



SFRITO
SPORT, FITNESS AND RECREATION
INDUSTRY TRAINING ORGANISATION

ASSESSMENT GUIDELINE

Instruct in basic mountaineering

Unit Standard: 16633

Level: 5 Credit: 35 Version: 2
Published by Sfrito 2006

Purpose:

People credited with this unit standard are able to: prepare for instructing in basic skills for mountaineering trips; instruct in basic skills for mountain movement and snow-camping; demonstrate effective instruction techniques and provide leadership for mountaineering trips; and evaluate the effectiveness of the instruction and leadership provided.

Prerequisites:

Unit 424, *Administer first aid in the outdoors*; Unit 432; *Navigate in poor visibility on land*; Unit 439; *Demonstrate overnight expedition skills in a mountain environment*; Unit 451, *Manage risk for an outdoor activity*; Unit 4573, *Communicate in the outdoors using two-way radio*; Unit 6401, *Provide first aid*; Unit 18132, *Demonstrate basic movement skills and the use of ice axe and crampons*; Unit 18135, *Assist on an avalanche response*; Unit 18136, *Demonstrate own party rescue*; Unit 20145, *Demonstrate knowledge of theories and processes associated with instructing in the outdoors*; and Unit 20161, *Analyse weather information and predict weather conditions for the outdoors*; or demonstrate equivalent knowledge and skills.

Special Notes:

1. Assessment against this unit standard must take place in an alpine environment on routes with snow and ice up to and including a 45 degree angle, with technical rock no greater than Ewbank Grade 8. Element 2 will also require at least one mountaineering trip of two days and one night.
2. The *Ewbank* (Australian) grading system is an open- ended numerical grading system. With this system the grade increases with corresponding increase in climbing difficulty. *Logan* is an alpine grading system used in New Zealand. Contact the New Zealand Alpine Club for more information: PO Box 786, Christchurch, or www.alpineclub.org.nz.
3. It is recommended that the candidate has logged personal experience of 20 days of climbing and tramping in an alpine environment before being assessed against this unit standard. When gaining the instructional experience the candidate is engaged in the role of instructor but has no responsibility for clients, although is responsible for self.
4. There are minimum assessor requirements for assessment against this unit standard. The details of these requirements are available on the Sfrito website <http://www.sfrito.org.nz/>.

Overview of assessment:

This assessment has 5 tasks:

Task 1: Submit log and evidence of prerequisites

Task 2: Plan for instructing mountaineering skills

Task 3: Instruction and Leadership - throughout all interaction with participants

Task 4: Instruct mountain movement and snow shelter camping

Task 5: Evaluate the instruction and leadership of the instruction

Notes to Assessor:

1. For Tasks 3 and 4 there are two types of evidence statements: one group relates to the instruction and leadership of the session (detailed under Task 3) and the other to the topic of instruction, details of which are adequately covered in the performance criteria (Task 4). The assessor is required to make a judgement about appropriateness given the possible variation in context, participant needs and NZQA unit level.
2. The candidate must be assessed instructing a group of real participants on a mountaineering trip.

Task 1: Submit log and evidence of prerequisites

Overview of task: The focus of this assessment is to ensure the prerequisites for units achieved and instructional time have been met

Resources:

NZOIA, NZMSC, or EONZ Outdoor Leader Logbook or similar
Candidate's NZQA Record of Learning.

Instruction to candidate:

During this task you are required to provide confirmation that you have:

- the pre-requisite unit standards for this assessment (contact Sfrito or NZQA for assistance)
- the pre-requisite logged instructional sessions for this assessment

Evidence/Judgement

- Assessor sights NZQA Record of Learning which confirms that the candidate holds:
 - 424 *Administer first aid in the outdoors*
 - 432 *Navigate in poor visibility on land*
 - 439 *Demonstrate overnight expedition skills in a mountain environment*
 - 451 *Manage risk for an outdoor activity*
 - 4573 *Communicate in the outdoors using two-way radio*
 - 6401 *Provide first aid*
 - 18132 *Demonstrate basic movement skills and the use of ice axe and crampons*
 - 18135 *Assist on an avalanche response*
 - 18136 *Demonstrate own party rescue*
 - 20145 *Demonstrate knowledge of theories and processes associated with instructing in the outdoors*
 - 20161 *Analyse weather information and predict weather conditions for the outdoors*
(or demonstrates equivalent knowledge and skills – in this case the assessor must record how this has been demonstrated)
- Assessor sights candidate's logbook which confirms that the candidate has logged:
 - personal experience of 20 days of climbing and tramping in an alpine environment
(Evidence can be confirmed with a senior person from candidate's organisation or from the industry)

Task 2: Plan for instructing mountaineering skills

Overview of task: The focus of this assessment is to demonstrate the ability to plan for instructing mountaineering skills, including an overnight trip.

