Aviation Photography: Plane-spotting tips and tricks




Airbus A340 on final approach. Canon EOS 1D MkIV, Sigma 120-300 f2.8 Sport @120mm, 1/2500, f5.6, ISO 400.

I have no claim to fame as a knowledgeable person on aircraft. I don't even like flying. I am however a sport and action photographer and a self-confessed petrol-head, so I love the sound of aircraft engines, the bigger the better, and photographing them doing their thing which is making aircraft fly. I do plane-spotting and go to airshows to listen to the aircraft and photograph them, along with the weaponry they can carry which is also of interest to me.

In this brief article I will discuss planning your general plane-spotting trip, equipment, composition and framing and a few general tips and tricks. I will deal with airshows in a separate article soon.

Starting with planning - Should you also be affected by the Covid-19 lockdown restrictions (this article was compiled during the pandemic with lockdown Levels 3 and 4) where no airshows and public gathering are permitted, you can always (within the regulations of your lockdown level) do "plane-spotting" at the airports in your area. A quick google search on a specific airport will yield places where you may be able to see arriving and departing airplanes, or which offer a viewing deck where you can do photography through a glass window or even outdoors for some of the smaller airports. Websites such as https://www.spotterguide.net and using the search function for your favorite or closest airport will yield lots of information on places, security, safety etc.

Almost all international airports and some of the regional ones all over the world are covered by this website. The proposed positions will place you close to approach corridors and take-off routes from which you can easily photograph aircraft, some even from public areas outside of the airport perimeter fence. Personal safety comes first, heed all commonsense warnings, park safely and be vigilant.

If you live not to far away from local airports, you can even do plane-spotting from your own back yard. In Centurion where I live, I have quite a bit of air-traffic passing over my house, being within 30km from OR Tambo, Lanseria, and Zwartkops and Waterkloof AFB. Sometimes they would pass overhead quite high, making photography very difficult, but there are times when one can get decent enough images. The Bushcat image was captured from my balcony.

Skyreach Bushcat. Canon EOS 1D MkIV, Sigma EX 500 f4.5 with 1.4x TC @ 700mm, 1/250, f10, ISO 800

You can actually do plane-spotting anywhere, I have captured some of my images in nature reserves, at motorsport events, etc. One just has to be on the look-out for any opportunity which may present itself. The image of the Bat Hawk with the pilot checking us out was taken in Pilanesberg National Park whilst on a wildlife and birding photography trip. That aircraft is used in an anti-poaching role. The Enstrom 480B was photographed at a motorsport event, ferrying TV crews around.

Equipment – this is rather easy; use what you have. DSLR is the first choice, with higher end models making it easier. Used with higher end lenses it will be the best combination for high quality images under adverse conditions.


Bat Hawk.  Canon EOS 1D MkIV, Sigma EX 500 f4.5 with 1.4x TC @ 700mm, 1/400, f11, ISO 1000

Enstrom 480B. Canon EOS 1D MkIV, Sigma EX 120-300 f2.8 OS @ 300mm, 1/50, f32, ISO 100

I prefer a mid to long tele- zoom lens such as my Sigma 120-300 f2.8 Sport, also fitted with either a 1.4x or 2x TC at times as the distance to you subject can vary quite a lot.

The size of your subject also matters. A Cessna is much smaller in the frame than a typical Airbus or Boeing. Depending on your position, being able to zoom in or out is a definite advantage. A long prime also has its place, my Sigma 500 f4.5 with a 1.4x TC also sees quite a bit of use. But in reality, any digital camera will do, the relative speed of the subject is usually not that fast so most AF systems in bodies and lenses will be able to keep up, most of the time. Bridge cameras have come a long way in recent years and with their extensive zoom ranges they should also be quite effective.

Over the years I have successfully used my Canon D30, 20D, 1D MkII, 1D MkIV and 1DX, and Sigma lenses 135-400 f4.5-5.6, EX120-300 f2.8 gen 1 and OS gen 3 version, 120-300 f2.8 Sport, EX 300-800 f5.6 and EX 500 f4.5 on plane-spotting trips and at airshows.

The Bell 206 JetRanger helicopter was photographed at Grand Central Airport during a commercial shoot for another helicopter charter company. (That airport is not easy for the casual photographer to get into; no viewing decks, no real area where you can see incoming or departing airplanes). The lens was a loaner Sigma 24-105 f4 Art, first time I used this lens, and really liked it. Actually, I prefer it over my similar series 1 Canon L version. Might just replace it one of these days.


