevant Qualification of NSQF Level 3.0 with minimum education as 8th Grade pass with 3- year relevant experience OR Previous relevant Qualification of NSQF Level 3.5 with 1.5- year relevant experience
Pre-Requisite License or Training	NA
Minimum Job Entry Age	18 years
Last Reviewed On	25-02-2021
Next Review Date	20/11/2025
NSQC Approval Date	25/02/2021
QP Version	2.0
Model Curriculum Creation Date	25-02-2021

Model Curriculum Valid Up to Date	20/11/2025
Model Curriculum Version	2.0
Minimum Duration of the Course	390 Hours
Maximum Duration of the Course	690 Hours

Program Overview

This section summarizes the end objectives of the program along with its duration.

Training Outcomes

At the end of the program, the learner should have acquired the listed knowledge and skills.

- Classify Tropical/sub-tropical fruits grown in India
- Plant a tropical/subtropical fruit plantation/ orchard
- Discuss how to nurture a tropical/subtropical fruit orchard
- Harvest tropical/subtropical fruits
- Discuss the basic entrepreneurial activities for a small enterprise
- Explain the health, hygiene and safety measures at the workplace
- Apply the techniques for pomegranate cultivation
- Apply the techniques for guava cultivation
- Apply the techniques for ber cultivation
- Apply the techniques for mango cultivation
- Apply the techniques for banana cultivation
- Apply the techniques for citrus cultivation

Compulsory Modules

The table lists the modules and their duration corresponding to the Compulsory NOS of the QP.

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
Bridge Module	**05:00**	**00:00**	**00:00**	**00:00**	**05:00**
Module 1: Introduction to the sector and the job	05:00	00:00	00:00	00:00	05:00
AGR/N0347: Prepare for growing tropical/subtropical fruits NOS Version No. 1.0 NSQF Level 4	**15:00**	**10:00**	**00:00**	**00:00**	**25:00**
Module 2: Fruit cultivation fundamentals	03:00	00:00	00:00	00:00	03:00
Module 3: Preparation of site for cultivation	06:00	06:00	00:00	00:00	12:00
Module 4: Preparation of planting material	06:00	04:00	00:00	00:00	10:00
AGR/N0348: Plant a tropical/subtropical fruit in an orchard NOS Version No. 1.0	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

NSQF Level 4					
Module 5: Preparation for planting	04:00	08:00	00:00	00:00	12:00
Module 6: Planting of fruit crop	06:00	12:00	00:00	00:00	18:00
AGR/N0349: Manage operations of a tropical/subtropical fruit orchard **NOS Version No. 1.0** **NSQF Level 4**	**30:00**	**60:00**	**00:00**	**00:00**	**90:00**
Module 7: Protection of crop	06:00	16:00	00:00	00:00	22:00
Module 8: Soil management	06:00	12:00	00:00	00:00	18:00
Module 9: Pruning and training	06:00	10:00	00:00	00:00	16:00
Module 10: Plant health	06:00	14:00	00:00	00:00	20:00
Module 11: Optimum resource utilization	06:00	08:00	00:00	00:00	14:00
AGR/N0309: Manage irrigation for fruit production **NOS Version No. 2.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 12: Irrigation management	10:00	20:00	00:00	00:00	30:00
AGR/N0344: Carry out harvesting and post-harvesting tasks in orchards/plantations **NOS Version No. 1.0** **NSQF Level 3**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 13: Harvesting the fruit plant	04:00	08:00	00:00	00:00	12:00
Module 14: Post-harvest activities for the fruit plant	06:00	12:00	00:00	00:00	18:00
AGR/N9908: Undertake basic entrepreneurial activities for small enterprise **NOS Version No. 2.0** **NSQF Level 4**	**20:00**	**10:00**	**00:00**	**00:00**	**30:00**
Module 15: Basic entrepreneurial activities	20:00	10:00	00:00	00:00	30:00

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N9903: Maintain health and safety at the workplace **NOS Version No. 3.0** **NSQF Level 4**	**20:00**	**10:00**	**00:00**	**00:00**	**30:00**
Module 16: Hygiene and cleanliness	03:00	03:00	00:00	00:00	06:00
Module 17: Safety and emergency procedures	17:00	07:00	00:00	00:00	24:00
DGT/VSQ/N0102 **Employability Skills** **NOS Version-1.0** **NSQF Level-4**	**60:00**	**00:00**	**0:00**	**0:00**	**60:00**
Module 18: Employability Skills	60:00	00:00	0:00	0:00	60:00
Total Duration	**180:00**	**150:00**			**330:00**
OJT: 60 hours					

Optional Modules

The table lists the modules and their duration corresponding to the Optional NOS of the QP.

Option 1:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0350: Grow pomegranate in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 19: Setting up a pomegranate orchard	02:00	04:00	00:00	00:00	06:00
Module 20: Maintaining a pomegranate orchard	04:00	06:00	00:00	00:00	10:00
Module 21: Harvesting and post-harvest activities in a pomegranate orchard	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Option 2:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0351: Grow guava in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 22: Setting up a guava orchard	02:00	04:00	00:00	00:00	06:00
Module 23: Maintaining a guava orchard	04:00	06:00	00:00	00:00	10:00
Module 24: Harvesting and post-harvest activities in a guava crop	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Option 3:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0352: Grow ber in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 25: Setting up a ber orchard	02:00	04:00	00:00	00:00	06:00
Module 26: Maintaining a ber orchard	04:00	06:00	00:00	00:00	10:00
Module 27: Harvesting and post-harvest activities in a ber crop	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Option 4:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0353: Grow mango in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 28: Setting up a mango orchard	02:00	04:00	00:00	00:00	06:00
Module 29: Maintaining a mango orchard	04:00	06:00	00:00	00:00	10:00
Module 30: Harvesting and post-harvest activities in a mango crop	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Option 5:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0354: Grow banana in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 31: Setting up a banana orchard	02:00	04:00	00:00	00:00	06:00
Module 32: Maintaining a banana orchard	04:00	06:00	00:00	00:00	10:00
Module 33: Harvesting and post-harvest activities in a banana crop	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Option 6:

NOS and Module Details	Theory Duration	Practical Duration	On-the-Job Training Duration (Mandatory)	On-the-Job Training Duration (Recommended)	Total Duration
AGR/N0355: Grow citrus in an orchard **NOS Version No. 1.0** **NSQF Level 4**	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**
Module 34: Setting up a citrus orchard	02:00	04:00	00:00	00:00	06:00
Module 35: Maintaining a citrus orchard	04:00	06:00	00:00	00:00	10:00
Module 36: Harvesting and post-harvest activities in a citrus crop	04:00	10:00	00:00	00:00	14:00
Total Duration	**10:00**	**20:00**	**00:00**	**00:00**	**30:00**

Module Details

Module 1: Introduction to the horticulture sector and the job
Bridge Module

Terminal Outcomes:

- Describe the agriculture industry and its various sub-sectors.
- List the career options and key responsibilities of a tropical / sub-tropical fruit grower

Duration: *05:00*	**Duration**: *00:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the agriculture industry and the horticulture sub-sector. - Discuss the career growth opportunities within the horticulture segment of the agriculture industry. - List the key responsibilities of a tropical / sub-tropical fruit grower.	
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Nil	

Module 2: Fruit cultivation fundamentals
Mapped to NOS AGR/N0347 v 1.0

Terminal Outcomes:

- Describe the tropical/sub-tropical fruit crop segment of the horticulture industry.