Resources:

- Allan, S. (2005). *Outdoor Activities – guidelines for leaders*. (Section A: General guidelines, pp. 2–22). Wellington: SPARC www.sparc.org.nz/education/outdoor-activities-guidelines-for-leaders
- Haddock, C. (2004). *Outdoor safety – risk management for outdoor leaders*. (Chapter 4, Tools, pp. 50–65; Chapter 8 & Appendix V, pp. 130–139). Wellington: NZ Mountain Safety Council. www.safeoutside.org/a1_link/frame_pursuits.html
- Priest, S. & Gass, M. (1997). *Effective leadership in adventure programming*. Champagne, Illinois: Human Kinetics.

Notes to the assessor:

1. The activity and risk management plans must be for the instruction sessions in Tasks 4 and 5. The participants described in the plans will be those participants expected for the instruction sessions in Tasks 4 and 5.
2. The candidate may write one plan that incorporates activity plans and risk management plans for all of the instruction they will do, or they may write a number of separate plans. In either case they must do activity / risk management plans for all of the instruction for which they will be assessed.

Instruction to candidate:

During this task you are required to write and present to the assessor plans for a mountaineering trip:

- An activity or trip plan (or plans)
- A risk management plan
- A plan for evaluation of the trip

Element 1: Prepare for instructing in basic skills for mountaineering trips.

Performance criteria	Evidence/Judgement
<p>1.1 The instructional objectives and requirements are identified.</p>	<p>The candidate writes an activity plan(s) and a risk management plan(s) for instructing mountaineering skills and an overnight mountain trip. The plans meet organisation requirements and industry standards.</p> <p>The plans must meet current accepted instructional practice and must contain:</p> <ul style="list-style-type: none"> • A description of the participant group, including needs, skills and experience. • Specific learning objectives that relate to: <ul style="list-style-type: none"> - Group and individual needs - The environment to be used - Equipment that will be available
<p>1.2 Trips are selected and their selection justified based on the objectives to be achieved and the composition of the group.</p> <p>Range: group composition may include but is not limited to – age, culture, gender, health, ability, confidence, experience, emotional and intellectual needs, group size, skills to be taught.</p>	

<p>1.3 Trip plans are prepared.</p> <p>Range: plans may include but are not limited to – accommodation, cost, access, weather, risk management, transport, equipment, food, contingencies, communication, personal details, intentions, resources.</p>	<ul style="list-style-type: none"> • Any other instructional objectives or requirements • The activity plan is justified on the basis of the participants, their needs and objectives. • A description of the trip that is intended to be used, including a map or detailed route description. • A risk management plan such as a RAMS form or similar, covering people, equipment and environment factors • An equipment list, including emergency equipment. • Emergency communication arrangements and roles to be taken in an emergency (these must fit into the procedural requirements of any organisation that is associated with the instruction) • How intentions will be lodged with a responsible person • Permission requirements from land owners, managers, iwi, DOC (as appropriate) • Contingency plans and alternative routes in case of bad weather, high avalanche hazard, flooded rivers or other possible events • A brief for participants, staff and other interested parties outlining, for example, gear requirements, meeting times, responsibilities • Other administrative arrangements necessary for the trip to take place. For example accommodation, cost, food, fuel, personal details. • A plan for post-trip evaluation by the participants, covering at least: <ul style="list-style-type: none"> - Achievement of learning objectives - Achievement of personal objectives - The candidate’s instructional/leadership style
<p>1.4 Pre-trip briefs for participants, staff, and other interested parties are prepared.</p> <p>Range: briefs may include but are not limited to – responsibilities, expectations, personal requirements, logistics.</p>	
<p>1.5 Instruction plans are prepared to meet the learning objectives, taking into consideration the needs of the group, and people, equipment, and environment issues.</p> <p>Range: plans may include but are not limited to – content, progressions, resources, environmental factors, contingencies, current professional technical information, balance of theory and practical components, retaining a positive learning experience.</p>	
<p>1.6 Evaluation methods and requirements are identified.</p>	

Task 3: Instruction and Leadership
Throughout all interaction with participants – Tasks 3 and 4

Overview of tasks: The focus of this assessment is to instruct participants in basic mountain movement and snow shelters

Notes to the Assessor

The following performance criteria and Evidence/Judgement applies to Task 4

Instruction to candidate:

During the following two tasks you are required to instruct mountain movement and snow camping skills according to current professional practice, covering:

- building and living in snow-shelters
- the appropriate use of crampons and iceaxe

Element 3: Demonstrate effective instruction techniques for mountaineering trips.
Element 4: Provide leadership for mountaineering trips.