Bell 206B JetRanger. Canon EOS 1D MKIV, Sigma 24-105 f4 Art @60mm with polarizing filter, 1/40, f13, ISO 160

I prefer to use shutter priority mode on my cameras so that I can quickly change the shutter speed for motion blur in propeller driven aircraft or try to blur busy backgrounds at airports, with partial metering and then add anything from +1/3 to +1.1/3 stop exposure compensation. You will be aiming the camera at a brighter sky which may cause some in-camera underexposure. The conditions on the day, and the equipment in use will quickly show you how to set-it up for proper exposure. Fortunately, you will have time on hand to adjust after the initial series of shots.

Using Raw files will provide some additional latitude in post-processing should you need to make exposure corrections, boost shadowy areas or pull highlights a little down. You will need a really slow shutter speed to blur the rotor blades in helicopters; they have a relatively slow rotational speed and usually require 1/100 or even slower to get some rotational blurring.

On a slightly misty morning such as what we had when doing the images of the Comair flight operated by British Airways Boeing 737-800 on approach to OR Tambo International in Gauteng (South Africa), you can expect some vapor-trials which will add a little extra to your image. Depending on your location, including some ground features will enhance the effect of “low-flying” aircraft. I captured the two images from the same spot, just zoomed back as the aircraft approached the runway. It will be a good idea to learn to operate the zoom function of your lens whilst tracking an aircraft in flight.

The registration number of the aircraft can be used to identify the manufacturer and model series of the aircraft. I have found websites such as https://www.jetphotos.com and https://www.flightradar24.com/data (use the Search Function) very valuable for identification. Just enter the reg number (ZS-ZWG etc) and get all the info you may need. When capturing a series of images of the aircraft make sure you get a clear shot of that registration number.

Remember that if you photograph aircraft coming in to land as a specific spot, it implies that the take-off will be at the opposite end of the airport. You will not be able to capture both from the same spot. Typically, at OR-Tambo International it is a 4 km drive to get to the opposite end, plan for that should you want to capture both arrivals and departures at that airport. Not all airports offer photographic opportunities at both ends from public areas. Lanseria Airport being one of them; you can only get to one end of the runway from outside the perimeter fence.

Do not forget about that space and time between touch-down and take-off. Taxiing images can be interesting too if you can get a nice view on those areas. For the Turkish Airways Airbus A380 I could have used my 24-105 f4 lens to good effect, sometimes one can get really close. Speeding down the runway before take-off can create nice panning images when using a slower shutter speed for the background blurring effect.
Aircraft waiting in a holding area can be good for record purposes and can present some interesting viewpoints such as with the and Diamond Eclipse waiting for take-off at Lanseria Airport; it is an elevated area from a public viewpoint that I used.


Boeing 737-800 on final approach, OR Tambo International.  Canon EOS 1D MkIV, Sigma 120-300 f2.8 Sport @ 145mm, 1/3200, f5.6, ISO 200


Boeing 737-800 on final approach, OR Tambo International.  Canon EOS 1D MkIV, Sigma 120-300 f2.8 Sport @ 120mm, 1/2500, f5.6, ISO 200


Airbus A330-300 on taxiway.  Canon EOS 1D MkIV, Sigma 120-300 f2.8 Sport with 1.4x TC @ 168mm, 1/250, f16, ISO 250


Diamond DA-20-C1 Eclipse.  Canon EOS 1D MkIV, Sigma 120-300 f2.8 Sport with 1.4x TC @ 420mm, 1/200, f18, ISO 400

To make more sense of your plane-spotting efforts, you can work on a specific theme for your gallery, such as “Airlines of the World” etc. Or you can stay with local airlines or charters or do only small aircraft. Many options can be pursued.

Use whatever you can of the environment to add a different dimension to your images. Airports tend to by very busy and sometimes with many foreground interferences which can spoil a clear view on your subject. The Lufthansa Boeing 747-830 just before touchdown at OR Tambo International was framed to include the two red traffic lights in the foreground, placing the 747 right between them, a sort off “Stop, low flying aircraft” title. As with any type of photography, you should scout the area for these possible interferences, and plan to use them to your advantage.

Similarly, the Mango Airlines Boeing 737-800 on take-off was framed to include the radar dome as a second point of interest.

Boeing 747-830. Canon EOS 1DX, Sigma 120-300 f2.8 Sport with 1.4x TC @ 168mm, 1/2500, f8, ISO 800.

There are such a variety of moments you can capture during your plane-spotting tip. A typical take-off moment for the Safair Boeing 737-800 at OR Tambo is one of those. Some are not always easy to get a decent view of at all airports but make do with what is offered to you and enjoy the sound of powerful engines and the smell of jet fuel in the morning. Happy plane-spotting. Feel free to contact me with any questions, or to possibly accompany me on one of my outings.

Boeing 737-800.  Canon EOS 1DX, Sigma EX 500 f4.5 with 1.4x TC @700mm, 1/320, f13, ISO 400


Boeing 737-800.  Canon EOS 1DX, Sigma 120-300f2.8 Sport with 2x TC @ 435mm, 1/160, f11, ISO 100.