Duration: *03:00*	Duration: *00:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- List various tropical /sub-tropical fruits grown in India and their common varieties. - List the various agro-climatic zones in India along with the tropical /sub-tropical fruits grown over there. - Explain the criteria for selection of tropical /sub-tropical fruits and their varieties for cultivation. - Describe basics of plant anatomy, morphology, physiology - photosynthesis, respiration, water relations, transpiration.	
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sample walk-in tunnels, natural ventilation greenhouses, poly cum shade house, poly tunnel.	

Module 3: Preparation of site for cultivation
Mapped to NOS AGR/N0347 v 1.0

Terminal Outcomes:

- Prepare site for tropical /sub-tropical fruit growing

Duration: *06:00*	**Duration**: *06:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the site conditions suitable for tropical /sub-tropical fruit growing. - State the agro-climatic conditions suited for growing various tropical /sub-tropical fruit. - List the primary and secondary sources of water. - Explain the importance of the quality of water required for tropical /sub-tropical fruit growing. - Evaluate the risks associated with tropical /sub-tropical fruit growing and the accompanying precautions.	- Analyze the given soil sample to determine the suitability of the soil for growing tropical /sub-tropical fruits. - Evaluate the given tropical /sub-tropical fruit(s) and their variety to check their suitability to local biotic and abiotic situations. - Demonstrate measures that can be taken to make the site suitable for tropical /sub-tropical fruit growing.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Nil	

Module 4: Preparation of planting material
Mapped to NOS AGR/N0347 v 1.0

Terminal Outcomes:

- Prepare planting materials for tropical /sub-tropical fruit growing.

Duration: *6:00*	Duration: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe different types of planting material, viz. seeds, seedling, rootstock, etc. required for growing tropical /sub-tropical fruit. - Explain the advantages and disadvantages of transplanting and direct sowing methods. - Describe the criteria for selecting healthy planting material. - Describe the treatment methods of planting material. - Explain the need and procedure for grafting, budding and inarching of planting materials - Describe appropriate storage methodology for the planting material.	- Segregate healthy and unhealthy planting material from a given sample. - Demonstrate application of pesticides and fungicide to the planting material. - Demonstrate grafting, budding and inarching of planting materials. - Demonstrate storing of the planting material in a safe and hygienic manner
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Tropical /sub-tropical fruit seeds and seedlings, planting material pesticide and fungicide, grafting and budding knives, storage bags for seedlings.	

Module 5: Preparation for planting
Mapped to NOS AGR/N0348 v 1.0

Terminal Outcomes:

- Discuss how to plan for planting a tropical /sub-tropical fruit crop
- Prepare the beds for tropical /sub-tropical fruit planting

Duration: *04:00*	**Duration**: *08:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe various types of tropical/sub-tropical fruit orchards, their land characteristics and planning considerations. - Explain the basic layout for the orchard. - Describe different types of planting system for fruit crop cultivation. - Describe the methods of marking lines, curves and positions onto the land. - Explain how tilth, soil structure, depth of preparation and seasonality and timing of cultivation affect the establishment of plants. - Describe the methods of soil preparation and soil improvement. - Describe the tools and techniques used for land preparation.	- Design a layout of the orchard. - Prepare a sample crop calendar for a specific crop as per the given climatic conditions. - Mark the positions of plants and farm features on field from the plan. - Demonstrate primary cultivation methods such as ploughing, harrowing, digging, etc. - Demonstrate secondary cultivation methods such as hoeing, raking, levelling, consolidation, fertilising and mulching. - Demonstrate the preparation of pits according to the nature of the soil and the size of the fruit trees to be planted - Apply organic and other recommended nutrients to improve the nutrient levels in the soil.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Hoe, rake, sickle, scythe, spade, weeder, mulching materials, fertilizer, organic soil nutrients, rope, tapes, ranging poles/rods, sand, pegs, Personal protective equipment used during cultivation operations e.g. Boots, hat/hard hat, overalls, gloves, protective eyewear, hearing protection, respirator or face mask, sun protection (sun hat, sunscreen).	

Module 6: Planting of fruit crop
Mapped to NOS AGR/N0348 v 1.0

Terminal Outcomes:

- Plant the fruit crop as per the plan

Duration: *06:00*	Duration: *12:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe appropriate planting conditions required for fruit crops. - Describe various tropical /sub-tropical fruit planting systems. - Describe various planting techniques such as using a planting board, using stakes and transplanting. - State permaculture principles for planting. - Explain the importance of planting depth and spacing to achieve the optimum planting density. - Describe the immediate aftercare required by fruit crops post sowing/planting.	- Select the planting material from a given sample that is in an appropriate condition for planting. - Demonstrate the planting of the seeds/planting material as per the plan. - Demonstrate transplantation of seedlings at appropriate time, stage and with appropriate spacing. - Demonstrate aftercare for the new plantings.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Hoe, rake, sickle, scythe, spade, weeder, mulching materials, planting materials like seeds or seedlings, watering can, Personal protective equipment used during cultivation operations e.g. Boots, hat/hard hat, overalls, gloves, protective eyewear, hearing protection, respirator or face mask, sun protection (sun hat, sunscreen).	

Module 7: Protection of crop
Mapped to NOS AGR/N0349 v 1.0

Terminal Outcomes:

- Discuss how to control and prevent potential threats to the plants

Duration: 06:00	Duration: 16:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the basic principles of integrated pest management. - List the potential threats to the health of tropical/sub-tropical fruit plants and trees - Describe various types of weeds that infect the fruit crop during the year. - Describe signs of threats to plant health and the appropriate method of control. - Describe mechanical, chemical, biological and cultural methods for treatment of weeds, pests and diseases. - List the factors to be considered for selection of control and preventive solutions for infestation. - Describe the economic, aesthetic or environmental thresholds for a range of fruit pests, diseases and disorders. - List the banned pesticides & herbicides. - Describe the harmful effects of excessive use of chemicals - Describe the permissible standards of residual pesticides in fruit crops.	- Prepare a checklist for the inspection of the plants and trees for any infestation of pests, disease or disorder. - Prepare a pest calendar for the fruit crop as against different stages of growth and seasons. - Demonstrate safe spraying of pesticides/fungicides/herbicides for effective control of pests/diseases/weeds. - Prepare a sample plan for the implementation of a suitable mix of mechanical, cultural, biological and chemical pest and disease prevention and control strategies. - Demonstrate measures to protect the fruit plant/trees, environment including soil and groundwater while applying treatments.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Weedicide; pesticide; fungicide; sprayers; axe; sickle; weeder; hand gloves; masks; pair of boots; apron.	

