

SWIMMING 101

THE BASICS

SKILLS The five competitive swimming strokes are freestyle, backstroke, breaststroke, butterfly, and individual medley.

COMPETITION Each swim meet offers a variety of events and distances, depending on the age group and classification. Each swimmer will have a limit to the number of

In **freestyle** events, the competitor may swim any stroke. The stroke most commonly used is sometimes called the crawl, which is characterized by the alternate stroking of the arms over the water surface and an alternating (up and down) flutter kick. On turns and finishes, some part of the swimmer must touch the wall. Most swimmers do a flip turn.

Backstroke consists of an alternating motion of the arms with a flutter kick while on the back. On turns, swimmers may rotate to the stomach and perform a flip turn and some part of the swimmer must touch the wall. The swimmer must finish on the back.

The **breaststroke**, which is the oldest stroke dating back hundreds of years, requires simultaneous movements of the arms on the same horizontal plane. The hands are pressed out from in front of the breast in a heart shaped pattern and recovered under or on the surface of the water. The kick is a simultaneous somewhat circular motion similar to the action of a frog. On turns and at the finish, the swimmer must touch the wall with both hands simultaneously at, above or below the water surface.

Some consider the **butterfly** to be the most beautiful of the strokes. It features a simultaneous recovery of the arms over the water combined with an undulating dolphin kick. In the kick, the swimmer must keep both legs together and may not flutter, scissors or use the breaststroke kick. Both hands must touch the wall simultaneously on the turns and the finish. (The butterfly is the newest stroke and was developed in the early 1950s as a variation of the breaststroke. It became an Olympic stroke in 1956 in Melbourne.)

The **individual medley**, commonly referred to as the **I.M.**, features all four strokes. In the IM, the swimmer begins with the butterfly, then changes after one fourth of the race to backstroke, then breaststroke and finally freestyle. In the **medley relay**, all four strokes are swum. The first swimmer swims backstroke, the second breaststroke, the third butterfly, and the final swimmer anchors the relay with freestyle.

The **freestyle relay** events consist of four freestylers, each swimming one-quarter of the total distance of the event.

STARTS In the start, the swimmer is called to the starting position by the starter who visually checks that all swimmers are motionless. When all swimmers are set, the starting horn is sounded to start the race. If the starter feels that one of the swimmers has moved, left early or gotten an unfair advantage, the guilty swimmer

may be disqualified after the race for a false start. Under USA Swimming rules, one false start disqualifies the swimmer.

OFFICIALS Officials are present at all competitions to enforce the technical rules of swimming so the competition is fair and equitable. Officials attend clinics, pass a written test and work meets before being certified. All parents are encouraged to get involved with some form of officiating.

RULES The technical rules of swimming are designed to provide fair and equitable conditions of competition and to promote uniformity in the sport. Each swimming stroke has specific rules designed to ensure that no swimmer gets an unfair competitive advantage over another swimmer.

THE COURSE Competition pools may be short course (25 yards or 25 meters), or long course (50 meters). The international standard (as used in the Olympics) is 50 meters. World records are accomplished in 25 and 50 meter pools. USA Swimming maintains records for 25 yard, 25 meter and 50 meter pools.

TEAMS USA Swimming is made up of approximately 2,800 teams from all over the country. Of these clubs, nearly half have 80 swimmers or less, and a handful of teams have over 500 swimmers. A team may be comprised of any number of swimmers, parents and coaches.

Participants compete in different age groups and meets depending on their achievement level and how old they are on the first day of the meet. Traditionally recognized age groups are 10 and under, 11-12, 13-14, 15-16, 17-18. Many local meets feature 8 and under, single age groups, or senior events. Team practice groups are usually determined by age and/or ability.

SWIMMING RULES

The technical rules of swimming are designed to provide fair and equitable conditions of competition and to promote uniformity in the sport. Each swimming stroke has specific rules designed to ensure that no swimmer gets an unfair competitive advantage over another swimmer.

Trained officials observe the swimmers during each event to ensure compliance with these technical rules. If a swimmer commits an infraction of the rules that is observed by an official, a disqualification (DQ) will result. This means that the swimmer will not receive an official time and will not be eligible for an award in that event. A disqualification may result from actions such as not getting to the starting blocks on time, false starting, performing strokes in an illegal manner, or unsportsmanlike conduct. DQs are also a result of technical rules violations. They include but are not limited to:

FREESTYLE: Walking on the bottom, pulling on the lane rope, not touching the wall on a turn, or not completing the distance.

BACKSTROKE: Pulling or kicking into the wall once a swimmer has turned passed the vertical onto the breast. Turning onto the breast before touching the wall with the hand at the finish of the race.

