مجلس أبـــوظبـي للـجـودة والـمـطابـــقـة
ABU DHABI QUALITY & CONFORMITY COUNCIL

ABU DHABI OCCUPATIONAL TERMS

Plumber Team Leader – Level 4

22 NOVEMBER 2018
FIRST EDITION

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Amendment Page

This Amendment Page is updated and issued with each set of revised and/or new pages of the document to help ensure that each copy of this Abu Dhabi Occupation Term (ADOT) contains a complete record of amendments.

This Occupational Term is a live document which can be amended when necessary. QCC can review stakeholder comments in order to review and amend this document; ultimately resulting in an issuance of an updated version, if necessary.

Log of Amendments						
Amendment			Discard		Insert	
No.	Date	*Sections Changed	Page(s)	Issue No.	Page(s)	Issue No.

About the Abu Dhabi Quality & Conformity Council

The Abu Dhabi Quality and Conformity Council (QCC) were established by law No. 3 of 2009, issued by His Highness Sheikh Khalifa Bin Zayed Al Nahyan, President of the UAE. QCC is responsible for the development of Abu Dhabi Emirate's Quality Infrastructure, which enables industry and regulators to ensure that products, systems and personnel can be tested and certified to UAE and International Standards.

Products and services certified by QCC receive the Abu Dhabi Trustmark. The Trustmark is designed to communicate that a product or system conforms to various safety and performance standards that are set by Abu Dhabi regulators.

Foreword

The QCC, along with relative stakeholders, had developed occupational terms for 21 unique occupations in the construction sector. This was required because of a high dependence on migrant labour to fill key technical roles in the skilled trades and concerns about the productivity of the industry where skills investment is inconsistent.

The occupational terms are professional standards that personnel must meet in order to perform the jobs they are assigned to produce quality outcomes. The Government of Abu Dhabi, under the leadership of His Highness Sheikh Khalifa bin Zayed Al Nahyan, President of the UAE and Ruler of Abu Dhabi, and His Highness Sheikh Mohamed bin Zayed Al Nahyan, Crown Prince of Abu Dhabi, Deputy Supreme Commander of the UAE Armed Forces and Chairman of the Abu Dhabi Executive Council, has invested heavily, and at high levels of professionalism and safety, in the Infrastructure of Abu Dhabi. Therefore, it is crucial and obligatory to encourage the presence of skilled workmanship to maintain the quality infrastructure value in the Emirate of Abu Dhabi in particular and the United Arab Emirates in general.

Acknowledgments

The QCC would like to thank the members of the working group listed below:

Sr.	Name	Entity
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Introduction

- Qualification Pack - Plumber Team Leader
- Brief description of Job – A plumber team leader is an important job role in plumbing works that cater as a mentor for the plumbers and a resource person to implement the work strategy under plumbing Supervisor.
- Personal attributes – A plumber team leader should be a good team player who have thorough knowledge in installation and maintenance of plumbing equipment including but not limited to different types of plumbing pipes, valves, accessories and fixtures.

Duties and responsibilities	To lead a team of level 3 and level 2 plumbers to install and maintain the plumbing installation activities on construction sites and required maintenance workers under foreman and supervisors.
Min. qualification	High School Diploma/ An Industrial training institute certification (ITI) or who have 3 years of work experience as level 3 plumber.
Training **(Suggested but not mandatory)**	On the job training for 6 months.
Work Experience	In line with min qualification he should have a total of 5 years of Plumbing work experience among 3 years should be as level 3 plumber.
Performance criteria	As described in relevant chapters

Occupational Terms

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No.	Field	Details		
8.	Grading	**Application unit**: *Competent/Not Yet Competent*		
9.	Industry sector	Construction & Maintenance		
10.	Developed by	Know How	Government Entities	Abu Dhabi Quality & Conformity Council
11.	Endorsement date	TBD		
12.	Frequency of review	2 Years		
13.	Version No.	0		
14.	ISCO-08	7126 Plumber and pipe fitters		

