Kayaking
Training, Health, and Fitness Guide

A quick-start resource for all levels of coaches.

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Partially sourced from: Special Olympics International Kayaking Coaching Guide
HEALTH and FITNESS TALK
Suggestions for including a focus on year-round health and wellness in your sports practice.

“To be a great athlete, you need to be a healthy athlete.”

These discussions are laid out in balance, order, and accordance with Special Olympics Montana’s 8 weeks – 10 hours practice requirements. An included practice plan, which shows how these discussions can fit in a practice, is included in this same packet.

The goal of Health and Fitness Talk is to support the health, fitness, growth, and success of Special Olympics Montana competitors. It is designed to be used as a part of your practice season. The following discussions will provide competitors with the introductory knowledge to begin thought processes on:

- Identifying nutritious choices
- Balancing nutrition and portions
- Making healthy and balanced snack and meals choices
- The importance of hydration
- Identifying unhealthy beverage choices
- Understanding endurance and strength
- Understanding flexibility and balance
- Understanding the benefits and fun of exercise

If you are interested in a more in-depth Health and Fitness Program, explanations, examples, and lesson plans/guides, reach out to the Special Olympics Montana Senior Director of Innovation at 406-216-5327.

Practice Week #1 Discussion: NUTRITION: Eating right is important to your health and your sports performance. Eating right can be easy and enjoyable because there are many delicious healthy choices.

Your goal is to eat at least 5 total fruits and vegetables every day!

Tell your teammate the names of some Fruits:
- Fresh: Apples, Bananas, Berries, Grapes, Kiwi, Oranges
- Frozen Fruits
- Canned fruits (pick options with no added sugar)
- Dried fruits: Raisins, Bananas, Apricots

Tell your teammate the names of some Vegetables:
- Fresh: Asparagus Broccoli, Carrots, Cauliflower, Green Beans, Peppers, Squash
- Lettuces and Dark Leafy Greens
- Frozen Vegetables
- Salads
- Canned Vegetables
What fruits can you have for breakfast? Lunch?
What vegetables can you have for lunch? Dinner?

You know fruits and vegetables are important for your health, but sometimes it can be difficult to know what other foods you should be eating. Here is a list of the other food groups and some great choices in each group that make up a healthy meal or diet.

**Grains:**
- Brown or Wild, or Unpolished Rice
- Oatmeal
- Whole Grain Bread
- Whole Grain Pasta
- Whole Grain Crackers
- Tortilla
- Flatbread

**Diary:**
- Low-fat or Skim Milk
- Low-fat Cheese
- Low-fat, unsweetened yogurt (watch the sugar!)
- Cottage Cheese

**Meats and Beans (Protein):**
- Lean Meats
- Eggs
- Fish (frozen, fresh or canned)
- Nuts
- Beans

-Tell your partner the Grains you ate yesterday. Dairy?
-Share with a teammate what protein (Meats & Beans) you had last night for dinner.

**Practice Week #2 Discussion**: BUILDING A HEALTHY PLATE: From last time, you now know what types of foods to eat. Here is how to build a healthy plate for a meal or for a snack.
- Watch the amounts of food you put on your plate (share/discuss the “Perfect Portions” diagram below).
- Save junk food like desserts, chips and sodas for special occasions.
- Make half of your plate fruits or vegetables (see diagram below).
- Fill the other half with foods like whole grains, dairy, and protein.
- Add more fruits and vegetables to your meals.
- Keep snacks healthy and small.

-Tell your teammate how to build a healthy plate.
-Name the 4 food groups that should make up a healthy meal.
Here is a fun way to remember how much to eat when you have a serving. The size of sports equipment on the left is about the same size as one serving of the foods on the right.

- 1 serving of fruit
- 1 serving of pasta
- 1 serving of nuts
- 1 serving of butter

Make half of your plate fruits or vegetables. Fill the other half with foods like whole grains, dairy, and protein.
Practice Week #3 Discussion: HEALTHY SNACK IDEAS: Snacking is a great way to make sure you are full of energy. It is important to keep your snacks healthy. Here are a few ideas for tasty snacks that are packed with fruits and vegetables.