BREASTSTROKE: An illegal kick such as flutter (freestyle), dolphin (butterfly), or

scissors (side stroke); not on the breast; alternating movements of the arms; taking two arm strokes or two leg kicks while the head is under water; touching with only one hand at the turns or finish.

BUTTERFLY: Alternating movements of the arms or legs; pushing the arms forward under instead of over the water surface (underwater recovery); a breaststroke style of kick; touching with only one hand at the turns or finish.

STARTS: The swimmers are not allowed a false start. If they jump the start and the starter thinks they are trying to get an advantage (whether intentional or not-it does not matter), they will be disqualified. This is not like the Olympics where they are allowed two false starts.

URNS AND FINISHES

1. Freestyle: feet have to touch the wall
2. Backstroke: At the finish a swimmer must finish on his/her back. A swimmer may not roll over and grab the wall until they have first touched it.
3. Breaststroke and Butterfly:
 - A. Swimmers have to touch with both hands at the same time.
 - B. A swimmer may not freestyle kick off the wall in either breaststroke or butterfly.
 - C. When swimming butterfly, both arms must move at the same time.

For specific language on any technical rules consult the USA Swimming Rules and Regulations book. Violations of the rules are reported to the Referee. The rules require that every reasonable effort be made to notify the swimmer or his coach of the reason for the disqualification. If your child is disqualified in an event, be supportive rather than critical. For beginning swimmers, a disqualification should be treated as a learning experience, not as a punishment. A disqualification alerts the swimmer and coach to what portions of the swimmer's stroke need to be corrected.

They should be considered in the same light as an incorrect answer in schoolwork- they point out areas that need further practice. Disqualifications are necessary to keep the competition fair and equitable for all competitors. A supportive attitude on the part of the official, coach, and parent can make a positive situation out of the disqualification.

LEVELS OF SWIM MEETS

DUAL MEETS Occasionally, the Ad Astra Aquatics will compete with one other team in a dual meet. These meets help promote team unity, but usually limit the number of events a swimmer may enter.

DEVELOPMENTAL MEETS These meets generally do not have any qualification time standards. Most of the time these meets offer each one of the competitive strokes in the two distances offered for each group. Each swimmer is usually allowed to enter from 3-5 events per day.

QUALIFICATION MEETS These meets have some type of qualification time standard(s) that a swimmer must meet in order to enter the meet.

LSC CHAMPIONSHIPS At the end of each short course (winter) and long course (summer) season, an LSC Championship meet is sanctioned by Missouri Valley Swimming, the governing body of swimming in our LSC. Missouri Valley Swimming sets the qualifying time standards for these championship meets.

ZONE CHAMPIONSHIPS After the state championships are held in the summer, a swimmer may qualify to participate in the Central Zone Championships by swimming a national "AAA" time. This is an all-star meet where swimmers compete as a member of the Missouri Valley Swimming Zone team competing against other states from the west.

SPEEDO/USS JUNIOR NATIONAL CHAMPIONSHIPS One of the highest levels of achievement Ad Astra swimmers strive for is the participation in the Junior National Championships. United States Swimming sponsors a United States Junior National meet each season. Ad Astra swimmers meeting qualifying time standards for this meet travel to different locations throughout the United States to compete against the best 18-Under swimmers in the nation.

PHILLIPS 66/USS NATIONAL CHAMPIONSHIPS (SENIOR NATIONALS) Other than the Olympic Trials and the World Championship Trials, each of which is held every four years, the highest level of competition for our senior swimmers is the USS National Championships. As with the Junior Nationals, Ad Astra swimmers meeting the national qualifying time standards travel to various cities throughout the U.S. to compete against America's best swimmers. Swimmers can qualify for national teams that represent the U.S. in international competition by their performances at Senior Nationals.

ABOUT SWIM MEETS

Swim meets are a great family experience! They're a place where the whole family can spend time together. Listed below are some very in-depth guidelines geared to help you through your first couple of swim meets. It may seem a little overwhelming, but we tried to be as specific and as detailed as we possibly could. If you have any questions, please ask your coach.