Module 8: Soil management
Mapped to NOS AGR/N0349 v 1.0

Terminal Outcomes:

- Identify the macro and micronutrients required for the fruit crops
- Interpret the nutrients requirement from the Soil Health Card
- Apply organic and chemical fertilizer as per the recommended dosage

Duration: 06:00	Duration: 12:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the basic macro and micro-nutrients and their role in plant growth. - Describe the importance of soil testing. - Explain the common causes of nutritional deficiency/ excess and its symptoms. - Describe the concepts of integrated nutrition management system. - Explain the need and process of application of farmyard manure. - Describe the method of preparation of vermicompost. - Explain the recommended dosage and application time of fertilizer for different vegetable crops. - Describe various methods of fertilizer application. - Describe the land use practices that improve the soil organic matter such as crop rotations, manure application, pasture management, tillage practices, etc.	- Demonstrate the method of soil sampling - Calculate the quantity of fertilizers required for a given crop with inputs from the Soil Health Card. - Prepare a sample integrated nutrient management system for a vegetable crop i.e. efficient utilization of chemical fertilizers, use of bio-fertilizers and addition of organic material. - Demonstrate the application of organic and inorganic fertilizer in correct dosage. - Demonstrate land use practices that improve the soil organic matter such as crop rotations, manure application, pasture management, tillage practices, etc - Demonstrate measures to minimize losses of soil, nutrients, and agrochemicals through erosion, runoff and leaching. - Prepare a sample record of the soil health and plant nutrition activities undertaken.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Chemical fertilizers, bio-fertilizers, organic compost, rake, hoe, spade, gloves, mask.	

Module 9: Pruning and training
Mapped to NOS AGR/N0349 v 1.0

Terminal Outcomes:

- Perform pruning and training activities as per requirement of the crop

Duration: *06:00*	Duration: 1*0:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe principles of plant nutrition, growth and development. - Describe tree and branch anatomy and attachments such as lateral branch collars, branch bark ridges, stem bark ridges. - Describe methods used to maintain/ control plant growth. - Explain the reasons for pruning and training, timing of pruning, types of material for removal and tree's response to it. - List the tools, equipment and machinery used in pruning and training. - Describe the method of pruning, positioning of cuts, formative and routine pruning and regenerative pruning. - Describe the importance of plant growth regulators for improving productivity. - List the plant growth regulators and chemicals used for improving productivity. - Explain the need for disposal of plant debris in environmentally aware and sensitive manner.	- Determine the requirement of pruning in the sample fruit trees. - Demonstrate pruning and training of fruit plants/trees using appropriate tools. - Demonstrate application of suitable plant growth regulators and chemicals. - Demonstrate proper disposal and recycling of pruned material.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Shears; long cutters; cutters; loppers; wheelbarrow; secateurs; pruning saws.	

Module 10: Plant health
Mapped to NOS AGR/N0349 v 1.0

Terminal Outcomes:

- Carry out water conservation practices
- Discuss how to rejuvenate old and unproductive orchards

Duration: *06:00*	**Duration**: *14:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the importance of water conservation. - Describe different methods of water conservation. - Describe the need for periodical checking of plants/trees for ensuring their health. - Explain the importance of need based irrigation using suitable irrigation systems like micro-irrigation and fertigation. - Describe techniques to ensure adequate light, shade and temperature as per the requirement for the plants and trees. - Describe the techniques used for the rejuvenation of old/unproductive orchards.	- Demonstrate methods to maximize water infiltration and minimize unproductive outpouring of surface water - Prepare a checklist for the inspection of the plants and trees to ensure their healthy growth - Demonstrate methods to enhance the functioning of the water cycle - Prepare a sample schedule for irrigating the fruit crops using suitable irrigation systems like micro-irrigation and fertigation. - Demonstrate techniques for rejuvenation of the old/unproductive orchards.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Chemical fertilizers, bio-fertilizers, organic compost, rake, hoe, spade, gloves, mask.	

Module 11: Optimum resource utilization
Mapped to NOS AGR/N0349 v 1.0

Terminal Outcomes:

- Describe how to optimize usage of resource/inputs
- Demonstrate how to manage waste effectively

Duration: *06:00*	**Duration**: *08:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- List the different types of resources available at the workplace. - Explain practices for resources conservation including water and electricity in various tasks/activities/processes. - Explain the benefits of resource optimization. - List practices that result in inefficient utilization of resources. - Explain the environment friendly work practices. - Distinguish among recyclable, non-recyclable and hazardous waste at the workplace. - Describe the waste management process and methods of waste disposal.	- Demonstrate different methods of resource conservation at the workplace. - Demonstrate the process of proper cleaning of tools, machines and equipment. - Demonstrate practices for electricity/energy conservation in various tasks/activities/processes. - Demonstrate segregation of waste into different categories. - Demonstrate how to dispose the waste as per the procedure. - Demonstrate how to deposit recyclable and reusable material at identified location.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook	
Tools, Equipment and Other Requirements	
Energy saving devices, Non-recyclable, recyclable and reusable waste	

Module 12: Irrigation management
Mapped to NOS AGR/N0309 v 2.0

Terminal Outcomes:

- Schedule irrigation for the fruit plant
- Irrigate the fruit plant

Duration: *10:00*	Duration: *20:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the importance of water testing - Describe characteristics of good irrigation systems. - Explain different methods of irrigation. - Explain the frequency of irrigation required at various stages of plant growth. - Explain the ill-effects of excess moisture/water content. - Describe importance of spread of water in the root zone. - Describe various types of micro irrigation equipment (misters, drippers, sprinklers, foggers, etc.). - Describe the various moisture measurement equipment. - Describe the fertigation process. - Discuss the purpose, usage and advantages of irrigation practices for specific crops. - Describe Water Use Efficiency (WUE) and how to improve it. - Explain methods that can be adopted for conserving water.	- Calculate the number of days of irrigation required for the sample vegetable crop based on the crop stage. - Prepare sample irrigation schedules by understanding water requirements of the plant and its holding capacity. - Demonstrate preparation of irrigation channels. - Demonstrate working of the micro irrigation systems such as drip irrigation, etc. - Demonstrate the process of fertigation - Demonstrate the use of moisture measurement tools. - Demonstrate water drainage techniques to be adopted in the field.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Micro irrigation system, irrigation equipment, hose, bucket.	

Module 13: Harvesting the fruit plant
Mapped to NOS AGR/N0344 v 1.0

Terminal Outcomes:

- Carry out harvesting activities for the fruit plant

Duration: *04:00*	Duration: *08:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the quality specifications for different types of tropical/sub-tropical fruits. - Explain the importance of planning harvesting activities. - Describe the harvesting tools and picking kit, their usage and care. - Describe relevant harvesting/maturity indices for the specified produce. - Describe harvesting techniques used for various types of orchard/fruits. - Describe personal safety and hygiene procedures required during harvesting. - Describe sorting and grading techniques used during harvesting.	- Prepare a sample harvesting plan to efficiently achieve harvest targets. - Demonstrate the proper use of harvesting tools for efficient harvesting. - Demonstrate the harvesting of the produce in an efficient manner. - Demonstrate preliminary sorting and grading techniques used for tropical/sub-tropical fruits.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 14: Post-harvest activities for the fruit plant
Mapped to NOS AGR/N0344 v 1.0

Terminal Outcomes:

- Carry out post-harvest activities including packing and loading

Duration: *06:00*	Duration: *12:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Explain the importance of weighing harvested produce, methods and accompanying precautions. - Describe the sorting and grading criteria for the harvested produce - Describe the records to maintain for harvest and post-harvest activities. - Describe the types of fruit packing materials and their use. - Describe different types of fruit packing methods. - Describe safe and efficient methods for loading, unloading and stacking of bags/baskets/crates. - Explain the importance of adhering to the loading capacity of transport vehicle.	- Demonstrate the use of weighing machines to weigh the harvested produce accurately. - Demonstrate the sorting and grading of the tropical/sub-tropical fruits based on their quality, colour, size and appearance, etc. - Segregate produce with biological infestation or physical injuries. - Demonstrate different packing methods using different packaging materials - Demonstrate loading, unloading and stacking of bags/baskets/crates in and out of the transport vehicle. - Prepare a sample record for various harvest and post-harvest activities
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 15: Basic entrepreneurial activities
Mapped to NOS AGR/N9908 v 2.0

