

# Maldives National Skills Development Authority



# National Competency Standard for Gardening and Landscaping

Standard Code: FNA-04L4-V2-24

**Qualification Name: National Certificate IV in Gardening and Landscaping** 

#### FOREWORD

The pivotal role of the Maldives National Skills Development Authority (MNSDA) in meticulously implementing and expanding Technical and Vocational Education & Training (TVET) exemplifies the steadfast commitment of the Maldives to build a skilled and resilient workforce. This commitment is evident from the strategic formulation of National Standards and the establishment of a comprehensive framework for training and certification.

Under the Higher Education and Training Act 7/2021, the MNSDA assumes an instrumental role, reflecting the government's unwavering dedication to streamlining TVET policies and procedures. This includes the establishment of a robust system for accrediting and registering both Institution Based Training (IBT) and Employer Based Training (EBT) providers. The MNSDA's active involvement in conducting the National Apprenticeship Program (NAP), National Trade Testing and Certification (NTTC), and the issuance of National Certificates reflects a comprehensive approach to ensure elevated quality standards and competency within the workforce.

The National Competency Standards (NCS) revised through the Maldives Enhancing Employability and Resilience of Youth (MEERY) project accentuates the commitment to updating and sustaining contemporary skill sets aligned precisely with industry demands. Deliberate efforts to revise existing NCS, coupled with the development of curriculum, teaching materials, resource books, and logbooks, attest to our dedication to ensuring the ongoing relevance and currency of the TVET system in the Maldives.

The active engagement of Technical Panels and Employment Sector Councils in the NCS development and approval process, coupled with alignment to the Maldives National Qualification Framework (MNQF) and accreditation by the Maldives Qualifications Authority (MQA), certifies that the TVET system not only remains highly responsive but also ensures the quality standards demanded by industries. This approach enables the system to effectively meet the diverse needs of industries and adapt to the evolving economic landscape.

The collaborative development of the National Certificate IV Gardening and Landscaping by the MNSDA, MEERY, and the Maldives Institute of Technology exemplifies the practical implementation of TVET initiatives. This training package represents a critical stride towards addressing the requisite skills while fostering opportunities to integrate sustainable economic development within the TVET framework.

Dr. Zahra Mohamed Chief Executive Officer Maldives National Skills Development Authority

	EMPLOYMENT SECTOR COUNCILS					
#	Name	Designation	Organisation			
01	Dr.Hussain Sinan	Director	Ministry of Fisheries and Ocean Resources			
02	Ali Amir	Director	Ministry of Agriculture and Animal Welfare			
03	Musthafa Abdul Gafoor	Senior Policy Officer	Ministry of Economic Development & Trade			
04	Mifrah Naseem	General Manager- Sales and Marketing	MIFCO			
05	Dr. Ahmed Riyaz Jauharee	Dean	College of Fisheries and Ocean Sciences, Maldives National University			
06	Adnan Ali	Industry Expert	-			
07	Maizan Ahmed Manik	Industry Expert	-			
08	Aishath Shazleena	HR Manager	Agro National Corporation Ltd (AgroNat)			
09	Shakeeba Ali	Director General	Maldives National Skills Development Authority			
National Occupational Standard has been endorsed by:						

Dr. Ahmed Riyaz Jauharee

Chairperson

Fisheries and Agriculture Sector Council

Maldives National Skills Development Authority

Umar Zahir Office Building, 5th Floor,

Orchidmaa Hingun, HulhuMale', Republic of Maldives

Date of Endorsement: 17.07.2024

	TECHNICAL SUPPORT				
#	Name	Designation	Organisation		
01					
02					

	TECHNICAL PANEL MEMBERS					
#	Name	Designation	Organisation			
01	Gasith Mohamed	Partnership Specialist	UNOPS			
02	Mohamed Rihwan	Assistant Director	Ministry of Fisheries and Agriculture			
03	Ahmed Afrah	Industry Expert				
04	Adam Adeel	Agronomist	Agro National Corporation			
05	Ibrahim Sharmeel	Assistant Manager	Housing Development Corporation			

VERSION	DEVELOPER	DATE	STANDARD CODE
V2	Maldives Institute of Technilogy	10/07/2024	FNA-04L4-V2-24

## **Standard Review Process**

To begin with, Gardening and Landscaping occupation competencies were profiled through study of the occupations across the Maldivian workplaces aligned to the principles of "Functional Analysis", a methodology used for reviewing Competency Standards. Referred occupational profiling process compared existing competency units incorporated within the National Competency Standard of Level IV in Gardening and Landscaping program.

Draft Review of the occupational standard is then compiled and submitted to the Technical Panel (TP) organised by the Maldives National Skills Development Authority (MNSDA). The Draft Standard is then edited based on comments from TP members under the direct observation of MNSDA. With series of reviewing and editings, TP approved standard is then tabled at Employment Sector Council (ESC) meeting for endorsement.

