



DEPARTMENT OF THE AIR FORCE
WASHINGTON DC

AFGM2018-36-02

1 June 2018

MEMORANDUM FOR DISTRIBUTION C
MAJCOMs/FOAs/DRUs

FROM: HQ USAF/A3
1630 Air Force Pentagon
Washington DC 20330-1630

SUBJECT: ALO and TACP Tier 2 Operator Fitness Test Guidance Memorandum

By Order of the Secretary of the Air Force, this Air Force Guidance Memorandum is immediately implemented. Compliance with the Memorandum is mandatory. This policy applies to 13L ALO and 1C4 TACP AFSCs. To the extent its directions are inconsistent with other Air Force publications, the information herein prevails, in accordance with AFI 33-360, Publications and Forms Management.

This guidance is intended to identify the requirements and resources necessary to support an adaptation period for the ALO-TACP community to achieve compliance with established Tier 2 OFT standards. In addition, this guidance applies to the Regular Air Force and Air National Guard.

This Memorandum becomes void after 1 year has elapsed from its date. There are no release restrictions on this memorandum.

MARK C. NOWLAND, Lt Gen, USAF
Deputy Chief of Staff, Operations

4 Attachments:

1. ALO TACP Tier 2 OFT Guidance
2. TACP OFT Scoresheet
3. AF Fitness Program – Battlefield Airmen Fitness Assessment Exemption policy by AF/A1
4. ALO-TACP Physical Tests and Standards Guidance

ALO-TACP Tier 2 Operator Fitness Test Guidance

1. This memo provides amplifying guidance to the Air Force Fitness Program – Battlefield Airmen Fitness Assessment Exemption policy by AF/A1 dated 27 October 2017. This policy applies to 13L ALO and 1C4 TACP AFSCs. The Tier 1 Fitness exemption applies only to 13L ALO and 1C4 TACP DAFSC personnel awarded the 3, 5 and 7 skill level and/or assigned to special experience identifier (SEI): O9C, 262, 279, 281, 316 and 914 coded positions on a unit manning document. All other 13L ALO and 1C4 TACP personnel must continue to take the Tier 1 AF Fitness Assessment and follow current AFI 36-2905, *Fitness Program*, test frequency procedures.
2. Effective date of this memo, 13L ALO and 1C4 TACP DAFSC personnel awarded the 3, 5 and 7 skill level and/or assigned to SEI: O9C, 262, 279, 281, 316 and 914 coded positions on a unit manning document must take the Tier 2 Operator Fitness Test (OFT) with the goal of achieving a component standard score of 2 or more on the 10 point component test scale for all components *and* a composite score of 46 or more on the 100 point composite test scale. IAW public law regarding new tests and standards, members are afforded a 12 month adaption period to accomplish this goal from the date of this message. Following this adaption period, TACP Training will include ALO-TACP Tier 2 Operator Fitness Test guidance and program management. This instruction will specify waiver authorities, exemption guidance, human performance education and intervention, scheduling, currency, deployment considerations and ramification for members that do not meet minimum requirements.
3. The ALO-TACP-specific ten component Tier 2 OFT standards surpass DoD (DoDI 1308.3, para 6.1.3.1) and AF (AFI 36-2905, paras 3.1, 3.2) physical fitness requirements for aerobic and muscle fitness, but not for the body composition component of physical fitness. Therefore, the physical fitness body composition component must be assessed via an abdominal circumference measurement in conjunction with the Tier 2 OFT, but not as part of the ten component scoring. Certified Physical Training Leaders will perform the abdominal circumference measurement IAW AFI 36-2905, sections 3.5 and 3.6. Certified Physical Training Leaders must conduct the abdominal circumference measurement prior to the warm-up for the ALO-TACP Tier 2 OFT. Personnel must meet current AFI 36-2905 abdominal circumference standards.
4. To administer the ALO-TACP Tier 2 OFT, Physical Training Leaders must obtain training and certification from the AF Exercise Science Unit Physical Training Leader Course or directly from a unit member that was trained and certified in the AF Exercise Science Unit Physical Training Leader Course. Only one level of training order is permitted, but not second order, *i.e.*, an AF Exercise Science Unit trained Physical Training Leader may train a unit member; however, the latter Physical Training Leader must not train other members. To administer abdominal circumference measurements, Physical Training Leaders must obtain training and certification via current AFI 36-2905 training process for qualification to conduct Tier 1 AF Fitness Assessments. PTLs will evaluate the 1.5 mile run component within 72 hours, before or after the actual Tier 2 test is administered (1 x regular scheduled drill for ANG). Resources required to administer the Tier 2 OFT will be procured at the unit level in coordination with the Exercise Science Unit.
5. Unit PTLs will record member's Tier 2 OFT data on the ESU-supplied scoring spreadsheet until further guidance is established. Member's AC measurement will remain valid until their next Tier 2 OFT; this may require a reentry of the passing score when the member is flagged in the Air Force Fitness Management System (AFFMS) for a new score, *i.e.*, at 6 month period, re-enter previous 6

month value. Due to the protracted timeframe to modify AFFMS, commanders of ALO-TACP personnel exempt from the Tier 1 AF Fitness Assessment will apply the “Commander’s Exemption” when ALO-TACP personnel are flagged to take a Tier 1 AF Fitness Assessment.

6. Points of contact for this memorandum: 13L ALO CFM Maj Justin Banez, justin.d.banez.mil@mail.mil and 1C4 TACP CFM CMSgt Matthew Nugent, matthew.a.nugent6.mil@mail.mil at DSN 224-6911.