Terminal Outcomes:

- Explain how to handle accounts and marketing activities
- Discuss how to gather information relevant to sales and marketing

Duration: *20:00*	Duration: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
• Describe how to do basic accounting practices such as calculating expenses incurred, total cost of production etc. • Explain how to determine market value of the produce. • Explain how to determine the demand and supply of produce in the market. • Describe how to identify target customers and assess their needs such as amount required, purpose, quality, expectations, etc. • Explain relevant regulations related to marketing and sale of the produce. • List various trading channels of produce and their margin of profit. • Discuss various subsidies/ funds offered by the Government, authorized state units and other financial institutions involved with the promotion and sale of produce. • Describe strategies for choosing and exploiting marketing channels related to the produce such as retailers, vendors, whole-sellers (mandi), e-trading platforms, related companies, marketing associations, cold storage owners, exporters, etc.	• Prepare a sample market survey report related to the supply and demand of the price, prevailing prices in different markets, etc. • Calculate the cost of production, transportation and marketing of the sample produce. • Prepare the pricing scheme for the produce for different type of buyers. • Collect information related to various subsidies/funds offered by the government, authorized state units and other financial institutions involved with the promotion of the produce. • Demonstrate the method of recording sale and purchase of items in the given format. • Demonstrate the method of recording quantity, quality, date of manufacture and batch number of the sample produce.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Nil	

Module 16: Hygiene and Cleanliness
Mapped to NOS AGR/N9903 v 3.0

Terminal Outcomes:

- Discuss how to adhere to personal hygiene practices
- Demonstrate ways to ensure cleanliness around the workplace

Duration: *03:00*	Duration: *03:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Explain the requirements of personal health, hygiene and fitness at work. - Describe common health related guidelines laid down by the organizations/ Government at the workplace - Explain the importance of good housekeeping at the workplace. - Explain the importance of informing the designated authority on personal health issues related to injuries and infectious diseases.	- Demonstrate personal hygiene practices to be followed at the workplace. - Demonstrate the correct way of washing hands using soap and water, and alcohol based hand rubs. - Demonstrate the steps to follow to put on and take off a mask safely. - Show how to sanitize and disinfect one's work area regularly. - Demonstrate adherence to the workplace sanitization norms. Show how to ensure cleanliness of the work area.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Personal Protective Equipment, cleaning equipment and materials, sanitizer, soap, mask	

Module 17: Safety and Emergency Procedures
Mapped to NOS AGR/N9903 v 3.0

Terminal Outcomes:

- Describe how to adhere to safety guidelines
- Show how to administer appropriate emergency procedures

Duration: *17:00*	Duration: *07:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- List the PPE required at the workplace. - Describe the common reported hazards at the workplace. - Describe the hazards caused due to chemicals/pesticides/fumigants. - Describe the basic safety checks to be done before the operation of any equipment/machinery. - Describe the common first aid procedures to be followed in case of emergencies. - State measures that can be taken to prevent accidents and damage s at the workplace. - Explain the importance of reporting details of first aid administered, to the reporting officer/doctor, in accordance with workplace procedures - State common health and safety guidelines to be followed at the workplace.	- Check various areas of the workplace for leakages, water logging, pests, fire, etc. - Demonstrate how to safely use the PPE and implements as applicable to the workplace. - Display the correct way of donning, doffing and discarding PPE such as face masks, hand gloves, face shields, PPE suits, etc. - Sanitize the tools, equipment and machinery properly. - Demonstrate safe disposal of waste. - Demonstrate procedures for dealing with accidents, fires and emergencies. - Demonstrate emergency procedures to the given workplace requirements. - Demonstrate the use of emergency equipment in accordance with manufacturers' specifications and workplace requirements. - Demonstrate the administration of first aid. - Prepare a list of relevant hotline/ emergency numbers
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Personal protective equipment, first aid kit, equipment used in medical emergencies.	

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Module 18: Employability Skills (60 hours)
Mapped to NOS DGT/VSQ/N0102 v1.0

Duration: 60:00
Key Learning Outcomes

Introduction to Employability Skills Duration: 1.5 Hours
After completing this programme, participants will be able to:
1. Discuss the Employability Skills required for jobs in various industries
2. List different learning and employability related GOI and private portals and their usage

Constitutional values - Citizenship Duration: 1.5 Hours
3. Explain the constitutional values, including civic rights and duties, citizenship, responsibility towards society and personal values and ethics such as honesty, integrity, caring and respecting others that are required to become a responsible citizen
4. Show how to practice different environmentally sustainable practices.

Becoming a Professional in the 21st Century Duration: 2.5 Hours
5. Discuss importance of relevant 21st century skills.
6. Exhibit 21st century skills like Self-Awareness, Behavior Skills, time management, critical and adaptive thinking, problem-solving, creative thinking, social and cultural awareness, emotional awareness, learning to learn etc. in personal or professional life.
7. Describe the benefits of continuous learning.

Basic English Skills Duration: 10 Hours
8. Show how to use basic English sentences for everyday conversation in different contexts, in person and over the telephone
9. Read and interpret text written in basic English
10. Write a short note/paragraph / letter/e -mail using basic English

Career Development & Goal Setting Duration: 2 Hours
11. Create a career development plan with well-defined short- and long-term goals

Communication Skills Duration: 5 Hours
12. Demonstrate how to communicate effectively using verbal and nonverbal communication etiquette.
13. Explain the importance of active listening for effective communication
14. Discuss the significance of working collaboratively with others in a team

Diversity & Inclusion Duration: 2.5 Hours
15. Demonstrate how to behave, communicate, and conduct oneself appropriately with all genders and PwD
16. Discuss the significance of escalating sexual harassment issues as per POSH act.

Financial and Legal Literacy Duration:5 Hours
17. Outline the importance of selecting the right financial institution, product, and service
18. Demonstrate how to carry out offline and online financial transactions, safely and securely
19. List the common components of salary and compute income, expenditure, taxes, investments etc.
20. Discuss the legal rights, laws, and aids

Essential Digital Skills Duration: 10 Hours

21. Describe the role of digital technology in today's life
22. Demonstrate how to operate digital devices and use the associated applications and features, safely and securely
23. Discuss the significance of displaying responsible online behavior while browsing, using various social media platforms, e-mails, etc., safely and securely
24. Create sample word documents, excel sheets and presentations using basic features
25. utilize virtual collaboration tools to work effectively

Entrepreneurship Duration: 7 Hours
26. Explain the types of entrepreneurship and enterprises
27. Discuss how to identify opportunities for potential business, sources of funding and associated financial and legal risks with its mitigation plan
28. Describe the 4Ps of Marketing-Product, Price, Place and Promotion and apply them as per requirement
29. Create a sample business plan, for the selected business opportunity

