A Guide to Writing Competency Based Training Materials
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Using this Guide

This guidebook is written as an application focused reference for novice and veteran trainers, working in the not-for-profit sectors, who develop or deliver competency based materials or learning activities.

It is recognised that many people who access this guide will have been exposed to a good deal of the content, so in many instances using this book will serve as a means of refreshing your knowledge. In other circumstances you will be looking for specific information or guidance on an aspect of training development or delivery. Whatever your need, by using the comprehensive table of contents you should be able to quickly find what you are seeking.

For those that like to scan through a document the key sections are:

- **Competency Based Training in Australia.** This section provides an overview of the national training agenda, Training Packages, the Australian Qualifications Framework and Units of Competency

- **Assessment of Competence.** Covers the forms and principles of assessment as well as looking at evidence gathering and assessment methodologies.

- **How We Learn.** Looks at how adults learn and includes information on learning styles and barriers to learning.

- **Writing Effective Training Materials.** The key focus of this guidebook. Provides information on how to structure your training, select learning activities and develop your writing style. There is also a suggested framework for learning guides.

Tips for Writers

**Writers Tips**
Throughout this text there are ‘tips’ that may assist writers to produce more effective materials.

Many of these ‘tips’ are highlighted by this callout symbol.
Overview

Before we begin it may be useful to consider some of changes that are impacting on training in Australia today. We are in the midst of a shift from the traditional approaches to training to a focus on the application of learning through assessing competency. This shift from a training activity to a focus on performance is generating a significant increase in our:

- Awareness of how people learn and what trainers and training writers should do to encourage effective learning
- Understanding of the pivotal role of assessment in the learning process
- Capacity to develop and deliver competency based training
- Expectations by organisations that training professionals will direct their attention beyond the training activity to improving or enhancing performance (an outcome)
- Awareness of what exemplary trainers, training writers and assessors actually do and what skills and knowledge they need to perform

So the challenge we all face is to develop and deliver training and assessment resources that enable a person to transport the skills and knowledge learnt to whatever situation they may find themselves in, while at the same time instilling in them the confidence to do well in their current situation.

As described by Gilbert (1996) there are two elements in performance: the behavior or activity and the outcome or accomplishment. For example the delivery of training has an activity component (presenting or facilitating) and an outcome (participant learning). For training to support improvements in learner performance it needs to connect with the learner’s experiences and current activities in a way that promotes transfer of learning.

*Knowledge must come through action; you can have no test which is not fanciful, save by trial.*

Sophocles (496 BC - 406 BC)
Written materials form the basis of most training, learning or assessment activities. These materials can serve a number of purposes. The principal uses are:

- provide trainers with guidance and resources for conducting or supporting learning activities
- provide learners with a resource that will support an ‘instructor led’ delivery and will be a useful reference for future application of the learning
- providing learners and assessors with resources for understanding and completing assessments
- serve as guide or resource for ‘self paced’ learning

A fundamental requirement for successful writing is to invite the learner to connect to their framework for learning and to present information in an engaging manner that appeals to the diverse range of potential learners.

As you begin to make use of this guide you may find that a number of terms used are new to you. The bottom line is that you should be familiar with them because they are the language of training today. For those who are not familiar with this terminology we have provided a glossary.

We hope that this guide will assist you to increase your understanding of competency based training in the Australia and help you to write more effective training or learning materials.
Competency Based Training in Australia

Competency based training is a structured approach to training and assessment that is directed toward achieving specific outcomes. It is about assisting individuals to acquire skills and knowledge so they are able to perform a task to a specified standard under certain conditions. In competency based training, the outcomes to be achieved are clearly stated so that learners know exactly what they have to be able to do, trainers know what training or learning is to be provided and organisations know the skill levels required of their people. The emphasis in competency based training is on "performing" rather than just "knowing".

A competency is defined in terms of what a person is required to do (performance), under what conditions it is to be done (conditions) and how well it is to be done (standards).

In the Australian context a broad definition of competency has been adopted that includes four aspects of work performance. These are described in the following chart.

<table>
<thead>
<tr>
<th>Table 1 – The Four Skills</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Task Skills</strong></td>
</tr>
<tr>
<td><strong>Task Management Skills</strong></td>
</tr>
<tr>
<td><strong>Contingency Management Skills</strong></td>
</tr>
<tr>
<td><strong>Environment Skills</strong></td>
</tr>
</tbody>
</table>

A competency is much more than just a description of a work task or activity. It encompasses measures of the competency and addresses the knowledge, skills and attitudes required for a person to perform a job to a required standard.
The National Training Agenda

Regardless of the type of training that you are writing or delivering it is important you have an awareness of the training reform agenda in Australia. In the past poor commitment to training by organisations was a key factor in the lack of appropriate and useful workplace skills. So much so that in 1990 the government passed the Training Guarantee Act to stimulate an increase in training activities by requiring employers to spend a minimum amount on training each year. About this time the government established the National Training Board (now the Australian National Training Authority) to assist industry to develop national competency standards. This began the process of making training more accountable for delivering competency outcomes which contribute to building our economy and society.

The current national strategy ‘A Bridge to the Future 1998-2003’ set a mission to:

“Ensure the skills of the Australian labour force are sufficient to support internationally competitive commerce and industry; and to provide individuals with opportunities to optimize their potential”.

The interim evaluation of this strategy shows much has been achieved with significant increases in participation in Vocational Education and Training (VET). The development and implementation Training Packages has been another significant success. There is increased equity and accessibility to VET especially for young people and adults with limited educational and training experience. The national recognition of skills has improved and the introduction of the Australian Quality Training Framework (AQTF) in July 2002 is expected to make mutual recognition a reality.

In 2003 the State, Territory and Commonwealth Ministers responsible for VET agreed in principle to a national VET strategy for 2004-2010. This has two components that are especially relevant to volunteer involving organisations.

- VET working for people – giving Australians world class skills and knowledge
- VET working for communities – building inclusive and sustainable communities
You may like to refer to the following websites to source further information and as an ongoing way of keeping abreast of current developments, issues and terminology:

- The Australian National Training Authority at www.anta.gov.au
- The National Training Information Service at www.ntis.gov.au
- The Resource Generator at www.resourcegenerator.gov.au
- Learning Communities Catalyst at www.lcc.edu.au

Training Packages – What Are They?

Training packages are sets of nationally endorsed standards and qualifications for recognising and assessing people's skills. They describe the work tasks or activities and the underpinning skills and knowledge needed to perform effectively in the workplace.

*Training packages do not prescribe how an individual should be trained.*

Generally Trainers, Writers and Assessors develop the materials required to support the delivery of training, learning and assessment activities. These are frequently referred to as the non-endorsed component and are not generally published with the endorsed components.

Figure 1: Training Packages – The Elements
Training Packages are developed by industry through National Industry Training Advisory Bodies (ITABs), Recognised Bodies or by enterprises to describe what competent performers do within specific industries or industry sectors. As of October 2002, there were 76 endorsed Training Packages. Seven of these were enterprise Training Packages, developed by enterprises for their own unique needs.

Each training package comprises a series of qualifications relevant to an industry sector. It is becoming increasingly clear that there is significant overlap across industry sectors. That is, some basic work tasks are the same whether you are in retail, recreation, building or community services sectors. For example, all workers need to communicate effectively with each other and the people they provide a service to, all need to be aware of Occupational Health and Safety (OH&S) and each person needs to understand their role and responsibilities and to work within the framework of their organisation. This has meant that increasingly there is a sharing of common areas (i.e. Units of Competency) between the training packages.

This is a positive step for the learner as they may start a course of study and find that this is not what they wish to do, but can gain recognition for some or all of what they have learnt. This can be especially valuable if and when they move to a different industry sector to continue their development.

Currently Training Packages are reviewed every three years. This means they are regularly subject to a nation wide consultation process. It is important to keep abreast of any changes that take place as a result of this review process.
As previously highlighted the introduction of Training Packages has shifted the focus from training to the application of learning through assessing and recognizing competency. In this approach it does not matter how the person acquired their competence.

Best practice approaches to training are assessment driven. This is where assessment is used to recognise a learner’s current competence. Comparison of this information with what is required leads to decisions on what training or learning is required to fill the identified gaps. In some situations a person may attain a qualification without having to attend a training course or participating in further learning activities. This is frequently referred to as Recognition of Prior Learning (RPL).

**Learner Self Assessment**

As you write training, learning or assessment materials it is important to build in self assessment for learners. This provides an opportunity for learners to focus their learning and give feedback on the success of their learning. It also helps the learner decide when they are ready for assessment.
Australian Qualifications Framework

As we have mentioned there are a number of qualifications that a person may complete in any sector. These qualifications make up what is commonly referred to as the Australian Qualifications Framework (AQF) and this was introduced in January 1995. In August 2003 it was agreed to add an Associate Degree in the VET Sector.

Table 2 – Qualifications in Australia

<table>
<thead>
<tr>
<th>Schools Sector</th>
<th>VET Sector</th>
<th>Higher Education Sector</th>
</tr>
</thead>
<tbody>
<tr>
<td>Senior Secondary Certificate of Education</td>
<td>Associate Degree Advanced Diploma Diploma Certificate IV Certificate III Certificate II Certificate I</td>
<td>Doctoral Degree Masters Degree Graduate Diploma Graduate Certificate Bachelor Degree Advanced Diploma Diploma</td>
</tr>
</tbody>
</table>

As you can see the AQF covers qualifications are issued by secondary schools, VET providers and higher education institutions. It is an integrated framework for qualifications from senior secondary certificates through to doctoral degrees.

In the VET sector Training Packages are used to specify the combination of competencies required to achieve a particular qualification.

**Materials and Training at the Right Level?**
As you write training and learning materials it is useful to cross-check the content and learning activities against the distinguishing features for the qualification.
### Table 3 – Distinguishing Features Certificate I – Certificate IV

<table>
<thead>
<tr>
<th>Certificate</th>
<th>Features</th>
</tr>
</thead>
</table>
| Certificate I | - Demonstrate knowledge by recall in a narrow range of areas  
                 - Demonstrate basic practical skills such as the use of relevant tools  
                 - Perform a sequence of routine tasks given clear directions  |
| Certificate II | - Demonstrate basic operational knowledge in a moderate range of areas  
                 - Apply a defined range of skills  
                 - Apply known solutions to a limited range of predictable problems  
                 - Perform a range of tasks where choice between a limited range of options is required  
                 - Assess and record information from varied sources  
                 - Take limited responsibility for own work outputs  |
| Certificate III | - Demonstrate some relevant theoretical knowledge  
                  - Apply a range of well developed skills  
                  - Apply known solutions to a variety of predictable problems  
                  - Perform processes that require a range of well developed skills where some discretion and judgement is required  
                  - Interpret available information using discretion and judgement  
                  - Take responsibility for own outputs in work and learning  
                  - Take limited responsibility for the outputs of others  |
| Certificate IV | - Demonstrate understanding of a broad knowledge base incorporating some theoretical concepts  
                 - Apply solutions to a defined range of unpredictable problems  
                 - Identify and apply skill and knowledge areas to a wide variety of contexts with depth in some areas  
                 - Identify, analyse and evaluate information from a variety of sources  
                 - Responsibility for own outputs in relation to specified quality standards  
                 - Take limited responsibility for the achievement of group outcomes  |

Table 4 – Distinguishing Features: Diploma – Advanced Diploma

<table>
<thead>
<tr>
<th>Diploma</th>
<th>Diploma</th>
<th>Advanced Diploma</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Demonstrate understanding of a broad knowledge base incorporating theoretical concepts, with substantial depth in some areas</td>
<td>• Analyse and plan approaches to technical problems or management requirements</td>
<td>• Analyse, diagnose, design and execute judgements across a broad range of technical or management functions</td>
</tr>
<tr>
<td></td>
<td>• Evaluate information using it to forecast for planning or research purposes</td>
<td>• Generate ideas through the analysis of information and concepts at an abstract level</td>
</tr>
<tr>
<td></td>
<td>• Transfer and apply theoretical concepts and/or technical or creative skills to a range of situations</td>
<td>• Demonstrate a command of wide-ranging, highly specialised technical, creative or conceptual skills</td>
</tr>
<tr>
<td></td>
<td>• Take responsibility for own outputs in relation to broad quantity and quality parameters</td>
<td>• Demonstrate accountability for personal outcomes within broad parameters</td>
</tr>
<tr>
<td></td>
<td>• Take limited responsibility for the achievement of group outcomes</td>
<td>• Demonstrate accountability for group outcomes within broad parameters</td>
</tr>
</tbody>
</table>

### Unit of Competency

Every training package details qualifications that a person may choose to complete because it is relevant to their career or interests. Each of these qualifications is made up of a number of competencies. These relate to the level of qualification that a person elects to complete.