ALO -TACP Tier 2 Operator Fitness Test Scoresheet

Name: _____ **Rank:** _____ **Age:** _____ **Unit:** _____

Email: _____ **Duty Phone:** _____ **Test Date:** _____

TEST RESULTS : Administer test within time constraints and sequence listed below

Abdominal Circumference (inches)				Weight (lbs)	Height (in)
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Conduct dynamic warm-up prior to testing

1 Grip Strength (psi)	Trial 1	Rest	Trial 2	Best	Points
Alternate hands per trial	Rt Hand:	1 min			
	Lft Hand:				

Rest time between test components: REST 1 minute minimum / 4 minutes maximum

2 Medicine Ball Toss back and side 20 lb (ft)	Trial 1	Rest	Trial 2	Rest	Trial 3	Best	Points
Alternate throws per trial	BACK	1 min		1 min		+	
Measure distance to the nearest half foot	SIDE					=	

TOTAL = best back + best side

Total _____

REST 1 minute minimum / 4 minutes maximum

3 Two Cone Drill (secs)	Trial 1	Rest	Trial 2	Rest	Trial 3	Best	Points
Begin in prone position / touch across line		1 min		1 min		Nearest 100th sec	

REST 5 minutes minimum / 20 minutes maximum

4 Trap Bar Deadlift 5 RM (lbs/reps)	Trial 1	Rest	Trial 2	Rest	Trial 3	Best	Points
Member must intend to accomplish 5RM	lbs	5 min	lbs	5 min	lbs		
Calculate total if less than 5 RM	reps		reps		reps		

REST 5 minutes minimum / 20 minutes maximum

5 Pull-up (reps)	Reps	Points
To limit of muscular endurance		

REST 5 minutes minimum / 20 minutes maximum

6 Lunges Weighted 50 lb Metronome 56 bpm (reps)	Reps	Points
Ensure lead knee does not go beyond toes of lead leg		

REST 5 minutes minimum / 20 minutes maximum

7 Extended Cross Knee Crunch Metronome 56 bpm (reps)	Reps	Points
Hands must remain in armpits, slide feet on surface		

REST 5 minutes minimum / 20 minutes maximum

8 Farmer's Carry 50 lb 4 x 25 yd [100 yd] (secs)	Time	Points
Start with a bag handle in each hand, bags on ground		<i>record to the 100th of a second</i>

REST 5 minutes minimum / 20 minutes maximum

9 Row Ergometer 1000 meter (mins:secs.tenths)	Time	Points
Concept 2 drag factor set at 130 ± 1		<i>record minutes:seconds.tenth of a second</i>

REST 15 minutes minimum / 60 minutes maximum

10 Run 1.5 Mile (mins:secs)	Date	Time of Day	Run Time	Points
Record run date, time of day, finish time			24 hr	<i>record minutes:seconds</i>

Note: members must complete the Run 1.5 Mile up to 72 hours prior to or after completing test components 1-9 above. One regular scheduled drill for ANG.

TOTAL POINTS _____

Tier 2 Operator Fitness Test Standards

As of June 1, 2018

ALO-TACP	Grip Strength	Med Ball Toss	Two Cone Drill	Trap Bar DL 5RM	Pull up	Lunges Wtd	Ext Cross Knee Crunch	Farmer's Carry 4 x 25 yd	Row 1000 m	Run 1.5 mile
Points	PSI	ft	secs	lbs	reps	reps	reps	secs	min:secs	min:secs
10	198	50.5	8.6	417	32	199	107	21.2	3:15	7:51
9	166	47.5	8.9	387	28	161	94	22.5	3:22	8:03
8	153	44.5	9.3	355	24	148	79	23.5	3:30	8:50
7	144	42.0	9.5	334	22	123	69	24.8	3:36	9:21
6	137	40.5	9.8	316	20	104	62	25.9	3:40	9:47
5	130	39.0	10.0	300	18	88	57	26.8	3:44	10:10
4	124	37.5	10.2	284	16	73	52	27.8	3:48	10:33
3	117	35.5	10.4	267	13	58	46	28.8	3:52	10:59
2	108	33.5	10.7	245	11	43	39	30.1	3:57	11:31
1	95	30.0	11.1	213	7	24	31	32.0	4:05	12:17

ALO-TACP - Component Minimums indicated in blue

Composite score requirement ≥ 46 of 100



DEPARTMENT OF THE AIR FORCE
WASHINGTON DC



27 October 2017

MEMORANDUM FOR DISTRIBUTION C
ALMAJCOM-FOA-DRU

FROM: HQ USAF/A1

SUBJECT: Air Force Fitness Program – Battlefield Airmen Fitness Assessment Exemption

Effective 1 November 2017, Airmen in Air Liaison Officer (13L) and Tactical Air Control Party (1C4X1) Air Force Specialty Codes (AFSCs) are granted a permanent exemption to the following components of the standard fitness assessment: aerobic, push-ups, and sit-ups. Airmen in these AFSCs are required to complete the abdominal circumference component in addition to their annual occupational AFSC-specific fitness assessment, conducted by a certified physical training leader.

Airmen in Combat Control (1C2X1), Combat Rescue Officer (13DX), Pararescue (1T2X1), Special Tactics Officer (13CX), Special Operations Weather Technician (1W0X2) AFSCs are granted a temporary exemption to the following components of standard fitness assessment until 1 December 2018: aerobic, push-ups, and sit-ups. Airmen in these AFSCs are required to complete the abdominal circumference component in addition to their occupational AFSC-specific fitness assessment annually, conducted by a certified physical training leader. This exemption is contingent upon each career field manager resuming and continuing development and validation of their new AFSC-specific, operationally specific/relevant fitness assessments.

This change will eliminate duplicative fitness assessment requirements for Battlefield Airmen. Additional implementation and policy guidance are forthcoming. Questions pertaining to this memorandum can be addressed to usaf.pentagon.af-a1.mbx.af-a1ppp-workflow@mail.mil. POCs for this waiver program are SMSgt Larry Anderson at DSN 227-4358, Dr. Neal Baumgartner at DSN 665-2371, and SMSgt Joey Williams at DSN 665-4369.

