



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

Rope Rescue Technician I & II Skill Stations

NFPA 1006 – Chapter 6 (2013 Edition)

Rope Rescue Technician Level I

Station A	Multiple-Point Anchor System	Mandatory Station
Station B	Compound Rope Mechanical Advantage System	Mandatory Station
Station C *	One-person Pickoff	Random Station
Station D *	Descend a Fixed Rope	Random Station
Station E	Ascend Fixed Rope and Switch to Descending Station	Mandatory Station

* **Either Station C or Station D MUST be used as a random station.**

Rope Rescue Technician Level II

Station F	Construct and Operate a High-line System	Mandatory Station
Station G	High Angle Victim Packaging and Lower	Mandatory Station
Station H	Self-Rescue	Random Station

NOTES

If testing both levels together all mandatory and one random station shall be used.

If testing individual levels separately follow list below.

Level I must test 4 skills:

Mandatory: Stations A, B, and E
Random Station C or D

Level II must test 3 skills:

Mandatory Stations F and G
Random Station H



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION A – Multiple Point Anchor System		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPR 6.1.3	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given a rope rescue scenario, life safety rope, and auxiliary rope rescue equipment, select appropriate anchors for the scenario, construct a multiple-point anchor system, and utilize/direct use of this anchor system so the expected loads are not exceeded, and the loads are equally distributed between the multiple anchors. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **8 of 8** tasks being correctly performed.

No.	Tasks	Yes	No
1	Appropriate equipment is selected		
2	Safe anchor points are selected and properly utilized		
3	System components are protected from abrasion		
4	Critical angles are not exceeded on anchor legs (120 degrees)		
5	All knots are properly tied and secured with a safety knot		
6	A system safety check is completed prior to loading (physical, load and visual/audible)		
7	Load is equally distributed between all selected anchors		
8	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome			
			PASS FAIL

Evaluator Comments: _____

Evaluator Signature: _____

Evaluator # _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION B – Compound Rope Mechanical Advantage System		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPRs 6.1.2, 6.1.4, 6.1.6	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given a rescue load (600 lbs.), an anchor system, life safety rope, and associated rope rescue equipment, construct and direct the operation of a compound rope mechanical advantage system which will accommodate the given load, reduce the force required to lift it, control the movement, and hold the load in place when needed. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **10 of 10** tasks being correctly performed.

No.	Tasks	Yes	No
System Construction			
1	System is appropriate for given need		
2	Identifies potential problems with the mechanical advantage system built		
3	Utilizes an appropriate attachment to the anchor system		
4	Utilizes associated equipment in an appropriate manner so not to cause rope damage		
5	System implemented has the capability to be held while re-setting		
Operation of the System			
6	Performs a system safety check (physical, load test and audible/visual).		
7	Directs team in clear and concise manner		
8	Operates systems efficiently		
9	Effectively and safely changes system direction of travel		
10	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome		PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____

Evaluator # _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION C – One-person Pickoff		Reference NFPA 1006 (2013 Edition), Chapter 6 Random Station: JPRs 6.2.2, 6.1.8	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given the allotted equipment and fixed rope system, perform a one person pick-off of a simulated victim in the high-angle environment. This task includes victim access, disentanglement (if needed), load transfer, and descent to a safe location. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **12 of 12** tasks being correctly performed.

No.	Tasks	Yes	No
1	Assembles and checks all appropriate equipment and hardware		
2	Performs a system safety check (physical, load test and audible/visual)		
3	Appropriately dons a rated class II or II/III combination harness and appropriate personal protective equipment		
4	Attaches harness to fixed rope system utilizing a descent control device (If using a Figure 8 – makes sure device is double wrapped)		
5	Descends fixed rope system in a controlled manner and makes access to the victim		
6	Stops descent above simulated victim and locks off descent control device		
7	Evaluates victim’s overall condition and harness for signs of wear or damage		
8	Attaches one end of a pick-off device to victim’s harness attachment		
9	Attaches other end of pick-off device to descent control device		
10	Transfers victim’s load onto the descent control device in a controlled manner		
11	Unlocks descent control device under load & safely rappels with victim to a safe area		
12	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome			
			PASS FAIL