Units of Competence are a key component of all competency standards and the building blocks for VET sector qualifications. They are statement of a key function or tasks in a particular job or occupation.

<table>
<thead>
<tr>
<th>Table 5 – Structure for Units of Competency</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Unit Title and Description</strong></td>
</tr>
<tr>
<td><strong>Element of Competency</strong></td>
</tr>
<tr>
<td><strong>Performance Criteria</strong></td>
</tr>
<tr>
<td><strong>Range of Variables</strong></td>
</tr>
<tr>
<td><strong>Evidence Guide</strong></td>
</tr>
</tbody>
</table>
Each unit of competency has a national code (e.g. BSZ508A) and the first three letters identify the training package that the competency is from. In this case the competency is from the business services package. The end letter identifies the version.

The latest versions can be obtained on the National Training Information Service website at http://www.ntis.gov.au

The unit of competency that covers the work a writer would do in designing and developing training materials is included in Attachment 1 at the end of this guide.

Are You Competent?
Attachment 1 – Design Training Courses – Is the unit of Competency that covers the requirements and responsibilities for designing training courses to meet client identified outcomes and where appropriate, to receive formal recognition.

Take ‘time out’ and check it out.

Are you walking the talk?
Assessment of Competence

Competency based assessment is the process of collecting evidence and making judgments against set criteria. In the VET sector the criteria is based on the performance an individual is expected to demonstrate in the workplace. These are described in the relevant unit of competency.

Accredited courses include an assessment strategy and this provides guidance for the development and conduct of assessments. This may include information on evidence gathering and an overview of the assessment process, methods and assessment tools.

When developing materials for delivery of units of an accredited course, the assessment criteria and the conditions and method of assessment for each learning outcome must be specified.

With Competency Based Training, a key emphasis is on the learners’ ability to demonstrate that they are competent in a variety of ways and over a period of time. This means that the assessment of competency may involve a range of tasks and activities which allow the learner to demonstrate competence successfully, when and where they are ready. In some cases, assessment can be used to identify gaps in a learner’s knowledge or application of skills; in others it is used as a tool to determine what the learner knows and how this knowledge or skill can be applied in a variety of situations.

The challenge for any writer or trainer in developing and implementing Competency Based Training is to provide a variety of opportunities for learners to demonstrate competence. Four types of assessment form an integral part of vocational training and each has a different purpose and end result.
Table 6 – Forms of Assessment

| **Diagnostic Assessment** | Is a type of formative assessment particularly intended to diagnose areas of weakness, or misunderstanding, and strength. It involves collecting evidence to diagnose or identify a training need or performance problem.

> “You can’t prescribe the remedy till you understand the cause”

When employed for development it is typically used to identify a learner’s gaps in knowledge and to ensure the content of the subsequent training will meet the learners’ needs. |
| **Formative Assessment** | This type of assessment assists and supports learning by providing feedback about performance and progress towards the achievement of competency. It is also a method for the collection of evidence, and determining a candidate’s readiness for her or his final assessment. Formative assessment is more a process than an event. It allows learners the opportunity to gain confidence through practice and application, in an environment which is conducive to the achievement of competence. It also encourages the learner’s engagement with the subject. Frequently learners will access this type of assessment throughout a course of study to generate a sense of achievement and to build confidence. Evidence gained from formative assessments may be used for summative purposes. |
| **Summative Assessment** | Is a final assessment of competence. It is used when the learner feels confident of their ability to perform and can demonstrate this performance in a workplace or a simulated environment. Summative assessment requires the assessor to make a final judgement as to whether the learner is ‘competent’ or ‘not yet competent’. This type of assessment is used to determine whether you have reached competency, or achieved the learning outcomes of a training program. It may also be for the purpose of recognition, classification or certification. |
Recognition of Prior Learning (RPL) allows a person to receive recognition and credit for the knowledge and skills they have, no matter how and where they were attained. This can include skills from previous study as well as work or life experience. In the VET sector, RPL assessment can result in a full qualification or a Statement of Attainment for partial completion of a qualification.

Whatever assessments you are developing or conducting there are four key principles that should be considered.

_Your design of assessment materials and conduct of assessments must be fair, valid, reliable and flexible._
Principles of Assessment

<table>
<thead>
<tr>
<th><strong>Fair</strong></th>
<th>Assessments and assessors should take into account the person being assessed and ensure they are not disadvantaged. A fair assessment is one where the learner:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>- Has a very clear understanding of what is expected and what form the assessment will take</td>
</tr>
<tr>
<td></td>
<td>- Is treated equitably</td>
</tr>
<tr>
<td></td>
<td>- Knows the criteria that will be used to judge performance</td>
</tr>
<tr>
<td></td>
<td>- Has opportunities for the assessment decision to be reviewed or to appeal the assessment outcome</td>
</tr>
<tr>
<td><strong>Valid</strong></td>
<td>A valid assessment assesses what it claims to assess. The evidence collected is relevant to the activity and demonstrates that the performance criteria have been met. This is achieved by:</td>
</tr>
<tr>
<td></td>
<td>- Focusing on the areas described in the relevant competency standard</td>
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<tr>
<td></td>
<td>- Sampling a sufficient range of evidence</td>
</tr>
<tr>
<td></td>
<td>- Gathering evidence in the workplace or from tasks that resemble those in the workplace</td>
</tr>
<tr>
<td></td>
<td>- Being clear about the competencies being assessed</td>
</tr>
<tr>
<td><strong>Reliable</strong></td>
<td>A reliable assessment is consistent and reproducible and this can be improved by:</td>
</tr>
<tr>
<td></td>
<td>- Ensuring the all parties are conversant with the competency being assessed</td>
</tr>
<tr>
<td></td>
<td>- Using several different methods to gather assessment data</td>
</tr>
<tr>
<td></td>
<td>- Collecting evidence in different situations or at different times</td>
</tr>
<tr>
<td></td>
<td>- Using more than one assessor</td>
</tr>
<tr>
<td><strong>Flexible</strong></td>
<td>Flexibility in assessment often involves negotiation of assessment methods. Flexibility also means:</td>
</tr>
<tr>
<td></td>
<td>- Being accessible to the learner</td>
</tr>
<tr>
<td></td>
<td>- Providing recognition regardless of how or where the competency was acquired.</td>
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</tbody>
</table>
Evidence Gathering Methods

Assessment is the gathering of evidence from a range of sources, and frequently more than one type of evidence is used to fairly and reliably determine competence.

When selecting an appropriate strategy for the collection of evidence in the assessment of competence various factors need consideration. These factors, some of which are detailed on the previous page, include:

- The requirements of the specific competency unit(s) or learning outcome
- The needs of the assessor and the learner being assessed
- The authenticity of the evidence. That is, that it actually relates to the performance of the person being assessed, and not that of another person.
- Sufficiency of the evidence to demonstrate competency.
- The currency of evidence. That the evidence is still relevant and current according to competency standard requirements.
- Workplace or organisation constraints
- Time and cost factors
- Does task being assessed or the location of the assessment involve a strong element of OH&S or environmental risk
- Will conducting an assessment risk a significant impact on service delivery, product quality or workplace operations

Careful consideration should be given to the selection of evidence collection methodologies to ensure that all components of the competence are being assessed (i.e. task skills, task management skills, contingency management skills, environment skills) are effectively addressed.

All methods of assessment can be categorised into three types. The type of evidence gathered may have an impact on the validity of the assessment outcome.
Types of Assessment Evidence

<table>
<thead>
<tr>
<th>Direct</th>
<th>The most desirable form of evidence. Frequently obtained by observing performance in the workplace or in simulations. May involve a detailed ‘walk through’ of workplace operations and exploration of work related information that clearly details the performance ability of the candidate. While observation of workplace performance is often the preferred choice it should not be used to the exclusion of the other effective methods of direct evidence gathering.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Indirect</td>
<td>Where competence cannot be directly observed indirect evidence is used to infer competence. Examples of the evidence gathered includes work samples, workplace documents or a portfolio of evidence etc</td>
</tr>
<tr>
<td>Supplementary</td>
<td>This type of evidence is gathered from a third party and is frequently obtained through interviews and testimonies. This method is of value in instances where direct and/or indirect forms of evidence gathering provide insufficient information for a valid assessment outcome and additional evidence is required.</td>
</tr>
</tbody>
</table>

These factors, or combinations of these factors, will influence the methods by which suitable and sufficient evidence is collected during the assessment process.

In most instances a combination of evidence gathering methods will be required to ensure the validity and reliability of the assessment outcome. The selection of methodology must also avoid costly and time consuming over assessment.
Examples of Assessment Methodologies

<table>
<thead>
<tr>
<th><strong>Observation Checklist</strong></th>
<th>This is a checklist completed by a trainer or the workplace assessor while observing the learner’s performance on relevant tasks.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Practical Demonstration</strong></td>
<td>Demonstrates competence by showing steps or process used to produce a product or service</td>
</tr>
<tr>
<td><strong>Project</strong></td>
<td>Demonstration of skills and knowledge in the completion of a project.</td>
</tr>
<tr>
<td><strong>360° Feedback</strong></td>
<td>Using a structured process to gather and analyse feedback from peers, supervisors and people who are supervised.</td>
</tr>
<tr>
<td><strong>Case Study</strong></td>
<td>Response to a situation which is presented to the learner. Used to ascertain the learners problem solving techniques and underpinning knowledge.</td>
</tr>
<tr>
<td><strong>Oral presentation</strong></td>
<td>Learners give an oral presentation about an area of knowledge or their projects to a small group, usually including a trainer, their assessor, their colleagues and any other interested parties.</td>
</tr>
<tr>
<td><strong>Journal</strong></td>
<td>A journal that records learning activities, skills and knowledge acquisition.</td>
</tr>
<tr>
<td><strong>Problem Solving</strong></td>
<td>Implementing problem solving techniques to analyse a product or process for problems or errors.</td>
</tr>
<tr>
<td><strong>Project</strong></td>
<td>Demonstration of skills and knowledge in the completion of a project.</td>
</tr>
<tr>
<td><strong>Video or Audio Tapes</strong></td>
<td>Recording performance in the workplace that is subsequently reviewed by an assessor.</td>
</tr>
</tbody>
</table>
How We Learn

Much of our traditional learning experience leads us to a believe that we learn best by listening to experts. Fortunately there has been considerable research into adult learning and this provides much better understandings of the factors influencing adult learning.

Training that actively engages an adult in the learning process achieves significantly greater results in learner self-awareness, changed behaviour, and the acquisition of new skills.

