What You Will Learn to Do

Meet the physical fitness standards for the Cadet Challenge

Linked Core Abilities
- Take responsibility for your actions and choices

Skills and Knowledge You Will Gain Along the Way
- Determine your personal Cadet Challenge goal
- Distinguish between the various fitness award categories
- Identify the five Cadet Challenge exercises
- Describe the proper techniques for the Cadet Challenge exercises
This is it! Lace up your sneakers and warm up for what may be the toughest part of this unit—participating in exercises designed for the Cadet Challenge program. Get ready to tackle exercises that test your physical ability. Each one requires endurance, speed, strength and flexibility.

How can Cadet Challenge, JROTC’s Physical Fitness Test, benefit you? Cadet Challenge not only develops your understanding and appreciation for physical fitness, it demonstrates how an exercise program can improve one’s health, appearance and self-confidence. Finally, through striving to achieve a goal and in recognizing and recording your own progress, you gain confidence.

The Challenge

Cadet Challenge consists of five exercises. They are:

1. Curl-ups
2. Pull-ups or flexed arm hang
3. Right angle push-ups
4. V-sit reach, or sit and reach
5. One-mile run/walk or shuttle run

Cadet Challenge requires each Cadet to participate in the physical fitness test, which is conducted two times each school year. Cadets who score 85 percent or better on each event can receive a Health Fitness Award.

Descriptions on how to execute each are provided later in this chapter. Along with each exercise description, is a box showing standards based on your age and gender. To qualify for the 85th Percentile Fitness Award, you must achieve a standard of 85 percent or higher on all five items of the test. Scoring at this level qualifies you to receive an award, which consists of a round, blue emblem embroidered with an eagle.

If you achieve a standard of 84 percent or below, but above 50 percent, you qualify for the 50th Percentile Fitness Award. Cadets who score in the 50th to 84th percentile are eligible to receive an award, which consists of a round red emblem embroidered with an eagle.

Those Cadets who achieve Cadet Command’s standards in Cadet Challenge are eligible to receive the JROTC Athletic Ribbon. Cadets who attempt all five exercises, but score below the 50th percentile on one or more of them, are eligible to receive a white round emblem embroidered with an eagle.

A JROTC Physical Fitness Ribbon (N-2-2) is presented to Cadets who receive the 85th percentile rating, or better, in each of the five events of the Cadet Challenge program.
The JROTC Athletics Ribbon (N-2-3) is presented to Cadets who receive the 50th percentile rating or better in each of the five events of the Cadet Challenge program. The top five male and five female Cadets in each unit receive individual medals.

Curl-ups

Conduct **curl-ups** on a flat, clean surface, preferably with a mat. Start in a lying position on your back with your knees bent so your feet are flat on the floor about 12 inches from your buttocks. You should have your arms crossed with your hands placed on opposite shoulders, and your elbows held close to the chest throughout the exercise. Have a partner hold your feet at the instep. At the command, “ready, go,” raise the trunks of your body, curling up to touch the elbows to the thighs, and then lower your back so your shoulder blades touch the floor/mat.

This constitutes one repetition of a curl-up. During each repetition, bouncing off the floor/mat is not allowed and the fingers must touch the shoulders at all times. Complete as many curl-ups as possible in 60 seconds.

Partial curl-ups can be used as an alternative to curl-ups. Lie on a cushioned, clean surface with knees flexed and feet about 12 inches from buttocks. Do not hold or anchor the feet. Arms are extended forward with fingers resting on the legs and pointing toward the knees. Your partner should be behind your head with hands cupped under your head. Curl up slowly, sliding the fingers up the legs until the fingertips touch the knees, then curl back down until the head touches your partner’s hands. The curl-ups are done to a metronome (or audio tape, clapping, drums) with one complete curl-up every three seconds. Continue until you can do no more in rhythm (have not done the last three in rhythm) or have reached the target number for the test.

Pull-ups

**Pull-ups** are conducted using a horizontal bar approximately 1.5 inches in diameter. A doorway bar or a piece of pipe can serve the purpose. The bar should be high enough so you can hang with your arms fully extended and your feet free of the floor/ground. Assume the hanging position on the bar using either an overhand grasp (palms facing away from body) or underhand grip (palms facing toward body). Begin the exercise by first raising your body until your chin is over the bar without touching it. To complete one repetition, the body must be lowered to the full-hang starting position. During each repetition, the body must not swing, legs must not kick or bend, and the pull must not be jerky.
Scoring is done on the number of pull-ups you can correctly execute. There is no time limit on this event.

The **flexed-arm hang** should be used when a Cadet cannot execute one pull-up. Using a horizontal bar as in the pull-ups, climb a ladder until your chin is above the bar. Begin the exercise by grasping the bar with your hands, shoulder width apart, using either an overhand grasp (palms facing away from body) or underhand grip (palms facing toward body). At the command “ready, go,” step off the ladder. Simultaneously, an assistant instructor will remove the ladder and prevent any forward swinging of the legs. The Cadet's chin should be level above the bar. Kicking and other body movements are not permitted while you are on the bar. The stopwatch starts on the command “go” and stops when your chin rests on the bar, the chin tilts backward to keep it above the bar, or the chin falls below the level of the bar. Scores are recorded to the nearest second.

**Right Angle Push-ups**

Lie face down on the mat in push-up position with hands under shoulders, fingers straight and legs straight. Your legs should be parallel and slightly apart, with the toes supporting the feet. Straighten the arms, keeping the back and knees straight, then lower the body until there is a 90-degree angle at the elbows, with the upper arms parallel to the floor. A partner holds your hand at the point of the 90-degree angle so that you go down only until your shoulder touches the partner’s hand, then back up. The push-ups are done to a metronome (or audio tape, clapping, drums) with one complete push-up every three seconds, and are continued until you can do no more in rhythm (have not done the last three in rhythm) or you have reached the target number for the 85th percentile Health Fitness Award.