Evaluator Comments: _____

Evaluator Signature: _____ **Evaluator #** _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION D – Descend a Fixed Rope		Reference NFPA 1006 (2013 Edition), Chapter 6 Random Station: JPR 6.1.8	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given the allotted equipment, construct a fixed rope system appropriate for a one-person load with adequate safety/back-up, descend a minimum of 25 feet utilizing an appropriate harness, hardware and descent control device, and rest suspended (i.e. lock-off) on the system with both hands free upon request of the evaluator. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **11 of 11** tasks being correctly performed.

No.	Tasks	Yes	No
1	Selects appropriate equipment and hardware to construct of a fixed rope system		
2	Attaches rope to anchor by means of a tensionless hitch or other recognized rescue knot		
3	Evaluates the system for potential abrasion and shock-loading, and provides for edge protection/padding as needed		
4	Performs a system safety check (physical, load test and audible/visual)		
5	Dons a rated Class II or II/III combination harness and appropriate personal protective equipment		
6	Attaches a descent control device to harness and rope system		
7	Negotiates edge of drop in a manner so as not to shock load the system or produce any excessive damage to the system components		
8	Descends a minimum of 25 feet in a controlled manner, always maintaining brake hand on the rope		
9	Stops, ties-off the descent control device and rests suspended on the rope system as directed by the evaluator		
10	Unlocks the descent control device and continues rappel in a controlled manner		
11	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome		PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____

Evaluator # _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION E - Ascend Fixed Rope & Switch to Descending Station		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPRs 6.1.7, 6.2.7	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given a fixed rope system and appropriate equipment, ascend the system a minimum of 25 feet, rest suspended when instructed to do so, convert the ascending system to a descending system, and rappel back to your starting point. Do you have any questions?

Performance Outcome: Pass / Fail will be determined by **10 of 10** tasks being correctly performed.

No.	Tasks	Yes	No
1	Assembles and checks all appropriate equipment and hardware		
2	Performs a system safety check (visual inspection, load test and audible announcement)		
3	Dons a rated class II or II/III combination harness appropriately and appropriate personal protective equipment		
4	Secures self to fixed rope system by means of ascending hardware, prusik loops, or an ascending system, assuring at least 2 points of contact between the rope and harness system		
5	Ascends the rope a minimum of 25 feet in a controlled and efficient manner		
6	Stops on the rope, suspended by system with hands free, when instructed		
7	Converts ascending system to descending system, utilizing a descent control device		
8	Recovers/removes ascending equipment from rope		
9	Executes a descent to the ground in a controlled manner		
10	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome		PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____

Evaluator # _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION F - Construct and Operate a Highline Rescue System		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPRs 6.2.5, 6.2.6	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Evaluator Note: Indicate the position for each candidate: Position 1 _____ 2 _____ 3 _____ 4 _____

Directions: Given the allotted equipment and working as a team, construct and operate an angled highline rope rescue system. Position 1 and 2 are to construct the far side fixed anchor system and high-line trolley system. Position 3 and 4 are to construct the near side anchor and tensioning systems. Once constructed, direct the movement of a simulated rescue load on the system. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **13 of 13** tasks being correctly performed.