Key terms

Term	Description
Personal Protective Equipment (PPE)	Items that construction workers can use to protect themselves against hazards. PPE includes but not limited to gloves, safety helmet, eye protection, face protection, foot protection and appropriate clothing.
Risk	Risk is the product of the measure of the likelihood of occurrence of an undesired event and the potential adverse consequences which this event may have upon: · People – injury or harm to physical or psychological health · Environment – water, air, soil, animals, plants and social Risk = frequency x consequences
Hazard	Any substance, physical effect, or condition with potential to harm people, property or the environment.
OSHA	Occupational Safety & Health Administration
OSHAD	Abu Dhabi occupational safety and health center
Building diagram	A technical drawing of a structure or building that is drawn in a scale that is proportionate to its real-world dimensions. Building drawings include site plans, floor plans, elevations and sections. Drawings that provide additional specific/specialist details are known as Coordination Drawings.
Work instructions	Written or verbal description of the work to be undertaken by an individual or work team.
Contamination	An impairment of the quality of the potable water that creates an actual hazard to the public health through poisoning or through spread of disease by sewage, industrial fluids, or waste.
Drain	Any pipe that carriers waste or waterborne waste in a building drainage system
Grey Water	Untreated waste water that has come into contact with toilet waste, kitchen waste, or similar contaminated sources. It includes waste
Hot Water	Water at temperature exceeding or equal to 50 °C
Horizontal Pipe	Any pipe or fitting that is installed in a horizontal position or which makes an angle of less than 45 degrees with the horizontal
Hydrostatic	Pressure exerted by liquids at test
Install	Place or fix equipment or an item in position ready for use
Invert	The lowest portion of the inside of a horizontal pipe
Joints, Fusion Welding	A jointing method of plastic pipe and fittings by melting using heat alone, the surface of the parts to be joined together to form a union
Joints, Solvent	A jointing method by the process of fusing the materials of plastic pipe and fittings together by dissolving the surfaces to be joined with a solvent, cleaner or both and placing the softened surfaces together to cure

Pipe	A cylindrical conduit used for potable water distribution
Piping Specialties (Potable)	Common devices installed in potable water system other than pipes and fittings that serve a specific purpose such as water hammer arrestor, backflow preventers, and pressure reducing valves.
Piping Specialties (Sanitary Wastewater)	Common devices installed in potable water system other than pipes and fittings that serve a specific purpose such as water hammer arrestor, backflow preventers, and pressure reducing valves.
Plumbing Fixture	A receptacle or device that is connected to a water system or discharges to a drainage system or both. Such receptacle or devices require a supply of water; or require a supply of water and discharge waste to a drainage system. Plumbing Fixture for this standard refers to wash basin, kitchen sink, bathtubs, showerheads, urinals, & water closet
Plumbing System	Refers to potable water system, potable water distribution pipes, plumbing fixtures, sanitary waste water system, sanitary wastewater pipes and fitting, water heaters, & pumps
Potable Water	Water that is satisfactory for drinking, culinary, and domestic purposes and that meets the requirements of the Health Authority Having Jurisdiction
Pressure	Normal force exerted by a fluid per unit area OR The normal force exerted by a homogenous liquid or gas, per unit of area, on the wall of container
Pressure Test	A test following the installation of new equipment/piping system or modification of existing equipment/piping system where the equipment/piping system is placed under pressure to ensure that it will not leak
Sanitary Wastewater	Drainage system in building consisting only of soil, waste, and vent of building. It is liquid and water-borne waste derived from the ordinary living processes, free from industrial wastes, and of such character as to permit satisfactory disposal, without special treatment, into the public sewer.
Stack	The vertical main of a system of soil, waste, or vent piping extending through one or more stories
Supports	Hanger, and anchors are devices for properly supporting and securing pipe, fixtures, and equipment
Trap	A fitting or device so designed and constructed as to provide, when properly vented, a liquid seal that will prevent the back passage of air without materially affecting the flow of wastewater through it
Vent	Any pipe provided to ventilate a plumbing system, to prevent trap siphonage and back pressure, or to equalize the air pressure within the drainage system
WMS	Work method statement

