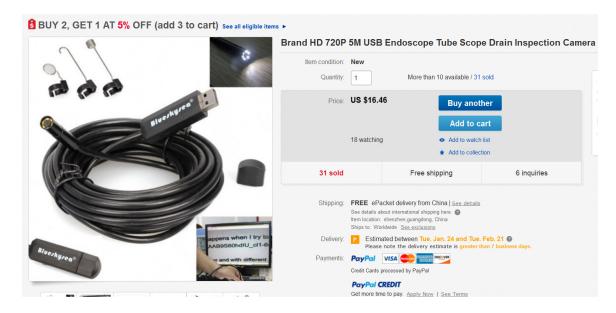
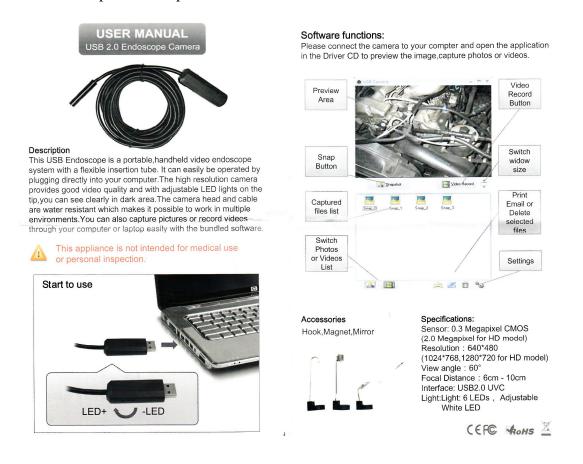
USB Endoscope

Last month I was searching eBay for LED lights and suddenly found myself looking at an ad for a Do It Yourself Endoscope!



Being a dedicated gadget lover I of course immediately ordered one!

It was shipped from mainland China and arrived in two weeks. It was well packed and arrived in good shape. I was amused that the instructions include the admonishment, "This appliance is not intended for medical use or personal inspection."



The first thing that I noticed was the length of the cable – it is sixteen feet long! It is flexible and could not be pushed far.

I loaded the software on a netbook PC. The software does not install in the PC. All you need to do is save it to an appropriate folder and create a shortcut.

The first thing I looked at was a heat duct. I removed the register cover and dropped the head down the hole into the duct. I had a good view of the dust in the bottom of the duct, but the head was swinging and it was not possible to get a good look at anything. I put my arm down the register hole and pointed the head into the horizontal duct. I could see that it was a duct, but that was about it.

I decided that I needed something to stabilize the head, so I went to Lowes and shopped around. My first stop was in the electrical department to look at armored flex conduit. I found that the head fit nicely into 3/8 conduit, but that the conduit was so flexible that it was of little use. I had hoped that it could be bent and would hold the shape, but it did not.

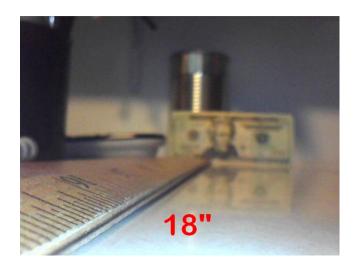
The next stop was in the plumbing department where I found some 3/8" PEX tubing. The head fit nicely into it, so I paid two dollars for a five foot piece.

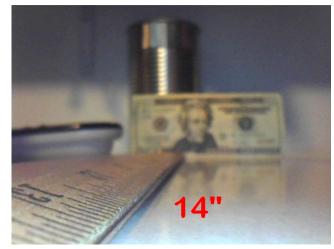
I filed a notch in one end and drilled a hole below the notch for a wiretie so the camera could be mounted at 90°. I used a hack saw to split the other end for about ¾"so it could be mounted in the tube.

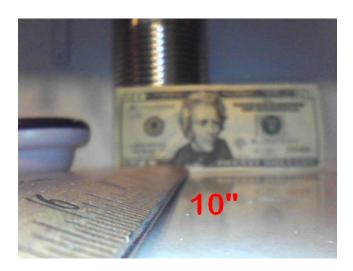




I had noticed that the focal length was limited, so I laid it on the desk and propped up a \$20 bill to check the focal length. Here are the results. It is apparent that the ideal focal distance is one to three inches.



















Conclusions. The limited focal length is the biggest issue to me. Pointing it is also a potential problem. It is a neat gadget and if I use it once I will have paid for it. There are a lot of these on eBay and Amazon – search for 'Endoscope'. Some use a smartphone for the display which would be a lot easier to use than a netbook computer. I noticed that most of the smartphone versions are for Android phones.

Good luck! I'd like to hear from you if you buy one of these and have any comments. Please provide a link to the model you bought. n7cfo [at] n7cfo.com