BEFORE THE MEET STARTS

1. Arrive at the pool at least 15 minutes before the scheduled warm-up time begins. This time will be listed in the meet information emailed out to all AD ASTRA swimmers and also in the team newsletter.
2. Upon arrival, find a place to put your swimmer's blankets, swim bags and/or sleeping bags. The team usually sits in one place together, so look for some familiar faces.
3. Once "checked in", write each event-number on your swimmer's hand in ink. This helps him/her remember what events he/she is swimming and what event number to listen for.
4. Your swimmer now gets his/her cap and goggles and reports to the pool and/or coach for warm-up instructions. It is very important for all swimmers to warm-up with the team. Swimmer's bodies are just like cars on a cold day-he/she needs to get the engine going and warmed-up before he/she can go all out.
5. After warm-up, your swimmer will go back to the area where his/her towels are and sit there until the next event is called. This is a good time to make sure he/she goes to the bathroom if necessary, gets a drink, or just gets settled in.
6. The meet will usually start about 10-15 minutes after warm-ups are over.
7. According to USS rules (because of insurance purposes), parents are not allowed on deck unless they are serving in an official capacity. Similarly, all questions concerning meet results, an officiating call, or the conduct of a meet, should be referred to the coaching staff. They, in turn, will pursue the matter through the proper channels.
8. **Heat Sheets.** A heat sheet is usually available for sale in the lobby or concession area of the pool. Heat sheets generally sell for one to two dollars per day. It lists all swimmers in each event in order of "seed time". When the team entry is sent in, each swimmer and his/her previous best time in that event is listed. If the swimmer is swimming an event for the first time, he/she will be entered as a "no-time" or "NT". A "no-time" swimmer will most likely swim in one of the first heats of the event.

MEET STARTS

1. It is important for any swimmer to know what event numbers he/she is swimming (again, why they should have the numbers on their hand). He/she may swim right away after warm-up or they may have to wait awhile.

2. A swimmer's event number will be called, usually over the loudspeaker, and he/she will be asked to report to their lane. Swimmers should report with his/her cap and goggle. Generally, girls events are odd-numbered and boys events are even-numbered. You can expect at least 4-8 heats of each event.

3. The swimmer swims their race.

4. After each swim:

A. He/she is to ask the timers (people behind the blocks at each lane) his/her time.

B. He/she should go immediately to their coach. The coach will ask him/her their time and discuss the swim with each swimmer.

C. Generally, the coach follows these guidelines when discussing swims:

a. Positive comments or praise

b. Suggestions for improvement

c. Positive comments

5. Things you, as a parent, can do after each swim:

A. Tell him/her how great they did! The coaching staff will be sure to discuss stroke technique with them. You need to tell him/her how proud you are and what a great job he/she did.

B. Take him/her back to the towel area and relax.

C. This is another good time to check out the bathrooms, get a drink or something light to eat.

D. The swimmer now waits until his/her next event is called and starts the procedure again.

6. When a swimmer has completed all of his/her events he/she and their parents get to go home. Make sure, however, you, as a parent, check with the coach before leaving to **make sure your swimmer is not included on a relay**. It is not fair to other swimmers who may have stayed to swim on a relay where your swimmer is expected to be a member and he/she is not there. (The coaches speak from experience on this issue).

What Happens If Your Child has a Disappointing Swim?

If your child has a poor race and comes out of it feeling bad, talk about the good things. The first thing you say is, "Hey, that is not like you. You're usually a top swimmer." Then you can go on and talk about the good things the child did. You never talk about the negative things.

If your child comes up to you and says, "That was a bad race, don't tell me it wasn't," there is nothing wrong with a swimmer negatively evaluating a race. The important thing is for the child not to dwell on it. You should move the swimmer on to something good. "All right, you have had a bad race. How do you think you can do better next time?" Immediately start talking about the positive things.

WHAT TO TAKE TO A SWIM MEET

1. Most important: Swim Suit and The Ad Astra Aquatics Cap--and goggles (if your swimmer uses them).

2. Baby or talcum powder--To "dust" the inside of swim cap. This helps preserve the cap and makes it easier to put on.
3. Towels-Realize your swimmer will be there awhile, so pack at least two.
4. Something to sit on. Example: sleeping bag, old blanket, or anything that will be comfortable to sit on. The swimmers will be spending a lot of time on it.
5. Sweat suits: bring one. Each swimmer may want to bring two because they can get wet and soggy.
6. T-shirts: Two or three. Same reason as above.
7. Games: travel games, coloring books, books, anything to pass the time.
8. Food: Each swimmer is usually allowed to bring a small cooler. It is better to bring snacks. They usually have snack bars at the meet, but the lines are long and most of the time they only sell junk food. Suggestions for items to bring:
Drinks: Hi-C, Fruit juice, Gatorade; Snacks: Granola bars, Fun fruits, yogurt, cereal, jello cubes, sandwiches

Once you have attended one or two meets this will all become very routine. Please do not hesitate to ask any other The Ad Astra Aquatics parent for help or information!