Performance Criteria

Element1: Installation of basic sanitary fixtures, fittings, piping and accessories

Scope	• Use of tools, machines and materials • Installation & maintenance
Performance Criteria (PC) w.r.t. the Scope	
Element	**Performance Criteria**
Use of tools, machines and materials	To be competent, the user/individual on the job must be able to: PC1. identify tools, materials, equipment and procedures required for each plumbing services PC2. thorough knowledge of techniques and usage related to tools, machines and materials PC3. ability to understand various types of defects in tools and equipment and its remedy PC4. knowledge of measurement units and basic plumbing terminology
Installation & maintenance	PC5. thorough knowledge of the task to be done following the appropriate WMS PC6. ability to establish the sequence of pipe and fittings installation and maintenance PC7. knowledge of workmanship required for each activity PC8. good technical knowledge related to the final outcome of levels required in piping and fixtures PC9. thorough knowledge of uniform plumbing code of Abu Dhabi and other international plumbing codes applicable for assigned work activities PC10. knowledge of workplace quality procedures to deal with installation and maintenance process and adhere to 5S and TPM guidelines PC.11. leads troubleshooting efforts and repairs steam and water distribution systems

Element2: Resource management (Manpower, Material and Tools)

Scope	Manpower management • workforce planning and work assignment related activities Material and tools management
Performance Criteria (PC) w.r.t. the Scope	
Element	**Performance Criteria**
Manpower management	To be competent, the user/individual on the job must be able to: PC1. knowledge of scheduling and assigning day to day activities to plumbers PC2. overall supervision of plumbing work at the site under supervisor PC3. management of manpower at the time of change orders and emergency breakdowns
Material and tools management	PC4. knowledge of tracking material usage at all stage of work PC5. aid in obtaining materials necessary to complete the job PC6. management of material/tools in cases of change of schedule/plan PC7. maintain plumbing tools and equipment

Element3: Inspection and quality check of basic plumbing systems

Scope	Preparatory site inspection Work-in-progress and completion related inspection • It covers inspection of all the systems for required functioning Quality check • Ensure quality in all installations and connections
Performance Criteria (PC) w.r.t. the Scope	
Element	**Performance Criteria**
Preparatory site inspection	To be competent, the user/individual on the job must be able to: PC1. expertise of assessing completion of work and its quality as per standards PC2. ability to verify field measurements as per drawings / site requirements PC3. understanding of quality standards of relevant materials PC4. identify any non-conformances to the requirements for the work/task to begin
Work-in-progress and completion related inspection	PC5. ability to ensure fittings and fixtures are installed as per the layout and drawings PC6. inspect all the systems for required functioning PC7. deep understanding and usage of quality standards in inspection of pipe lines and fixtures

Element4: Review and communicate designs and plans related to plumbing work and follow all maintenance procedures

Scope	Review and communicate designs and plans • study of designs and plans in context of specifications of the site and communicate the work plan to work supervisors of the respective teams Interaction with senior • receive work instructions, discuss task status and receive feedback Maintenance • Implementing and following the maintenance procedures required for the smooth running of plumbing services
Performance Criteria (PC) w.r.t. the Scope	
Element	**Performance Criteria**
Review and communicate designs and plan	To be competent, the user/individual on the job must be able to: PC1. understand the prepared design PC2. checking plans, building diagrams, drawings and quantities for accuracy of calculations PC3. capability of validating the designs, ensuring that designs meet the site's requirement and communicate within team if discrepancy found.
Interaction with senior	PC4. receive work instructions and raw materials from reporting senior PC5. communicate to reporting senior about task status, repairs and maintenance of tools and equipment as required PC6. communicate any potential hazards and expected process disruptions PC7. Handing over knowledge of completed task to reporting senior PC8. receive feedback from reporting senior

	PC9. report any anticipated reasons for delays
Maintenance	PC10. Should be capable of doing the following maintenance activities/procedures and managing his/her team to do so. **Plumbing & drainage -Sanitary Fittings** **a. Weekly** 1) Check all sanitary fitting for leaks to water services, connections and dripping taps. 2) Make sure that all fittings are in good condition, replace damage fitting as required. **b. Quarterly** 1) Check waste water pipes for leaks and water flows. Clean and flush when required. 2) Clean all urinals and trap and flush. Check customs operation and timing. Water discharge pipe work should be removed and sterilized in a chlorine solution, thoroughly raised and re-assembled. 3) Visually check WC flushing units. Check for pan leaks and working condition, repair/replace flushing mechanism if required. **c. Annually** 1) Clean tap spray nozzles and any in—line strainers. 2) Flush hot taps to check temperature of water delivered meets 55-60 deg Celsius within one minute. 3) Flush cold taps to check temperature of water delivered meet less than 20 deg Celsius within one minute. 4) Ensure all shower heads are operated and flushed through with hot water at 60 deg Celsius regularly. 5) Check the functionality of water heaters, repair/replace units as required. **Plumbing & drainage-Sewage and Drainage** **a. Annually** 1) Inspect the manholes, covers; gully traps and sewage lines. 2) Check the masonry works inside the manholes, gully traps and repair if they are damaged. 3) Check all sewage line and connecting lines, remove all dirt and debris from sewage line. Use high pressure water to clean and flush the sewage line. 4) Check, repair damaged manholes; gully traps. 5) Check all services manholes, paint the cover sand frame with black enamel epoxy paint. Mark the drains as per the as built drawings. 6) Grease the manholes; clear the manholes and gully traps of any impediments to open the cover. 7) Check and clean the drainage lines Gulley traps. 8) Flush the entire sewage system. **Potable Water pipe work/Drain pipe work / Vent Pipe/ Rain water Pipe/Soil Pipe** **a. Half yearly** 1)Inspect for any water leakage 2) Inspect support framework. Repair if damaged.

	3) Check pipes for corrosion and if found necessary wire brush to clean metal and paint with an approved anti-corrosion paint system. 4) Check all insulated pipes for insulation and repair if found worn out or damaged insulation. 5) Repair all pipes and related fixtures if found broken damaged or leaking. 6) Report any abnormalities. **Potable Water Tank (Fresh Water)** **a. Monthly** 1) Check for visible signs of water leakage. 2) Check installation generally for leaks, loose brackets or any abnormalities. **b. Quarterly** 1) Perform monthly services. 2) Check condition and proper operation of float valve. 3) Check the water supply pipe, overflow pipe and drain to ensure no choking and proper functioning. 4) Grease the exposed valve spindles to avoid rust development. 5) Operate the isolation valves once to ensure freedom of movement and complete isolation when the valve is being closed. 6) Check air vent and over flow pipe for clogging. 7) Check the water level controller and alarm device (if any), confirm smooth operation of such devices at all times. 8) Repair and rectify any part found faulty or leaking or damaged. **Annually** 1) Perform Quarterly services 2) Remove rust from the tank casing and re-paint afterwards. Paint internally, as required, with approved nontoxic paint. 3) Checking the inside reinforcement parts for missing or loose bolts, tightens any loose bolt or fit a new bolt as required. Since over tightening may cause water leak, make sure to tighten the bolt as per required pressure. 4) Water sampling and test analysis, testing to be done by third party duly approved by government authority, result of such test to be forwarded for clients review. **Water Pumps(Freshwater)** **a. Weekly** 1) Check for pump vibrations and pay attention to abnormal noise generated. 2) Track the motor starting current and report any abnormalities. 3) Note the running current and observe any abnormal changes to the figures. 4) Check and re—tighten any loose bolt and nuts in proper sequence. 5) Check condition of gland for excessive wear, repair and replace if required. 6) Check for normal operation of the check value. 7) Adjust pump packing if installed to reduce water leakage. 8) Check the pump bearing, and oil or grease and clean if necessary. 9) Check for the proper operation of the associated control and safety device, reset if