- Apple slices dipped in peanut butter
- Low-fat unsweetened yogurt with berries
- Low-fat cottage cheese with tomatoes
- Carrots or peppers dipped in hummus
- Celery topped with peanut butter and raisins

What snacks do you like the most? Are these healthy snacks or junk food snacks?

Tell your partner a healthy snack you could make for yourself.

Are these healthy snacks (thumbs up) or junk food snacks (thumbs down)?

- Doritos
- Banana with peanut butter
- Snickers candy bar
- A half cup of nuts
- Carrot sticks
- A cookie

HEALTHY MEALS: Add more fruits and vegetables to your meals. You can make any meal more nutritious with these simple suggestions.

**Breakfast**
- Have a piece of fruit with your meal.
- Vegetables like spinach, tomatoes, onions and peppers make great toppings on omelettes.
- Dried or cut fruit make great toppings on cereal and oatmeal as well.

**Lunch**
- Top sandwiches with plenty of vegetables like lettuce, tomatoes, cucumbers, peppers, and sprouts.
- Try apples, carrots, or celery for a crunchy side.
- Add leftover or canned vegetables like peas and carrots to soups.
- Make a salad with your choice of meat, cheese, lots of vegetables, and an oil-based dressing.

**Dinner**
- Add vegetables like broccoli, squash, or peppers to pastas.
- Make a stir-fry with brown rice, your favorite lean meat or seafood, and vegetables.
- Add a side of steamed vegetables or a salad to any meal.
- Have some fruit as a healthy dessert.
-What healthy items can you add to a salad (carrots, tomatoes, sunflower seeds, etc.)?
-Do you like oatmeal? What can add to oatmeal (banana, blueberries, etc.)
-Tell you partner how are you doing with the goal of having half your plate be fruits and vegetables.

**Reach Your Fit 5 Nutrition Goal**

*It’s easy to eat 5 fruits and vegetables in one day.* Follow this sample meal plan and see how easy it is to reach your goal.

**Practice Week #4 Discussion:** **HYDRATION:** Water is another important fuel for sports and for life. Drinking the right amount of water is important for your health and can also help your athletic performance.

**Your goal is to drink 5 bottles of water every day!** Your water bottle should be 16-20oz or 500-600ml. Drink out of a sports water bottle to track your water intake. Sports bottles are refillable and can hold 16-20oz or 500-600ml of water.

-Do you have a water bottle? Do you take it with you when you go places? Do you bring it with you to practice?
-Are you drinking water with your meals?

**SIGNS OF DEHYDRATION:** Water helps to keep your body working properly. You lose water when you go to the bathroom, sweat, exercise or even breathe. If you lose too much water without drinking more, your body won’t work as well. This is called **dehydration**.
**Signs of Dehydration:**
- You feel thirsty
- You are tired or sluggish
- You have a headache
- Your mouth is dry
- Your urine is dark yellow or brown

-Tell your teammate two of the signs of dehydration.
-Have you ever been dehydrated? How did you know? How did you feel?

**Practice Week #5 Discussion: HEALTHY BEVERAGE CHOICES:** There are many beverage options available, but some of them are healthier choices than others. This guide can help you make the best choices to stay hydrated and perform your best.

-What is your favorite thing to drink? How often do you drink it (most days, sometimes, special occasions)?
-What is the best thing to drink (water)? Why (no sugar)?

**Sodas, energy drinks, and sports drinks are NOT good beverage choices.**
Sodas, energy drinks, and sports drinks have extra sugar and can make you gain weight. Energy drinks and many sodas also have caffeine. Caffeine does not help you stay hydrated.

**Moderate amounts of low-fat milk and 100% juice are also good choices in small amounts.**
Low-fat milk and 100% fruit juice are good choices with meals. Keep serving sizes small. No more than 3 cups of milk and 1 cup of juice per day.

**Water is the best choice for a beverage!**
Drink water every day! If you like flavored drinks, try sparkling water or add a few pieces of fruit into your water bottle.
You might consider bringing in some beverages and having your athletes look at the number of grams of sugar in each one. The athletes could count out the number of sugar cubes represented in each drink.

