



LITERACY PROFILE:

Roofing Trainee

This profile identifies the literacy tasks and skills used by roofing trainees. These tasks and skills involve reading, writing, speaking and listening, numeracy, critical thinking and the use of information and communications technology.

Reading tasks

"Read" implies that a person reads and understands

Read signs and short texts

- Hazard signs
- Safety signs
- Capacity of lifting equipment
- Notes, including shorthand or cryptic written instructions interpreted using previous knowledge e.g. roof same as #20
- Job sheets
- Product and installation labels
- SMS text messages relating to work

Read charts, tables and graphs

- Schedule of quantities
- Road maps

Read forms on the job

- Supplier delivery documents
- Site safety inspection checklists
- Building inspection checklists

Read plans

- Site plan drawings
- Roofing and building plan drawings (both handwritten and computer generated) including abbreviations and technical terms, 2D and 3D representations

Read memos and notices

- Health and safety brochures or handouts
- Hazard ID board onsite

Read job instructions and more detailed job information

- Job instructions
- Installation instructions
- Manuals
- Product guides
- Use of equipment guides
- Safety data sheets including symbols and abbreviations

Read excerpts from legislation, regulations or industry standards

- Building standards documents and updates

Read industry publications

- RANZ - Rooflink

Read training material

- Off-job training material and workbooks
- Text books
- First aid
- Health and safety

Read employment documents

- Leave forms
- Job descriptions
- Employment contracts
- Company standards or rules about employment
- Performance reviews
- Training agreements
- Pay slips

Reading skills

Recognise the features of a range of texts.

- Signs
- Codes
- Forms
- Drawings
- Procedures
- Manuals
- Regulations

Scan text, table or label to find a specific piece of information.

Understand common and industry vocabulary and abbreviations.

Use a range of strategies to find out the meaning of unfamiliar words or phrases.

- Reference source.
 - Dictionary (while training)
 - Directory
 - Glossary
- Ask someone
- Make inferences from surrounding text

Follow written instructions (which may include diagrams).

Understand written and numerical information from graphic material.

- Tables
- Graphs
- Diagrams
- Charts
- Maps

Use a guide to document contents.

- Index
- Table of contents
- Key
- Legend

Interpret material read.

- Summarise material read in own words
- Take notes from material read
- Report accurately on the information read



Writing tasks

Sign off on documents to confirm read and understood

- Site safety rules
- Supplier delivery dockets

Write short notes

- Handover instructions about work completed or progress to date
- Materials and tools borrowed or lent
- Items to be purchased
- Delivery dockets
- SMS text messages relating to work

Write detailed lists

- Records of work completed
- Materials needed and used on the job

Complete forms independently

On job

- Time sheets
- Accident report forms

Employment related

- Leave application
- Job application
- Employee details
- Tax code declaration

Complete forms with the assistance of others

- Health and safety incident or near miss forms
- ACC claim forms

Create drawings or sketches

- Sketch fastenings
- To supplement any job instructions
- To record work done

Write for training purposes

- Complete workbook
- Fill in verification book
- Make notes during training
- Write answers for unit standard assessments
- Keep diary records of completed work for practical assessment and ongoing work records
 - Sketches
 - Descriptions
 - Photographs of work completed
 - Materials used

Writing skills

Sign name on forms to indicate understanding.

Use the right style for different sorts of writing.

- Note
- List
- Checklist
- Form
- Assessments (training)

Write simple correct text in appropriate places and in appropriate formats on job sheets and forms.

- Use legible handwriting
- Use recognisable spelling and abbreviations
- Writing should stay on the line

Complete forms using numbers, single words, or short sentences.

- Handwriting must be legible
- Abbreviations can be used
- Spelling must be understandable, but correct spelling is not essential
- Grammar and punctuation must be understandable

Write notes, lists and short sentences.

- Handwriting must be legible
- Abbreviations can be used
- Use recognisable spelling
- Use diagrams and sketches to clarify points
- Write points in a logical order

Draw sketches that clearly represent work done or job requirements.

- Geometric shapes are represented clearly
- Dimensions are drawn in proportion
- Correct abbreviations are used
- Exact or accurate dimensions are included

Write short answers to assessment questions (training).