All the Standards of MNSDA are endorsed from the ESC before being published on its website.

### Description of "Gardening and Landscaping"

The National Certificate IV in Gardening and Landscaping is a comprehensive program designed to impart fundamental skills and knowledge in the dynamic field of gardening. This course is structured to equip individuals with essential competencies needed for proficient gardening techniques. Participants will delve into practical insights, emphasising key methods and practices essential for creating beautiful garden landscapes with precision.

This certification empowers participants to gain hands-on experience in plant selection, propagation, cultivation, and landscaping, ensuring they develop the expertise necessary for success in the everevolving realm of gardening and given the varied site characteristics in gardening and landscaping, conducting a thorough site analysis is a fundamental aim of this program.

# Recommended changes to the existing National Certificate IV in Gardening and Landscaping Standard

The changes proposed by the Technical Panel (TP) for National Certificate IV in Gardening and Landscaping Standard aim to synchronise the curriculum with contemporary industry benchmarks. These revisions are intended to ensure that the program aligns seamlessly with current standards and practices prevalent within the gardening sector.

# Job opportunities upon completion of "National Certificate IV in Gardening and Landscaping"

Upon successful completion of the National Certificate IV in Gardening and Landscaping and Landscaping students can work in the following jobs.

- 1. Head Gardener
- 2. Greenhouse Manager
- 3. Park Maintenance Officer
- 4. Landscaping Supervisor

# **KEY FOR CODING**

# **Coding Competency Standards and Related Materials**

DESCRIPTION	REPRESENTED BY
	Construction Sector (CON) Fisheries and Agriculture (FNA)
	Information, Communication and Technology (ICT)
Industry Sector as per ESC (Three letters)	Transport Sector (TRN)
	Tourism Sector(TOU)
	Social Sector (SOC)
	Foundation (FOU)
Standard Number - Occupation with in an industry sector	Two digits 01-99
Common Competency	СМ
Core Competency	CC
Unit Number - Occupation with in an Standard	Three digits 01-99
MNQF level of qualification	L1, L2, L3, L4 etc.
Version Number	V1, V2 etc.
Separator	-
Year of Last Review of standard, qualification	Two digits responding to the year of
Tear of Last Neview of standard, quantication	last review, example 23 for the year 2023
Qualification Code	Refers to Sandard code in cover page

	1. Endorsement Appli	ication for Qualifica	tion 01	
2. NATION	AL CERTIFICATE IV IN GARDEN	NING AND LANDSCA	APING	
3. Qualific	cation code: FNA-04L4-V2-24	Total Number of	Credits: 170	
The qualification	e of the qualification ation aims is to equip learners with the en projects effectively, and address comp			
5. Regulat	ions for the qualification	Gardening and Lan those who are	-9+10+11+12+13+14+15+16+	
6. Schedul	e of Units			
Unit No.	Unit Title		Code	
Common C	Competencies			
01	Participate in sustainable work pra	actices	FNA-01-CM07-V2-24	
02	Enhance customer service experie	ence	FNA-01-CM08-V2-24	
03	Lead and manage people		FNA-01-CM09-V2-24	
04	Manage business operations		FNA-04-CM01-V2-24	
05	Apply work ethics and manage di workplace	versity in the	FNA-01-CM10-V2-24	
Core Com	petencies			
06	Understand principles of turf and	plant nutrition	FNA-04-CC19-V2-24	
07	Perform specialist amenity prunin	g	FNA-04-CC20-V2-24	
08	Implement a propagation plan		FNA-04-CC21-V2-24	
09	Implement a plant nutrition progra	am	FNA-04-CC22-V2-24	
10	Provide information on plants and	l cultivation methods	FNA-04-CC23-V2-24	
11	Conduct operational inspection of	park facilities	FNA-04-CC24-V2-24	
12	Understand agriculture and garder regulations	ning rules and	FNA-04-CC25-V2-24	
13	Implement hydroponic gardening	techniques	FNA-04-CC26-V2-24	
14	Undertake floriculture manageme	nt	FNA-04-CC27-V2-24	
15	Develop a soil health and plant nu	itrition program	FNA-04-CC28-V2-24	
16	Plan and implement a chemical us		FNA-04-CC29-V2-24	
17	Supervise maintenance of propert equipment	y, machinery and	FNA-04-CC30-V2-24	

18	Design plant displays	FNA-04-CC31-V2-24			
19	Implement a pest management	FNA-04-CC32-V2-24			
20	Develop a sports turf maintenar	nce program	FNA-04-CC33-V2-24		
21	Plan the implementation of reve	egetation works	FNA-04-CC34-V2-24		
22	Manage organic soil improvement		FNA-04-CC35-V2-24		
23	Implement the pest monitoring and evaluation plan		FNA-04-CC36-V2-24		
24	Sample soils and interpret results		FNA-04-CC37-V2-24		
25	Plan and implement sports turf	renovation	FNA-04-CC38-V2-24		
7. Accreditation requirements		The training provider should have made arrangements to ensure students are provided with adequate theory and practicals for them to develop all the required knowledge and skills stipulated in the National Competency Standard.			
8. Recommended sequencing of units		As appearing under th	e section 06		

# Unit Details

Unit No.	Unit Title	Code	Level	No. of credits	Credit hours	Contact hours
01	Participate in sustainable work practices	FNA-01-CM07-V2-24	IV	04	40	20
02	Enhance customer service experience	FNA-01-CM08-V2-24	IV	10	100	50
03	Lead and manage people	FNA-01-CM09-V2-24	IV	10	100	50
04	Manage business operations	FNA-04-CM01-V2-24	IV	06	60	30
05	Apply work ethics and manage diversity in the workplace	FNA-01-CM10-V2-24	IV	15	150	75
06	Understand principles of turf and plant nutrition	FNA-04-CC19-V2-24	IV	05	50	25
07	Perform specialist amenity pruning	FNA-04-CC20-V2-24	IV	06	60	30
08	Implement a propagation plan	FNA-04-CC21-V2-24	IV	08	80	40
09	Implement a plant nutrition program	FNA-04-CC22-V2-24	IV	08	80	40
10	Provide information on plants and cultivation methods	FNA-04-CC23-V2-24	IV	06	60	30
11	Conduct operational inspection of park facilities	FNA-04-CC24-V2-24	IV	06	60	30
12	Understand agriculture and gardening rules and regulations	FNA-04-CC25-V2-24	III	03	30	15
13	Implement hydroponic gardening techniques	FNA-04-CC26-V2-24	III	03	30	15
14	Undertake floriculture management	FNA-04-CC27-V2-24	IV	06	60	30
15	Develop a soil health and plant nutrition program	FNA-04-CC28-V2-24	IV	08	80	40
16	Plan and implement a chemical use program	FNA-04-CC29-V2-24	IV	08	80	40
17	Supervise maintenance of property, machinery and equipment	FNA-04-CC30-V2-24	IV	06	60	30
18	Design plant displays	FNA-04-CC31-V2-24	IV	04	40	20
19	Implement a pest management plan	FNA-04-CC32-V2-24	IV	08	80	40
20	Develop a sports turf maintenance program	FNA-04-CC33-V2-24	IV	08	80	40

21	Plan the implementation of revegetation works	FNA-04-CC34-V2-24	IV	04	40	20
22	Manage organic soil improvement	FNA-04-CC35-V2-24	IV	06	60	30
23	Implement the pest monitoring and evaluation plan	FNA-04-CC36-V2-24	IV	08	80	40
24	Sample soils and interpret results	FNA-04-CC37-V2-24	IV	06	60	30
25	Plan and implement sports turf renovation	FNA-04-CC38-V2-24	IV	08	80	40
	Total			170	1700	850

### **Packaging of National Qualifications:**

National Certificate IV in Gardening and Landscaping will be awarded to those who are competent in units 1+2+3+4+5+6+7+8+9+10+11+12+13+14+15+16+17+18+19+20+21+22+23+24+25Qualification Code: FNA-04L4-V2-24

# **COMPETENCY BASED ASSESSMENT**

The final assessment of the National Competency-Based Programmes conducted by the Maldives National Skills Development Authority (MNSDA) is a competency-based assessment.

The Competency-Based Assessment ensures that the students' performance meets the requirements specified in the National Competency Standards (NCS). This assessment approach is designed to verify that graduates are job-ready and meet established occupational competency requirements within their respective fields.

### **Eligibility for Final Assessment**

To be eligible for the final Competency-Based Assessment, students must fulfil the following conditions:

- achieve a **minimum of 80%** attendance
- deemed competent in each of the units of the programme in the pre-assessment

#### **Competency-Based Assessment Process**

Upon submission of the Pre-assessment report by the training provider, MNSDA will check for all the necessary supporting documents and conduct Competency-Based Assessment through a National Assessor registered with MNSDA. It is important to note that any trainer involved in the training process is **not permitted** to conduct the assessment to maintain impartiality and integrity of the process.

The final Competency-Based Assessment conducted by MNSDA includes both:

- **Theory**: Evaluating students' knowledge and understanding of key theoretical aspects of the competency.
- **Practical:** Assessing hands-on skills and application of knowledge in real-world or simulated environments.

Once the assessment is completed, the National Assessor will send the Competency-Based Assessment Report to MNSDA.

#### **Competency Status Requirement**

For certification to be granted, the student must be officially declared **"Competent"** in each of the units of the programme by the National Assessor.

#### Conclusion

Competency-Based Assessment is a critical component in ensuring the quality and credibility of technical and vocational skills-based training. By adhering to the outlined procedure, MNSDA upholds the standards required to certify students who are fully prepared to meet industry demands.