Photographing Sports and Recreation

10 Sports Photography Tips

What you need and some pre-tips:

You will need a digital SLR camera, or a camera that allows you to set your own shutter speed. If you aren't using either of these, then the chances are you won't be able to capture very good sports photos.

When you first arrive at an event, particularly children's sports, it's important to seek permission to take photos. Once you get the ok we are ready to shoot!

1. Use a lens or zoom range that is at least 200mm.

A focal length greater than 200mm is obviously a lot better as it will allow you to get close to the action and without being able to zoom in, you won't be able to isolate any of your subjects. Two common beginners lenses are the *Nikon AF-S DX 18-300mm f/3.5-5.6G ED VR* or the *Canon EF 100-300mm f/4.5-5.6 USM*.

Remember that a telephoto/zoom lens has a narrow field of view, so if you position yourself too close to the action, the crucial moment may pass through the lens's field of view so quickly that you miss the shot!







2. Do NOT use full automatic mode.

This is a common mistake made by amateur photographers, who will usually set their camera in full automatic mode or a pre-mode labelled 'sports' or 'action'. While these may work OK on occasions, to really go to the next level you need to use a semi-manual mode.

3. Use a FAST shutter speed.

In sports photography, you want to ensure that the shutter speed is fast enough to capture the quick moving bodies of the athletes, and also to prevent blurred images due to camera shake.

Remember the reciprocal rule:

The shutter speed should be 1/Lens focal length.

So, if you're using a 200mm lens, then the shutter speed should be NO LESS than 1/200th second, but ideally faster - e.g. 1/250, 1/500, 1/1000

4. Use Aperture Priority mode (A on a Nikon camera and AV on a Canon)

The aperture is the f/stop number, which determines how much light is allowed into the camera's sensor. We are looking at setting a very large aperture, which is a small f-stop number, such as f/2.8 or f/4. This will ensure that the most possible light is allowed in, which in turn tells the camera that a fast shutter speed is needed for the correct exposure, thus helping to freeze the action.

If you aren't using a digital SLR camera, you don't need to worry about setting an aperture, but rather a shutter speed, which we will cover shortly.

5. Watch your ISO.

To determine the correct exposure we use 3 components - aperture, shutter speed and ISO. When shooting in a semi-manual modes such as aperture priority or shutter priority we need to set the ISO ourselves by considering the location, time and conditions of the event you are photographing.

For a bright sunny daytime football match for example, a low ISO of 400 will be perfect as there is plenty of light available for the camera to use.

However if it is a dull overcast day, there is not as much light, so we need to increase the ISO to around 800-1600.

6. Use Shutter Priority Mode if Aperture Priority isn't available.

This setting is best used for non-SLR photographers who only have a camera that enables shutter speed settings, but you can still capture some great shots.

Most cameras including point-and-shoots will enable you to set a shutter speed.

Instead of telling the camera how much light to let in, as we did with aperture priority, using shutter priority mode enables us to tell the camera directly what speed we would like the shutter to be. As mentioned earlier, at least 1/200th of a second is needed. The camera will then decide on what aperture (f/stop number) to use.

You will need to take test shots when setting your shutter speed manually, in case you set it too high and are not letting enough light into the camera.

7. Use a fast auto-focus and burst mode.

In order for the camera to keep up with the fast movements we want to set it to continually focus on our subject or subjects rather than lock on to one spot. This will probably be called 'Servo' or 'AI Servo' on your camera. Additionally, set your camera to take multiple images, usually referred to as 'frames per second' (fps) or 'burst'. Locate both of these on your camera and ensure that they are switched ON when shooting sports.

If you have the option to set how many frames per second you would like your camera to take, always set it to the maximum, whether it be 3, 4, 5 or more photos a second. This increases our chances of capturing that money shot.

8. Position yourself correctly and know your sport.

For best results, position yourself with the sun behind your back, as this ensures maximum light is hitting your subject, which equates to letting as much light in as possible and freezing the action with fast shutter speeds.

Follow the action with your camera, ensuring that you are zoomed in close enough to have the majority of the frame filled by the player themselves.

It is also helpful if you know something about the sport you are photographing, as anticipating where the ball or the action may be is going to help you get the best shots possible!

9. Take plenty of photos.

Whether it be a football player kicking the ball or a tennis player serving, once you have your subject in the frame you can half-hold the shutter button to focus and then hold down to fire away and capture as many photos per second as you can, thanks to the previous burst modes we have set.

With digital photography we are fortunate to be able to see our results immediately, and there is no harm in finishing a sporting event with completely filled memory cards!

10. Shoot from a low angle

Sit down and rest your camera on your knees for stability and comfort. This will let you capture much more of a dramatic angle as well as letting in more of a clear background rather than other athletes and grass. The lower perspective also gives the photo excellent depth and it's a technique that you will see all pro photographers doing.

Also look to using a monopod, even if your lens and camera are not heavy. It will help you keep your camera steady and balanced while shooting from different angles, particularly your knees.

Panning Photography

One of the most creative ways to show movement is to use a technique called Panning. The image below shows the biker is in sharp focus, but the background is streaky and blurred.



This is achieved by swinging the camera with the biker as he rode by, and using a SLOW shutter speed to show movement in the background that wasn't moving with the the camera.

When you first start panning, you may experience a few problems:

- 1. You will probably only get one or two good shots for every 25 or 30 blurry shots you take. As you practice this ratio will improve.
- 2. Some subjects are more amenable to panning than others. A panning shot of someone running will not work well because the arms and head move up and down and will create blur. A bike, a car, or a soaring bird that is not flapping its wings will produce cleaner results.

6 Tips to Improve Your Panning Photography

1 - Aim small, miss small

This phrase is famous among shooting sports athletes. It means that the smaller a point you train your focus on, the less movement you will be tolerant to. You can apply this to panning photography and significantly improve the percentage of keeper shots you take. Instead of aiming big and just trying to keep the bicyclist in the middle of the frame, aim small and try to keep the cyclist's eye on one of your focus points.

2 - Shoot when the subject is directly in front of you

If you shoot while the subject is angled toward or away from you, the perspective will change slightly during the exposure, which will produce a less sharp subject.

3 - Twist with your hips

If you simply turn your head and arms rather than spinning at the trunk, you will be less steady and the photo will be less sharp.

4 - Do not trust the LCD

Many of your panning shots will look sharp on the LCD, but it is almost impossible to determine if the photo is truly sharp without looking at the photo large on the computer. Zooming in on the LCD can help, but it's difficult to tell without seeing it large.

5 - Use a monopod

This will significantly improve the sharpness of the subject since the camera will not shake up and down.

6 - Use a flash on rear-curtain sync (if your camera allows) to freeze the subject

This is not necessary all the time, but can certainly be a valuable method in some situations.

Generic Panning Camera Settings

These settings will obviously depend on the situation and subject, but the settings below are a good starting point if you haven't done panning before.

The shutter speed will vary according to the subject, but 1/200th of a second is a good starting point for cyclists, birds soaring at an average speed, or a vehicle going less than 30 miles per hour.

- 1. Shutter Priority Mode (T or Tv)
- 2. Shutter speed: 1/200th of a second
- 3. ISO: 100
- 4. Focus Mode: AF-C for Nikon, or AI Servo for Canon
- 5. Focal length: 200mm (A long focal length helps the streaking of the background)