Customer Service Duration: 5 Hours
30. Describe the significance of analysing different types and needs of customers
31. Explain the significance of identifying customer needs and responding to them in a professional manner.
32. Discuss the significance of maintaining hygiene and dressing appropriately

Getting Ready for apprenticeship & Jobs Duration: 8 Hours
33. Create a professional Curriculum Vitae (CV)
34. Use various offline and online job search sources such as employment exchanges, recruitment agencies, and job portals respectively
35. Discuss the significance of maintaining hygiene and confidence during an interview
36. Perform a mock interview
37. List the steps for searching and registering for apprenticeship opportunities

Module 19: Setting up a pomegranate orchard
Mapped to NOS AGR/N0350 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for pomegranate orchard
- Perform planting for pomegranate fruit

Duration: 02:00	Duration: 04:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the characteristics of the location suitable for the cultivation of pomegranate. - List the disease-resistant and high-yielding varieties of pomegranate that can be grown profitably in the local agro-climatic conditions. - State the appropriate season and conditions for pomegranate crop planting. - Describe different pomegranate planting systems. - Describe the optimum spacing and planting density recommended for the pomegranate orchard.	- Evaluate the suitability of the given soil for growing pomegranate. - Demonstrate land preparation activities required for pomegranate cultivation. - Demonstrate air-layering, hardwood cuttings and micro-propagation techniques for propagation of pomegranate plants. - Demonstrate planting of the pomegranate plants/ trees as per the square system.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Pomegranate crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system; drip irrigation system; hand gloves; masks; pair of boots; apron.	

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Module 20: Maintaining a pomegranate orchard
Mapped to NOS AGR/N0350 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the pomegranate crop
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning and training

Duration: 04:00	Duration: 06:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for pomegranate. - Describe the requirement, preparation and application of manure and fertilizers for pomegranate crop. - List various pomegranate pests and diseases. - Describe various methods to protect pomegranate trees from diseases. - Describe various pomegranate pest-control methods. - Describe the importance of selecting disease resistant varieties of pomegranate plants. - Explain the need for inter-cropping with suitable crops - Describe the importance of pruning and training of pomegranate trees.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the pomegranate crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests such as trichogramma spp.; tetrastichus spp.; telenomus spp.; robber fly, fire ant, ladybird beetle, praying mantis, etc. - Demonstrate application of appropriate herbicide or fungicide to protect the pomegranate crop from common diseases and disorders such as bacterial leaf and fruit spot, leaf and fruit spot, anthracnose, fruit rot & scab, fusarium wilt etc. - Demonstrate pruning of the trees as per the structural pruning system. - Demonstrate training of the pomegranate trees as per the single-stem or multi-stem system. - Demonstrate techniques of rejuvenation of old and senile pomegranate orchards.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.	

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Module 21: Harvesting and post-harvest activities in a pomegranate orchard
Mapped to NOS AGR/N0350 v 1.0

Terminal Outcomes:

- Harvest the pomegranate fruit
- Perform post-harvest activities

Duration: 04:00	Duration: 10:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for the pomegranate. - Describe the pomegranate harvesting schedule and process. - List different markets available for pomegranates in the region. - Describe the pomegranate sorting and grading criteria. - List the measures taken while packing, pomegranates so that they remain fresh and damage free for a long time. - Describe pomegranate storage and transportation requirements to prevent damage and spoilage.	- Demonstrate harvesting of the pomegranate. - Demonstrate collection of the harvested pomegranate in bags. - Demonstrate cleaning, sorting and grading of the harvested pomegranate based on its weight, size, colour, etc. - Demonstrate the storage of the pomegranate fruits in a safe and hygiene manner - Demonstrate measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.

Classroom Aids:
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.

Tools, Equipment and Other Requirements
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.

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Module 22: Setting up a guava orchard
Mapped to NOS AGR/N0351 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for guava orchard
- Perform planting for guava crop

Duration: *02:00*	**Duration**: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the characteristics of the location suitable for the cultivation of guava. - List the disease-resistant and high-yielding varieties of guava that can be grown profitably in the local agro-climatic conditions. - State the appropriate season and conditions for guava crop planting. - Describe different guava planting systems. - Describe the optimum spacing and planting density recommended for the guava orchard.	- Evaluate the suitability of the given soil for growing guava. - Demonstrate land preparation activities required for guava cultivation. - Demonstrate budding, stooling, inarching and air layering for propagation of guava plants. - Demonstrate planting of the guava plants/ trees as per the square system.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Gauva crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system; drip irrigation system; hand gloves; masks; pair of boots; apron.	

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Module 23: Maintaining a guava orchard
Mapped to NOS AGR/N0351 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the guava crop
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning and training

Duration: 04:00	Duration: 06:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for guava. - Describe the requirement, preparation and application of manure and fertilizers for guava crop. - List various guava pests and diseases. - Describe various methods to protect guava trees from diseases. - Describe various guava pest-control methods. - Describe the importance of selecting disease resistant varieties of guava plants. - Explain the need for inter-cropping with suitable crops - Describe the importance of pruning and training of guava trees.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the guava crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests such as fruit fly, stem borer, mealy bug, etc. - Demonstrate application of appropriate herbicide or fungicide to protect the guava crop from common diseases and disorders such as wilt, fruit canker, fruit rot, anthracnose and grey leaf spot etc. - Demonstrate pruning of the trees as per the structural pruning system. - Demonstrate training of the guava trees as per the single-stem or multi-stem system. - Demonstrate techniques of rejuvenation of old and senile guava orchards.

Classroom Aids:

Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.

Tools, Equipment and Other Requirements

Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.

Module 24: Harvesting and post-harvest activities in a guava crop
Mapped to NOS AGR/N0351 v 1.0

Terminal Outcomes:

- Harvest the guava fruit
- Perform post-harvest activities

Duration: *04:00*	**Duration**: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for guava. - Describe the guava harvesting schedule and process. - List different markets available for guavas in the region. - Describe the guava sorting and grading process. - List the measures taken while packing, guavas so that they remain fresh and damage free for a long time. - Describe guava storage and transportation requirements to prevent damage and spoilage.	- Demonstrate harvesting of guava. - Demonstrate collection of the harvested guava in bags/baskets. - Demonstrate cleaning, sorting and grading of the harvested guava based on its weight, size, colour, etc. - Demonstrate the storage of the guava fruits in a safe and hygiene manner - Demonstrate measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 25: Setting up a ber orchard
Mapped to NOS AGR/N0352 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for ber orchard
- Perform planting for ber crop

Duration: *02:00*	Duration: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the characteristics of the location suitable for the cultivation of ber. - List the disease-resistant and high-yielding varieties of ber that can be grown profitably in the local agro-climatic conditions. - State the appropriate season and conditions for ber crop planting. - Describe different ber planting systems. - Describe the optimum spacing and planting density recommended for the ber orchard.	- Evaluate the suitability of the given soil for growing ber. - Demonstrate land preparation activities required for ber cultivation. - Demonstrate 'I' or 'T' (shield) budding methods for propagation of ber plants. - Demonstrate planting of the ber plants/ trees as per the square system.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Ber crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system, drip irrigation system; hand gloves; masks; pair of boots; apron.	