4 grams of sugar = 1 sugar cube

-How does it make you feel knowing that there are 10 teaspoons of sugar in a can of Coke?
-Do sports drinks like Gatorade have sugar in them? TV ads don’t tell you that, do they?
**Practice Week #6 Discussion:** **EXERCISE- Endurance & Strength:** You can become a better athlete by enjoying physical activity outside of your sports practice. There are many ways to be physically active. Certain exercises can help you improve the skills needed for your sport. **Your goal is to do at least 5 days of exercise every week!**

*Types of Exercise: ENDURANCE STRENGTH FLEXIBILITY BALANCE*

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**Endurance**

*Endurance is the ability of your body to keep moving for long periods of time.* Endurance can help you run farther distances without stopping and practice longer with fewer breaks.

**Try your favorite endurance exercise for 30 minutes, 5 days each week.**

- Running
- Biking
- Dancing
- Brisk Walking
- Aerobics Classes
- Swimming
Strength is the ability of your body to do work. Strength gives you the ability to jump higher, throw farther, and sprint faster.

Try to complete a workout for the entire body, 2-3 days each week.

-Is dancing exercise? (Yes, endurance.)
-Running, biking, and swimming are examples of what type of exercise? (Endurance)
-Push-ups and sit-ups are what kind of exercise? (Strength)
-What exercise do you do for endurance? Strength?

Practice Week #7 Discussion: EXERCISE- Flexibility & Balance:

Flexibility is the ability of your body to move easily in all directions. Being flexible makes it easier to do sports skills and helps prevent injuries to your muscles and joints!

Balance is the ability of your body to stay upright or stay in control of your movements. Balance helps you to stay in control when you are playing sports and helps you to avoid falls.
Flexibility is the ability of your body to move easily in all directions. Being flexible makes it easier to do sports skills and helps prevent injuries to your muscles and joints!

**Try to complete a stretch for all body parts, 2-3 days each week!**

Note: Dynamic stretching should be done as part of your warm up. Static stretching should be done as part of a cool down.

Balance is the ability of your body to stay upright or stay in control of your movements. Balance helps you to stay in control when you are playing sports and helps you to avoid falls.

**Try to complete a full body balance workout, 2-3 days each week!**
Practice Week #8 Discussion: EXERCISE IS FUN!

Exercise is Fun!

It is easy to get in the right amount of exercise if you make it fun. Here are some tips to help you stay motivated to reach your Fit 5 goal.

- Exercise with a friend or group!
  - Go on a walk, run, or bike ride with a friend or family member.
  - Join a group exercise class.
  - Do strength training with a teammate.

- Take the lead at practice!
  - Ask your coach if you can lead some flexibility or strength exercises.
  - Teach a friend a new sport.

- Try something new!
  - Try a new group exercise class.
  - Walk or run a different route than you normally do.
  - Learn a new strength or flexibility exercise.

- Track your improvements!
  - Write a goal on a piece of paper. Post the goal on your wall.
  - Keep a log of your exercises so you can see your progress.

Doing exercise together is a fun way to socialize with friends and family.

- How many of you could walk with a friend after school or work? Attend an exercise or fitness class? Bike on a trail? Take a walk with your mom or dad?
- What is a new exercise you would like to try?
- Share your exercise goal with a partner.

The diagrams in this document are from the Special Olympics Fit 5 Guide.

Other resources:

- NCHPAD.org This website has lots of health resources for people with disabilities. They have articles, videos, and even workout plans.
- ChooseMyPlate.org This website has it all! Learn how many servings of each food group you need, track your eating to see if you are eating healthy, and even find links to healthy recipes.
- EatRight.org This website also has loads of nutrition information, healthy recipes, and even a section to find a dietician in your area.
- Heart.org (click on the heading, “Getting Healthy”) The American Heart Association has great resources for leading a healthy lifestyle, including a nutrition center with tons of recipes and cooking videos for heart-healthy recipes.
- Diabetes.org (click on the heading, “Food & Fitness”) The American Diabetes Association has lots of great articles for people who have diabetes. There are also many diabetes friendly recipes!
Warm Up and Cool Down

Warm Up

Generally, there are two stages of warm up:

1. Warm up on the shore
2. Warm up on the water (in kayak)

A warm up period is the first part of every training session or preparation for competition. The warm up starts slowly and progresses gradually, involving all muscles and body parts. In addition to preparing the athlete mentally, warming up also has several physiological benefits.