Performance criteria	Evidence/Judgement
<p>3.1 Instruction skills and techniques are demonstrated that are relevant to the needs of the group and enable them to achieve the skills.</p> <p>Range: skills and techniques may include but are not limited to – different teaching styles, teaching progressions, checking for individual understanding after presenting skill progressions, adapting plans to suit needs, responsive to group dynamics, maintaining a positive environment;</p> <p>needs may include but are not limited to – individuals initial skill and understanding, different learning speeds, different learning styles, different communication styles.</p>	<ul style="list-style-type: none"> • The candidate uses activity plan(s) and risk management plan(s) from Task 2 appropriately, making adjustments as required based on needs of individual and group. • Implements and monitors risk management strategies developed in Task 2 • Identifies and manages risks as they arise • Discloses risks to the group and checks group members’ readiness for the activity • Communicates emergency procedures to the group, including mountain search and rescue procedures
<p>3.2 Rapport and/or a learning partnership is effectively established with the participants.</p>	<ul style="list-style-type: none"> • Instruction meets industry and organisation accepted practice
<p>3.3 Progress of each participant is evaluated and accurate feedback is delivered in a manner that matches the needs and learning styles of each participant.</p> <p>Range may include but is not limited to – constructive, timely, verbal, visual.</p>	<ul style="list-style-type: none"> • Instruction style is flexible to meet the needs of participants (e.g. each participant’s initial skill and understanding, different learning speeds, different learning styles, different communication styles) • Varies instruction style (e.g. lecture, questioning, discovery)
<p>4.1 Leadership is demonstrated that ensures the needs of the group are met in a safe and positive environment throughout the mountaineering trips.</p> <p>Range: may include but is not limited to – navigation, weather interpretation, first aid, environmental care, group processes, communication, motivation, enthusiasm, role modelling.</p>	<ul style="list-style-type: none"> • Creates positive learning environment and rapport with participants • Evaluates progress of each participant through observation and questioning, and gives appropriate feedback e.g. constructive, timely (immediately, or later 1-on-1), verbal (explanation) and visual (demonstration). • Checks for understanding

4.2 Risk management is demonstrated.	<ul style="list-style-type: none"> • Demonstrates leadership skills to maintain a safe and positive environment. This could include technical skills such as navigation, weather or first aid; and group facilitation skills such as communication, enthusiasm, role modelling. • Demonstrates leadership in environmental care • Maintains control of group and activity during normal and emergency situations (if they occur)
4.3 Emergency management is explained.	
4.4 Mountain search and rescue is explained.	

<p>Task 4: Instruct mountain movement and snow shelter camping</p>		
<p>Resources:</p> <ul style="list-style-type: none"> • Allan, S. (2005). <i>Bushcraft</i>. NZ Mountain Safety Council. www.mountainsafety.org.nz • Cotter, C. and Sedon, M. (2003). <i>A Climber's Guide</i>. Adventure Consultants. • Cox, S. et al. (2003). <i>Mountaineering: Freedom of the Hills</i>, 7th edition. The Mountaineers, Seattle, WA • Dickson, G. and Ogden, C. (2006). <i>Alpine Guides Technical Manual</i>, 2nd edition. Available from Alpine Guides or NZAC. • Wayatt, G. (2005). <i>Alpine Skills</i>. NZ Mountain Safety Council. www.mountainsafety.org.nz 		
<p>Element 2: Instruct in basic skills for mountain movement and snow-camping.</p>		
<p>2.1 Instruction in building and living in snow-shelters is provided.</p> <p>Range: instruction must include but is not limited to –</p> <table border="0"> <tr> <td> <ul style="list-style-type: none"> - types of different snow-shelters and their advantages and disadvantages - site selection - differences between emergency and longer term shelters </td> <td> <ul style="list-style-type: none"> - shelter construction - group and gear management whilst building - using resources efficiently - care for the environment </td> </tr> </table>	<ul style="list-style-type: none"> - types of different snow-shelters and their advantages and disadvantages - site selection - differences between emergency and longer term shelters 	<ul style="list-style-type: none"> - shelter construction - group and gear management whilst building - using resources efficiently - care for the environment
<ul style="list-style-type: none"> - types of different snow-shelters and their advantages and disadvantages - site selection - differences between emergency and longer term shelters 	<ul style="list-style-type: none"> - shelter construction - group and gear management whilst building - using resources efficiently - care for the environment 	
<p>2.2 Instruction in the appropriate use of crampons and iceaxe is provided.</p> <p>Range: instruction must include but is not limited to –</p> <table border="0"> <tr> <td> <ul style="list-style-type: none"> - movement in varied snow conditions - self-arresting - step-cutting </td> <td> <ul style="list-style-type: none"> - climbing in varied snow conditions on terrain inclined up to 30 degrees and half-body-height sections up to 50 degrees </td> </tr> </table>	<ul style="list-style-type: none"> - movement in varied snow conditions - self-arresting - step-cutting 	<ul style="list-style-type: none"> - climbing in varied snow conditions on terrain inclined up to 30 degrees and half-body-height sections up to 50 degrees
<ul style="list-style-type: none"> - movement in varied snow conditions - self-arresting - step-cutting 	<ul style="list-style-type: none"> - climbing in varied snow conditions on terrain inclined up to 30 degrees and half-body-height sections up to 50 degrees 	