Module 26: Maintaining a ber orchard
Mapped to NOS AGR/N0352 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the guava crop
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning and training

Duration: *04:00*	Duration: *06:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for ber. - Describe the requirement, preparation and application of manure and fertilizers for ber crop. - List various ber pests and diseases. - Describe various methods to protect ber trees from diseases. - Describe various ber pest-control methods. - Describe the importance of selecting disease resistant varieties of ber plants. - Explain the need for inter-cropping with suitable crops. - Describe the importance of pruning and training of ber trees.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the ber crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests and diseases such as fruit fly, fruit borer, powdery mildew, leaf spot, etc. - Demonstrate pruning of the trees. - Demonstrate training of the ber trees. - Demonstrate techniques of rejuvenation of old and senile ber orchards.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.	

Module 27: Harvesting and post-harvest activities in a ber crop
Mapped to NOS AGR/N0352 v 1.0

Terminal Outcomes:

- Harvest the ber fruit
- Perform post-harvest activities

Duration: *04:00*	**Duration**: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for ber. - Describe the ber harvesting schedule and process. - List different markets available for ber in the region. - Describe the ber sorting and grading process. - List the measures taken while packing ber so that they remain fresh and damage free for a long time. - Describe ber storage and transportation requirements to prevent damage and spoilage.	- Demonstrate harvesting of ber. - Demonstrate collection of the harvested ber in bags. - Demonstrate cleaning, sorting and grading of the harvested ber based on its size, colour, etc. - Demonstrate the storage of the ber fruits in a safe and hygiene manner - Demonstrate measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 28: Setting up a mango orchard
Mapped to NOS AGR/N0353 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for mango orchard
- Perform planting for mango crop

Duration: *02:00*	Duration: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
• Describe the characteristics of the location suitable for the cultivation of mango. • List the disease-resistant and high-yielding varieties of mango that can be grown profitably in the local agro-climatic conditions. • State the appropriate season and conditions for mango crop planting. • Describe different mango planting systems. • Describe the optimum spacing and planting density recommended for the mango orchard.	• Evaluate the suitability of the given soil for growing mango. • Demonstrate land preparation activities required for mango cultivation. • Demonstrate veneer grafting, inarching and epicotyl grafting for propagation of mango plants. • Demonstrate planting of the mango plants/ trees as per the square system.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Mango crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system, drip irrigation system; hand gloves; masks; pair of boots; apron.	

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Module 29: Maintaining a mango orchard
Mapped to NOS AGR/N0353 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the mango crop
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning and training

Duration: *04:00*	**Duration**: *06:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for mango. - Describe the requirement, preparation and application of manure and fertilizers for mango crop. - List various mango pests and diseases. - Describe various methods to protect mango trees from diseases. - Describe various mango pest-control methods. - Describe the importance of selecting disease resistant varieties of mango plants. - Describe the special problems occurring in mango trees. - Explain the need for inter-cropping with suitable crops - Describe the importance of pruning and training of mango trees.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the mango crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests such as mealy bug, fruit fly, scale insects, etc - Demonstrate application of appropriate herbicide or fungicide to protect the mango crop from common diseases and disorders such as powdery mildew, anthracnose, die back, blight, etc. - Demonstrate management of special problems occurring in mango, viz. fruit drop, biennial bearing, mango malformation, leaf scorch, etc - Demonstrate pruning and training of the mango trees. - Demonstrate techniques of rejuvenation of old and senile mango orchards.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.	

Module 30: Harvesting and post-harvest activities in a mango crop
Mapped to NOS AGR/N0353 v 1.0

Terminal Outcomes:

- Harvest the mango fruit
- Perform post-harvest activities

Duration: *04:00*	Duration: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for the mango. - List different markets available for mango in the region. - Describe the mango harvesting schedule and process. - Describe the need for de-sapping treatment to be given to the harvested produce. - Describe the mango sorting and grading process. - List the measures taken while packing mango so that they remain fresh and damage free for a long time. - Describe mango storage and transportation requirements to prevent damage and spoilage.	- Demonstrate harvesting of the mango. - Demonstrate collection of the harvested mango in bags/basket - Demonstrate de-sapping treatment given immediately after harvest - Demonstrate cleaning, sorting and grading of the harvested mango based on its weight, size, colour, etc. - Demonstrate the storage of the mango fruits in a safe and hygiene manner - Demonstrate measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 31: Setting up a banana orchard
Mapped to NOS AGR/N0354 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for banana orchard
- Perform planting of the banana suckers/tissue cultured seedlings

Duration: *02:00*	Duration: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
• Describe the characteristics of the location suitable for the cultivation of banana. • List the disease-resistant and high-yielding varieties of banana that can be grown profitably in the local agro-climatic conditions. • State the appropriate season and conditions for banana crop planting. • Describe different banana planting systems. • Describe the optimum spacing and planting density recommended for the banana orchard.	• Evaluate the suitability of the given soil for growing banana. • Demonstrate land preparation activities required for banana cultivation. • Demonstrate propagation of banana plants through suckers • Demonstrate planting of the banana suckers/tissue cultured seedlings as per the pit and furrow method. • Demonstrate installation of props to support the banana plants.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Banana crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system, drip irrigation system; hand gloves; masks; pair of boots; apron.	

Module 32: Maintaining a banana orchard
Mapped to NOS AGR/N0354 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the banana crop
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning

Duration: *04:00*	**Duration**: *06:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for banana. - Describe the requirement, preparation and application of manure and fertilizers for banana crop. - List various banana pests and diseases. - Describe various methods to protect banana trees from diseases. - Describe various banana pest-control methods. - Describe the importance of selecting disease resistant varieties of banana plants. - Explain the need for inter-cropping with suitable crops - Describe the importance of pruning of banana suckers.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the banana crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests such as root stock/rhizome weevil, stem borer, thrips, banana beetle, banana aphid, nematodes etc. - Demonstrate application of appropriate herbicide or fungicide to protect the banana crop from common diseases and disorders such as panama wilt, anthracnose, leaf spot, shoot rot, viral diseases, etc. - Demonstrate pruning of the banana suckers

Classroom Aids:
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.

Tools, Equipment and Other Requirements
Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.

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Module 33: Harvesting and post-harvest activities in a banana crop
Mapped to NOS AGR/N0354 v 1.0

Terminal Outcomes:

- Harvest banana bunches
- Perform post-harvest activities

Duration: *04:00*	**Duration**: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for the banana. - Describe the banana harvesting schedule and process. - List different markets available for bananas in the region. - Describe the banana sorting and grading process. - List the measures taken while packing, bananas so that they remain fresh and damage free for a long time. - Describe banana storage and transportation requirements to prevent damage and spoilage.	- Demonstrate harvesting of the banana. - Demonstrate cleaning, sorting and grading of the harvested banana based on its length, girth, colour and maturity. - Demonstrate the storage of the banana fruits in a safe and hygiene manner - Demonstrate measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Module 34: Setting up a citrus orchard
Mapped to NOS AGR/N0355 v 1.0

Terminal Outcomes:

- Describe how to prepare the land for citrus orchard
- Perform planting for citrus crop

Duration: *02:00*	**Duration**: *04:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the characteristics of the location suitable for the cultivation of citrus fruits. - List the disease-resistant and high-yielding varieties of citrus fruits that can be grown profitably in the local agro-climatic conditions. - State the appropriate season and conditions for citrus fruit planting. - Describe the optimum spacing and planting density recommended for the citrus orchard.	- Evaluate the suitability of the given soil for growing citrus fruits. - Demonstrate land preparation activities required for citrus cultivation. - Demonstrate T-budding for vegetative propagation of citrus plants. - Demonstrate transplanting the citrus seedlings, maintaining the recommended spacing.

