



**Australian Government**

# **ACMVET503A Produce veterinary dental oral cavity radiographs**

**Revision Number: 2**

## ACMVET503A Produce veterinary dental oral cavity radiographs

### Modification History

| Release | TP Version | Comments                                                                                        |
|---------|------------|-------------------------------------------------------------------------------------------------|
| 2       | ACM10v3    | Application of unit clarified<br>Reference to OHS legislation replaced with generic terminology |
| 1       | ACM10v1    | Initial release. Supersedes and is equivalent to RUV5603A                                       |

### Unit Descriptor

This Unit of Competency covers the process of preparing and monitoring patients during radiographic procedures, preparing radiographic equipment, developing radiographs, and recording and storing radiographic results for advanced veterinary dental surgery cases.

### Application of the Unit

This Unit is specifically designed for nurses who work in a veterinary clinic or hospital, or a specialist or referral veterinary dental clinic/hospital where registered veterinary dental specialists perform advanced veterinary dentistry procedures. Producing veterinary dental oral cavity radiographs requires access to a veterinary clinic/hospital that performs advanced veterinary dentistry, or a specialist or referral veterinary dental clinic/hospital; veterinarians who perform advanced and specialist dental procedures; patients and clients requiring veterinary dental oral cavity radiographs and specialised dental procedures; and the equipment, instruments and resources required to perform all seven veterinary dentistry disciplines.

Candidates must have access to veterinarians who perform advanced dental procedures and are, at a minimum, Members of the Australia and New Zealand College of Veterinary Scientists Veterinary Dental Chapter (MANZCVS).

In addition to legal and ethical responsibilities, all Units of Competency in the ACM10 Animal Care and Management Training Package have the requirement for animals to be handled gently and calmly. The individual is required to exhibit appropriate care for animals so that stress and discomfort is minimised.

## Licensing/Regulatory Information

Licensing, legislative, regulatory or certification requirements may apply to this Unit. Therefore, it will be necessary to check with the relevant state or territory regulators for current licensing, legislative or regulatory requirements before undertaking this Unit.

## Pre-Requisites

Nil

## Employability Skills Information

This Unit contains employability skills.

## Elements and Performance Criteria Pre-Content

|                                                                   |                                                                                                                                                                                                                                                                                                                  |
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| Elements describe the essential outcomes of a Unit of Competency. | Performance criteria describe the performance needed to demonstrate achievement of the element. Where bold italicised text is used, further information is detailed in the required skills and knowledge section and the range statement. Assessment of performance is to be consistent with the evidence guide. |
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## Elements and Performance Criteria

| ELEMENT                                                      | PERFORMANCE CRITERIA                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|--------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1. Prepare and monitor patient during radiographic procedure | <p>1.1. Specific sedation and/or anaesthetic procedures are applied as directed by the veterinarian and in accordance with <b>workplace health and safety</b> requirements.</p> <p>1.2. Appropriate technique is determined in consultation with the veterinarian.</p> <p>1.3. Patient is <b>positioned</b> and <b>film</b>/cassette is positioned as required to suit patient needs.</p> <p>1.4. Patient anaesthetic recovery is monitored and observations are recorded.</p>                |
| 2. Prepare <b>radiographic equipment</b>                     | <p>2.1. Manual processor, automatic processor or chair side darkroom is prepared in accordance with the manufacturers' instructions and clinic policies.</p> <p>2.2. Pre-packed dental films/cassettes are made ready.</p> <p>2.3. Radiographic machine is positioned and set for required procedure as instructed by the veterinarian.</p> <p>2.4. <b>Personal protective equipment</b> is prepared and fitted to all staff in accordance with workplace health and safety requirements.</p> |
| 3. Develop radiographs                                       | <p>3.1. Exposed film is developed and displayed for examination by the veterinarian.</p> <p>3.2. Film debris and waste chemicals are disposed of in accordance with clinic policies and legislative requirements.</p>                                                                                                                                                                                                                                                                         |
| 4. Record and store radiographic results                     | <p>4.1. Film and radiographic results are recorded and stored in line with clinic policies and legislative requirements.</p> <p>4.2. Films are stored in a cool, dry place away from ionising radiation and light.</p>                                                                                                                                                                                                                                                                        |

## Required Skills and Knowledge

This section describes the skills and knowledge required for this Unit.

### Required skills

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#### Ability to:

- complete relevant work-related documentation
- comply with relevant state or territory radiation safety act and regulations with regard to licensing, personal monitoring and record keeping
- employ safe and environmentally responsible organisational systems and procedures when working with and handling animals
- maintain the highest standards of hygiene and infection control at all times to reduce the risk of infection and cross-infection
- observe accurately and report on animals' condition and health
- use literacy skills to read, select and implement policies and procedures, including workplace health and safety, infection control and other clinic policies and procedures; coordinate patient admission and discharge; implement sequenced written and oral instructions; and record patient details accurately and legibly
- use interpersonal skills to relate to people from a range of social, cultural and ethnic backgrounds and with a range of physical and mental abilities
- use oral communication skills/language required to fulfil the job role as specified by the clinic, including negotiating and questioning techniques, active listening, asking for clarification from veterinarian, and acknowledging and responding to a range of views
- use numeracy skills to monitor anaesthetised patients
- use problem-solving skills to use available resources, prioritise tasks and produce high quality radiographs
- use safe manual handling techniques and/or equipment
- use safe waste handling and disposal procedures
- work as a member of a team and working closely with the supervising veterinarian.