GINA M. GROSSO

Lieutenant General, USAF

DCS, Manpower, Personnel and Services

***Tier 2 Operator Physical
Fitness Test and Standards***
for
Air Liaison Officer
and
Tactical Air Control Party

Test Guidance

Air Liaison Officer (ALO) and Tactical Air Control Party (TACP) Tier 2 Operator Fitness Test

Introduction and Purpose

All US Air Force Airmen must maintain a necessary level of physical fitness to meet the science based standards of the Air Force Fitness Assessment. This assessment, referred to as a *Tier 1* physical fitness test, is designed with health criterion standards to ensure Airmen are present for duty in good health and general fitness. However, a Tier 1 level of fitness does not necessarily reflect specific military task achievement. Some Air Force (AF) occupations or AF Specialty Codes, including ALO and TACP, require higher and broader levels of physical fitness to meet the physical demands of their operational mission sets. Thus, such specialties need a set of physical fitness tests and standards based on their AFSC-specific physical duty requirements, we refer to these as Tier 2 occupationally-specific, operationally-relevant (OSOR) tests and standards.

Therefore, the ALO and TACP career fields worked with the AF Exercise Science Unit to conduct a multi-step research and development process to produce OSOR physical fitness tests and standards. These Tier 2 requirements ensure ALO and TACP operators have the necessary physical abilities to perform the critical physical tasks inherent to their operational duties. This document provides the guidance to conduct the ALO-TACP specific Tier 2 Operator Fitness Test (OFT).

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The following sections describe the requirements to conduct each test component of the ALO-TACP Tier 2 OFT. The ALO-TACP Tier 2 Physical Training Leader (PTL) must complete the PTL guidance section prior to administering a test and must audibly read the protocol section verbatim to members taking the test. Members must complete test components in sequence indicated.

Grip Strength

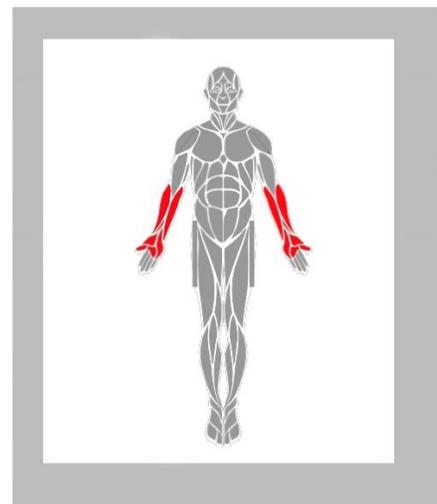
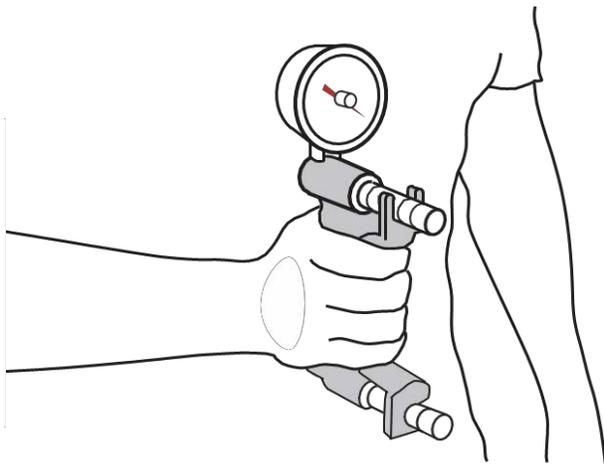
Purpose: measure muscular strength

Protocol:

1. Select a handgrip size that is comfortable for you; recommend second or third setting from the gauge side
2. Grasp the hand dynamometer in your right hand with the gauge facing away from body
3. Stand straight, with your upper arm in contact with torso, elbow flexed at 90°, forearm parallel to the ground, and if desired wrist in slight, 0° to 30°, extension (bent outward)
4. Squeeze the dynamometer as hard as possible for two seconds to three seconds with no extra body movements; sudden jerking motions or any other body movements will result in a trial foul
5. One trial equals a right hand test and a left hand test; you will accomplish two trials separated by a mandatory one minute rest period
6. Time between test components: mandatory minimum time and maximum time = 1 minute and 4 minutes, respectfully

Tier 2 Physical Training Leader (PTL) Guidance (do not read to member)

1. Prepare Equipment: hand dynamometer (Lafayette), grip chalk, scoresheet
2. Ensure at least one minute rest between trials. Conduct one trial, right hand test, followed by left hand test, then the member begins rest period. Recommend conducting first trial for each member testing in serial order followed by second trial in same order, *i.e.*, members rest while others are testing
3. Enforce all protocol requirements
4. Time between test components: mandatory minimum time and maximum time = 1 minute and 4 minutes, respectfully

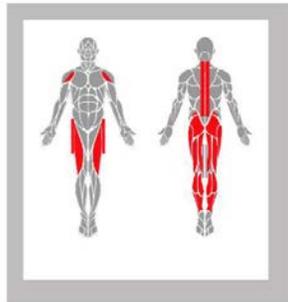
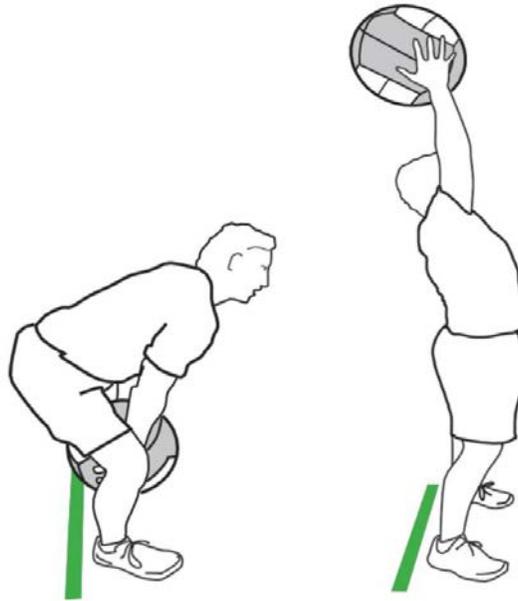


Medicine Ball Toss back and side 20 lb (9.1 kg)