- Handwriting must be legible
- Abbreviations can be used
- Spelling must be understandable but correct spelling is not essential
- Grammar and punctuation must be understandable

Speaking and listening tasks

Note: There is a heavy dependence on oral communication to deliver both work instructions and on job training

Listen to oral instructions

- From supervisor or foreman
- In training

Listen and respond to requests

- Supervisors
- Co-workers
- Customers
- Verbal explanations
- Training
- Other contractors

Listen to presentations

- Management
- Health and Safety meetings
- Work related training

Ask questions

- To clarify oral instructions
- Requests
- Explanations
- Assistance from supervisor or co-workers

Participate in meetings

- Health and safety
- Company

Discuss design and construction issues with

- Supervisor
- Co-workers
- Sub-contractors

Communicate with

- Office staff as required
- People from different language speaking background to own
- Co-workers (team work) during day to day work situations
- Supervisors to order equipment
- Customers to arrange site access

Give instructions to others

- What work they need to do

Explain job progress and answer questions

- Supervisors
- Customers

Answer oral assessment questions

Discuss training with

- Industry training adviser
- Industry training assessor
- Off and on-job trainers
- Other trainees

Use a cell phone to communicate verbally



Speaking and listening skills

Discuss topics which are appropriate in a work context.

Use words, pronunciation, and tone appropriate to situation and audience.

Open and close conversations appropriately.

Give information in a sensible order.

Plan and deliver oral instructions in a logical order and to suit the audience.

Use active listening skills.

- Repeat message back to sender
- Summarise instructions in own words
- Use following techniques e.g. say "aha" or "okay" as they follow what someone is saying

Use hand signals and gestures to communicate in noisy environment.

Use questioning techniques, including open and closed questions, to gain information, check understanding, and encourage further discussion.

Numeracy tasks

Measure

- Length (mm, m, inches, feet)
- Angles
- Height
- Width
- Area
- Volume
- To set tolerance e.g. +/- 5mm for placement of battens
- Pitch e.g. degrees – 30° or ratios 7:12 using an electronic spirit level

Calculate (using a calculator when necessary)

- Area
- Spacing
- Slope length
- Hip length
- Quantity of materials needed to complete job, allowing for wastage where necessary
- How to cut materials to minimise waste

Estimate time needed to carry out job

Calculate and record time spent on jobs

Check

- Pay is correct
- Items and quantities on delivery checklists

Convert between imperial and metric measurements

Interpret

- 2D and 3D representations from drawings (spatial awareness, geometric shapes)
- Road map key, page numbers and co-ordinates

Numeracy skills

Use numbers.

- Whole numbers
- Decimals
- Fractions
- Percentages
- Ratios

Do number problems (including using formula and conversions e.g. fractions to decimals).

- Addition
- Subtraction
- Multiplication
- Division

Estimate.

- Length
- Time
- Weight
- Number
- Temperature
- Area
- Capacity
- Angle

Measure accurately.

- Length
- Time
- Weight
- Number
- Temperature
- Angle
- Quantity

Understand difference between imperial and metric measurements.

Understand tolerances in measurements e.g. + / - 5mm.

Understand wastage factor e.g. 10%.

Recognise 2D and 3D geometric shapes.

- Square
- Rectangle
- Circle
- Triangle

Recognise and use geometric concepts.

- Straight
- Square
- Parallel
- Flat
- Level
- Round
- Vertical
- Horizontal

Extract information from a 2D drawing of a 3D object.



Critical thinking tasks

Work out the best order to complete job

Seek help from others when needed

Select correct equipment and tools to do the job effectively

Decide how to cut materials so that waste is minimised

Understand principle that "time is money" and spend appropriate amounts of time on jobs

Plan own tasks in order to ensure work flows efficiently

Judge if finished work (own and co-workers') meets professional building standards

Identify

- When a proposed change to a plan will need to be referred to local authority
- When roofing materials can be repaired rather than replaced e.g. damaged metal tile

Interpret shorthand or cryptic written instructions

Deal with contingencies

- Work not to standard
- Materials cut too short or too long or not enough materials supplied to complete job
- Injuries and accidents
- Weather issues making roof unsafe to work on
- OSH hazard identification
- Problem with drawing or plan may involve talking to supervisor or architect
- Problems with equipment
- Power outages

Determine source of leak

Critical thinking skills

Identify when action should be taken.

Identify what action should be taken.

Identify when action cannot be taken independently and seek assistance.

Apply knowledge of safety requirements and principles to work practice.

Visualise a 3D object from a 2D drawing.

Apply knowledge of efficient work practices to plan the most effective way to complete work activities with minimum time and wastage.



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