All parts of a kayaker’s body need to be warmed-up, however, most important is the upper body, as the upper body will do the most work.

The importance of a warm up prior to exercise cannot be overstressed. Warming up raises the body temperature and prepares the muscles, nervous system, tendons, ligaments, and the cardiovascular system for upcoming stretches and exercises. The chances of injury are greatly reduced by increasing muscle elasticity.

Warming Up:

- Raises body temperature
- Increases metabolic rate
- Increases heart and respiratory rate
- Prepares the muscles and nervous system for exercise

Warm ups consist of active motion leading up to more vigorous motion to elevate heart, respiratory and metabolic rates. The total warm up period takes at least 25 minutes and immediately precedes the training or competition. A warm up period will include the following basic sequence and components.

<table>
<thead>
<tr>
<th>Activity</th>
<th>Purpose</th>
<th>Time (minimum)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Slow aerobic walk/fast walk/run</td>
<td>Warms up heart muscles</td>
<td>5 minutes</td>
</tr>
<tr>
<td>Stretching</td>
<td>Increase range of movement</td>
<td>10 minutes</td>
</tr>
<tr>
<td>Event Specific Drills</td>
<td>Coordination preparation for training/competition</td>
<td>10 minutes</td>
</tr>
</tbody>
</table>

Aerobic Warm-Up
Activities such as walking, light jogging, walking while doing arm circles, jumping jacks.

Walking
Walking is the most basic warm up activity, but should be the first exercise of an athlete’s routine. Athletes begin warming the muscles by walking slowly for three to five minutes. This circulates the blood through all the muscles, thus providing them greater flexibility for stretching. The sole objective of the warm up is to circulate the blood and warm the muscles in preparation for more strenuous activity.
Running
Running is the next exercise in an athlete’s routine. Athletes begin warming the muscles by running slowly for three to five minutes. This circulates the blood through all the muscles, thus providing them greater flexibility for stretching. The run starts out slowly, and then gradually increases in speed; however, the athlete should never reach more than 50 percent of their maximum effort by the end of the run. Remember, the sole objective of this phase of the warm up is circulating the blood and warming the muscles in preparation for more strenuous activity—and should not tire out the athlete before training or competition.

Stretching
Stretching is one of the most critical parts of the warm up and can directly impact an athlete’s performance. A more flexible muscle is a stronger and healthier muscle. A stronger and healthier muscle responds better to exercise and activities and helps prevent injury. Please refer to the Stretching section for more in depth information.

Event Specific Drills
Drills are activities designed to teach sport skills. Progressions of learning start at a low ability level, advance to an intermediate level, and finally, reach a high ability level. Encourage each athlete to advance to their highest possible level. Drills can be combined with warm-up and lead into specific skill development.

Skills are taught and reinforced through repetition of a small segment of the skill to be performed. Many times, the actions are exaggerated in order to strengthen the muscles that perform the skill. Each coaching session should take the athlete through the entire progression so that he or she is exposed to all of the skills that make up an event.

Specific Warm Up Activities
- More exercises with arms than in other sports.
- Walking through the techniques with and without the paddle.
- Paddling to the given destination (e.g. start line) is not only a part of training and competition but part of kayaking warm up as well.
Shoulder Warm-Up

Warm-Up Exercises in the Kayak

WATCH VIDEO 1

WATCH VIDEO 2
The Cool Down

The cool down is as important as the warm up, however is often ignored. Stopping an activity abruptly may cause pooling of the blood and slow the removal of waste products in the athlete's body. It may also cause cramps, soreness, and other problems for Special Olympics athletes. The cool down gradually reduces the body temperature and heart rate and speeds the recovery process before the next training session or competitive experience. The cool down is also a good time for the coach and athlete to talk about the session or competition. Note that cool down is also a good time to do stretching. Muscles are warm and receptive to stretching movements.