These meets are a lot of fun for the swimmers! He/she gets to visit with his/her friends, play games, and meet kids from other teams. He/she also gets to "race" and see how much he/she has improved from all the hard work he/she has put in at practice.

Special Parent's Note The pool area is usually very warm. Therefore, you need to make sure you dress appropriately. Nothing is worse than being hot at a swim meet. It makes the time pass very slowly! At some of the meets, the parents are allowed to sit with the swimmers at the blanket area (those are most of the meets not held at the natatorium). If you don't think that a gym floor is comfortable, feel free to bring folding chairs to sit on.

CHAMPIONSHIP MEETS

A top goal of our team is to qualify as many swimmers as possible for the Championship meet(s). Whether attendance is REQUIRED or OPTIONAL, the Championship meet is a special experience and extremely important in the athletes development.

As our season progresses, all of the swimmers get excited and motivated to "go for a Division cut". Unfortunately, some of the swimmers do not have the consistent practice habits nor the USS meet experience to make the cut, yet, through and extremely psyched swim and a lot of desire, they do the time. Because they don't have the practices and meet experience, the swimmer will probably not repeat the time at the Championship meet. They really don't belong there.

As an Age Group swimmer, our swimmers learn they swim faster at the Championship meet than at any other time during the season. They are prepared for this; they are taught this; we practice this. If a young swimmer goes to the Championship meet and is not properly prepared, the experience is negative and can affect other championships later in his/her swimming career.

We, as coaches, believe that the honor of competing in a Championship meet is earned through consistent practice habits and competitive experience at USS swim meets. There's a big difference between "wanting" to go to the championships and "deserving" to be at the championships. Talent plays a supporting role to commitment.

To insure that all of our swimmers are properly prepared for their championships:

1. Meet attendance and participation through out the entire season is important. USS meets offer the experience necessary for the championships.
2. Practice habits must be within our recommendations for the group the swimmer trains with. "Consistency" is the key word.

The State Championship is not the ultimate goal. It is a seasonal goal that should lead to Zones, Junior & Senior Nationals, and beyond. Making the "cut off time" is simply a requirement to attend the meet. The goal is to be as prepared as possible and perform to the best of one's ability at the meet. Sometimes swimmers get the "end" and the "means" mixed up.

Swimmers are special people and deserve to have positive experiences as rewards for their dedication and commitment. Let's make sure that parents, swimmers, and coaches, are laying the foundation for the best possible experience at the Championship meet.

PRELIMS AND FINALS

Meet Format: In a preliminaries and finals meet format, the object of the preliminary swim is to qualify for the evening finals session. If a swimmer places among the top 8 (in an 8 lane pool) after his/her morning swim they then qualify to swim in the Championship finals in the evening session. Some meets also swim a Consolation final. If a swimmer places from 9th - 16th place from preliminaries, he/she qualifies to participate in the Consolation finals in the evening session. In the evening finals session, the Consolation heat is swam first followed immediately by the Championship heat. During the prelims, the results are usually posted within 1/2 hour of the conclusion of the event. If a swimmer does not wish to swim in a final swim he or she may "scratch" the event and not be penalized. This must take place within a half hour of the posting of the preliminary results. Therefore, within approximately 1 hour of the end of an event, a swimmer should know if they have made finals. A swimmer should never leave the meet without making sure if they are a finalist or an alternate. United States Swimming rules dictate that if a swimmer makes a finals event and fails to show up they are bared from participating in the remainder of the meet (individual events and relays). Alternates (the 17th & 18th place swimmers) should check with his/her coach about attending finals.

CIRCLE SEEDING

Used only in the prelims of Championship meets with events that have "prelims & finals". This affects only the top 24 seeded swimmers (8 lane pool) which compete in the last 3 heats. All other heats are regular seeding. Circle seeding goes like this: The fastest seeded swimmer will be in the last heat in lane 4. The second fastest swimmer will be in the second to last heat lane 4. The third fastest swimmer will be in the third to last heat lane 4. The fourth fastest swimmer will be in the last heat lane 5 and so on. For an event with 60 swimmers, the seeding would look like this:
#=swimmers seed in prelims

The finals are seeded like a regular meet as are any events that are swam as timed finals such as relays, distance freestyles and other events most often held on Friday evening as a timed finals session.