*As a person responsible for designing, writing or delivering learning activities what should you understand and apply?*

Stages of Learning

*Or, How We Go From the Unknown To the Known*

Figure 3: The Learning Ladder

*Source: Maslow*
At Step 1: You don’t know what you don’t know.
In other words you are not aware you have a learning need. Sometimes referred to as being in a state of blissful ignorance.

At Step 2: You know what you don’t know.
This is the stage where learning really begins. It is where we have become aware that we have a lack of knowledge or skill and that this is preventing (or may prevent) us from doing or achieving.

At Step 3: You know what to do and can do it when you think about it.
At this stage learning is becoming easier. Often we feel we “pretty much know how to do this”. Frequently all we need at this stage is an opportunity to practice and some positive reinforcement.

At Step 4: You don’t know what you know and do it without having to think about it.
This is like riding a bike. You know what you need to know and can repeat the performance at will.

Know Where Your Learners are on the Ladder
Knowing where your learners are on the ladder helps contextualise the learning activities to match their needs.

Consider ‘Self Assessments’ to ensure learners are aware of their learning needs.
## Applying the Principles of Adult Learning

<table>
<thead>
<tr>
<th>PRINCIPLE</th>
<th>IMPLICATION FOR WRITERS AND TRAINERS</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Learner Motivation</strong></td>
<td>Adults must want to learn</td>
</tr>
<tr>
<td>Adults must want to learn</td>
<td>In addition to communicating the learning objectives we need to show how the learner and their work will benefit from the training.</td>
</tr>
<tr>
<td></td>
<td>▪ Use overviews to engage the learner</td>
</tr>
<tr>
<td></td>
<td>▪ State benefits in the outline of each topic and including learning activities that reinforce the benefits</td>
</tr>
<tr>
<td></td>
<td>▪ Providing self assessments as a prelude to the module or topic</td>
</tr>
<tr>
<td></td>
<td>▪ Create personas to assist you to focus on the learners</td>
</tr>
<tr>
<td>Adults generally have a concept of being responsible for their own decisions. Keep this in mind and incorporate it in the learning. If you take this away from them then you will be undermining their ability to engage in the training.</td>
<td></td>
</tr>
<tr>
<td>The most potent motivation for adult learners are internal pressures (self esteem, life quality). So meet these needs. Allow and encourage people to explore, recognise their achievements and apply them to their learning and training.</td>
<td></td>
</tr>
<tr>
<td><strong>Learner Orientation</strong></td>
<td>Adults will learn only what they feel they need to learn</td>
</tr>
<tr>
<td>Adults will learn only what they feel they need to learn</td>
<td>Adults must feel the things they are learning are relevant and will be useful. So make the links to the work they are doing or could be doing in the future by:</td>
</tr>
<tr>
<td></td>
<td>▪ Including examples and case studies on how others have used the knowledge or skills</td>
</tr>
<tr>
<td></td>
<td>▪ Provide opportunities for the learner to control their learning environment</td>
</tr>
<tr>
<td></td>
<td>▪ Using a problem – solution approach</td>
</tr>
<tr>
<td>Adults are task centered or problem centered in their orientation to learning. So make sure you look at issues, and how to work through them, and keep on track.</td>
<td></td>
</tr>
<tr>
<td>You need to lead them to discover their own solutions for issues, not tell them what to do. Encourage your learners to work together, to discuss, debate and share ideas and information.</td>
<td></td>
</tr>
<tr>
<td>Principle</td>
<td>Implication for Writers and Trainers</td>
</tr>
<tr>
<td>-----------</td>
<td>--------------------------------------</td>
</tr>
<tr>
<td>Adults learn by comparing past experience with new experience</td>
<td>Adults bring to a wealth of experience and knowledge into their learning activities. When they learn something new most check how this fits in or is different from what they already know. In developing and using learning materials we should devise way to tap into this knowledge and to provide frameworks or models that assist the learner to establish relationships between what they know and the new knowledge or skill. Sharing of personal experiences or stories is one way this can be achieved.</td>
</tr>
<tr>
<td>Adults need immediate feedback concerning their progress</td>
<td>We need to provide opportunities for learners to track their progress and to get constructive feedback on their learning. Providing self assessment questionnaires or check lists and quizzes are useful techniques for learners to track their progress. Make sure answers are readily available.</td>
</tr>
<tr>
<td>Adults want their learning to be practical</td>
<td>Adult interest in learning surges when we can provide exercises that provide the experience of applying a new concept or skill to a ‘real life’ situation. Try to provide opportunities for learners to link their learning with people, issues or activities in their lives.</td>
</tr>
<tr>
<td>Adults try to avoid failure</td>
<td>Adults often perceive the trial and error approach to learning as too risky and resist exploring this approach to learning. This is especially true if the person has experienced learning difficulties in the past. Consider the learners fears and emotional safety when developing training or learning activities. Ensure the ‘real’ consequences of failure are low. Begin with easy learning activities and build complexity once learners have experienced success.</td>
</tr>
<tr>
<td><strong>PRINCIPLE</strong></td>
<td><strong>IMPLICATION FOR WRITERS AND TRAINERS</strong></td>
</tr>
<tr>
<td>---------------</td>
<td>----------------------------------------</td>
</tr>
<tr>
<td>Adults do not all learn the same way</td>
<td>Adults have their own styles of learning. So ensure the design of your program and the way you write learning materials features activities, content and language that appeals to a broad range of learning styles. Use visual auditory and kinesthetic language. Include graphics and diagrams. Consider using role plays, case studies, games, simulations, essays and readings etc.</td>
</tr>
</tbody>
</table>

*For further information on adult learning refer to Malcolm Knowles (1990)*

### Learning Styles

A key principle of adult learning is how people prefer to gather, organise and think about information. As a writer or trainer having a good understanding of one or more of the “learning style” models and how to apply these is a key step in increasing the power of your learning resources and activities. Regardless of the model you use the following deductions seem to apply to the majority of models:

- People will learn more effectively when using their preferred style
- People improve their capacity to learn when they can expand their preferences
- When learning materials and activities accommodate a range of preferences, more learners will be successful
- Training materials can be developed that appeal to learning preferences

We will now examine two models in more detail to see how these can be applied to improve learner outcomes.
Kolb's Learning Inventory

Describes a learning process and a style with the emphasis on the need for learning to be grounded in experience, and the importance of a person being active in learning. It provides guidance in situations where learner differences play a role in communication and human interaction. The model provides ways to gauge personal inclinations toward learning, and offers a clear and actionable way to accommodate learners in learning environments. There are 4 main styles. Most people have a preference for 1 or 2 styles.

In the United Kingdom, Honey and Mumford (1992) built on David Kolb’s innovative work and offered a model of learning preferences using the descriptions Activist, Reflector, Theorist and Pragmatist.

Figure 4: Combining Kolb with Honey & Mumford
Activist

_Learns by having a go_

They perceive information concretely and process it actively. They integrate experience and application. They learn by trial and error. They believe in self discovery. They are enthusiastic about new things. They are adaptable, even relish change. They excel when flexibility is needed. They often reach accurate conclusions in the absence of logical reason. They are risk takers. They are at ease with people. They enrich reality by taking what is and adding to it. Sometimes they are seen as manipulative and pushy.

<table>
<thead>
<tr>
<th>Strength</th>
<th>Function by</th>
<th>Goals</th>
<th>Favourite Question</th>
</tr>
</thead>
<tbody>
<tr>
<td>Action, getting things</td>
<td>Acting and testing experience</td>
<td>To bring action to ideas</td>
<td>WHAT IF?</td>
</tr>
<tr>
<td>getting things going</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Their philosophy is: “*I’ll try anything once.*”

Reflector

_Learns most from activities where they can watch, listen and then review what has happened._

They perceive information concretely and process it reflectively. They integrate experience with the Self. They learn by listening and sharing ideas. They are imaginative thinkers who believe in their own experience. They excel in viewing direct experience from many perspectives. They value insightful thinking. They work for harmony. They need to be personally involved, seek commitment. Are interested in people and culture. They are thoughtful people who enjoy observing others. They absorb reality. They seem to take in the atmosphere almost like osmosis.

<table>
<thead>
<tr>
<th>Strength</th>
<th>Function by</th>
<th>Goals</th>
<th>Favourite Question</th>
</tr>
</thead>
<tbody>
<tr>
<td>Innovation and ideas</td>
<td>Value clarification</td>
<td>To be involved in important issues and to bring harmony</td>
<td>WHY?</td>
</tr>
</tbody>
</table>

Their philosophy is to be cautious, to consider all possible angles and implications before making a move. “*I need more information.*”
Theorist

*Learns most when ideas are linked to existing theories and concepts.*

They perceive information abstractly and process it reflectively. They form theories and concepts by integrating their observations into what is known. They seek continuity. They need to know what the experts think. They learn by thinking through ideas. They value sequential thinking. Need details. They critique information and collect data. They are thorough and industrious. They will re-examine the facts if situations perplex them. They enjoy traditional classrooms. Schools are made for them. They are more interested in ideas then people. They prefer to maximise certainty and are uncomfortable with subjective judgements.

<table>
<thead>
<tr>
<th>Strength</th>
<th>Function by</th>
<th>Goals</th>
<th>Favourite Question</th>
</tr>
</thead>
<tbody>
<tr>
<td>Creating concepts and models</td>
<td>Thinking things through</td>
<td>Intellectual recognition</td>
<td>WHAT?</td>
</tr>
</tbody>
</table>

Their philosophy prizes rationality and logic: *“If it’s logical, it’s good.”*

Pragmatist

*Learns most from learning activities that are directly relevant to their situation.*

They perceive information abstractly and process it actively. They integrate theory and practice. They learn by testing theories and applying common sense. They are pragmatists, they believe if something works, use it. They are down-to-earth problem solvers who resent being given answers. They do not stand on ceremony but get right to the point. They have a limited tolerance for fuzzy ideas. They value strategic thinking. They are skills-oriented. They experiment and tinker with things. They need to know how things work. They edit reality, cut right to the heart of things. Sometimes they seem bossy and impersonal.
### Strength | Function by | Goals | Favourite Question
---|---|---|---
Practical application of ideas | Factual data garnered from kinesthetic, hands-on experience | to align their view of the present with future security | HOW DOES THIS WORK?

Their philosophy is: “*There is always a better way.*” “*If it works, it’s good.*”

**Table 7 - Using Honey and Mumford**

The aim of this list is to encourage you to use a diversity of learning modes in your writing or when you facilitate a training session.

<table>
<thead>
<tr>
<th>Pragmatist</th>
<th>Reflect</th>
<th>Theorist</th>
<th>Activist</th>
</tr>
</thead>
<tbody>
<tr>
<td>▪ Link the topic to their work</td>
<td>▪ Provide opportunities for them to observe</td>
<td>▪ Provide models, statistics and quotes</td>
<td>▪ Provide challenging simulations</td>
</tr>
<tr>
<td>▪ Show the practical benefits of the topic</td>
<td>▪ Use lectures, video or demonstration techniques</td>
<td>▪ Use group discussion to provide an opportunity for them to question and probe ideas</td>
<td>▪ Use educational games</td>
</tr>
<tr>
<td>▪ Use case studies</td>
<td>▪ Allow time for reflection</td>
<td>▪ Use case studies and readings</td>
<td>▪ Enjoy active roles in group discussion</td>
</tr>
<tr>
<td>▪ Ensure feedback with role plays</td>
<td>▪ Essay topics</td>
<td>▪ Use analogies</td>
<td>▪ Use team tasks or role plays</td>
</tr>
<tr>
<td>▪ Provide opportunities for practice</td>
<td>▪ Use self analysis questionnaires</td>
<td>▪ Provide problem-solving exercises</td>
<td>▪ Case studies and project assignments</td>
</tr>
<tr>
<td>▪ Encourage the use of learning logbooks or journals</td>
<td>▪ Give them interview tasks</td>
<td></td>
<td>▪ Problem solving activities</td>
</tr>
</tbody>
</table>
VARK

Is another model that attempts to deal with one dimension of the complex amalgam of preferences that make up a person’s learning style. VARK provides a means for exploring our preferences in how we take-in and give-out information whilst learning.