The cool down should begin just after kayakers have finished their fast paddling. The main part of the training session or race should transition into cool down by paddling a given distance with little effort. This cool down activity can replace walk or jog. After the cool down, light stretching is strongly recommended.

<table>
<thead>
<tr>
<th>Activity</th>
<th>Purpose</th>
<th>Time (minimum)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Slow aerobic paddling</td>
<td>Lowers body temperature</td>
<td>5 minutes</td>
</tr>
<tr>
<td></td>
<td>Gradually lowers heart rate</td>
<td></td>
</tr>
<tr>
<td>Light stretching</td>
<td>Removes waste from muscles</td>
<td>5 minutes</td>
</tr>
</tbody>
</table>
Stretching

Flexibility is critical to an athlete’s optimal performance in both training and competition. Flexibility is achieved through stretching. Stretching follows an easy aerobic jog at the start of a training session or competition.

Have athletes begin with an easy stretch to the point of tension, and hold this position for 15 to 30 seconds until the pull lessens. When the tension eases, slowly move further into the stretch until tension is again felt. Athletes should hold this new position for an additional 15 seconds. Each stretch should be repeated four to five times on each side of the body.

It is also important to continue to breathe while stretching. As athletes lean into the stretch, have them exhale. Once the stretching point is reached, have them continue inhaling and exhaling while holding the stretch. Stretching should be a part of everyone’s daily routine. Regular, daily stretching has been demonstrated to have the following effects:

1. Increases the length of the muscle-tendon unit
2. Increases joint range of motion
3. Reduces muscle tension
4. Develops body awareness
5. Promotes increased circulation
6. Makes you feel good

Some athletes, like those with Down Syndrome, may have low muscle tone that makes them appear more flexible. Be careful to not allow these athletes to stretch beyond a normal, safe range. Several stretches are dangerous to perform for all athletes, and should never be part of a safe stretching program. These unsafe stretches include the following:

- Neck Backward Bending
- Trunk Backward Bending
- Spinal Roll

Stretching is effective only if the stretch is performed accurately. Athletes need to focus on correct body positioning and alignment. Take the calf stretch for example. Many athletes do not keep the feet forward, in the direction that they are running.
Another common fault in stretching is bending the back in an attempt to get a better stretch from the hips. An example is a simple sitting forward leg stretch.

Incorrect    Correct

In this portion of the guide, we will focus on some basic stretches for major muscle groups. Along the way we will also point out some common faults, illustrate corrections and identify stretches that are more event specific. We will start at the top of the body and work our way to the legs and feet.
Upper Body

**Chest Opener**

Clasp hands behind back. Palms facing in. Push hands towards sky.

**Side Stretch**

Raise arms over head. Clasp forearms. Bend to one side.

**Side Arm Stretch**

Raise arms over head. Clasp hands, palms up. Push hands towards sky.

If the athlete is unable to clasp their hands, they can still get a good stretch by pushing their hands to the sky.

**Trunk Twist**

Stand with back to wall. Turn, reach palms to wall.
Elements of a safe and successful practice

- Check area for safety hazards
- Warmup
- Stretching
- Skills practice
- Competitive/fun session
- Cool down
- Wrap-up and conclusion
- HYDRATE!!!
- *Elements can be added and subtracted, as desired*

1 hour practice plan example

- 8:30-8:55 – Coach arrives and checks area for safety hazards.
- 8:55-9:00 – Walking or jogging to warm-up muscles.
- 9:00-9:10 – Stretching
- 9:10-9:25 – Skills practice
- 9:25-9:30 – Water break
- 9:30-9:40 – Skill practice
- 9:40-9:50 – Competitive/fun session
- 9:50-9:55 – Cool down
- 9:55-10:00 – Wrap-up and conclusion