**V-sit Reach**

The **V-sit reach** is conducted on a flat, clean floor. Use a yardstick and adhesive tape to make a baseline that is two feet long. Make a measuring line perpendicular to the midpoint of the baseline extending two feet out from either side of the baseline. Place one-inch and half-inch marks along the measuring line with “0” where the baseline and measuring line intersect. Remove your shoes and sit on the floor with the soles of your feet placed immediately behind the baseline. The measuring line should be between your heels, which are eight to 12 inches apart. Clasp your thumbs so that your hands are together, palms down, and place them on the floor between your legs. While your legs are held flat on the floor by a partner (or partners), perform the exercise while keeping the soles of your feet perpendicular to the floor (feet flexed). Slowly reach forward along the measuring line as far as possible, keeping the fingers in contact with the floor. You receive three practice tries for the v-sit reach. On the fourth extension, hold your farthest reach for three seconds. Scores are recorded where fingertips touch
the floor to the nearest half-inch. Scores beyond the baseline are recorded as plus scores, whereas those behind the baseline are recorded as minus scores.

**Sit and Reach**

The sit and reach exercise is done in a specially constructed box with a measuring scale marked in centimeters, with 23 centimeters at the level of the feet. Remove your shoes and sit on floor with knees fully extended, feet shoulder-width apart, and soles of the feet held flat against the end of the box. With hands on top of each other, palms down, and legs held flat, reach along the measuring line as far as possible.

After three practice reaches, the fourth reach is held while the distance is recorded. Participants are most flexible after a warm-up run. Best results may occur immediately after performing the endurance run. Legs must remain straight, soles of feet against the box and fingertips of both hands should reach evenly along measuring line. Scores are recorded to the nearest centimeter.

**One-mile Run/Walk**

This event is conducted on a flat area that has a known measured distance of one mile with a designated start and finish line. You will be given a lightweight numbered device to carry or wear in any manner that will not slow you down while running.

**Shuttle Run**

The **shuttle run** is conducted on an area that has two parallel lines 30 feet apart. The width of a regulation volleyball court can serve as a suitable area. Start from the standing position. At the command “ready, go,” run to the opposite line, pick up one block, run back to the starting line, and place the block behind the line. Run back, and pick up the second block, and carry it across the line. Two runs are allowed for this event, with the better of the runs recorded. Scores are recorded to the nearest tenth of a second.

*Courtesy of Army JROTC*
Basic Rules of Exercise

As you prepare for the Cadet Challenge, remember to follow these basic rules:

- To produce positive results, exercise at least three times a week.
- Begin your exercise program by warming up for five to seven minutes.
- Spend at least 20 minutes on conditioning then cool down for four to six minutes.
- With the exception of the v-sit reach, complete the exercises in the challenge during the conditioning period.
- Make the V-sit reach part of your warm-up or cool-down.

Remember to follow an exercise program that includes aerobic exercise for the one-mile run/walk, anaerobic exercise for the shuttle run, muscle strengthening for the pull-ups and curl-ups, and stretching for the v-sit reach. If you give it your all and perform to the best of your abilities, you will:

- Have a stronger body
- Feel good about yourself
- Appreciate health and fitness

Improving Your Scores

The exercises in Cadet Challenge test your endurance and physical strength. Initially, it does not matter what you score on these events except to establish a base score from which to build. From there, however, it is important that you establish a routine exercise program, so that your score will improve, and along with it, your health. Work toward achieving the 85th percentile standard. If you have participated in the similar program in another physical education program, and met the 85th percentile for your age and gender, try to achieve it again this time. If you did not meet that standard, here’s a chance to improve.

Building Health Skills

As you go through this, or any exercise program, it’s important to protect your body and build some health skills. These skills include knowing how to warm up, cool down and stretch.

Warming Up, Cooling Down and Stretching

Imagine you are about to go on a five-mile bicycle ride or play your favorite sport.
You know these are strenuous activities that put stress on your bones, muscles and tendons. So, how should you prepare your body for these activities? After the activity, what should you do to minimize the effects of the stress on your body?

Before a workout, use slow movements to warm up the muscles you will use.

When the muscles are warmed up, stretch them. Stretching cold muscles is not effective and can cause injury. After your workout, cool down by slowly moving the muscles you used. Then stretch these muscles as you did before the workout.

Although no single stretching routine is appropriate for every activity, the stretching exercises that follow provide a base from which to build. It is important not to rush when you perform these movements. A pulled muscle can hold you up much longer than the few minutes of warming up/stretching and cooling down/stretching needed with each workout.

When you perform stretching exercises, do not bounce. Bouncing can tear muscle fibers and scar tissue can form.

Before your workout, walk, jog slowly, or perform the activity that you are about to participate in at a reduced pace. This warms up your muscles, preparing them for the more intense activity of the workout itself. Similarly, right after the workout, continue moving your muscles at a reduced pace for five to 10 minutes, as you did in the warm-up. This cool-down period helps ease the body back into normal levels of muscular activity.

**Conclusion**

The Cadet Challenge is an introduction to exercising for a specific goal. You will see your scores improve as you continue to practice. Making healthy changes in your lifestyle and working hard to reach this goal will make you a stronger, healthier individual, both mentally and physically. By participating in the Cadet Challenge, you will also gain the satisfaction of a job well done!

**Lesson Check-up**

1. Contrast the requirements of the 85th and 50th Fitness Award.
2. How do you benefit from participating in the Cadet Challenge?