The acronym VARK stands for Visual, Aural, Read/write, and Kinesthetic perceptual modalities that are used for learning information. Fleming and Mills (1992) suggested four categories that seemed to reflect the experiences of their students. Although there is some overlap between categories, for purposes of our discussion, they are defined as follows.

Visual (V):
This preference includes the depiction of information in charts, graphs, flow charts, and all the symbolic arrows, circles, hierarchies and other devices that instructors use to represent what could have been presented in words.

*Visual learners like to see the whole picture. They are often swayed by the look of an object and are interested in colour, layout and design.*

Aural / Auditory (A):
This perceptual mode describes a preference for information that is "heard." Students with this modality report that they learn best from lectures, tutorials, tapes, group discussion, speaking, web chat, talking things through.

*Aural learners want this page explained to them. For them the written word is not as valuable as those they hear.*
Read / Write (R):
This preference is for information displayed as words. Not surprisingly, many academics have a strong preference for this modality. This preference emphasises text-based input and output - reading and writing in all its forms.

Read / write learners like this page because the emphasis is on words and lists. They believe meanings are within the words, so talk is OK but the written word is better.

Kinesthetic (K):
By definition, this modality refers to the "perceptual preference related to the use of experience and practice (simulated or real)." Although such an experience may invoke other modalities, the key is that the student is connected to reality, "either through experience, example, practice or simulation"

Kinesthetic learners want to experience things so they understand.
Ideas are only valuable if they sound practical, real and relevant. They need to do to understand.
### Table 8 – Using VARK to Improve Training Materials and Learning

<table>
<thead>
<tr>
<th>VARK Preference</th>
<th>Trainers and writers can improve learning by using or providing:</th>
</tr>
</thead>
</table>
| **Visual**      | - Pictures, videos, posters and slides  
                   - Flowcharts  
                   - Headings, bold text, colour, underlining and bullets to highlight key points  
                   - Diagrams and pictures  
                   - Graphs  
                   - Symbols  
                   - White space  
                   - Picture pages  
                   - Opportunities for learners to create diagrams, pictures, graphs, flowcharts etc. |
| **Aural / Auditory** | - Opportunities to discuss topics or issues  
                   - Tape recording an activity or discussion and then analysing this  
                   - Lectures or tutorials  
                   - Setting tasks that involve talking with others or presenting the material they have learnt  
                   - Providing quiet time for the learner to recall and reflect on what they have heard |
| **Read / write** | - Lists  
                   - Headings, bold text, colour, underlining and bullets to highlight key points  
                   - Glossaries and definitions  
                   - References for further reading  
                   - Essay tasks  
                   - Tasks that require diagrams, pictures or graphs to be described in writing  
                   - Manuals |
| **Kinesthetic**  | - Real life examples  
                   - Hands on learning experiences  
                   - Trial and error  
                   - Role plays  
                   - Tours or field trips  
                   - Solutions to problems |

Barriers to Learning

An important aspect to consider in the design, development and delivery of training or learning activities are the potential barriers to learning. These may relate to the people or organizations that provide the training or the learners themselves.

<table>
<thead>
<tr>
<th>Potential Barrier</th>
<th>Issue and suggestions to overcome</th>
</tr>
</thead>
</table>
| Language, Literacy and Numeracy    | Some 2.6 million people aged 15 to 74 have very poor literacy skills and could be expected to face considerable difficulties in using many printed materials that are encountered in everyday life. (Source ABS 1996)  
  ▪ Use plain English  
  ▪ Emphasis on pictorial learning materials  
  ▪ Pairing or “buddy” approaches  
  ▪ Ensure reference materials include simple texts |
| Diversity                          | Australia is characterized by diversity in gender, race, age, disability, sexual orientation, cultural background and socio-economic status.  
  ▪ Consider the diversity of potential learners in designing and writing materials  
  ▪ Include texts or examples that reflect a diversity of perspectives  
  ▪ Acknowledge the diversity of knowledge and experience of the learners  
  ▪ Provide a range of learning opportunities  
  ▪ Avoid using potentially offensive stereotypes or assumptions  
  ▪ Use plain English, explain acronyms and avoid colloquialisms  
  ▪ Actively discourage language that is racist, sexist, homophobic or demeans people |
<table>
<thead>
<tr>
<th>Potential Barrier</th>
<th>Issue and suggestions to overcome</th>
</tr>
</thead>
</table>
| **Disabilities** | In 1998, 3.6 million people in Australia had a disability (19% of the total population). A further 3.1 million had an impairment or long-term condition that did not restrict their everyday activities. Of those with a disability, 87% (3.2 million) experienced specific restrictions in core activities, schooling or employment.  
- Avoid fast paced or physically complex learning tasks  
- Attention to the physical environment that learning is to take place  
- Use plain English in training materials and where possible make them available in large print and electronic formats  
- Be flexible in your training options  
- Consider what support may need to be offered  
- Consider ‘reasonable adjustment’ in assessments |
| **Personal** | Adults frequently have significant constraints to their capacity or motivation to engage in learning activities. Family and work commitments frequently mean time is a premium. Other personal barriers may show up because of bad experiences in school or stigma attached to the lack of skills and knowledge.  
- Provide support and understanding for adults who are striving to learn  
- Some learning may need to be designed to affect a change in a learners belief and values systems  
- Accommodate different learning preferences in the design and delivery of training or learning  
- Be flexible  
- Ensure there is a match between the persons needs and the training or learning activities  
- Relate the training or learning to the learners performance  
- Build in opportunities for feedback and reinforcement |
<table>
<thead>
<tr>
<th>Potential Barrier</th>
<th>Issue and suggestions to overcome</th>
</tr>
</thead>
</table>
| **Isolation**    | Location of training venue or learning support in relation to the learner or other providers.  
|                  | ▪ Provide information or support for transport to the venue  
|                  | ▪ Consider how you can improve access to face-to-face and other forms of support when using ‘distance learning’ methods  
|                  | ▪ Facilitate networking with other learners or people who can mentor or coach the learner |
Writing Effective Training Materials

These days most of us have access to sophisticated computers and software that facilitates the production of professional looking materials. So what are the other elements that enable us to produce materials that support the achievement of outstanding learning outcomes?

First we need to know our audience and the intended use of the materials. As we outlined in the previous section on how we learn the things to consider in designing include:

- Adult learning principles and their implications for how writers structure their materials
- Learning style preferences and how these can inform our selection of learning materials and our use of language as we write
- Potential barriers to learning and how these can be overcome

For many trainers when we are faced with the task of writing training materials we find ourselves struggling to combine our knowledge of competencies, content, learning outcomes, instructional techniques and learning activities into a completed document. If you have ever found yourself in this situation you may find Robert Gagne’s (1999) model useful in providing a structured approach to developing your materials. This provides a nine steps that can assist you in your writing:

- Gain Attention – to orientate and motivate the learner
- Inform Learners of Objectives – to guide learners and to assist them to organize their thoughts around what they are about to learn
- Stimulate Recall of Prior Knowledge – because adults learn by establishing relationships with what they know and a new knowledge or skill
- Present the material – in a way that appeals to the different learning preferences and is easy to digest
- Provide guidance for learning – by providing opportunities to integrate new information into their existing knowledge base
- Elicit performance by providing safe opportunities to practice
- Provide feedback – to reinforce or correct learning
- Assess performance – learners should be given the opportunity for assessment to gain recognition of their success in learning
- Enhance retention and transfer – by encouraging learner to plan the application of what they have learnt

Robert Gagné's Nine Steps of Instruction

| **Gain Attention.** | Capture the learners attention at the start of each topic or learning activity by using such things as:
|                    | - A thought provoking question
|                    | - Storytelling
|                    | - Interesting facts
|                    | - Case studies

| **Inform Learners of Objectives** | Providing the learner with specific, measurable objectives that guide them in the learning process and assist the learner to organise their thoughts around what they are about to learn.
|                                | A good objective is not a description of the course contents rather they inform learners of what they will be able to do under what conditions and to what standards. Well framed objectives use specific verbs like:
|                                | - list
|                                | - identify
|                                | - state
|                                | - describe
|                                | - define
|                                | - solve
|                                | - compare and contrast
|                                | - operate
| **Stimulate Recall of Prior Knowledge** | This allows the learners to build on their previous knowledge or skills. It is easier for learners to encode and store information in long term memory when they can make linkages to their previous experiences and knowledge. |
| **Present the material** | Chunk the information and organise it to appeal to the different learning styles. Where possible use a variety of media. |
| **Provide guidance for learning** | This is not the presentation of content. It is assistance to facilitate the long term storage of the new knowledge. Approaches include use of examples, case studies, graphical representations and analogies. |
| **Elicit performance** | Provide the opportunity to practice by providing an opportunity for the learner do something with the newly acquired behaviour, skills, or knowledge. Repetition increases retention. |
| **Provide feedback** | As learners practice it is important to provide timely feedback on their performance. This feedback needs to be specific, not, "you are doing a good job" Tell them "why" they are doing a good job or provide specific guidance on how they can improve. |
| **Assess performance** | On completion of learning activities learners should be given the opportunity for assessment. (see formative assessment) |
| **Enhance retention and transfer** | Learners should be encouraged to plan the application of the learning and to consider how to maintain competence into the future. They may also be encouraged to review the learning process they have just completed. |
Unpacking a Training Package

As we have seen earlier in this handbook a training package and the associated qualifications are statements about what a person is competent to do in a workplace rather than the process by which such an outcome can be achieved. In preparing to write it is absolutely crucial that we:

- Have a detailed knowledge of the relevant competencies
- Can visualise what competent performance would look like in the workplace
- Use these understandings to make decisions on the structure, learning activities and content of the materials we are writing

One process that is commonly used in the preparatory phase of writing competency based materials is “unpacking” the competency. Using this process significantly decreases the risk that crucial elements of competence and their performance criteria will be overlooked, or that delivery and assessment may be reduced to a mechanistic and repetitive activity.

The “unpacking” process is completed for all elements in each unit of competency that the training or learning is being developed. The process may be summarised as follows:

- Each element within the unit competency needs to be analysed by considering the performance criteria
- For each performance criterion the writer then identifies the embedded knowledge and skills needed for performance. Many of the underpinning skills and knowledge are identified in the evidence guide section of the competency but a prudent writer will check this against their knowledge of the learner’s workplace
- The range statements and evidence guides should then be carefully examined for additional embedded knowledge and skills or to clarify already identified embedded knowledge and skills
- Finally the range of variables should be analysed to determine the context and conditions to which the performance criteria apply

Once the competency standard has been “unpacked” you will be able identify overlaps in knowledge and skills across the various elements or units of competency, enabling you to readily identify how to most efficiently structure the materials you are writing.
Choosing Learning Activities and Methods

This is a key aspect in providing the variety that engages all of the learners who use our materials in their learning activities. Careful selection and sequencing of learning activities and methods is fundamental in our development of professional training materials that really do work.

Determining and Sequencing your Content

One method I use in design and development of materials is to write all of the selected activities, methods and heading of my content on ‘post it’ notes. I then stick them on a wall or whyteboard near where I will be writing. I move them around till I’m happy with the framework of the materials.

Then, using these notes as a reference point, I begin writing.