Purpose: measure muscular power

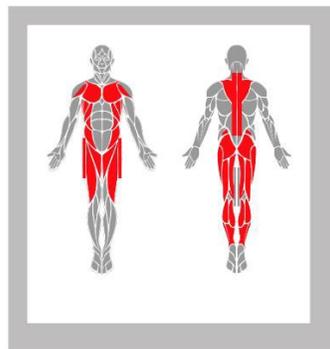
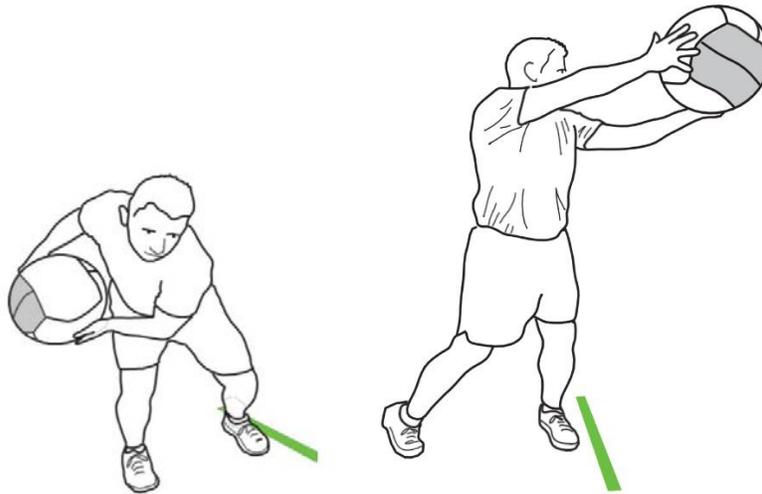
Protocol (*Back* medicine ball toss):

1. Grasp the medicine ball with both hands at hip level and stand with heels at, not on, the start line
2. Bend at your knees and toss the medicine ball from an underhand position over head. Your body and face must remain opposite to throwing direction until the ball contacts the ground
3. You may pivot on your heels or toes, but feet must remain in contact with the ground until ball makes contact with the ground
4. One trial equals a back toss and a side toss. If you have completed a valid trial you may forego remaining trials. You may attempt up to three trials; if you foul on all three trials, you will attempt a final fourth trial
5. A mandatory one minute rest period separates each trial



Protocol (*Side* medicine ball toss):

1. You must use your dominant side for all side tosses. Grasp the medicine ball with both hands and align both feet parallel to the start line in a shoulder-width stance
2. Rotate your trunk and squat down on your rear leg as a counter-movement. Follow this motion by rotating trunk and pressing upward with hip and leg extension in the throwing direction as you toss the medicine ball as far as possible
3. You may pivot on your heels or toes, but feet must remain in contact with the ground until ball makes contact with the ground
4. You may not overhand throw or put, *e.g.*, shot-put
5. One trial equals a back toss and a side toss. If you have completed a valid trial you may forego remaining trials. You may attempt up to three trials; if you foul on all three trials, you will attempt a final fourth trial
6. A mandatory one minute rest period separates each trial
7. Score equals the sum of the best back toss and the best side toss
8. Time between test components: mandatory minimum time and maximum time = 1 minute and 4 minutes, respectfully



Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, tape measure, marking tape or paint, medicine balls, scoresheet
2. Ensure medicine balls are 14 inches in diameter. Weigh medicine balls on calibrated scale to ensure each ball weighs 20 pounds \pm 0.4 lb. Measure and mark a 35 foot landing zone in one foot increments
2. Ensure at least one minute rest between trials. Conduct one trial, a back toss and a side toss, then member begins rest period. Recommend conducting first trial for each member testing in serial order followed by second trial in same order, *i.e.*, members rest while others are testing
3. Requirement: two PTLs required to conduct this test component. Lead PTL directs the test and monitors for foot fouls, second PTL measures and records toss
4. Measure toss from the front of the start line (member side of marking) to the point where the ball lands (center of the ball); when ball impacts ground second PTL must immediately mark the landing spot with own foot, then measure and record the nearest one-half foot increment. If ball lands in between one-half foot marks then round to the lower mark, *e.g.*, ball landed between 20.5 foot mark and 21.0 foot mark, score is 20.5 feet
5. If member fouls on all three trials, conduct a final fourth trial
6. Enforce all protocol requirements
7. Time between test components: mandatory minimum time and maximum time = 1 minute and 4 minutes, respectfully

Two Cone Drill

Purpose: measure agility, balance, coordination

Protocol:

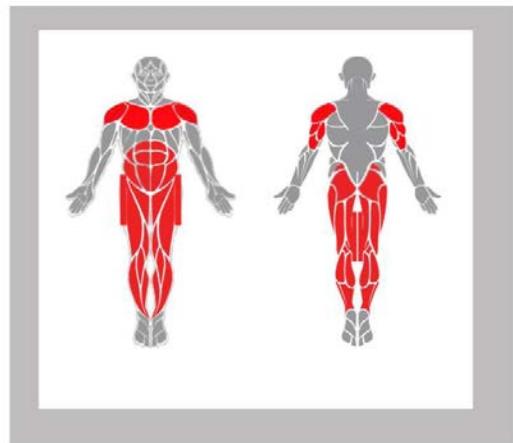
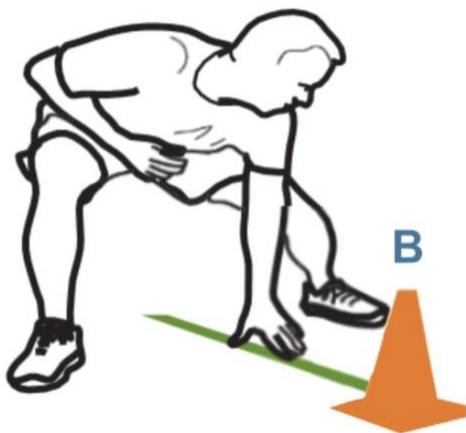
1. Start from the prone position; legs extended with feet no more than 12 inches apart, head behind the start line
2. After a “Ready” command, time will start on your first movement. Push yourself up from the start/finish line at cone A and sprint forward to the line at cone B, touching the ground beyond (past) the line at cone B with your hand
3. Reverse direction and sprint forward to the start/finish line at cone A, touching the ground beyond (past) the start/finish line at cone A with your hand
4. Change direction and sprint forward towards cone B. Round cone B counter-clockwise keeping cone B to your left (left shoulder to the inside of the turn)
5. Sprint forward towards cone A. Round cone A clockwise keeping cone A to your right (right shoulder to the inside of the turn)
6. Sprint forward toward the line at cone B, touching the ground beyond (past) the line at cone B with your hand
7. Run *BACKWARDS* through the original start/finish line at cone A
8. Time stops when your buttocks cross the line
9. If you have completed a valid trial you may forego remaining trials. You may attempt up to three trials; if you foul on all three trials, you will attempt a final fourth trial
10. A mandatory one minute rest period separates each trial
11. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, tape measure, marking tape or paint, cones, stopwatches, scoresheet
2. Test surface: *highly* recommend thin government carpet for testing. Alternatives: rubber flooring, turf, basketball court
3. Layout: place two cones five yards (15 feet) apart from each other on a flat, clean surface. Mark, with tape or paint, an A line (start/finish) and a B line; ensure the lines are at least 4 feet in width. You must place cones inside test area with outer edge of cone aligned with outer edge of marking tape/paint line; cone A at the start/finish line and cone B at the opposite line
4. Requirement: two PTLs and one assistant are required to conduct this test component. Lead PTL directs test, acts as line A judge and primary timer, second PTL acts as line B

judge. Second timer not required to be PTL certified

5. Timing procedures. timers should use index finger for the start and stop actions on the stopwatch. Must use primary timer's finish time unless: 1) primary timer was mistaken (late start, early finish, other), or 2) difference between primary and secondary timers' finish times is > 0.2 seconds. If difference is > 0.2 seconds and both timers are confident in their timing actions then mean the times. Record time to the hundredth of a second, *e.g.*, 9.87 seconds
6. Time begins on member's first movement and ends when member's buttocks cross the start/finish line at cone A
7. Ensure at least one minute rest between trials. Recommend conducting first trial for each member testing in serial order followed by second trial in same order, *i.e.*, members rest while others are testing
8. If member fouls on all three trials, conduct a final fourth trial
9. Enforce all protocol requirements
10. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully



Trap Bar Deadlift 5 RM

Purpose: measure muscular strength

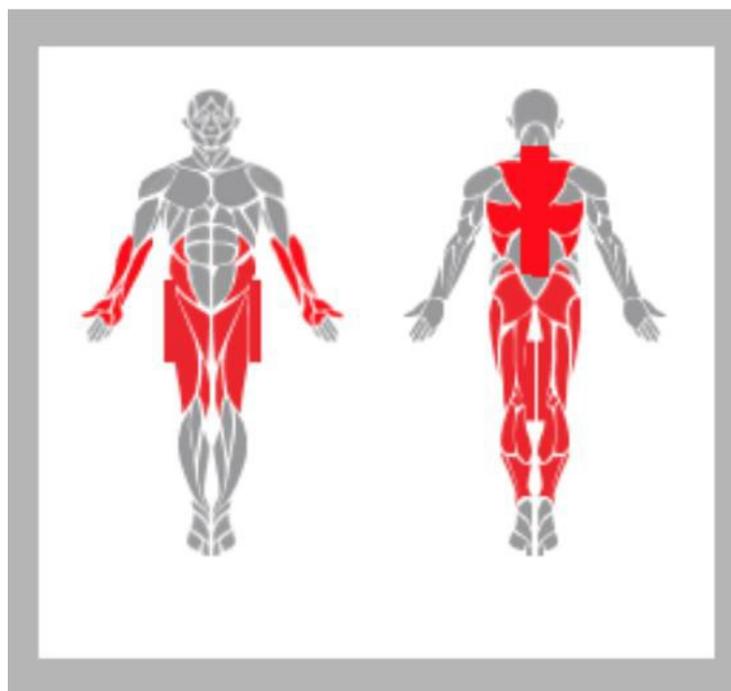
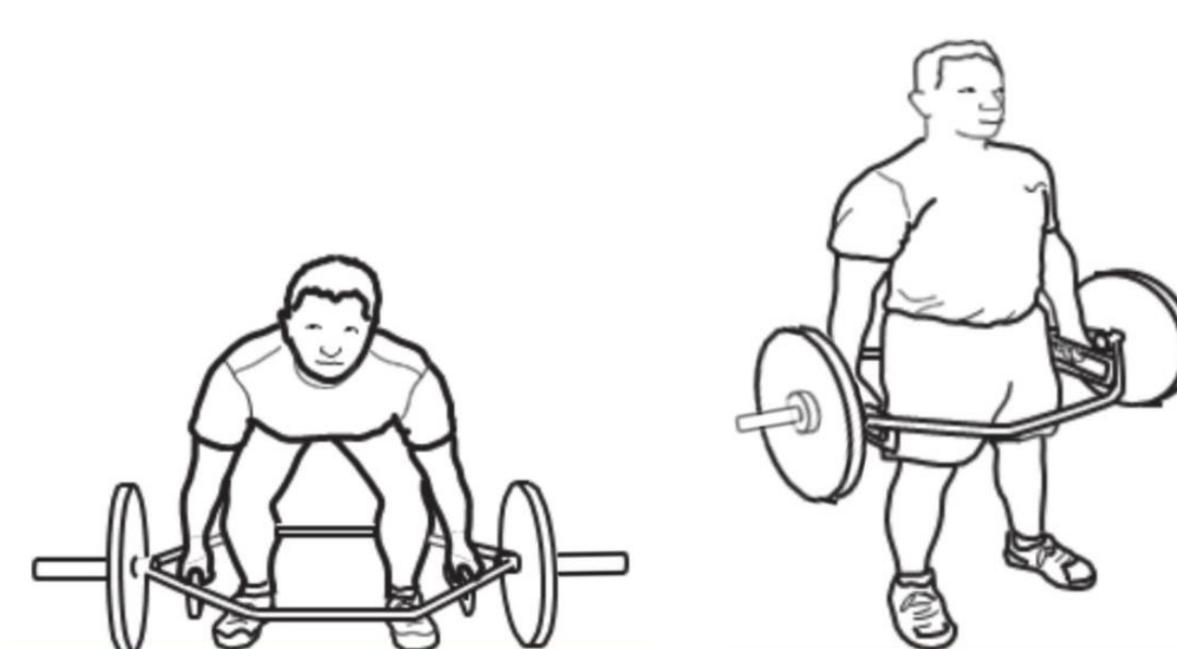
Protocol:

1. Prior to testing you will adequately warm up with a light weight
2. The trap bar deadlift consists of three phases; preparatory, upward movement, and downward movement
3. Preparatory Phase: stand inside the trap bar and grasp the handles with a centered grip (if a dual-handled trap bar is used, you will grasp the lower handles, with the upper handles facing down). Arms must be fully extended, back flat, chest held up and out, head in line with the spinal column or slightly hyperextended, heels in contact with the floor, and eyes focused straight ahead or slightly upward
4. Upward Movement Phase: lift the bar by extending your hips and knees. Hips should not rise before your shoulders. Back should remain flat; if your back arches (upward) we will terminate the attempt. Continue to extend the hips and knees until you are standing fully upright. There is a slight pause at the top of this movement
5. Downward Movement Phase: slowly lower the bar to the floor while maintaining a flat-back position. Do not lean forward. Trap bar weight plates must touch the floor very briefly before beginning the next repetition (“touch and go”), do not set weight down or rest between repetitions
6. On each trial you must attempt to accomplish five repetitions
7. A mandatory five minute rest period separates each trial
8. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, trap bars, weight plates, collars, grip chalk, scoresheet
2. Prior to testing, weigh the trap bar with calibrated scale and mark mass of bar to the nearest tenth of a pound on the bar
2. Member is allowed to re-grip the bar in the down position; however, do no permit resting in the down position or rising up without the trap bar
3. Ensure proper form is maintained. If back arches, terminate the attempt
4. Record weight, to nearest pound, and repetitions on each trial. Calculate predictive values for each trial including any trial where member is unable to complete five repetitions. Do not permit any intentional 1 RM, 2 RM, 3 RM, or 4 RM efforts (5RM must be the goal for each trial). Attempts resulting in less than 5RM are permitted only if staff terminates test, member loses full safe grip, member drops bar, or member fatigues

5. Do not permit use of gloves, weight belts, wrist straps, or under foot wedges. Member may or may not wear shoes
6. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully



Pull-up

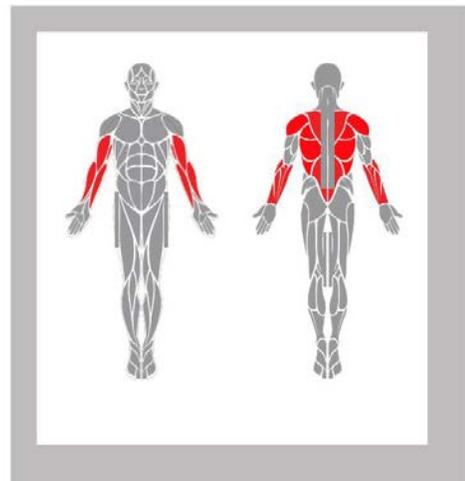
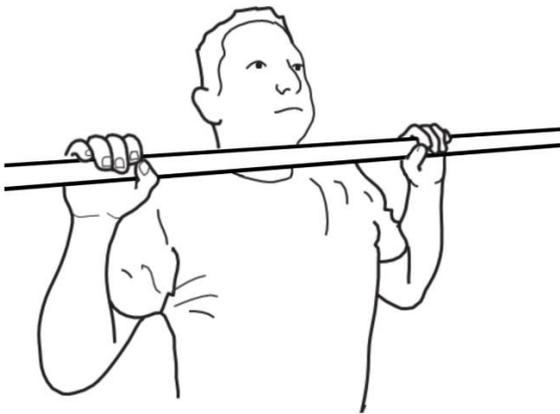
Purpose: measure muscular endurance

Protocol:

1. Starting position: hang from bar, hands approximately shoulder-width apart, palms facing away from you with no bend in your elbows, *i.e.*, “dead hang”
2. Movement one: pull your body up until your chin is over (not at) the bar (chin breaks horizontal plane of the bar). Legs may bend but you shall not kick them or use them in any way to aid upward movement (no “kipping”)
3. Movement two: return to the starting position. Continue to the limit of muscular endurance. If you release from the bar or hang by one hand we will terminate the test
4. Time between test components: mandatory minimum time and maximum time = 5 minute and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, bar, tally counters, grip chalk, scoresheet
2. PTL should stand 45 degrees from front of member
3. Count one pull-up upon the successful completion of movements one and two; ensure chin breaks the horizontal plane of the bar, and ensure member returns to full extension (dead hang) position prior to next repetition
4. Record total number of correct pull-ups completed until exhaustion
5. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully



Lunges Weighted 50 lb (22.7 kg) Metronome 56 bpm

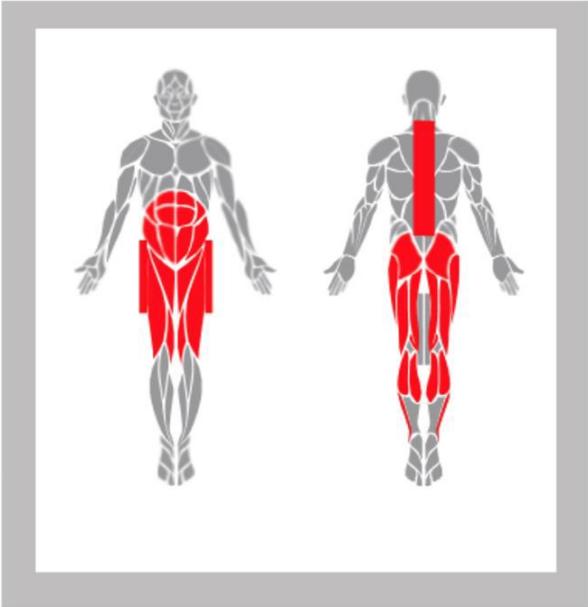
Purpose: measure muscular endurance

Protocol:

1. Starting position: stand with a 50 lb sandbag resting behind the neck and across the shoulders; hold onto bag handles or drape your arms around the sandbag maintaining control of the bag
2. First Movement: step forward, rear leg kneels down
3. Second Movement: push the body upright and step back
4. Alternate right and left leg, so the heel of your front leg is a minimum of 4 inches (10 cm) in front of the knee of your back leg; the knee of your back leg may touch the floor but must be no higher than 4 inches (10 cm) above the floor at end of forward step
5. You must maintain a stable back and your lead knee should not pass toes of your lead leg while lunging
6. Repeat lunge movements in cadence, 56 beats per minute, to the limit of muscular endurance
7. If movements are not continuously in cadence with the metronome for two or more repetitions, we will terminate the test. Goal of this event is to complete as many correct repetitions as possible without rest; there is no authorized rest position for this test
8. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, sandbag 50 lb, metronome, tally counters, marking chalk, scoresheet
2. Prior to testing, weigh sandbags on calibrated scale to ensure mass of each bag is 50 pounds \pm 0.6 lbs
3. Set metronome to 56 beats per minute and ensure sound is distinct and loud enough for all members to hear clearly
4. PTL may place chalk marks on ground to assist both member and PTL in maintenance of consistent lunge step length
5. Ensure member's lead knee does not go beyond toes of lead leg while lunging
5. Record total number of correct repetitions in cadence
6. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully



Extended Cross Knee Crunch Metronome 56 bpm

Purpose: measure muscular endurance

Protocol:

1. Starting position: lie on your back on a flat, level surface, legs straight, arms crossed, and hands locked completely under armpits. Hands must remain under armpits for test duration
2. If using a mat, thin only ($\approx \frac{1}{2}$ inch) permitted, then hips must be close to edge of mat so feet remain on floor during test
3. Remove shoes. Slide feet in while bringing torso upwards and your left elbow across your body to reach the *top* of your right knee
4. Back must be vertical (straight) to the surface
5. Return to the starting position, pushing feet outward along the surface. This is one crunch. Feet must remain in contact with surface throughout test
6. Slide feet in while bringing right elbow across your body to reach the *top* of your left knee
7. Repeat movements in cadence, 56 beats per minute, to the limit of muscular endurance
8. If movements are not continuously in cadence with the metronome for two or more repetitions, we will terminate the test. Goal of this event is to complete as many correct repetitions as possible without rest; there is no authorized rest position for this test
9. Recorder will warn you if your feet depart the surface, *i.e.*, start “floating”; assessor will terminate test if “floating” continues for two or more repetitions
10. Again, you must remove shoes for this test
11. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: test area, mats, metronome, tally counters, scoresheet
2. Set metronome to 56 beats per minute and ensure sound is distinct and loud enough for all members to hear clearly
3. Warn member if hands depart armpits, wrists are bent so only ends of fingers are in armpit, or if feet are “floating”; terminate test on second consecutive warning for any of these
4. Record total number of correct repetitions in cadence
5. Member must remove shoes
6. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Farmer's Carry 100 lb (45.4 kg) 4 x 25 yard (22.9 m) 100 yard (91.4 m)

Purpose: measure anaerobic capacity

Protocol:

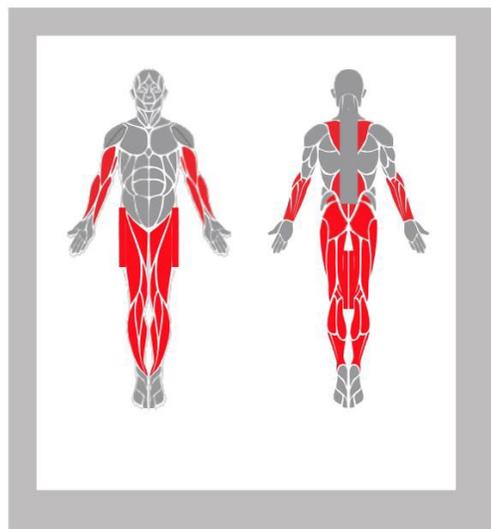
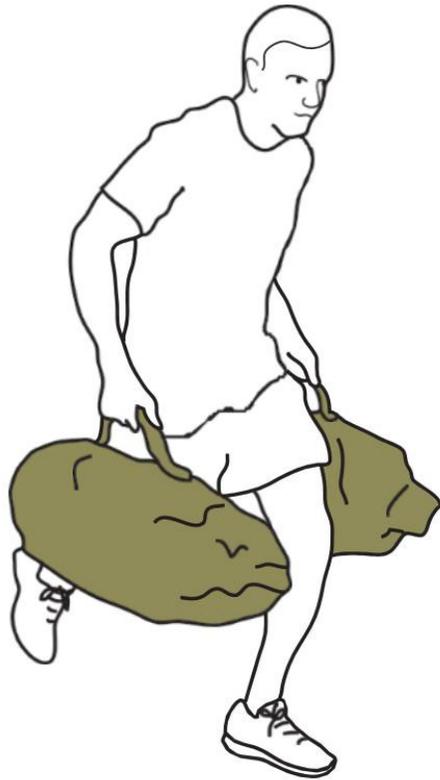
1. Prior to start you may lift the sandbags, 50 pounds each, to familiarize yourself with the weight, then return them to start position on the ground. Bags and body must be behind the start line before the test
2. Start position: you will stand between two sandbags behind the start line. Squat down between the sandbags and grasp the handles, but do not lift the bag prior to start
3. Two commands, "Ready" and "Go." Time starts on the "Go" command
4. Lift the sandbags and traverse (walk, jog, or run) the course as fast as possible with one sandbag remaining in each hand for the entire 100 yards. Maneuver around the 25 yard cone, return to start line, maneuver around the start line cone, and repeat a second lap. You may choose either a clockwise or counterclockwise direction around the cones
5. You must carry sandbags by the handles, you may not carry them on your shoulders or cradled in your arms. If you drop a sandbag you must pick it up prior to any further advancement
6. Time ends when you and the bags are entirely across the finish line; you may not toss sandbags or release them prior to fully crossing the finish line
7. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare equipment: test surface, sandbags, measuring tape, marking tape or paint, cones, stopwatches, scoresheet. Two timers are required for this test component
2. Ensure a flat, level, non-banked, smooth, 25 yard surface with area beyond the start line and 25 yard line for turning; sweep/mop surface free of dirt and debris for consistent performance and safety. Mark start and 25 yard lines with marking tape or paint, eight foot wide. Outer edge of marking tape must be at the zero and 25 yard points. Place cones at each end, outer edge of cone even with outer edge of tape
3. Prior to testing, weigh sandbags on calibrated scale to ensure mass of each bag is 50 pounds \pm 0.6 lbs
4. Timing procedures. timers should use index finger for the start and stop actions on the stopwatch. Use primary timer's finish time unless: 1) primary timer was mistaken (late start, early finish, other), or 2) difference between primary and secondary timers' finish times is $>$ 0.2 seconds. If difference is $>$ 0.2 seconds and both timers are confident in their

