

Domain

SOLAR INSTALLATION

Title:

Carry out basic administrative duties

Level: 3

Credits: 3

Purpose

This unit standard specifies the competencies required to carry out basic administrative duties. It includes the following elements: prepare quotations, prepare contracts, order materials, create job cards, complete applicable reports and prepare invoices. This unit standard is intended for those who work as solar installation technicians.

Special Notes

1. Entry information:

Prerequisite

- *None*

2. To demonstrate competence, at a minimum, evidence is required of identification of deficiencies of plant or solar water heater system equipment through inspection and testing and ability to remove, clean and replace worn parts.

3. Tools, equipment, accessories and materials may include but are not limited to removing/fixing tools, calculators, pencil/pen, manufacturers' manuals and guides, schedules, spare components, formats and instructions for the estimation of quantities and costs and the preparation of quotations.

4. Assessment evidence may be collected from a real workplace or an appropriate simulated realistic environment in which system operations are carried out.

5. Performance of all elements in this unit standard must comply with all relevant workplace requirements and manufacturers' specifications.

6. Glossary of terms:

- *'Isolation and lockout procedures'* refer to isolating the PVP from the water supply and electrical source of supply where applicable.
- *'Thermal insulation'* refers to minimizing heat loss in any heat transfer media.
- *'Specifications'* refers to any, or all of the following: manufacturers' specifications and recommendations, workplace specific requirements, national and international standards and legislations.
- *'ISO'* refers to International Organization for Standards.
- *'SANS'* refers to South African National Standards.
- *'PVP'* refers to Solar Water Heater.
- *'INSOLATION'* refers to Incoming Solar Radiation.

7. Regulations and legislation relevant to this unit standard include the following:

- Labour Act No. 11 of 2007.
- Petroleum Products and Energy Amendment Act No. 2 of 2005.

- National Energy Fund Act of 2000.
 - Gas Act (Draft 2b).
 - Occupational Health and Safety Regulations No. 18, 1997 and all subsequent amendments.
 - ISO 14001 (Environmental Management Standard)
- and all subsequent amendments to any of the above.

Quality Assurance Requirements

This unit standard and others within this subfield may be awarded by institutions which meet the accreditation requirements set by the Namibia Qualifications Authority and the Namibia Training Authority and which comply with the national assessment and moderation requirements. Details of specific accreditation requirements and the national assessment arrangements are available from the Namibia Qualifications Authority on www.namqa.org and the Namibia Training Authority on www.nta.com.na.

Elements and Performance Criteria

Element 1: Prepare quotations

Performance criteria

- 1.1. Material take-offs are performed accurately and checked against job specification(s).
- 1.2. Materials, labour and other costs are determined from industry standard labour rates, enterprise costing arrangements and/or material suppliers.
- 1.3. Quotations are checked for accuracy in costing and against job specification.
- 1.4. Quotation is documented in accordance with established policies and procedures.
- 1.5. Quotation is submitted to customer within by an agreed date.

Element 2: Prepare contracts

Performance criteria

- 2.1 Contract is prepare as per system requirement.
- 2.2 Terms used in the contract are clearly defined.
- 2.1 Lay out of the maintenance services to be performed are noted and explained.
- 2.4 Compensation structure agreed upon for services is discussed.
- 2.5 Any warranties or promises made by either party are discussed.
- 2.6 Guidelines for handling legal disputes are discussed.

Element 3: Order materials

Performance criteria

- 3.1 The ordering form is completed as per job requirement.
- 3.2 Estimated materials are described according to the work specification or bill of quantity.

Element 4: Create job cards

Performance criteria

- 4.1 Job card is prepared as per job requirement.
- 4.2 Details of the customer are filled and completed.
- 4.3 Material list is indicated and discussed.
- 4.4 Labour task are indicated and discussed.
- 4.5 Material and labour cost are indicated and discussed.
- 4.6 Job card is documented in accordance with established policies and procedures.

Element 5: Complete applicable reports

Performance criteria

- 5.1 Various type of reports are completed per system requirement.
- 5.2 System commissioning report is completed after the installation.
- 5.3 Reports are documented in accordance with established policies and procedures.

Element 6: Prepare Invoices

Performance criteria

- 6.1 Invoice are prepared and completed against job specifications.
- 6.2 Invoice is checked for accuracy in costing and against job specification.
- 6.3 Invoice is documented in accordance with established policies and procedures.
- 6.4 Invoice is submitted to customer within by an agreed date.

Registration Data

Subfield:	Electrical Engineering
Date first registered:	28 March 2018
Date this version registered:	28 March 2018
Anticipated review:	2023
Body responsible for review:	Namibia Training Authority