AWARDS AND PLACINGS

The swimmers who participate in the championship finals receive awards as listed in the meet information. The swimmers who participate in the consolation finals often do not receive awards, but do score points for the team. One very important thing: Once a swimmer has made the championship final, the worst they can place is 8th, regardless of how slow they may swim in finals. The swimmers who participate in the consolation finals may place no better than 9th (the winner of the heat) regardless how fast they swim. It has been known to happen that the winner of the consolation finals swims a time that would have placed him/her 2nd or 3rd in the championship finals, but the highest he/she can score is 9th. That is why it is important to swim very fast in the morning prelims session to make the championship finals. If a swimmer is disqualified in finals, they do not score points or get awards, however, a non-finals swimmer cannot be moved up to score. The place simply is not awarded. Alternates occasionally get to swim and can score the same as any other swimmer.

RECEIVING AWARDS IN PUBLIC

Whenever there is a system of presenting awards at a meet, it is customary for swimmers to be prompt and to cooperate fully with dignity and respect at the presentations. A club uniform is to be worn when accepting the award. It is also customary for Ad Astra swimmers to be polite and modestly thankful for any awards they receive. It is appropriate to congratulate other swimmers and receive the same with poise and a "thank you". Good sportsmanship is essential. If photos are being taken, we ask the swimmer to remain until the shooting is complete, being sure to cooperate with the photographer. Do not ham it up! The picture may be special to someone else. The image a swimmer presents is a direct reflection of the team.

OUT OF TOWN MEETS

Trips to meets in other cities become an important aspect of a swimmer's career while advancing through the age group ranks. The Ad Astra Aquatics has established the following policies for the safety of the swimmer and peace-of-mind of parents:

1. Parents are to be responsible for arranging transportation and lodging to away meets, with the exception of Nationals and those competitions so designated. DO

NOT ASK YOUR SWIMMER(S) TO HANDLE THIS JOB. Oftentimes, a certain hotel will be designated as "team headquarters."

2. Parents are encouraged to attend out-of-town meets with their swimmers and to chaperon other youngsters. These trips can be great fun for parents and swimmers alike. They also are a rare opportunity to participate in a special way in each young swimmer's career.

3. A coach has too many responsibilities to the entire team to accept responsibility for an individual swimmer. Therefore, do not ask a coach to provide transportation.

4. Any swimmer riding in a car is responsible to the parent/driver for his/her behavior and is expected to adhere to the the Ad Astra Aquatics "Honor Code" at all times.

5. A medical release and emergency telephone number should be given to the parent/driver with whom your swimmer is riding in case emergency medical treatment is required.

6. An appropriate contribution is expected from each passenger in a car to the driver/owner to help defray gasoline and related expenses.

NUTRITION FOR SWIMMING

Reprinted from "Training Agenda", a USS Sports Medicine and Science Series

Everything you do influences your performance, but your food choices have the most effect due to the long term and short-term benefits. A proper diet, including proper selection of foods, will help your training and performance while also achieving a healthy lifestyle once you stop competing.

To help ensure a balanced diet, remember that there are no magical nutrition remedies. So forget the fads and eat a variety of wholesome foods from the four food groups--milk, meat, fruits & vegetables, and grains. Foods in these groups provide protein, fat carbohydrate, fiber and all the necessary vitamins and minerals. Your ideal diet should include the following percentage of calories:

Carbohydrate 50-60%

Fat 20-30%

Protein 14-18%

This nutrition series is designed to help you better understand good nutrition and to provide guidelines for ideal food choices. Within sports, there are four major periods that nutrition will impact:

During Training

1. Training represents the period in which athletes spend most of their time. Therefore, this category represents the most critical period. During this time, a diet high in carbohydrates is important. This is important since it is not uncommon for athletes training 4-6 hours a day to burn 2500 to 4000 calories a day. The best way to replenish these calories is with a high carbohydrate diet. By being conscious of this and by taking high carbohydrate foods or drink in the first 30 minutes following a workout, you can minimize depletion of energy stores.

Pre-event Nutrition

2. The major purpose of the pre-event diet is to ensure sufficient energy and fluid for the athlete. Two to three days before competition, a high carbohydrate diet with plenty of fluids should be emphasized. The pre-event meal should include a light, high carbohydrate meal three to four hours before the event.

Nutrition During Competition

3. Provided that good nutrition practices were followed during training, middle distance and sprint events will not be limited by nutrition-related factors. During a three to four day competition, make sure you consume plenty of fluids and each meal should include high carbohydrate, low fat selections.

Nutrition After Competition

4. High intensity work will deplete the muscle's energy supplies. Therefore, carbohydrates play an important role after competition to make sure energy stores are maintained.

Food Choices

The best food choices include a well balanced, mixed diet with choices from each of the four food groups. You can get all the nutrients you need by selecting a variety of foods in the recommended serving size from each of the following food groups: