

**Review: Nikon AF 85mm f/1.4D vs Nikon AF 85mm f/1.8D - part 1 + part 2**

Review Nikon AF 85mm f/1.4D vs Nikon AF 85mm f/1.8D - part 1



**Build Quality**

The 85mm f/1.8 feels very much like the 35mm f/2D and 50mm f/1.4D, which is typical Nikon quality. But while the 85mm 1.8D's build quality is

pretty decent, it's the 1.4D that has the pro grade lens build quality. It feels strong like a tank when you hold it on your hand, the focus ring is very smooth and has the same rough finish that is on other Nikon AF pro grade lenses

### Weight and Size

Even they are both 85mm prime lenses, the 85mm 1.4D is definitely quite a bit bigger, it's both wider and longer than the 1.8D. Not only that, the 1.4D is a lot heavier as well. (550g vs 380g).



From Left to Right: AF-S 50mm f/1.4G, AF 85mm f/1.8D, AF 85mm f/1.4D, AF-S 24-70mm f/2.8G

The 1.4D has a much larger front element which takes 77mm filter. The 1.8D's smaller front element takes smaller 62mm filter. 77mm filter is more expensive than the 62mm filter.

But one thing is, 62mm is not really a popular filter size. and if you are buying a 85mm f/1.4D, chances are you already have at least one or more professional lens that uses 77mm filter such as the 24-70 f/2.8, 28-70 f/2.8, or 70/80-200 f/2.8 ..etc So the 1.4D's 77mm filter maybe more convenient to a lot of photographers.



### **Autofocus**

Both lenses are AF and not the newer AF-S type autofocus lenses. Because of that, if you are using a entry model DSLR such as D40,D60,D3000 which does not have a body autofocus motor, you won't be able to autofocus at all.

Autofocus speed is reasonably fast with both lenses. When used on a D700, both are actually very fast. While it's not as fast as the AF-S 70-200 VR, it's a lot faster than the AFS 50mm f/1.4G. I've read lots of reviews that mention about the very slow 85mm f/1.4D AF speed. I personally don't really feel the difference when i'm using these two lenses to take photo with a D700 but i believe it's partly because of the longer focus ring travel path (~135degree) compare to the 1.8D (~90degree). Even when using the 1.4D on a D80, the autofocus speed is a bit slower but still decent.

Both lenses are IF (internal focusing) and length does not change when focusing. the front element does not rotate as well so it's CPL friendly. My test copy of the 85mm f/1.8 seems to have some noise coming from the internal gears and is a bit louder when focusing.

The 85mm f/1.4D has a ring-based M/A switch for you to switch between manual and autofocus mode. This is definitely not as convenient as the newer AF-S design. I myself don't use manual focus very often so it's not a big problem to me.

The 85mm f/1.8 doesn't have any M/A switch, so you'll have to change to manual mode from the camera body if you want to use manual focus. Both manual focus ring feel nice and smooth, but the 1.4D's slightly dampened focus ring + the larger travel path as mentioned before make manual focus a much better experience on the 1.4D.

The minimum focusing distance is the same for both lenses at 0.85m. So don't even think about using it as a macro lens.

### **Image Quality**

The followings photos shows you the center and corner picture sharpness at different aperture size:  
(all sample photo straight JPG from camera, no postprocessing / sharpening.)

Test Equipment:

Nikon D700

Nikon AF 85mm f/1.4D lens

Nikon AF 85mm f/1.8D lens

Original Photo:



The two areas we are going to compare at 100% are highlighted in red.

100% crop at center:



Nikon AF 85mm f/1.4D

f/1.4

Nikon AF 85mm f/1.8D

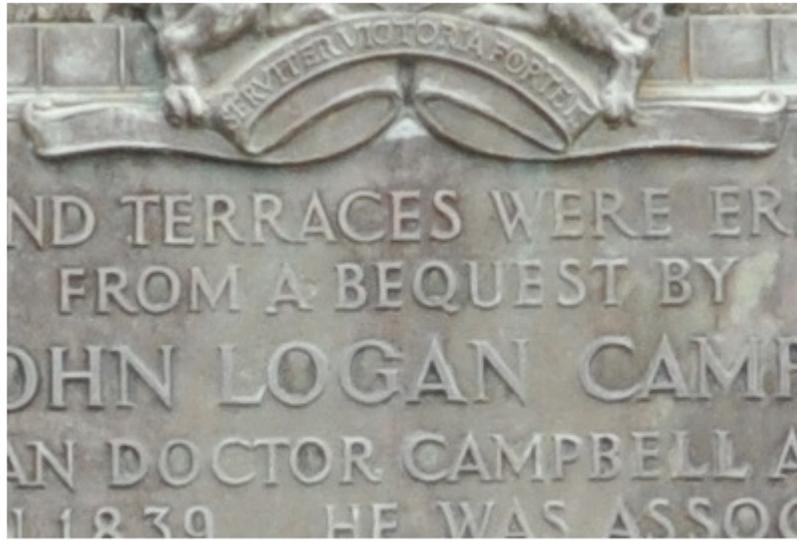


Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/28



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/4.0



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/5.6



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/8.0

Both lenses are reasonable sharp even at wide open. The 1.4D seems to be slightly sharper than the 1.8D from wide open to f/2.8 but the difference is really small. From f/2.8+ onwards there is virtually no difference even when you are pixel peeping at 100%. Another thing is autofocus seems to be pretty accurate and consistent with both lenses. All the photo's focus were spot on.

Now let's look at the 100% crop at corner from the same set of photos:



Nikon AF 85mm f/1.4D

f/1.4

Nikon AF 85mm f/1.8D



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/28



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/4.0



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/5.6



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/8.0

The 1.4D has really soft corner from wide open up to f/5.6. The 1.8D's corner performance seems to be much sharper even at wide open. To make sure the 1.4's soft corner was not because of human error (which probably isn't, because the center crops are all sharp and in focus), i've re-shoot another set of comparison photo (also tried manual focus with liveview) and I have very similar results.

If you are using the lens to take say like landscape photo at wide open, then the 1.8D would definitely be a much better lens for you. But most people who bought the 85mm lens used it for portrait photos so the soft photo at corner is not really a big problem as it's very seldom you would place your model at the corner. But it's quite interesting to see the 1.8D has much sharper corner

**[added: 2009/09/22]**

Quite a few readers are a bit surprised by f/1.4D's corner performance. Here are two more comparison shots . both are corner crop at 100%

Cropped from the same set of photos shown above. But this time i crop at bottom right corner:



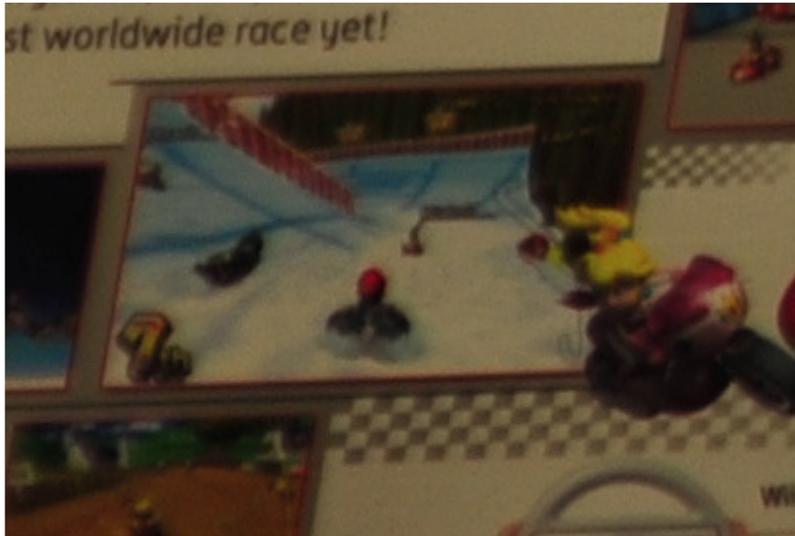
Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8 bottom right crop 100%

Another set of photos i took (manual focus using live view). 100% crop at bottom left corner this time.



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8 bottom left crop 100%

 FIND

 REPLY

09-20-2009, 01:55 PM (This post was last modified: 09-26-2009 04:12 PM by [yellow15](#).)

Post: #2

**yellow15** 

Senior Member



Posts: 606

Joined: Jun 2009

Reputation: **7**

**RE: Review: Nikon AF 85mm f/1.4D vs Nikon AF 85mm f/1.8D - part 1**

**Bokeh**

These are comparison photos showing the differences in bokeh between the two lenses:



Nikon AF 85mm f/1.4D

f/1.4

Nikon AF 85mm f/1.8D



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/28



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/4.0



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/5.6



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/8.0

Both lenses give very smooth and creamy bokeh. After all this is one of the most important things for a good portrait lens. Bokeh from the f/1.4D lens is slightly smoother at the same aperture setting and it has the advantage of being able to open up an extra 2/3 stop to give even more creamy bokeh.

And here is a comparison picture between AF 85mm f/1.4D and AFS 50mm f/1.4G both at f/1.4. Camera was at same position and focus on the handrail.



Nikon AF 85mm f/1.4D



Nikon AF-S 50mm f/1.4G

f/1.4

With the same aperture and shooting/focus distance, the background from the 85mm lens is just a lot more softer and creamy.

So what about the highlight bokeh?

### **Highlight Bokeh**

For the comparison picture below, both lenses were shot at wide open:



Nikon AF 85mm f/1.4D

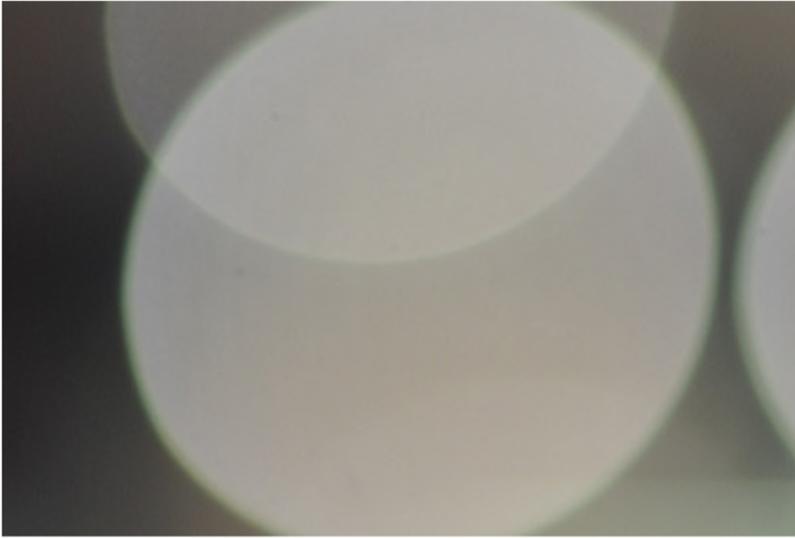


Nikon AF 85mm f/1.8D

Wide Open

The f/1.4D lens gives very round and smooth highlight bokeh. the f/1.8D's highlight bokeh is also very round as well but a bit nervous with visible halo near the edge.

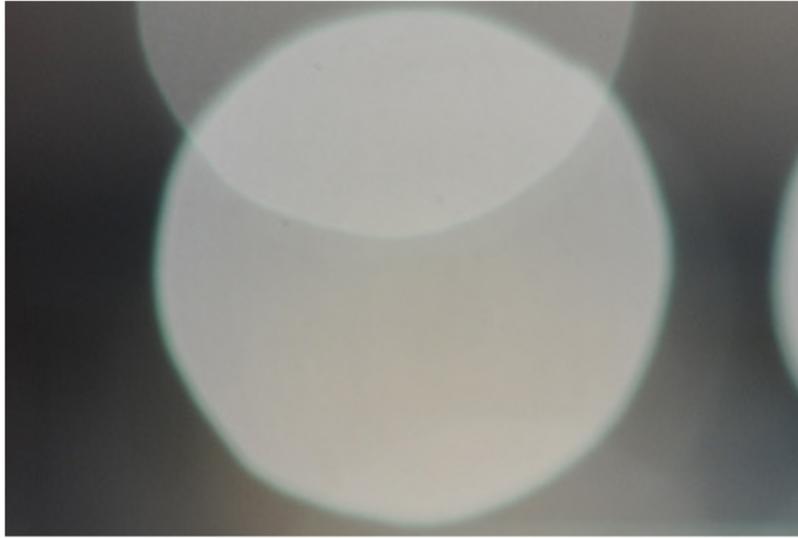
Now let's look at it closer and compare the highlight bokeh with 100% crop at different aperture settings:



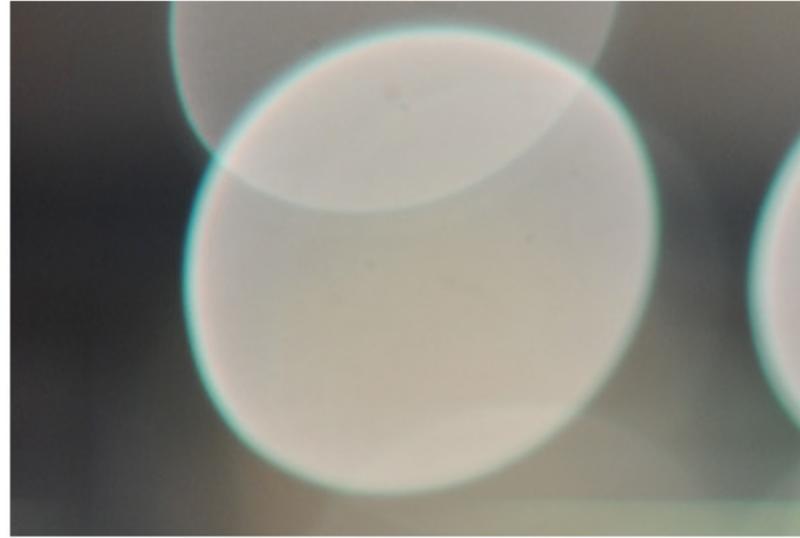
Nikon AF 85mm f/1.4D

f/1.4

Nikon AF 85mm f/1.8D



Nikon AF 85mm f/1.4D

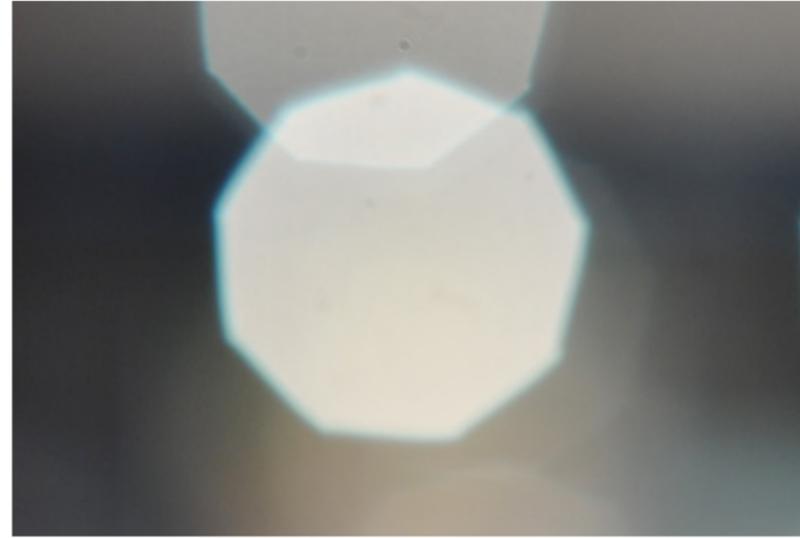


Nikon AF 85mm f/1.8D

f/1.8

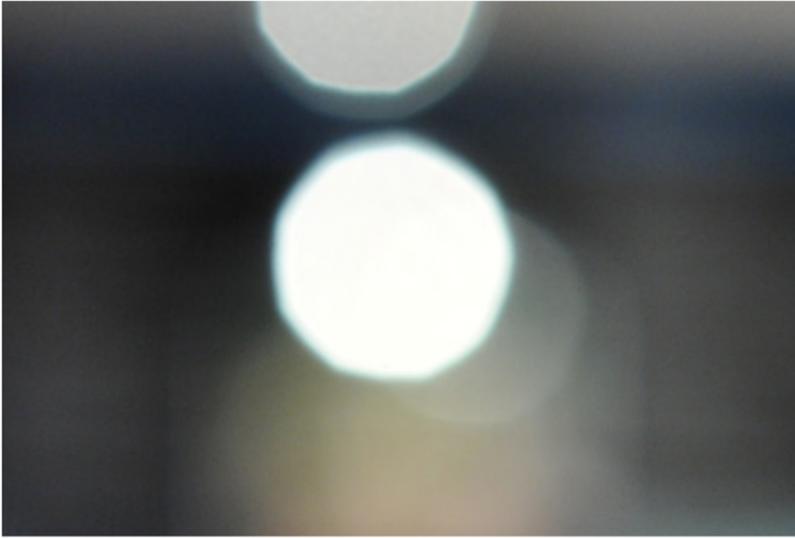


Nikon AF 85mm f/1.4D

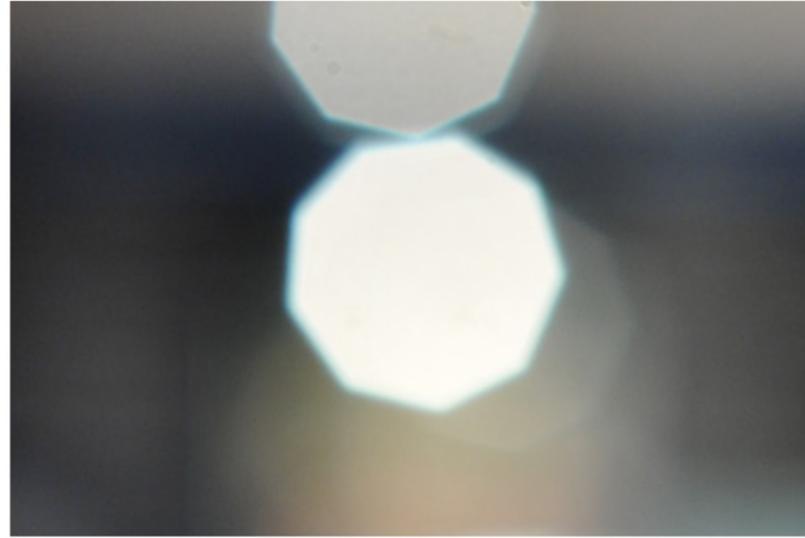


Nikon AF 85mm f/1.8D

f/28

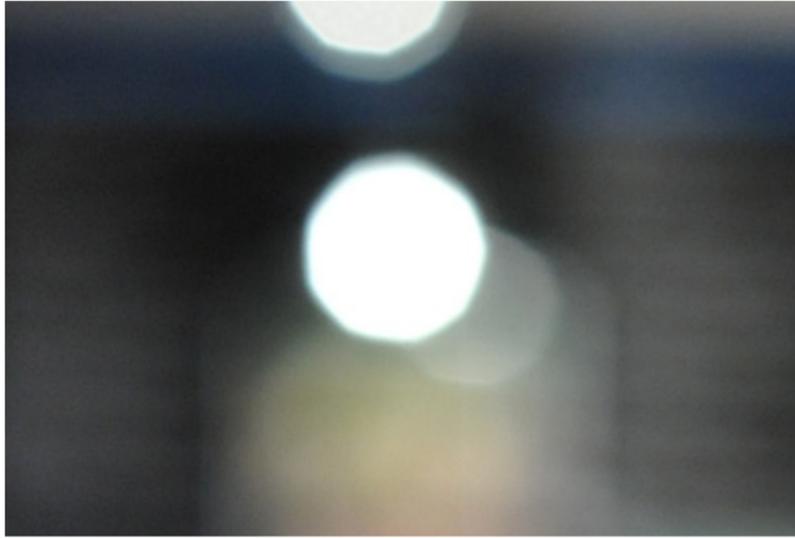


Nikon AF 85mm f/1.4D

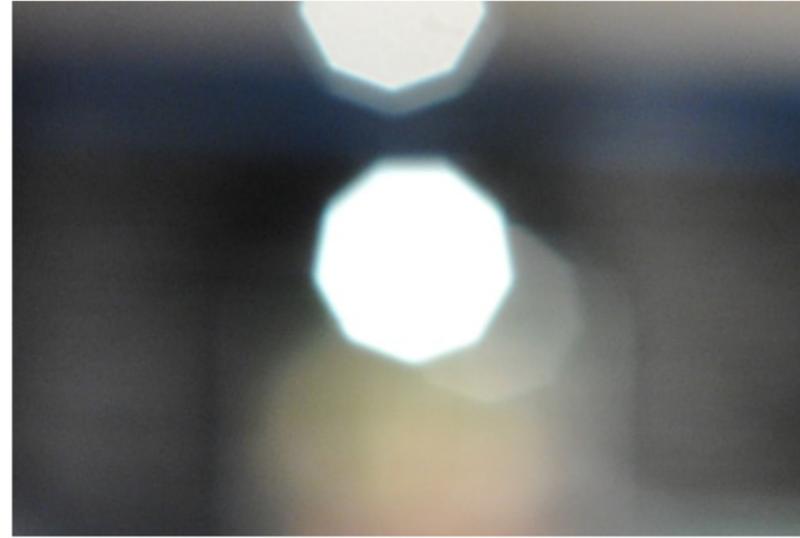


Nikon AF 85mm f/1.8D

f/4.0

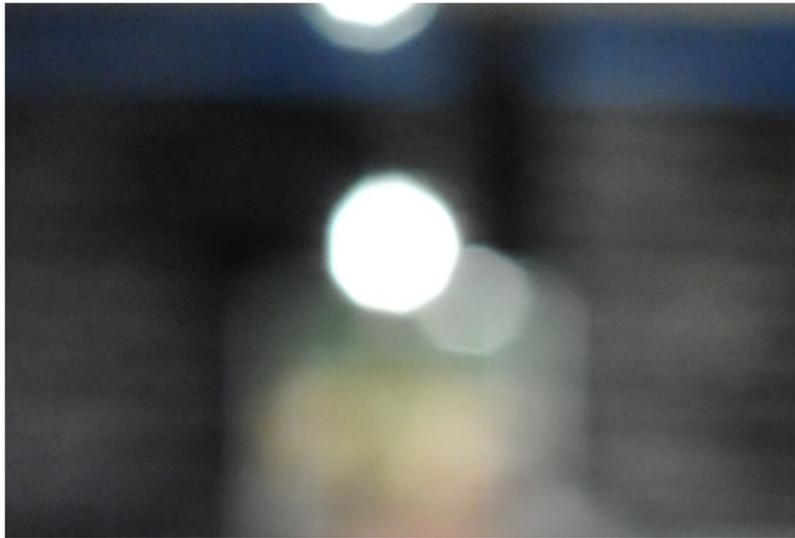


Nikon AF 85mm f/1.4D

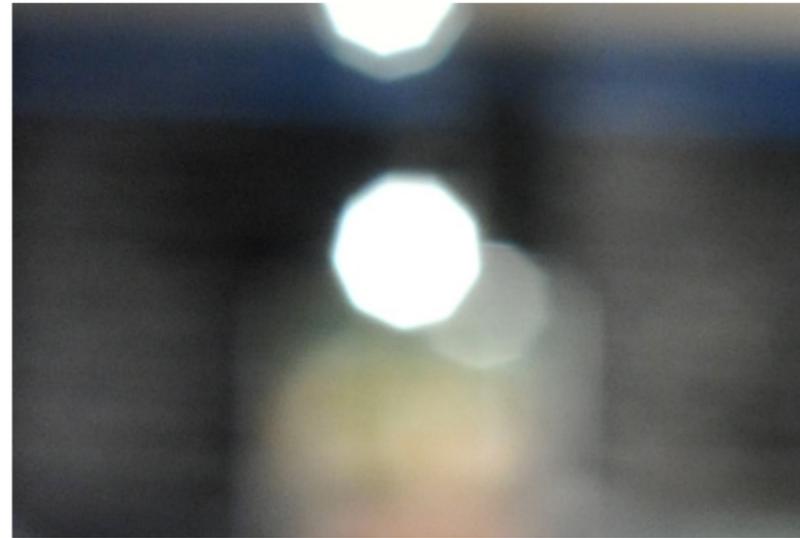


Nikon AF 85mm f/1.8D

f/5.6



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

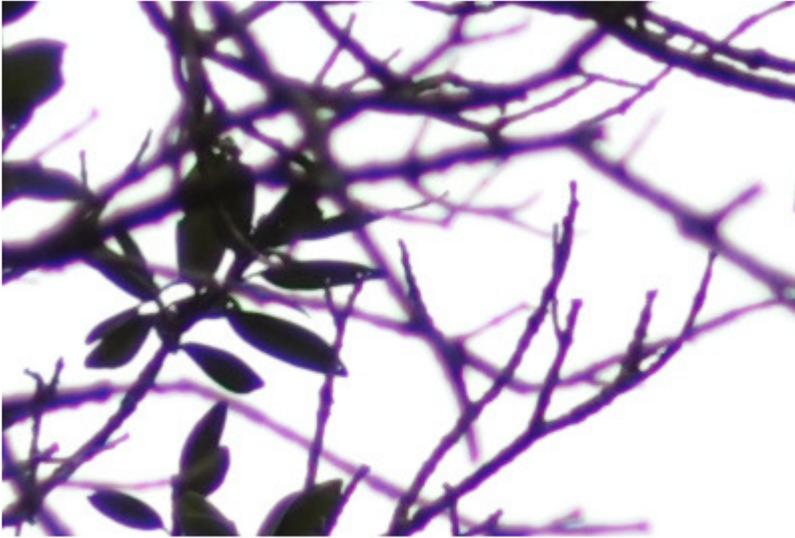
f/8.0

At f/1.8, the highlight bokeh look very similar from both lenses. From f/2.8 onwards, the highlight bokeh from the 1.4D lens remain relatively round even at f/8. But the 1.8D lens's highlight bokeh quickly become a polygon shape and is not round anymore. Also the bokeh from the f/1.8D lens has more obvious bright rings - more nervous bokeh.

**Chromatic Aberration**

CA sample photo

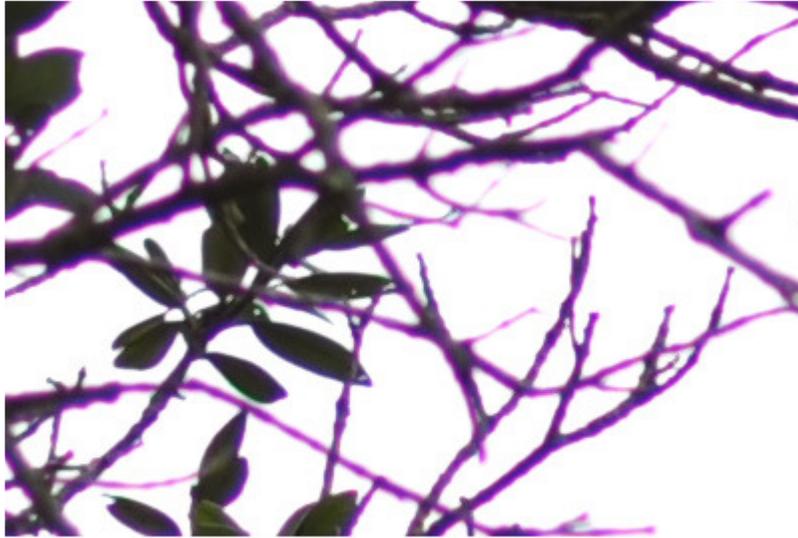




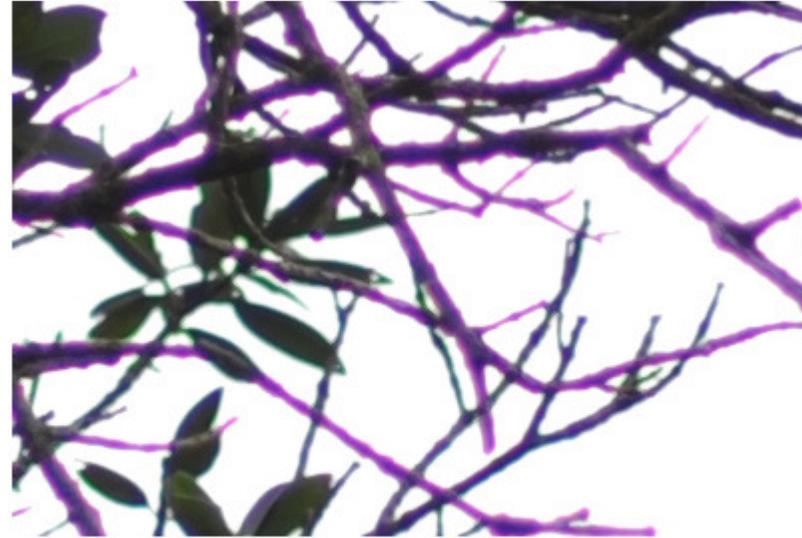
Nikon AF 85mm f/1.4D

f/1.4

Nikon AF 85mm f/1.8D



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/1.8



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/28



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/4.0



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/5.6



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

f/8.0

both lenses have very bad CA problem at f/1.4-f/1.8. It becomes a lot better from f/2.8 and not really obvious from f/5.6.. In this set of photos, the f/1.8D lens seems to have slightly worse CA problem at f/4.0 than the f/1.4D lens . But i also notice in other pictures i shot, sometimes the f/1.8D has less CA problem than the f/1.4D with the same aperture setting.

### Sample and Colour Rendition

Both lenses give out good contrast and colour. Skin tone looks beautiful. And i don't see any difference in colour rendition between the two lenses.

The photos below were shot with manual white balance.



Nikon AF 85mm f/1.4D



Nikon AF 85mm f/1.8D

Manual White Balance

Nikon AF 85mm f/1.4D at f/1.4



Nikon AF 85mm f/1.4D at f/1.8



Nikon AF 85mm f/1.8D at f/1.4



note: The two photo above were shot at exactly identical settings with manual white balance. The difference in colour is most likely due to shooting the florescent light with a high shutter speed (the shutter speed was 1/4000s).

The following two photos, one was taken with the 85mm f/1.4D and one was taken with the 85mm f/1.8D lens both were taken at wide open. Can you guess which one was taken with the f/1.4D lens and which one was taken with the f/1.8D lens? (answer at the end of the review)

A:



B:



### Others

If there is one thing i really don't like about these 85mm lenses, it's the lens hood!! (oh and the price tag as well). Compare to the newer Nikon lenses, both the 85mm f/1.4D and f/1.8D's lens hood design is really ancient.

1. The lens hood is non reversible, the only way you can attach it to the lens is the forward position. you can't reverse it for storage.
2. It uses the screw on design, not the newer turn and click design. Not only it takes a bit longer time to install and uninstall it, i have a feeling

that one day i will damage the lens when i'm installing the lens hood.  
3. The lens cap cannot be installed "independently" from the lens hood.

### **Conclusions**

The Nikon AF 85mm f/1.4D and AF 85mm f/1.8D are two of the most commonly used portrait lens by professional and amateur photographers especially wedding and portrait photographers around the world.

Both the 85mm f/1.4D and 85mm f/1.8D lenses can give you great portrait pictures with very nice colour, center sharpness and very nice bokeh. So which lens should i buy?

I guess the answer really depends on who you are or who you ask . If you are a professional wedding photographer, just go and buy the 1.4D for the better bokeh, professional grade build quality and it being 2/3 stop faster which give you a bit more flexibility when you need it. If you are an amateur photographer with very tight budget, then you can't go wrong with the 1.8D, not only it's a lot cheaper, it's also smaller and the overall picture quality is almost just as good (and better in some area) than the 1.4D

But if you are not a professional photographer and you can afford the f/1.4D lens but not sure if it's really worth the extra money, here are the major differences between the two lenses, have a look and hopefully it'll help you to decide which lens suits you the most:

#### **AF 85mm f/1.4D**

- it is 2/3 stop faster than the f/1.8D
- the center sharpness is better when shooting at wide open
- very creamy bokeh that is better than the f/1.8D's already very nice bokeh
- Highlight Bokeh is a lot smoother and more round when you stop down.
- Professional Grade Build quality
- The f/1.4D uses the more expensive but also more common 77mm filter so you probably already have the filter that can fit this lens
- easier to Manual focus because of the longer focus ring travel, smoother and slightly dampened focus ring and the M/A focus switch

#### **AF 85mm f/1.8D**

- The corner sharpness is quite a bit better than the f/1.4D
- It is smaller and lighter and uses a less expensive 62mm filter
- It is only 40% the price of the f/1.8D
- Autofocus is slightly faster than the f/1.4D

*Answer for the sample photo:*

*A: 85mm f/1.8D @ f/1.8*

*B: 85mm f/1.4D @ f/1.4*