### Required knowledge

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#### Knowledge of:

- appropriate placement techniques (e.g. bisecting angle or parallel)
- clinic recording systems and legislative requirements
- positioning of animals for dental radiography
- principles of animal welfare and ethics
- radiographic print development procedures
- radiography and other imaging equipment
- how to recognise emergencies
- relevant state or territory legislation and regulations relating to radiation safety, the practice of veterinary science, workplace health and safety and animal welfare
- relevant state or territory legislation covering the use of therapeutic and controlled

substances

- safe work practices in the use of radiography and other imaging equipment
- sedation for dental procedures
- workplace hygiene standards, disinfectants and sterilisation, cleaning agents, cleaning techniques and cleaning equipment and materials.

## Evidence Guide

The Evidence Guide provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge, range statement and the Assessment Guidelines for the Training Package.

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| <b>Overview of assessment</b>                                                                |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| Critical aspects for assessment and evidence required to demonstrate competency in this Unit | <p>The evidence required to demonstrate competence in this Unit must be relevant to workplace operations and satisfy all of the requirements of the performance criteria, required skills and knowledge and the range statement of this Unit. Assessors should ensure that candidates can:</p> <ul style="list-style-type: none"> <li>• provide caring and capable support to veterinarians and patients during dental radiography procedures in all disciplines of veterinary dentistry</li> <li>• prepare patients and equipment for the required procedures</li> <li>• process and develop high quality standard radiographs</li> <li>• monitor vital signs of patients accurately through induction, during procedure and through recovery</li> <li>• recognise, respond to and assist with emergencies</li> <li>• handle a range of patients occurring in the clinic</li> <li>• communicate effectively with owners and the veterinarian providing advice.</li> </ul> |
| Context of and specific resources for assessment                                             | <p>Assessment of this Unit is to be practical in nature and must be assessed in a clinic or hospital, a specialist veterinary dental clinic or hospital, or a referral veterinary dental clinic or hospital where registered veterinary dental specialists perform advanced veterinary dentistry.</p> <p>There must be access to the appropriate dental equipment, resources and documentation to enable one to demonstrate competence.</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| Method of assessment                                                                         | <p>To ensure consistency of performance, competency should be demonstrated by producing an extensive range of veterinary dental oral radiographs on a regular basis over a period of time.</p> <p>The assessment strategy must include practical skills assessment. Suggested strategies for this Unit are:</p> <ul style="list-style-type: none"> <li>• written and/or oral assessment of candidate's required knowledge</li> <li>• observed, documented and first-hand testimonial evidence of candidate's application of practical tasks</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                     |

|                                     |                                                                                                                                                                                                                                                                                                                                                                             |
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|                                     | <ul style="list-style-type: none"><li>• simulation exercises that reproduce normal work conditions</li><li>• case study analysis</li><li>• third-party evidence</li><li>• workplace documentation</li><li>• portfolio.</li></ul> <p>This Unit may be assessed in a holistic way with other Units of Competency relevant to the industry sector, workplace and job role.</p> |
| Guidance information for assessment | Assessment methods should reflect workplace demands (e.g. literacy and numeracy demands) and the needs of particular target groups (e.g. people with disabilities, Aboriginal and Torres Strait Islander people, women, people with a language background other than English, youth and people from low socioeconomic backgrounds).                                         |

## Range Statement

### RANGE STATEMENT

The range statement relates to the Unit of Competency as a whole. It allows for different work environments and situations that may affect performance. Bold italicised wording, if used in the performance criteria, is detailed below. Essential operating conditions that may be present with training and assessment (depending on the work situation, needs of the candidate, accessibility of the item, and local industry and regional contexts) may also be included.

|                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
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| The seven veterinary dentistry disciplines are:                                 | <ul style="list-style-type: none"> <li>• periodontics</li> <li>• endodontics</li> <li>• restorative dentistry</li> <li>• oral surgery</li> <li>• prosthodontics</li> <li>• orthodontics</li> <li>• exotic animal dentistry.</li> </ul>                                                                                                                                                                                                                                                                                                                                    |
| <b>Workplace health and safety</b> risks when working with animals may include: | <ul style="list-style-type: none"> <li>• animal bites, kicks, scratches and crush injuries</li> <li>• biological hazardous waste and sharps disposal</li> <li>• handling of chemicals and medicines</li> <li>• gas leakage</li> <li>• inhalation of aerosol particles</li> <li>• intraocular contamination</li> <li>• manual handling, including carrying, lifting and shifting</li> <li>• needle pricks and cuts from other sharps</li> <li>• release of infective agents (animal and human)</li> <li>• slippery or uneven work surfaces</li> <li>• zoonoses.</li> </ul> |
| Type of <b>positioning</b> may include:                                         | <ul style="list-style-type: none"> <li>• intraoral</li> <li>• extraoral.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| Type of <b>film</b> may include:                                                | <ul style="list-style-type: none"> <li>• screen and non-screen (e.g. dental) film.</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Preparing <b>radiographic equipment</b> may include:                            | <ul style="list-style-type: none"> <li>• preparation of: <ul style="list-style-type: none"> <li>• automatic processor and film</li> <li>• chair side darkroom</li> <li>• radiography machine</li> <li>• room</li> <li>• screens.</li> </ul> </li> </ul>                                                                                                                                                                                                                                                                                                                   |
| <b>Personal protective equipment</b> may include:                               | <ul style="list-style-type: none"> <li>• safety equipment: <ul style="list-style-type: none"> <li>• glasses</li> <li>• lead aprons</li> </ul> </li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                 |

| RANGE STATEMENT |                                                                                                               |
|-----------------|---------------------------------------------------------------------------------------------------------------|
|                 | <ul style="list-style-type: none"><li>• lead gloves</li><li>• lead thyroid collars</li><li>• masks.</li></ul> |

## Unit Sector(s)

Veterinary nursing