timing actions then mean the times. Record time to the hundredth of a second, *e.g.*, 25.87 seconds

5. Enforce all protocol requirements
6. Time between test components: mandatory minimum time and maximum time = 5 minutes and 20 minutes, respectively



Row Ergometer 1000 meter

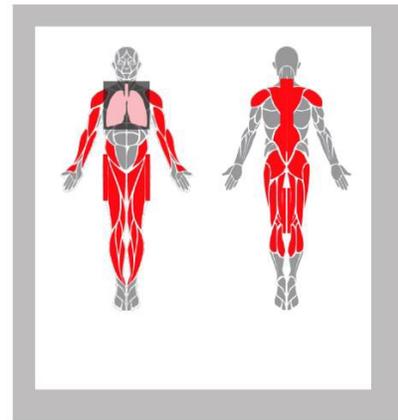
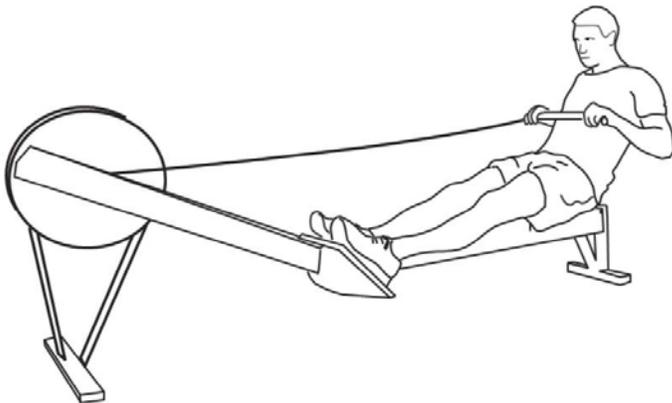
Purpose: measure muscular endurance, anaerobic capacity, and cardiorespiratory endurance

Protocol:

1. Sit in the ergometer ready to start a single distance 1000 meter test. Tighten foot straps securely around your shoes
2. Aim of the test is to cover 1000 meters in the shortest possible time
3. Time starts on your first pull; ergometer module will track your time and distance
4. Time between test components: mandatory minimum time and maximum time = 15 minutes and 60 minutes, respectfully

Tier 2 PTL Guidance (do not read to member)

1. Prepare equipment: test area, Concept 2 row ergometer with PM5 module, stopwatch, and scoresheet. Clean dust, dirt, debris from ergometer seat, slide rail, fanhousing
2. Prior to testing, set the damper to 5 (gross setting). Locate ergometer drag factor setting (fine setting) on the PM5 interactive screen (More Options; Display Drag Factor). PTL begin rowing and screen will display the drag factor; adjust the damper until the drag factor reads 130 ± 1
3. Return to main menu, select “New Workout,” “Single Distance,” input 1000m, and select “Check Mark”
4. Ensure member does not touch damper or alter settings in anyway
5. Record time from the screen in minutes:seconds.tenths, *e.g.*, 3:16.9



Run 1.5 Mile (2414m)

Purpose: measure cardiorespiratory endurance

Protocol:

1. Complete a dynamic warm-up prior to test; recommend including a 30 second to 60 second run at goal pace at end of warm-up period, five to ten minutes prior to start of test
2. Line up on the straight line across all lanes of track behind the curved waterfall start line. On the command “runners to your mark,” move up to the waterfall start line, on the command “go,” start the test
3. Run the test to the best of your ability, *i.e.*, a maximal effort. Recommend relatively even pacing, keeping lap time differential to less than 10 seconds
4. You are not permitted physical assistance from anyone or anything
5. You must stay on the marked course; we will disqualify you if you depart from the course for two or more consecutive steps

Tier 2 PTL Guidance (do not read to member)

1. Prepare Equipment: flat level non-banked course free of dirt and debris, stopwatches, scoresheet, and, if needed, member marking tags with safety pins
2. Measure course or track, total distance 1.5 mile (2414 meters). Measure and mark split marks every one-quarter mile or 402.34 meters (one lap on a one-quarter mile track)..If using a 400 meter track then PTL must ensure total distance run is 2414 meters, not simply six laps for 2400 meters. Must use a measuring wheel to measure course (to include track*) versus GPS devices, vehicle odometers, or other devices. *Must measure base or post track you are using; must not rely on local units’ measurements or their claims as to the distance of track
3. If on a quarter mile or 400 meter track, employ a waterfall start. Have members line up on straight line across all lanes of track behind the curved waterfall start line. Start members with a two part command, on the command “runners to your mark,” members move up to the waterfall start line, on the command “go,” members start
4. PTL or PTL assistant must call out lap split times
5. Record finish time in minutes and seconds, *e.g.*, 8:07
6. Member must take this test component within plus or minus 72 hours from the completion of the other Tier 2 OFT test components
7. Time between test components: mandatory minimum time and maximum time = 15 minutes and 60 minutes, respectfully