No.	Tasks	Yes	No
1	Safe anchor points are chosen (tensionless or high strength tie-offs) or multipoint self-equalizing anchor systems are developed to withstand system working load		
2	All edges are protected and critical angles are not exceeded		
3	Track line(s) is rigged across the span and anchored on the far side		
4	Track line(s) is tensioned using a simple mechanical advantage system on the near side and is appropriately anchored (3:1 or 4:1 system) <i>Note: Soft rope grab devices (prusiks) should be utilized to warn of system overload.</i>		
5	Track line tension is appropriate for the system and does not exceed acceptable safety margins for rope and hardware [500# on dynamometer for unloaded systems or 10 % of sag per 100-foot spans per 200# load.]		
6	Pulley/trolley system is placed on track line(s) and control lines are attached to the trolley system		
7	Control lines are rigged to either simple mechanical advantage systems or descent control devices as the system warrants based on the rescue objectives		
8	System safety check is performed (visual, load test and audible)		
9	Simulated rescue load (mannequin) is appropriately packaged in a patient transfer device so as not to aggravate potential injuries, movement within the device is minimized, and victim has appropriate personal protective equipment for the situation		
10	Simulated rescue load is attached to the system in a safe manner so the load is secure		
11	Team directs the movement of the simulated rescue load in a clear, concise manner		
12	Rescue load is safely moved to a predetermined point and can be secured at any point during the movement		
13	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome		PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____

Evaluator # _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION G - High Angle Victim Packaging & Lower		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPRs 6.2.2, 6.2.3, 6.2.4	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Working as a team of four, package a simulated patient utilizing a victim transfer device, construct a lowering system with belay, and lower the simulated patient to the ground. Position #1 is responsible for assessing rescue needs and directing the team and the lowering operation. Position #2 will rig and operate the lowering system. Position #3 is responsible for patient packaging and rigging/operating the belay system. Position #4 is responsible for patient packaging and rigging/operating any needed tag lines. At any given time, the evaluator may change the candidates' positions. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **13 of 13** tasks being correctly performed.

No.	Tasks	Yes	No
1	Rescue needs are assessed and communicated		
2	Appropriate anchors or anchor systems are chosen		
3	All edges are protected and critical angles are not exceeded		
4	Descent control device is attached to anchor and lowering line is rigged to the device		
5	A separate belay system is constructed and is appropriate for the rescue load to be moved on the system		
6	A system safety check is performed (visual, load test and audible)		
7	Simulated patient (mannequin) is positioned in patient transfer device and secured appropriately using webbing/rope to minimize any movement during the evacuation		
8	Lower line is attached to the patient transfer device		
9	Belay line is attached to patient transfer device and/or patient		
10	Simulated patient is lowered in a controlled manner to the ground		
11	Load can be secured in place at any time during the lowering operation		
12	Tag lines are used where appropriate		
13	Completes all tasks without compromising personal or team safety		
Please indicate skill outcome		PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____ **Evaluator #** _____



PENNSYLVANIA STATE FIRE ACADEMY ROPE RESCUE TECHNICIAN SKILL STATIONS

STATION H - Self Rescue		Reference NFPA 1006 (2013 Edition), Chapter 6 Mandatory Station: JPR 6.2.1	
Test Site	Test Date	Candidate #	Check the Test Type ____ Initial ____ Retest

Directions: Given the allotted equipment, descend a fixed rope system, engage an obstacle during the descent, and work your way past the obstacle and continue your descent to the ground. Do you have any questions?

Performance Outcome: Pass / Fail is determined by **13 of 13** tasks being correctly performed.

No.	Tasks	Yes	No	
1	Selects appropriate equipment to perform evolution			
2	Properly dons an approved Class II or II/III combination harness			
3	Attaches descent control device to rope			
4	Attaches descent control device to harness			
5	Performs a system safety check of existing fixed system (visual, load test & audible)			
6	Descends rope in a controlled manner and engages obstruction			
7	Attaches rope grab device (prusik, ascender) to rope above descent control device			
8	Attaches other end of rope grab device to harness			
9	Forms girth hitch using rope below obstruction			
10	Steps up into girth hitch and load rope grab device to transfer weight			
11	Removes descent control device from rope and places it on rope below obstruction			
12	Steps up in girth hitch to transfer weight to descent control device			
13	Removes rope grab device from line			
14	Switches over to descent in a controlled manner			
15	Continues descent to ground			
16	Completes all tasks without compromising personal or team safety			
Please indicate skill outcome			PASS	FAIL

Evaluator Comments: _____

Evaluator Signature: _____ **Evaluator #** _____