Classroom Aids:

Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.

Tools, Equipment and Other Requirements

Citrus crop seedlings; seedling tray; trowel; rake; polybags; hand cutter; long cutter; watering can; sprinkler system; drip irrigation system; hand gloves; masks; pair of boots; apron.

Module 35: Maintaining a citrus orchard
Mapped to NOS AGR/N0355 v 1.0

Terminal Outcomes:

- Apply fertilizer as per the requirement
- Irrigate the citrus plants/trees
- Explain ways to protect the crop from weeds, pests and diseases infestation
- Perform pruning and training

Duration: 04:00	Duration: 06:00
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe irrigation best practices for citrus trees. - Describe the requirement, preparation and application of manure and fertilizers for citrus crop. - List various citrus pests and diseases. - Describe various methods to protect citrus trees from diseases. - Describe various citrus pest-control methods. - Describe the importance of selecting disease resistant varieties of citrus plants. - Explain the need for inter-cropping with suitable crops. - Describe the importance of pruning and training of citrus trees.	- Demonstrate the application of fertilizer in the recommended quantity. - Demonstrate drip irrigation as per the irrigation schedule recommended for the citrus crop. - Demonstrate application of suitable pesticide or foliage spray or organic methods to protect the crops from various pests such as citrus black fly, citrus psylla, citrus leaf miner, citrus aphids, thrips, etc. - Demonstrate application of appropriate herbicide or fungicide to protect the citrus crop from common diseases and disorders such as twig blight, gummosis, damping off, root and collar rot, etc. - Demonstrate pruning of the citrus trees. - Demonstrate training of the citrus trees. - Demonstrate techniques of rejuvenation of old and senile citrus orchards.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Mulching materials, sprayer, fertilizers, bio-fertilizers, weeding machine, sickle, spade, pesticides, traps, gloves, masks, boots, micro irrigation system, hose, bucket.	

Module 36: Harvesting and post-harvest activities in a citrus crop
Mapped to NOS AGR/N0355 v 1.0

Terminal Outcomes:

- Harvest the citrus fruit
- Perform post-harvest activities

Duration: *04:00*	Duration: *10:00*
Theory – Key Learning Outcomes	**Practical – Key Learning Outcomes**
- Describe the maturity/harvesting indices for the citrus fruits. - Describe the harvesting schedule and process for citrus fruits. - List different markets available for citrus fruits in the region. - Describe the sorting and grading process for citrus fruits. - List the measures taken while packing, citrus fruits so that they remain fresh and damage free for a long time. - Describe the storage and transportation requirements for citrus fruits to prevent damage and spoilage.	- Demonstrate harvesting of the citrus fruits. - Demonstrate collection of the harvested citrus in bags/baskets. - Demonstrate sorting and grading of the citrus fruits based on its weight, size, colour, etc. - Demonstrate the storage of the citrus fruits in a safe and hygiene manner - Demonstrate the measures taken while packing, storing and transporting to ensure that the produce is not damaged or spoiled.
Classroom Aids:	
Computer, Projection Equipment, PowerPoint Presentation and software, Facilitator's Guide, Participant's Handbook.	
Tools, Equipment and Other Requirements	
Sickle, knife, picking shears, storage bags, wooden or plastic bulk bins and boxes, weighing machine, sealing machine.	

Annexure

Trainer Requirements

Trainer Prerequisites						
Minimum Educational Qualification	**Specialization**	**Relevant Industry Experience**		**Training Experience**		**Remarks**
		Years	*Specialization*	*Years*	*Specialization*	
Diploma	Diploma in Agriculture/Horticulture	3	Agriculture Crop Production	0		Ex-Service-Man including Ex-Paramilitary personnel: Minimum Qualification is 10+2 with an Honorable Discharge/Pension. SSC would consider a relaxation/waiver of sector specific experience on case to case basis.
Graduate	Graduate	2	Agriculture Crop Production	0		For school Program minimum qualification of Trainer should be Graduate. Their Teaching experience will be considered industry experience
Graduate	Graduate (Agriculture / Horticulture/ Forestry)	1	Agriculture Crop Production	0		
Post Graduate	Agriculture / Horticulture	0.5	Agriculture Crop Production			

Trainer Certification	
Domain Certification	**Platform Certification**
Certified for Job Role: "Tropical/Sub-Tropical Fruit Grower" mapped to QP: "AGR/Q0309, v2.0". Minimum accepted score is 80%	Recommended that the Trainer is certified for the Job Role: "Trainer (Vet and Skills)", mapped to the Qualification Pack: "MEP/Q2601, v2.0". Minimum accepted scoreas per MEPSC guidelines is 80%.

Assessor Requirements

Assessor Prerequisites					
Minimum Educationall Qualification	Specialization	Relevant Industry Experience		Training/Assessment Experience		Remarks
		Years	Specialization	Years	Specialization	
Graduation	B.Sc. (Horticulture/Pomology Agri culture/Botany/Forestry/ and related streams)	5	In Pomoculture	0		Practical skills and knowledge required in cultivation practices of tropical/subtropical fruits
Post- graduation	M.Sc. (Pomology/Horticulture/Agri culture/Botany/Forestry/and related streams)	2	In Pomoculture	0		Practical skills and knowledge required in cultivation practices of tropical/subtropical fruits
PhD	PhD (Horticulture/Agriculture/ Pomology/Botany/Forestry/ and related streams)	1	In Pomoculture	0		Practical skills and knowledge required in cultivation practices of tropical/subtropical fruits

Assessor Certification	
Domain Certification	Platform Certification
Certified for Job Role: "Tropical/Sub-Tropical Fruit Grower" mapped to QP: "AGR/Q0309, v2.0". Minimum accepted score is 80%	Certified for the Job Role: "Assessor (Vet and Skills)", mappedto the Qualification Pack: "MEP/Q2701, 2.0" with minimum score of 80%.

Assessment Strategy

Assessment System Overview

In Agriculture Sector it is of ultimate importance that individuals dealing with crop production or livestock have the requisite knowledge and competencies to undertake the task. Based on the Assessment Criteria, SSC in association with empaneled AAs, define the test structure for the given job roles to cover the required skills and competencies. Assessment strategy consists of the following:

1. <u>Multiple Choice Questions</u>: To assess basic knowledge (Objective/Subjective)
2. <u>Viva:</u> To assess awareness on processes (Oral and/or written questioning)
3. <u>Practical:</u> To evaluate skills and identify competencies. (Observation)

Assessments for knowledge and awareness on processes may be conducted through 'real time' internet based evaluation or by conducting the same 'offline' through TABs. Skills and competencies are to be assessed by conducting 'practical' on ground through qualified and ToA certified assessors.

While it is important that an individual has adequate knowledge and skills to perform a specific task, weight age for different aspects for assessment are given as follows:

- Multiple Choice Questions: 20%-30%, depending on the specific QP
- Viva: 20%
- Practical: 50% - 60% (Involves demonstrations of applications and presentations of procedures/tasks and other components)

Assessment will be carried out by certified assessors through empaneled assessment partners. Based on the results of assessment; ASCI will certify the learners/candidates

Testing Environment

Assessments are conducted on laptops, Mobiles and android tablets via both offline and online mode depending on the internet connectivity at assessment location.

In remote locations/villages, assessments get delivered through tablets without the requirement of Internet.

- Multilingual assessments (ASCI is conducting assessments in 13 + languages pan India)
- Rubric driven assessments in Practical/Viva sections and responses recorded accordingly
- All responses, data, records and feedback stored digitally on cloud
- Advanced auto-proctoring features – photographs, time-stamp, geographic-tagging, toggle-screen/copy-paste disabled, etc.
- Android based monitoring system
- End to end process from allocation of a batch to final result upload, there is no manual intervention
- Assessment will normally be fixed for a day after the end date of training / within 7 days of completion of training.

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- Assessment will be conducted at the training venue
- Room where assessment is conducted will be set with proper seating arrangements with enough space to curb copying or other unethical activities
- Question bank of theory and practical will be prepared by ASCI /assessment agency and approved ASCI. Only from approved Question Bank assessment agency will prepare the question paper. Theory testing will include multiple choice questions, pictorial question, etc. which will test the trainee on his theoretical knowledge of the subject.
- The theory, practical and viva assessments will be carried out on same day. In case of more number of candidates, number of assessors and venue facilitation be increased and facilitated

Assessment			
Assessment Type	Formative or Summative	Strategies	Examples
Theory	Summative	MCQ/Written exam	Knowledge of facts related to the job role and functions. Understanding of principles and concepts related to the job role and functions
Practical	Summative	Structured tasks/Demonstration	Practical application /Demonstration /Application tasks
Viva	Summative	Questioning and Probing	Mock interviews on usability of job roles/advantages /importance of adherence to procedures. Viva will be used to gauge trainee's confidence and correct knowledge in handling job situation

The question paper pre-loaded in the computer /Tablet and it will be in the language as requested by the training partner.

Assessment Quality Assurance framework
Assessment Framework and Design:

Based on the Assessment Criteria, SSC in association with AAs will define the test structure for the given roles to cover the required skills and competencies. ASCI offer a bouquet of tools for multi-dimensional evaluation of candidates covering language, cognitive skills, behavioral traits and domain knowledge.

Theoretical Knowledge - Item constructs and types are determined by theoretical understanding of the testing objectives and published research about the item-types and constructs that have shown statistical validity towards measuring the construct. Test item types which have been reported to be coachable are not included. Based on these, items are developed by domain experts. They are provided with comprehensive guidelines of testing objectives of each question and other quality measures.

Type – Questions based on Knowledge Required, Case-based practical scenario questions and automated simulation based questions.

Practical Skills - The practical assessments are developed taking into consideration two aspects: what practical tasks is the candidate expected to perform on the job and what aspects of the job cannot be judged through theoretical assessments. The candidates shall be asked to perform either an entire task or a set of subtasks depending on the nature of the job role

Type – Standardized rubrics for evaluation against set of tasks in a demo/practical task

Viva Voce - Those practical tasks which cannot be performed due to time or resource constraints are evaluated through the viva mode. Practical tasks are backed up with Viva for thorough assessment and complete evaluation

Type – Procedural questions, do's and don'ts, subjective questions to check understanding of practical tasks.

Assessor has to go through orientation program organized by Assessment Agency. The training would give an overview to the assessors on the overall framework of QP evaluation. Assessor shall be given a NOS and PC level overview of each QP as applicable. Overall structure of assessment and objectivity of the marking scheme will be explained to them. The giving of marks will be driven by an objective framework which will maintain standardization of marking scheme.

Type of Evidence and Evidence Gathering Protocol:

During the assessment the evidences collected by AAs and ASCI are:

- Geo Tagging to track ongoing assessment
- AA's coordinator emails the list of documents and evidences (photos and videos) to the assessor one day prior to the assessment. List is mentioned below:
    - Signed Attendance sheet
    - Assessor feedback sheet
    - Candidate feedback sheet
    - Assessment checklist for assessor
    - Candidate Aadhar/ID card verification
    - Pictures of classroom, labs to check the availability of adequate equipment's and tool to conduct the training and assessment
    - Pictures and videos of Assessment, training feedback and infrastructure.
- Apart from the Assessor, Technical assistant popularly known as Proctor also ensures the proper documentation and they verify each other's tasks.
- To validate their work on the day of assessment, regular calls and video calls are done.
- On-boarding and training of assessor and proctor is done on timely basis to ensure that quality of the assessment should be maintained.
- Training covers the understanding of QP, NSQF level, NOS and assessment structure

Methods of Validation

- <u>Morning Check (Pre-Assessment)</u>: Backend team of AA calls and confirms assessor/technical

SPOC event status. Assessor/Technical SPOC are instructed to reach the centre on time by 9:30 AM / as decided with TC and delay should be highlighted to the Training Partner in advance.

- Video Calls: Random video calls are made to the technical SPOC/assessor so as to keep check on assessment quality and ensure assessment is carried out in fair and transparent manner
- Aadhar verification of candidates
- Evening Check (Post Assessment): Calls are made to the ground team to ensure event is over by what time and the documentation is done in proper manner or not.
- TP Calling: To keep check on malpractice activity, independent audit team calls to TP on recorded line to take confirmation if there was any malpractice activity observed in assessment on part of AA/SSC team. If calls are not connected, email is send to TP SPOC for taking their confirmation
- Video and Picture Evidence: Backend team collects video and pictures for assessment on real time basis and highlights any issue like, Students sitting idle/trainer allowed for helping out candidates during assessment.
- Surprise Visit: Time to time SSC/AA Audit team can visit the assessment location and do surprise audit for assessment process carried out by ground team.
- Geo Tagging: On day of assessment, each technical SPOC is required to login in our internal app which is Geo tagged. Any deviation with centre address needs to be highlighted to assessment team on real-time basis.

Method for assessment documentation, archiving, and Access:
- ASCI has fully automated result generation process in association with multiple AAs
- Theory, Practical and Viva marks forms the basis of the results and encrypted files generated to avoid data manipulation. All responses captured and stored in System with Time-Stamps at the end of AAs and SSC. NOS-wise and PC-wise scores can be generated.
- Maker Checker concept: 1 person prepares results and other audit result which is internally approved by AA at first and then gets vetted at the end of SSC
- All soft copy of documents is received from the on-ground tech team over mail. The same are downloaded by our internal backend team and saved in Repository. The repository consists of scheme wise folders. These scheme wise folders have job role specific folders. These specific folders have Year wise and Month wise folders where all documents are saved in Batch specific folders. All Hard copies are filed and stored in storeroom.

Result Review & Recheck Mechanism –
- Time stamped assessment logs
- Answer/Endorsement sheets for each candidate
- Attendance Sheet
- Feedback Forms: Assessor feedback form, Candidate feedback form, TP feedback form
- The results for each of the candidate shall be stored and available for review (retained for 5 years/ till conclusion of project or scheme)

References

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 that together specify the technical, generic, professional and organisational specific knowledge that an individual need 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.

Acronyms and Abbreviations

AGR	Agriculture
NOS	National Occupational Standard (s)
NSQF	National Skills Qualifications Framework
OJT	On-the-job Training
QP	Qualifications Pack
PwD	People with Disability
PPE	Personal Protective Equipment