Analogy

Analogies assist learners to make connections with the materials and what they already know. Many well-known concepts have been effectively explained using this technique. Examples include:

- The way data is organized and stored on a hard drive is like how we store hard copy information in an office. Information is partitioned and stored in folders, just like we do in filing cabinets.
- Organisations resist change in much the same way as a thermostat regulates the temperature in a room. When something happens that affects the organisation it’s thermostats kicks in and adjusts the way the organisation behaves to return it to the status quo. This is just like the thermostat in your air conditioning adjusting how much cooling or heating effort is made to maintain a steady temperature in your room.
Case Studies

Case studies are an excellent way of providing opportunities for analysis of ‘real world’ situations which pose problems for the learner to solve as well as a chance to apply or consolidate their learnings. Key issues to keep in mind in developing or selecting your case studies are:

- Making sure they are as realistic as possible for the learners
- Getting the right balance of complexity for the learners needs
- Ensuring enough background information about the characters, environment and the issues or problems is provided
- Being specific about the problem to be analysed or resolved
- Providing very clear instructions to the learners

You can also use short scenarios to provide learners with the opportunity of solving issues. Things like here is a situation what would you do? How do you think you would act in this situation? What could have been done instead?

Charts and Diagrams

Graphics improve the comprehension of underlying principles and maintain a viewer's interest. Modern software packages (eg Word, Excel, Powerpoint) enable us to quickly produce graphics, such as bar and pie charts, and detailed diagrams. Photographic images, ‘clip Art’ files or drawings can also be easily imported into a documents are writing.

Checklists

Checklists are simple tools that can be used for a variety of purposes. These include:

- At the end of a topic as a reminder and self affirmation by the learner of the key points
- For use in there workplace as a job aide
- To provide the learner with a method of determining if they are ready for assessment
- At the start of a topic to gain a learners attention
Instructional Games and Simulations

These can be excellent, and enjoyable, way for learners to become involved in the learning process with the risks associated with learning in their workplace. Some basic principles are provided by Silberman and Auerbach (1990) which should be considered in choosing or developing your games or simulations:

- They should be relevant to their needs and work situation
- The easiest way to create your own is to mimic the format and character of existing games and simulations (e.g. Jeopardy, Wheel of Fortune, Desert Survival, Monopoly etc)
- Modifying existing games and simulations to meet your needs
- Starting with fun or contrived games and moving and following with more serious, less contrived games later
- Make sure your instructions are well thought out and clearly communicated
- Make sure you provide adequate opportunities to discuss or reflect on what happened and what was (or could be) learnt

Mind Maps

Mind maps are graphical techniques that help us think and remember better, creatively solve problems and take action. Some uses included note taking and note making, essay planning and problem solving.

The subject of interest is depicted in a central image and then the main topics radiate out on branches. To create a mind map:

- get some plain paper and colour pens or pencils
- Draw your a picture that captures the subject you wish to map
- Add the branches, and sub branches to portray the topics. Feel free to use both words and images
- As thoughts about the subject occur to you add these to the appropriate branch or sub branch
- Use arrows to connect linked ideas
Models

Models, (eg Figure 3 on page 23 or Figure 4 on page 28) help us communicate complex ideas in a way that is more easily understood and remembered. It is relatively easy to draw these (an example is figure 1 which was drawn in Powerpoint) and cut and paste them into your materials.

Mnemonic Aids

Are used to assist learners in remembering key concepts or principles. An example is RATER, which reminds us of the five factors that clients use to rate the quality of service they receive.

- **Reliability** – striving to eliminate mistakes and errors
- **Assurance** – demonstrating to clients that they are valued
- **Tangibles** - the concrete things are delivered
- **Empathy** – how well the service provider understood how the other person felt and what they wanted
- **Responsiveness** – were the clients needs dealt with in a timely manner

Pictures

As the old adage says ‘A picture is worth a 1,000 words’.

They can also be very useful in creating context for what is being presented and for assisting learners to anchor the learning.
Stories

Are an excellent way of providing real examples of how the information you are providing works in the real world. It gives you an opportunity to share some of your experiences with the reader, as well as explore the content.

Self Tests, Quizzes and Questionnaires

Tests, quizzes and questionnaires all add variety to your training or learning materials. They are also powerful tools for gaining a learners attention, tapping into their past experiences and providing opportunities for learners to measure their progress. It is important that you consider how timely feedback on the answers will be given to the learner.

Writing Tasks

This activity allows an individual to reflect carefully on their own understanding. Writing activities can rage from short question and answer tasks, worksheets or recording brief descriptions or workplace events, through to longer assignments and research projects.
Copyright Considerations

Copyright is a real issue.

Copyright does not protect ideas, information, concepts, techniques or styles. What it does protect is the way a person expresses themselves, including the way they select and arrange material. Recent changes to the law in Australia have introduced the concept of moral rights. This means the creator of written materials has the right to:

- Be credited as the creator of the work
- Take action if their work is falsely attributed to someone else
- Take action if their work is used in a way that is prejudicial to their reputation

It is important for us all to remember that in Australian law a copyright notice does not have to be on a work for it to be protected by copyright. Reproducing or communicating copyright material without the copyright owner’s permission will usually infringe copyright. Reproducing or communicating part of a work may also infringe copyright.

There is always someone in a book or article that says exactly what you want to say, so be diligent when quoting from other sources and check to be sure you are not breaking copyright law. If you intend to use sections of someone else’s work, then you will need to seek permission from the author or publisher. This can be a lengthy process.

In many situations it is much better to paraphrase a person’s ideas or concepts and reference this in your writing.

For further information on copyright in Australia you may like to visit the Australia Copyright Council on the web at [www.copyright.org.au](http://www.copyright.org.au)
Writing Effective Training or Learning Materials

Your written materials may be used for a range of delivery styles and methodologies. It is important to be very clear about how your materials are intended to be used when designing and writing materials. In the National Volunteer Skills Centre project we have decided that our materials will be primarily used for instructor led learning and that in some situations they will be used for self paced learning. We refer to these materials as training guides (for trainers) or learning guides (for learners).

Many of us find it helpful to think of the learning materials we have used, especially those that engaged us in the learning process and helped us achieve significant outcomes. It is the way that some writers connect with us and take us on a journey through the content in a way that links us to experiences and knowledge embodied in the material. They do this by engaging us in thinking about the information and looking at ways of applying this as we progress. They also use a wide variety of learning activities and integrate adult learning principles to make learning much easier, quicker and enjoyable.

Writing effective training or learning materials requires knowledge, skill and effort. In preparation for writing consider that you need:

- To enjoy writing
- Knowledge of your subject area and be able to put time into research
- Relevant personal experience that you can draw upon
- Appropriate knowledge of instructional design, adult learning and training.
- To focus for periods of time without interruption

If you have never written training or learning materials before, then spend some time with people that have, talk about the issues that they faced and how they overcame these. Obviously their issues and solutions may not be the same as yours, but you will gain an understanding of strategies they use and you may be able to adapt some of these.
Developing Your Writing Style

We are all different, therefore we write differently. The issue is not what style you use but how well you connect with learners. When we write these materials they need to be real. (i.e. based on real examples or written so they are representative of what really happens) The person reading the materials needs to feel a link between what is written and themselves. This means that as writers we invest a part of ourselves in the materials we are creating. We use examples from our experiences, and those we have heard about (changing the names to protect confidentiality of course). It is not easy to build a relationship through the written word, but if learners are relying solely on written materials for their learning, this is what you must endeavour to do. It is a skill writers need to develop and use.

The materials that you write need to be appropriate to the range of people that will be using them. Your writing style also needs to reflect the nature of the information that you are presenting.

When we read materials we should be able to hear in our heads the writer, as if we know them. A good writer lets us know who they are. You can hear them reading to you as you move through the content. If we can hear you, then you are on the right track. This is particularly important for those who are going to rely solely on the written materials for their learning.

Stay with the one style of writing and check for consistency, or people may become confused.

If you are co-writing with others, make sure that the language and style is consistent. It’s okay for others to write different sections, but check the flow, style and language.
So what are the key points for developing your writing style?

- Know your audience. Who are they? What educational background do they have? How much time do they have? Are they going to have a facilitator or trainer to support their learning? Is English their first language? What cultural background do they relate to? etc

- Start where you want the learners to finish. This means you know your content. You should make sure you are conversant with the competency, that you have the big picture and can then look at it from an overall perspective

- Use your analysis of the competency to determine the topics. If you do use the elements as topics be aware that performance criteria are often repetitive because of common underpinning knowledge or skills

- Plan your materials. Consider the structure, length, style, diagrams, case studies, activities, illustrations, etc. Get the big picture and then write in a logical progression

- Don’t get bogged down with planning. Remember effort in writing is seldom wasted; you can move things around later (see writers tip on page 50). If your not completely sure of how or where to start, then just start where you can. In this day of computers. Some writers get the most interesting or exciting part done first. This gives them the momentum to get the rest done later

- Don’t hatch the first draft. It is no use to anyone if you sit on the draft looking to get it perfect before you give it to someone to look at. Get the ideas down, refine it once, then hand it over. The feedback will help clarify your thoughts, and it also gives you a space in time to find your objectivity again

- Remember that people learn differently. So develop your content to ensure your work flows easily and activities are incorporated in a relevant and useful way that engages the different learning styles

- Lead the learner though the learning process. You need to start at the basics, and gradually increase the degree of skill and knowledge to meet the ultimate goal – competence in the specified area. Ensure that your writing enables the learner to
sequentially develop an understanding of the concepts and enables them to develop the skills required

- Check that you have covered everything in the competency standard once you have finished your first draft
- Find reliable people to review your writing. People that understand training, learning styles and the subject area. Give them specific ideas of what you require feedback on and how you would like to receive the feedback

Improving your Writing

A number of principles underpin success in writing of training and learning materials that are effective in achieving their objectives. An article by Booher (1999) identified a number of tips to improve your training materials. These included:

**Using overviews instead of introductions.**
Instead of just mentioning the contents or learning outcomes to introduce a topic, writers should use overviews to provide the learner with the key concepts and to elicit interest.

**Make the dialogue sound real, not stilted.**
Use clear, crisp and simple language that reflects authentic speech. Then once you’ve written it read it out loud or get someone else to read your words. That way we hear sentences that don't ring true, or that sound too stilted. Then edit straight away, while the words are fresh in your mind.

**Create intriguing case studies and role plays.**
Use real-sounding names and situations relevant to the learners. Provide a clear, succinct statement of the issue to be identified or resolved. Then provide a launch statement for the participants to wade into the activity.

**Position ideas for emphasis.**
Position ideas and information so that they get the attention they require. The most important spot in a paragraph is the first sentence and the most important spot in a sentence is at the end. To convey to a learner “this information is the most important,” take advantage of the impact of climactic sentences.
**Vary sentence pattern and length.**
Besides using an active voice pattern sentence variety makes readers to sit up and take notice. Also don’t let paragraphs go too long, some writers advise no longer than 10 sentences. Remember paragraphs function visually to rest the eye as much as the mind.

**Make every word count.**
Use strong verbs and active voice to capture the learners attention. Keep a sharp focus and make every word contribute to the information you wish to convey.

**Pay attention to grammar.**
Careless writing obscures information. Avoid unnecessary tense changes. Make items in a list parallel in construction; equal ideas get equal structure. The items should be all phrases or all full sentences. They should all start with verbs or all start with adjectives. Grammar is not a nitpicking matter. Errors can change the meaning of your words and confuse participants. Garbled sentences lead to garbled information and learning.

**Create an eye-appealing layout.**
When finished with the draft, take another look. Learners judge the complexity of content by the look of the page or screen. Ask yourself these questions:

- Would a learner who skimmed the headings know all of the key concepts (not just topics) in the course? If not, make your headings more informative.
- Do all of the graphs and charts have informative captions?
- Have you used sidebars and pullouts to emphasise key information?
- Is the white space sufficient to keep learners from being overloaded?
- Have you used (sparingly) typographical effects such as bolding, different font sizes, and italics for impact and clarity?
Key Elements in a Learners Guide

As previously stated we all write differently, but there are some elements that seem to be used frequently in learning materials, so the following section provides some tips that you may incorporate in writing your materials.

Overview

If you are writing training or learning materials that have more than one topic it is useful to give the learner an overview of the whole unit of work. This provides the key concepts and allows you to gain the interest of the learner from the beginning.

Introducing the style, format and expectations

If you are going to be using symbols or icons, then you need to explain the use of these to the learner before they start their study. This gets them used to the icons and what this means for them.

This is also an opportunity to introduce any other information that may help the learner with the study they are about to start. This could be things like, is there a recommended order for topic study? In some cases they may be able to do some of the later topics before they do the first one.

Topics

People are in general are familiar with topics of content. This means that this section is going to deal with a common theme or content that relates. So give each topic a relevant title that attracts the learners attention and signals what is covered by the section.

In some competency based materials the elements are used as topic headings in others the needs analysis or the process of unpacking the competency leads to decisions to use different topics.

Each topic needs an introduction to set the overall tone of what the person should expect to be covering.
Sub Headings

Each time you are moving into a new section then give it a heading. This provides an immediate focus for the learner. Headings also help to break up the text, and give the learner an opportunity to pause or leave the study with a feeling of having completed the section. The performance criteria or analysis of underpinning skills and knowledge may be a guide to identifying relevant headings.

Time

Some writers like to give the learner or trainers an idea of how much time it should take to complete or facilitate each part. This can be useful. But be aware of the message you may be giving learners if they do not complete the work in your time frame. We all learn at different rates and competency based approaches to training should recognize this fact.

Symbols and Icons

Symbols and icons are great when you are directing a learner to do something different from reading. They attract the learners attention and cue them for what is task or activity is required. Think about the types of directions you may want to give, and pick some symbols to match the requirements. Common ones are – writing, reading, research, think, reflect, discuss – two examples are included below.

Reading Required

![Reading Required Icon]

Writing Required

![Writing Required Icon]
Activities

Remember that variety in your learning activities is important. So provide lots of opportunities for the person to do something with the information you are providing. Depending on their learning preferences people will learn best by doing, engaging, reflecting or thinking. So refer to pages 42-46 when you are selecting your activities and methods.

Learners could be asked to apply knowledge to a case study, reflect on their own workplace, discuss with others and so on. We like to put at least one activity in at the end of each section of content to cement the content and explore the application. Don’t forget skills assessment tools (and supply the answers at the end), a short quiz (again with answers at the back), getting some research completed, or a group discussion.

Skills assessment tools should include all that is relevant to the content, and requires application of skills and knowledge just learnt. The information that these (and some other learning activities) generate can also be used as evidence in formal assessment of competency.

Feedback

If you have set an activity, which is vital to the learner’s progression, then you may want to provide feedback.

This could include an activity that checks understanding or application, something they need to be clear about - then provide feedback. Something like - did you consider….? Did you think of….? This gives them an opportunity to check their progress and to make sure they are on track. Sure, they may skip straight to your answers, but as long as they read them they are progressing.

Feedback provides you with an opportunity to communicate directly with the learner and for example to emphasise important points, expand their thinking and to make sure they understand.
Content

This is the part that is about expanding peoples skills and knowledge and in some situations providing an opportunity for learners to explore their underpinning values and beliefs. Content needs to be in manageable chunks to facilitate learners processing of the new information.

It also needs to be progressive to lead the person down a learning pathway. It must be structured to lead and build easily from one part to the next.

It is also important to link information. Competency is about a big picture understanding as well as a focus on specific parts. You need to write to show the links, do not expect the learner to do this without your assistance.

Use language that is easily understood and if you wish to introduce new words, concepts or jargon, then explain it the first time you use it.

Vary the length of your paragraphs and avoid overly long paragraphs as learners can get lost in them. Long sentences can cause the same problems.

Text size, dot points, bold text and underlining are great for providing a simple emphasis, they also serve to break up the page and increase retention of learning.

White Space

Training or learning materials must be easy to read. The use of White space is an important layout technique often overlooked by the inexperienced writer. For our materials to be visually appealing we must provide an adequate amount of white space.

Without this text is more difficult to read, graphics lose their emphasis and seems to be little balance between the elements on a page.

This means lots of white space such as borders, margins and gaps between paragraphs. We like to use bigger spaces between paragraphs than we do between sentences; this increases the white space while not taking up too much more space. Choose a font that is easy to read and has white space in it. Studying should be easy, so make your materials easy on the eye. Look around at examples you have to help you decide how you will use ‘white space’ in your documents.
Learning Material Summary

We think it helps to put a summary at the end of each topic. This provides a form of closure for the information that you have been giving. It is also an excellent opportunity to go over the main points one more time.

You may also like to use a summary at the end of a section of information if you feel that it would help focus the reader.

References and Resources

It is important to include a bibliography with your materials, particularly if you have referred to other sources of information. Even if you have not directly quoted from other publications, people are often interested in your sources of inspiration and ideas. Information in the bibliography should, where appropriate, include relevant websites, videos and journals in addition to books.

Cover and Binding

The presentation of your materials is important. It’s not about spending a million dollars, however the care you take in your presentation shows that you are:

- proud of what you have done
- identifies the materials
- provides a resource they may use in future

We have found that most people like training or learning materials that they can put in a folder, but then most of our learners study whole qualifications. Others like to ring bind their materials. The choice is yours and will depend on what you are presenting and what and where it will be used, for example training or learning materials designed for learners studying aquaculture have plastic covers back and front to try and avoid water damage.

The type of binding you use may affect the margins so decide before you finish the final documents.
Summary

Well, thank you for joining us on this journey; we hope that the information has been relevant and useful to you. Most of all we hope that we have provided you with enough information to become a writer of training or learning materials. Completing and then seeing your materials used successfully is one of the most satisfying and stimulating things that you can achieve.

If you do not enjoy writing then it is highly likely the materials will not do you credit, and your discontent will show in the writing. If you find yourself in this situation you should take time to identify the cause and determine if there is a way of dealing with the problem.

Each time you are involved in writing training or learning materials you have an opportunity to learn. Not only do you learn more about the content but you also are presented with a significant reflective learning opportunity. By taking time out to after you have completed the task of writing reflect on:

- what you did
- what worked and why it worked
- what could be improved and what you need to do in response to this new knowledge

This is what will significantly improve you writing capacity.

Good luck with your writing – have fun and enjoy!
## Glossary

<table>
<thead>
<tr>
<th><strong>Access and Equity</strong></th>
<th>A policy or set of strategies to make vocational education and training available to all members of the community, to increase participation and to improve outcomes, particularly focussing on those groups that have been traditionally under-represented, especially women, indigenous Australians, people with a disability, people from a non-English-speaking background, and people from rural and remote areas.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Accreditation</strong></td>
<td>Formal recognition of a course by the State or Territory course accrediting body in accordance with the <em>Standards for State and Territory Registering / Course Accrediting Bodies (ANTA 2001)</em>.</td>
</tr>
<tr>
<td><strong>Accredited course</strong></td>
<td>A structured sequence of vocational education and training that leads to an Australian Qualifications Framework qualification or Statement of Attainment.</td>
</tr>
<tr>
<td><strong>Adult learning</strong></td>
<td>The processes by which adults learn and build on their existing knowledge and skills.</td>
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<tr>
<td><strong>ANTA</strong></td>
<td>See Australian National Training Authority.</td>
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<tr>
<td><strong>AQF</strong></td>
<td>See Australian Qualifications Framework.</td>
</tr>
<tr>
<td><strong>AQTF</strong></td>
<td>See Australian Quality Training Framework.</td>
</tr>
<tr>
<td><strong>Assessment</strong></td>
<td>The process of gathering and judging evidence in order to decide whether a person has achieved a standard or objective. See also competency-based assessment.</td>
</tr>
<tr>
<td><strong>Assessment guidelines</strong></td>
<td>An endorsed component of a Training Package which underpins assessment and which sets out the industry approach to valid, reliable, flexible and fair assessment. Assessment guidelines include information concerning: assessment system overview, assessor requirements, designing assessment resources, conducting assessment, sources of information on assessment.</td>
</tr>
<tr>
<td><strong>Assessment materials</strong></td>
<td>An optional component of Training Packages that complement endorsed industry assessment guidelines and could take the form of assessment exemplars or specific assessment tasks and instructions.</td>
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<tr>
<td><strong>Assessment tool</strong></td>
<td>A method for the gathering of evidence for assessment, such as a knowledge test or a checklist of practical performance.</td>
</tr>
<tr>
<td><strong>Assessor</strong></td>
<td>A person qualified to carry out assessment.</td>
</tr>
<tr>
<td><strong>Australian National Training Authority (ANTA)</strong></td>
<td>A Commonwealth statutory authority with responsibility for the development of national policy, goals and objectives for the vocational education and training sector; the development, management and promotion of the National Training Framework; the administration and funding of national programs; and the collection and analysis of national statistical data on the vocational education and training system. See also ANTA Board, ANTA CEOs’ Committee, ANTA Ministerial Council.</td>
</tr>
<tr>
<td><strong>Australian Qualifications Framework (AQF)</strong></td>
<td>A nationally consistent set of qualifications for all post-compulsory education and training in Australia.</td>
</tr>
<tr>
<td><strong>Australian Quality Training Framework (AQTF)</strong></td>
<td>The nationally agreed recognition arrangements for the vocational education and training sector. The Australian Quality Training Framework is based on a quality assured approach to the registration of training organisations seeking to deliver training, assess competency outcomes and issue Australian Qualifications Framework qualifications and/or Statements of Attainment and ensures the recognition of training providers and the Australian Qualifications Framework qualifications and Statements of Attainment they issue, across Australia.</td>
</tr>
<tr>
<td><strong>Competency</strong></td>
<td>(Also competence) the ability to perform tasks and duties to the standard expected in employment.</td>
</tr>
<tr>
<td><strong>Competency Based Assessment (or CBA)</strong></td>
<td>The gathering and judging of evidence in order to decide whether a person has achieved a standard of competence.</td>
</tr>
<tr>
<td><strong>Competency Based training (or CBT)</strong></td>
<td>Training which develops the skills, knowledge and attitudes required to achieve competency standards.</td>
</tr>
<tr>
<td><strong>Competency Standard</strong></td>
<td>An industry-determined specification of performance which sets out the skills, knowledge and attitudes required to operate effectively in employment. Competency standards are made up of units of competency, which are themselves made up of elements of competency, together with performance criteria, a range of variables, and an evidence guide. Competency standards are an endorsed component of a training package.</td>
</tr>
<tr>
<td><strong>Contextualisation</strong></td>
<td>The addition of industry or enterprise specific information to a unit of competency to improve the standards relevance to industry.</td>
</tr>
<tr>
<td><strong>Copyright</strong></td>
<td>The exclusive legal right to reproduce, publish or otherwise control the use of a work, granted to the creator, author, composer, artist, publisher, etc. for a specified period.</td>
</tr>
<tr>
<td><strong>Course</strong></td>
<td>A structured and integrated program of education or training, usually consisting of a number of modules (subjects) or shorter programs, and leading to the award of a qualification.</td>
</tr>
<tr>
<td><strong>Customisation</strong></td>
<td>Tailoring to individual requirements; (in vocational education and training) the process of tailoring a program to meet the specific needs of clients. Customised qualifications are devised by Registered Training Organisations, created through combining competency standards drawn from two or more different endorsed Training Packages to create a new qualification outcome. Such qualifications must meet the requirements of the Australian Qualifications Framework, the Customisation Policy of the National Training Quality Council and the customisation advice of the relevant Training Packages.</td>
</tr>
<tr>
<td><strong>Distance Education (also called external studies)</strong></td>
<td>A mode of education in which learners enrolled in a course do not attend the institution, but study off-campus and may submit assignments by mail or email.</td>
</tr>
<tr>
<td><strong>Element of competency</strong></td>
<td>Any of the basic building blocks of a unit of competency which describe the key activities or elements of the work covered by the unit.</td>
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<tr>
<td><strong>Endorsed component</strong></td>
<td>The central part of a training package, endorsed by the National Training Quality Council, comprising competency standards, assessment guidelines and qualifications. Compare non-endorsed component.</td>
</tr>
<tr>
<td><strong>Equity</strong></td>
<td>Fairness, social justice. In vocational education and training, equity policy incorporates measures to improve access to, participation in, and outcomes of vocational education and training for those who may be disadvantaged or have traditionally been under-represented, especially indigenous Australians, people with a disability, women, people in remote and rural communities, and people from a non-English-speaking background.</td>
</tr>
<tr>
<td><strong>Evaluation</strong></td>
<td>The process or results of an assessment or appraisal in relation to stated objectives, standards, or criteria; in vocational education and training may be applied to organisations, programs, policies, courses, etc.</td>
</tr>
<tr>
<td><strong>Evidence Guide</strong></td>
<td>The part of a competency standard which provides a guide to the interpretation and assessment of the unit of competency, including the aspects which need to be emphasised in assessment, relationships to other units, and the required evidence of competency.</td>
</tr>
<tr>
<td><strong>Facilitator</strong></td>
<td>A person who helps learners learn by discovering things for themselves.</td>
</tr>
<tr>
<td><strong>Instructional Design</strong></td>
<td>The design and development of instructional materials and learning activities to meet learning needs.</td>
</tr>
<tr>
<td><strong>Integrated Assessment</strong></td>
<td>An approach to assessment that covers multiple elements and/or units of competence from relevant competency standards. The integrated approach attempts to combine knowledge, understanding, problem solving, technical skills, attitudes and ethics into an assessment task with the aim of reducing the time spent on testing as well as making assessment more ‘authentic’.</td>
</tr>
<tr>
<td><strong>Key Competency</strong></td>
<td>Any of several generic skills or competencies considered essential for people to participate effectively in the workforce. Key competencies apply to work generally, rather than being specific to work in a particular occupation or industry. The Finn Report (1991) identified six key areas of competence which were subsequently developed by the Mayer committee (1992) into seven key competencies: collecting, analysing and organising information; communicating ideas and information; planning and organising activities; working with others and in teams; using mathematical ideas and techniques; solving problems; and using technology.</td>
</tr>
</tbody>
</table>
| **Learning** | (1) The process of acquiring knowledge, attitudes, or skills from study, instruction, or experience. Source: Miller & Findlay 1996, p.167  
(2) The knowledge, attitudes, or skills acquired. |
| **Learning Strategy** | A non-endorsed component of a training package which provides information on how training programs may be organised in workplaces and training institutions. This may include information on learning pathways, model training programs, and training materials. |
| **Logbook** | A record kept by a person of the knowledge, skills or competencies attained during on-or off-the-job training. |
| **Module**  
(also called subject) | A unit of education or training which can be completed on its own or as part of a course. Modules may also result in the attainment of one or more units of competency. |
<table>
<thead>
<tr>
<th><strong>Non Endorsed Component</strong></th>
<th>The parts of a training package not required to be endorsed by the National Training Framework Committee, including support materials for learning, training, assessment, and professional development.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Performance Criteria</strong></td>
<td>the part of a competency standard specifying the required level of performance in terms of a set of outcomes which need to be achieved in order to be deemed competent.</td>
</tr>
<tr>
<td><strong>Performance Indicator</strong></td>
<td>A criterion or measure for monitoring or evaluating the efficiency or effectiveness of a system or service, which may be used to demonstrate accountability and to identify areas for improvement.</td>
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<td>(also performance measure)</td>
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</tr>
<tr>
<td><strong>Range of Variables</strong></td>
<td>The part of a competency standard which specifies the range of contexts and conditions to which the performance criteria apply.</td>
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<tr>
<td>(also called range statement)</td>
<td></td>
</tr>
<tr>
<td><strong>Recognition</strong></td>
<td>The formal approval of training organisations, products and services operating within the vocational education and training sector (as defined by State and Territory legislation).</td>
</tr>
<tr>
<td><strong>Recognition of Prior Learning</strong> (or RPL)</td>
<td>The acknowledgement of a person’s skills and knowledge acquired through previous training, work or life experience, which may be used to grant status or credit in a subject or module.</td>
</tr>
<tr>
<td><strong>Registered Training Organisation</strong> (or RTO)</td>
<td>An organisation registered by a State or Territory recognition authority to deliver training and/or conduct assessments and issue nationally recognised qualifications in accordance with the Australian Quality Training Framework. Include TAFE colleges and institutes, adult and community education providers, private providers, community organisations, schools, higher education institutions, commercial and enterprise training providers, industry bodies and other organisations meeting the registration requirements.</td>
</tr>
<tr>
<td><strong>Reliability</strong></td>
<td>The consistency of an assessment outcome; for example, different assessors using the same evidence making the same judgement, or the same assessor making the same judgement about the same evidence on different occasions.</td>
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<tr>
<td>(in assessment)</td>
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<tr>
<td><strong>Self Assessment</strong></td>
<td>A process in which learners or organisations assess their own performance against particular standards or criteria; (in competency-based training) a process in which learners assess their own performance against competency standards; (in quality endorsement) a process in which an organisation assesses the extent to which it satisfies the criteria for quality endorsement, identifying opportunities for improvement.</td>
</tr>
<tr>
<td><strong>Self Directed Learning</strong></td>
<td>Learning in which the learner is the principal driving force, deciding how, when, and at what pace learning takes place.</td>
</tr>
<tr>
<td><strong>Short Course</strong></td>
<td>A course of vocational education and training which stands alone and does not usually lead to a full qualification. A statement of attainment may be issued on successful completion.</td>
</tr>
<tr>
<td><strong>Statement of Attainment</strong></td>
<td>Certification issued to a learner for partial completion of a qualification, including, where relevant, the units of competency achieved under nationally endorsed standards. Achievements recognised by statements of attainment can accumulate towards a qualification within the Australian Qualifications Framework.</td>
</tr>
<tr>
<td><strong>Training</strong></td>
<td>The development of skills, knowledge, attitudes, competencies, etc. through instruction or practice.</td>
</tr>
<tr>
<td><strong>Training Package</strong></td>
<td>An integrated set of nationally endorsed standards, guidelines and qualifications for training, assessing and recognising people’s skills, developed by industry to meet the training needs of an industry or group of industries. Training packages consist of core endorsed components of competency standards, assessment guidelines and qualifications, and optional non-endorsed components of support materials such as learning strategies, assessment resources and professional development materials.</td>
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</tr>
<tr>
<td><strong>Unit of Competency</strong></td>
<td>A component of a competency standard. A unit of competency is a statement of a key function or role in a particular job or occupation. See also element of competency, performance criteria, range of variables</td>
</tr>
<tr>
<td><strong>Validity</strong></td>
<td>The soundness of the interpretation and use of the results of an assessment.</td>
</tr>
<tr>
<td><strong>Vocational Education and Training (VET)</strong></td>
<td>Post-compulsory education and training, excluding degree and higher level programs delivered by higher education institutions, which provides people with occupational or work-related knowledge and skills. VET also includes programs which provide the basis for subsequent vocational programs. Alternative terms used internationally include technical and vocational education and training (TVET), vocational and technical education and training (VTET), technical and vocational education (TVE), vocational and technical education (VTE), and further education and training (FET).</td>
</tr>
<tr>
<td><strong>Workplace Assessment</strong></td>
<td>The gathering and judging of evidence during normal work activities in order to determine whether a required standard has been achieved. Workplace assessment usually involves observation of work in progress, checking the product(s) of a work activity, and receiving oral responses to questions posed while work is in progress.</td>
</tr>
</tbody>
</table>

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Resources

Internet

- The Australian National Training Authority at http://www.anta.gov.au
- The National Training Information Service at http://www.ntis.gov.au
- The Resource Generator at http://www.resourcegenerator.gov.au
- Peterhoney.com - the home of the Honey and Mumford Learning Styles Questionnaire at http://www.peterhoney.co.uk/main/

Books and Articles


Mager, Robert Frank & Pipe, Peter (1997) Analyzing performance problems, or, You really oughta wanna : how to figure out why people aren't doing what they should be, and what to do about it. Atlanta, GA: Center for Effective Performance


Attachment 1 – A Unit of Competency

(BSZ508A) DESIGN TRAINING COURSES

Description

This unit covers the requirements and responsibilities for designing training courses as part of a training system to meet client identified outcomes and where appropriate, receive formal recognition.

Elements of Competency and Performance Criteria

<table>
<thead>
<tr>
<th>National Code</th>
<th>Element Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>BSZ508A/01</td>
<td>Determine the need for a course</td>
</tr>
<tr>
<td></td>
<td>▪ Stakeholders are identified and consulted to establish training aims and requirements</td>
</tr>
<tr>
<td></td>
<td>▪ Course proposal is outlined in terms of stakeholders' aims</td>
</tr>
<tr>
<td></td>
<td>▪ Relevant endorsed training packages and curriculum are sourced and assessed for relevance to course proposal</td>
</tr>
<tr>
<td></td>
<td>▪ Any licensing/regulatory or government policies relevant to the course proposal are identified</td>
</tr>
<tr>
<td></td>
<td>▪ Potential employment markets and career opportunities for training participants are recorded and documented</td>
</tr>
<tr>
<td></td>
<td>▪ Results of monitoring activities for related courses are sourced and analysed, where appropriate</td>
</tr>
<tr>
<td>BSZ508A/02</td>
<td>Identify the learner profile</td>
</tr>
<tr>
<td></td>
<td>▪ Potential learners are identified</td>
</tr>
<tr>
<td></td>
<td>▪ Profiles of learners on entry to the course are developed and learner profiles are examined to determine language and literacy requirements</td>
</tr>
<tr>
<td>BSZ508A/03</td>
<td>Develop course structure</td>
</tr>
<tr>
<td></td>
<td>▪ Core and elective units/modules are identified</td>
</tr>
<tr>
<td></td>
<td>▪ The relationship between units of competence/modules and course outcomes is documented</td>
</tr>
<tr>
<td></td>
<td>▪ Entry and exit points are identified and documented</td>
</tr>
<tr>
<td></td>
<td>▪ Prerequisites for the course and for specific units/modules within the course are identified and documented</td>
</tr>
<tr>
<td>BSZ508A/04</td>
<td><strong>Determine the training and assessment requirements</strong></td>
</tr>
<tr>
<td>------------</td>
<td>-------------------------------------------------------</td>
</tr>
<tr>
<td></td>
<td>• The professional development and competency requirements of trainers and assessors are identified in consultation with appropriate personnel</td>
</tr>
<tr>
<td></td>
<td>• The trainer and assessor requirements are checked for consistency with industry/training package assessment guidelines, where appropriate</td>
</tr>
<tr>
<td></td>
<td>• Essential learning resources, materials, facilities, equipment and human resources are identified</td>
</tr>
<tr>
<td>BSZ508A/05</td>
<td><strong>Define the training content</strong></td>
</tr>
<tr>
<td></td>
<td>• The competencies to be acquired by learners are clearly specified</td>
</tr>
<tr>
<td></td>
<td>• Entry level competencies are identified and documented</td>
</tr>
<tr>
<td></td>
<td>• Requirements for on the job training or assessment are identified and documented</td>
</tr>
<tr>
<td></td>
<td>• Appropriate evidence and assessment methods are identified and documented</td>
</tr>
<tr>
<td>BSZ508A/06</td>
<td><strong>Develop course monitoring arrangements</strong></td>
</tr>
<tr>
<td></td>
<td>• Mechanisms for ongoing course monitoring are negotiated, agreed and documented in consultation with appropriate personnel</td>
</tr>
<tr>
<td></td>
<td>• Arrangements to enable course outcomes to be evaluated against relevant performance indicators including industry/enterprise competency standards and learner needs are defined and documented</td>
</tr>
<tr>
<td>BSZ508A/07</td>
<td><strong>Identify career/educational pathways</strong></td>
</tr>
<tr>
<td></td>
<td>• Course entry and exit points are linked to occupational and educational opportunities</td>
</tr>
<tr>
<td></td>
<td>• Articulation points with higher or related qualifications are identified, negotiated with course owners and documented</td>
</tr>
</tbody>
</table>
**RANGE OF VARIABLES**

Stakeholders and relevant parties may include:

<table>
<thead>
<tr>
<th>Stakeholders and Relevant Parties</th>
<th>Relevant Variables</th>
</tr>
</thead>
<tbody>
<tr>
<td>professional associations</td>
<td>Licensing, regulatory and government policies may include:</td>
</tr>
<tr>
<td>employer associations</td>
<td>• relevant policies or agreement(s) on any of the following:</td>
</tr>
<tr>
<td>union/employee associations</td>
<td>- purposes of training and assessment</td>
</tr>
<tr>
<td>secondary, TAFE/VET and higher education sector representatives</td>
<td>- human resource management issues</td>
</tr>
<tr>
<td>potential learners</td>
<td>- what and who are to be trained/assessed</td>
</tr>
<tr>
<td>trainers/trainers</td>
<td>- timing of training/assessments</td>
</tr>
<tr>
<td>regulatory authorities</td>
<td>- links with other human resources functions</td>
</tr>
<tr>
<td>partner organisations</td>
<td>- appeal/review mechanisms</td>
</tr>
<tr>
<td>employer associations</td>
<td>- criteria for making decisions of competent, or not yet competent</td>
</tr>
<tr>
<td>union/employee associations</td>
<td>- number of assessors</td>
</tr>
<tr>
<td>secondary, TAFE/VET and higher education sector representatives</td>
<td>- allowable adjustments to the assessment procedure</td>
</tr>
<tr>
<td>potential learners</td>
<td>- record keeping requirements</td>
</tr>
<tr>
<td>trainers/trainers</td>
<td>- recognition of prior learning/recognition of current competencies</td>
</tr>
<tr>
<td>regulatory authorities</td>
<td>- qualifications framework and regulations for issuing statements of attainment, qualifications</td>
</tr>
<tr>
<td>partner organisations</td>
<td>• relevant equal employment opportunity and anti-discrimination legislation, regulations and policies</td>
</tr>
<tr>
<td>enterprise(s)/organisation(s)</td>
<td>• relevant licensing or accreditation arrangements</td>
</tr>
<tr>
<td>industry training advisory bodies</td>
<td></td>
</tr>
<tr>
<td>industry sector</td>
<td></td>
</tr>
<tr>
<td>government bodies</td>
<td></td>
</tr>
<tr>
<td>community sector</td>
<td></td>
</tr>
</tbody>
</table>
- development costs and resources
- evaluation
- licensing.

A training course proposal may include:

| · stakeholder(s) aims and objectives | · career and educational pathways |
| · course outcomes                   | · scope and need for course.     |
| · identified learners               |                                |

A training course may include:

| ▪ suite of training programs (or modules) | ▪ courses may be designed and documented (curriculum) to:- |
|                                          | - meet a whole or part qualification in a training package |
|                                          | - be submitted for formal recognition |
|                                          | - meet industry/enterprise competency standards |
|                                          | - meet stakeholder aims and objectives. |

Learner profiles might include:
- generic or technical competencies of potential clients
- relevant prior learning (formal and informal) and employment
- language, literacy and numeracy skills.

Course outcomes may include:
- qualifications
- units of competence
- learning outcomes (module/program outcomes)
- satisfaction of requirements for
- licensing
- memberships of professional associations
- further education opportunities
- employment.

Course monitoring arrangements may include:

- panel of external evaluators
- feedback from learners - during and after course delivery
- survey responses from industry/enterprises about the course outcomes
- moderation mechanisms of assessment decisions
- conduct of regular internal and external reviews
- sampling and evaluation of competencies
- networking of trainers and assessors involved in course implementation.

Appropriate personnel may include:

- support personnel (administration)
- technical experts (eg. language and literacy specialists)
- supervisors/managers
- assessment/training personnel
- other training organisations (partners)
- existing and former learners.

Course requirements

- entry requirements may include
  - pre requisite competencies
  - access to the workplace.
- training requirements may include
  - job placement
  - field placement
  - access to specialist equipment and facilities
  - minimum competencies to be held by trainers.
- assessment requirements may include:
  - minimum competencies to be held by assessors
- assessment conditions including location, timing and access to resources.

Sources of information / documents may include:

- performance standards which may include:
  - industry/enterprise competency standards
  - licensing requirements
  - job descriptions
  - standard operating procedures.

- conditions of service, legislation and industrial agreements including:
  - workplace agreements and awards
  - occupational health & safety procedures.

- applicable State, Territory, Commonwealth legislation and related regulations concerning:
  - occupational health & safety in terms of duties of employers, employees, suppliers and contractors
  - workplace relations
  - workers compensation
  - equal opportunity, anti-discrimination and affirmative action.

**EVIDENCE GUIDE**

**Critical aspects of evidence**

Assessment requires evidence of the following products to be collected:

- Documentation on the identification and confirmation stakeholder training aims and requirements
- Course proposal
- Course documentation
- Documentation on course monitoring mechanisms
- Description of career pathways, including qualification entry and exit points.

Assessment requires evidence of the following processes to be provided:

- How stakeholder needs were identified
- How the learner profile was researched
• How assessment and training requirements were researched
• How the course monitoring arrangements were developed.

INTERDEPENDENT ASSESSMENT OF UNITS
This unit of competency may be assessed in conjunction with other units that form part of a job role.

Required knowledge and skills
• Knowledge of mechanisms to implement relevant access and equity principles
• Knowledge of relevant training packages, competency and other performance standards to course proposal
• Knowledge of accreditation and any licensing or regulatory requirements
• Knowledge of course monitoring mechanisms
• Compliance with requirements for copyright and other regulatory requirements
• Language and literacy skills to collect and interpret irrelevant information relevant and communicate with stakeholders and appropriate personnel.
• Skills in planning own work including predicting consequences and identifying improvements
• Communication skills appropriate to the culture of the workplace
• Skills in applying OHS and other workplace policies and procedures and any related legislation or regulatory requirements

Resource implications
Access to stakeholders, information and resources to meet the required skills and knowledge and to develop course proposal, course documentation and course monitoring mechanisms.

Consistency in performance
Competency in this unit needs to be assessed over a period of time, in a range of contexts and on multiple occasions involving a combination of direct, indirect and supplementary forms of evidence.

Context for assessment
Assessment may occur on the job or in a simulated workplace.
Attachment 2 – NVSC Writers Checklist

Writers of NVSC materials and those who contextualise NVSC materials for use with specific audiences are encouraged to use this checklist.

☐ I am familiar with the Design Training Courses competency (BSZ508A – Attachment 1)

☐ I have reviewed information that is available on the training needs (this may be a formal Training Needs Analysis) and determined how this relates to the module I am about to write or modify.

☐ I know the audience who will use the training or learning materials. (If writing generic materials the NVSC personas provide this information)

☐ I understand adult learning principles and learning styles and use these to enhance the effectiveness of the training and learning materials I write.

☐ I am conversant with the competency standard (e.g. I have unpacked the competency) and can directly relate this to what learners need to know in order to demonstrate competence against their industry standards

☐ I have been given information on the assessment strategy or will develop this as part of the writing task.

☐ I can visualise what effective performance of the competency would look like in the workplace.

☐ I have an appropriate level of subject matter expertise (or ready access to this) and the associated theory.

☐ I have prepared an outline for the materials I am about to write. Topics have been determined by an analysis of the competency, the training needs and the intended audience.

☐ I have selected and sequenced an appropriate range of learning activities or methods, for inclusion in the materials I am writing. This is based on the learning objectives, the learners, adult learning principles, learning styles and my outline.
Learning activities or methods I am conversant with and typically consider using include those listed on pages 42 – 46 of this handbook.

My writing reflects the wide diversity of people in our volunteering community.

I have considered Language, Literacy and Numeracy (LL&N) needs.

My material includes the use of flowcharts, tables, lists, graphics, charts and models to help learners organise information.

I use bold type and large font to draw attention to vital information.

I regularly seek feedback on what I have written.
Attachment 3 – ANTA QUALITY PRINCIPLES

FOR TRAINING PACKAGE SUPPORT MATERIALS

SUGGESTED INDICATORS

1. Foundation

Training Package support materials must identify and support units of competency from endorsed Training Packages.

Does the material:

- Clearly identify and accurately support the units of competency from endorsed Training Package(s) to which it relates?
- Reflect industry characteristics through use of appropriate industry terminology and good work practice examples?
- Complement rather than duplicate existing support materials?
- Complement rather than duplicate information provided in Training Packages?

2. Scope

Training Package support materials must specify and be appropriate for their purpose, audience and coverage.

Does the material:

- Identify and meet a clear purpose of supporting the acquisition of competency?
- Identify and relate to its audience/target group(s) with a focus on suitability for equity groups?
- Provide clear examples and explanations of complex ideas or terminology?
- Ensure that the complexity of tasks and activities is based on realistic workplace application?
- Indicate any resources needed to support the effectiveness or use of the material?
- Provide accurate industry content?
3. Structure and design

Training Package support materials must promote effective learning and assessment strategies and use easily accessible formats.

Does the material:

- Have a clear structure (i.e., is it practical and easy to use)?
- Present a visually attractive design interface, appealing for the target audience?
- Allow use by people with a disability, e.g., learners who are vision impaired?
- Provide activities and learning strategies designed to motivate and engage the target audience?
- Provide a range of strategies that enable fair, valid and reliable assessment of competency, including options for particular equity groups?
- Provide for integrated delivery and integrated assessment (e.g., group related units of competency to reflect application of knowledge and skills in a work task)?
- Use words economically at a level the audience can understand?
- Support the development of underpinning knowledge and skills, including the enabling skills of language, literacy and numeracy and the key competencies?
- Meet ANTA's National Strategies (refer to Bridging Pathways - the National Strategy for increasing opportunities for people with a disability in vocational education and training; and Partners in a Learning Culture - Australia’s National Aboriginal and Torres Strait Islander Strategy for vocational education and training 2000-2005)?
4. Flexible delivery

Training Package support materials must provide for variations in learners' needs, preferences and starting points.

Does the material:

- Provide a range of delivery and assessment methods/ options to accommodate different learning styles, cultural contexts and training environments?
- Provide for use in a variety of training and assessment contexts (e.g. on-the-job, off-the-job and simulation strategies)?
- Allow for contextualisation for different needs?
- Provide adequate user support (e.g. help desk, installation guide)?
- Enhance learner choice through maximising opportunities to engage in learning in different ways?
- Allow for reasonable adjustment for people with a disability?

5. Access and Equity

Training Package support materials must be inclusive and actively challenge stereotypes.

Does the material:

- Accommodate Indigenous, rural or isolated learners?
- Accommodate cultural diversity?
- Challenge stereotypes of gender, ethnicity and disability?
- Accommodate learners with a disability?

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