Task 5: Evaluate the instruction and leadership of the instruction

Overview of task: The focus of this assessment is to evaluate the achievement of objectives, and evaluate the leadership and instruction of the mountaineering instruction and trip.

Resources:

- www.reviewing.co.uk

Instruction to candidate:

During the task you are required to:

- Obtain feedback from participants (as per your evaluation plan in Task 2)
- Discuss with the assessor the achieved outcomes, and the strengths and weaknesses of your instruction and leadership
- Write up a summary of the feedback received, and what you will do to act on it.

Element 3: Demonstrate effective instruction techniques for mountaineering trips.

Element 5: Evaluate the effectiveness of the instruction and leadership provided.

Performance criteria	Evidence/Judgement
<p>3.2 Rapport and/or a learning partnership is effectively established with the participants.</p>	<ul style="list-style-type: none"> • The candidate obtains feedback and acts on it during the course of the trip. • Obtains feedback from participants as planned in Task 2 (Post-trip evaluation) • Participants' feedback indicate that they considered the instructor to have <ul style="list-style-type: none"> - Established rapport - Been enthusiastic - Enjoyed the activities and the environment • In a discussion with the assessor, the candidate covers: <ul style="list-style-type: none"> - Their own evaluation of the trip and instruction, including strengths and weaknesses of their leadership and instruction - Participant feedback - Skills and knowledge that participants demonstrated - A comparison of planned objectives with achieved objectives - Justification for variance between planned objectives and achieved objectives - Areas for ongoing practice and improvement • Writes a summary of the feedback received and a personal development plan
<p>5.1 The plans and objectives are evaluated against actual outcomes and reasons for changes and justified.</p>	
<p>5.2 The instructional and leadership components of the activities are evaluated for strengths and areas for improvement.</p>	

Candidate Name _____ NSN _____

**Unit 16633 (v2) Checklist
Instruct in basic mountaineering**

Assessor name: _____

Organisation name: _____

C/NYC

Comments

Task 1: Submit log and evidence of prerequisites

- Assessor sights ROL and logbook confirming candidate holds:
 - 424, 432, 439, 451, 4573, 6401, 18132, 18135, 18136, 20145, 20161 (or equivalent)
 - personal experience of 20 days of climbing and tramping in an alpine environment

Task 2: Plan for instructing mountaineering skills

- Plan(s) meet organisation requirements and industry standards.
- A description of the participant group
- Specific learning objectives
- Any other instructional objectives or requirements
- Plan(s) justified on basis of participants, their needs, objectives.
- A description of the intended route
- A risk management plan such as a RAMS form or similar
- An equipment list, including emergency equipment.
- Emergency communication arrangements and roles
- How intentions will be lodged with a responsible person
- Permission from land owners, managers, iwi, DOC
- Contingency plans and alternative routes
- A brief for participants, staff and other interested parties
- Other administrative arrangements necessary for the trip
- A plan for post-trip evaluation by the participants

Task 3: Instruction and Leadership - throughout all interaction with participants

- Uses activity and risk management plans, adjusting as required
- Implements and monitors risk management strategies
- Identifies and manages risks as they arise
- Discloses risks to the group
- Communicates emergency procedures to the group
- Instruction meets industry and organisation accepted practice
- Instruction style is flexible to meet the needs of participants
- Varies instruction style
- Creates positive learning environment and rapport
- Evaluates progress of each participant and gives feedback
- Checks for understanding
- Demonstrates leadership to maintain safe & positive environment.
- Maintains control of group and activity during normal and emergency situations (if they occur)

Task 4: Instruct mountain movement and snow shelter camping			
<ul style="list-style-type: none"> • Building and living in snow-shelters • The appropriate use of crampons and iceaxe 			
Task 5: Evaluate the instruction and leadership of the instruction			
<ul style="list-style-type: none"> • Obtains feedback and acts on it during the course of the trip. • Obtains feedback from participants as planned in Task 2 • Participants' feedback indicates positive outcomes • Evaluates instruction and areas for improvement with assessor • Presents summary of feedback and personal development plan 			
DATE	CANDIDATE'S SIGNATURE	ASSESSOR'S SIGNATURE	C/NYC
Comments:			