	required. 10) Clean the water strainer of flush water system if installed. 11) Measure and record major operational parameters, including current, water in and out pressure, etc. 12) Inspect pump casing, supporting framework, starter panel and control panel for corrosion and if found necessary, wire brush to clean metal and paint with an approved anti-corrosion paint system. 13) Grease the vibration isolators if necessary. 14) Submit report including recommendations for any improvement works. **b. Monthly** 1) Perform monthly services. 2) When the equipment is stationary, operate the isolation valves once to ensure freedom of movement and complete isolation when the valve is being closed. 3) Remove the grease of the vibration isolator and reapply afterwards. 4) Check all wiring terminals for tightness and condition of electrical components to ensure functioning properly. 5) Lubricate and clean pump and motor bearings. 6) Check alignment between motor and pump. 7) Use infra-red thermometer if available to check the motor bearing temperature for excessive than generation. 8) Use infra-red thermometer if available to check the electrical joints to ensure good contacts. 9) Measurement of the insulation resistance of motors, wiring and associated electrical equipment. 10) Submission of a written report on the condition of the plant incorporating the above observations. 11) Perform quarterly services. **c. Annually** 1) Submission of written report on the condition of the plant incorporating the above observations. 2) Perform annually maintenance services.

Element5: Maintain a healthy, safe and secure working environment

Scope	**Ensuring healthy, safe and secure working environment:** • self-monitor and adhere to safety principles and standards • ensure behavioral safety by workmen to good building maintaining practices and applicable safety standards on the buildings • report any identified breaches in health, safety, and security policies and procedures to the designated person **Managing emergency procedures**: • illness • accidents

	• fires • other reasons to evacuate the premises • breaches of security
Performance Criteria (PC) w.r.t. the Scope	
Element	**Performance Criteria**
Ensuring healthy, safe and secure working environment	To be competent, the user/individual on the job must be able to: PC1. observe and comply with the company's current health, safety and security policies and procedures PC2. while carrying out work, use appropriate safety gears (PPE) like head gear, masks, gloves and other accessories as mentioned in the guidelines PC3. report any identified breaches in health, safety, and security policies and procedures to the designated person PC4. responsible for maintaining discipline at the plumbing working area PC5. identify and correct any hazards that the individual can deal with safely, competently and within the limits of their authority PC6. adhere and comply to storage and handling guidelines for hazardous material PC7. identify and recommend opportunities for improving health, safety, and security to the designated person PC8. electrical safety must be followed all times while doing maintenance. PC9. procedures like LOTO, installing warning signs etc… should be implemented while working with energized equipment. PC10. ensure that any electrical equipment under maintenance is isolated from electrical power supply and other potential hazards PC11. complete any health, safety and security activities like safety drills and prepare records legibly and accurately PC12. knowledge of chemical substances, their characteristics and required precaution and safety measures PC13. the importance of maintaining high standards of health, safety and security PC14. implications that any non-compliance with health, safety and security may have on individuals, in the maintenance process and in the organization including the constant exposure to elements like extreme temperatures, toxic chemicals, bio hazardous materials, dirt, dust, fumes, smoke and loud noises.
Managing emergency procedures	PC15. report any hazards that the individual is not competent to deal with to the relevant person in line with organizational procedures and warn other people who may be affected PC16. follow the company's emergency procedures promptly, calmly, and efficiently PC17. evacuation procedures for workers and visitors PC18. how to summon medical assistance and the emergency services, where necessary PC19. how to use the health, safety and accident reporting procedures and the importance of these procedures PC20. different types of occupational health hazards

Technical Knowledge

Relevant work Context	The user/individual on the job needs to know and exhibit: TK1. installation, working, fault identification, trouble shooting of plumbing equipment, pipes, fixtures and related accessories. TK2. knowledge of tools and equipment handling TK3. knowledge of standards like uniform plumbing code, uniform plumbing code of Abu Dhabi etc… TK4. requirements of different shutdowns and appropriate maintenance TK5. chemicals, gases and liquids used and formed in the plumbing system maintenance and its functions and hazards TK6. knowledge of Abu Dhabi occupational terms for water tanks cleaner (Public drinking water tanks) TK7. Knowledge of code of practice for the inspection and cleaning of customer water storage tanks

Knowledge and Understanding

General & organizational Context	The user/individual on the job needs to know and exhibit: KA1. different quality management systems (ISO-9000, TS16949, ISO-14001, OHSAS-18000) KA2. impact of various practices on cost, quality, productivity, delivery and safety KA3. characteristics of the material and equipment required in setting up plumbing equipment and their maintenance KA4. implications of using inaccurate measuring and testing equipment KA5. the reason, impact and reoccurrence of failure KA6. the correct method for carrying out corrective actions outlined for each Problem and risk and impact of not following the defined procedures/work instructions KA7. escalation matrix for reporting identified issues, hazards and breakdown KA8. types of documentation used in the organization, importance of maintaining the same and different methods of recording information KA9. procedures for reporting any unresolved issues in maintenance and operation KA10. energy management systems KA11. quality requirements of materials and equipment KA12. method of preparation of estimates and materials order for maintenance and repair jobs KA13. basic computer knowledge including MS office operation KA14. ability to identify documental errors in technical reports. KA15. environmental issues and controls relevant to the process, including waste/rework collection and handling procedures related to the process KA16. plumbing installation, maintenance and repair skills KA17. ability to develop and implement planned maintenance programs

Soft Skills

A. Core Skills/ Generic Skills	**Reading Skills**
	The user/ individual on the job needs to know and understand how to: SA1. read, understand and interpret manuals, SOPs, health and safety instructions, memos, reports, job cards etc. SA2. read various coding systems as per company norms
	Writing skills
	SA3. do legible entries with permanent ink SA4. write detailed reports for investigation SA5. pay attention to detail while recording maintenance parameters
	Oral Communication (Listening and Speaking skills)
	SA6. communicate with upstream and downstream teams with a proper form and manner and use language that is open and respectful SA7. effectiveness in emergency response and communication
B. Professional Skills	**Plan & Organize**
	SB1. plan and organize resources to ensure assembly, installation and maintenance activities adhere to schedule SB2. multi-task and adapt to meet work timelines SB3. effectively delegate and lead to plan, lay out, supervise and inspect the work of subordinates
	Decision Making
	SB4. evaluate multiple options on defined, objective parameters when taking assembly, installation and maintenance decisions SB5. collaborate with the team for identifying appropriate decisions SB6. apply commercial awareness as a decision parameter
	Critical Thinking
	SB7. apply balanced judgment to different situations SB8. apply basic mathematical and statistical knowledge
	Analytical Thinking
	SB9. analyze operations data and information to identify assembly, installation and maintenance needs SB10. pay attention to detail for identifying faults and anomalies SB11. spot process disruptions and delays and report and communicate these to the supervisor with solutions
	Problem solving
	SB12. solve conflicts and negotiate on behalf of the team and within the team or get help from an appropriate person, in a way that preserves goodwill and trust SB13. explore new ways of doing things SB14.identify and objectively evaluate both temporary/short-term and permanent/long-term solutions SB.15 Researches catalogs and vendor services for complex and/or customized system retrofits SB16. Lead Plumbing team in complex repair work

References

http://www.ukstandards.org.uk

https://www.nsdcindia.org/nos

http://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/---publ/documents/publication/wcms_172572.pdf

https://www.oshad.ae/en/Pages/OSHTopicInnerViewPage.aspx?topicID=15

https://dmat.abudhabi.ae/_data/ADC2014/AD_Property_Maintenance_Code/index.html#p=40

https://www.nqa.gov.ae/en/Documents/QF_Handbook_FINAL.pdf

https://dmat.abudhabi.ae/en/About/Pages/buildingcode.aspx

Uniform plumbing code of Abu Dhabi Emirate

Code of practice for the inspection and cleaning of customer water storage tanks

Abu Dhabi occupational terms for water tanks cleaner (Public drinking water tanks)