



Instructions for the Halltech HC.125 Laminar Airflow Straightener Screen

History: In 2002, GM removed the laminar flow screen on the Z06 in an attempt to increase horsepower from the 2001 Z06, which had the screened MAF. All LS1 motors came with the screened MAF sensor. GM did not make any power claims for this mod, and since there were no changes at all in the MAF tables, there is little doubt the difference was negligible.

The problems all began with aftermarket intakes, which had a predisposition to more turbulence at the MAF wire pickup, and without this screen, some popped lean codes daily, even the Halltech STinger had issues here.

This problem has become one of the reasons many C5 owners have stayed clear of aftermarket intakes since this subject came up weekly on the Corvetteforum.com

Those days are over. Halltech has invented an new **Honeycomb Flow Straightener**, with little to no airflow restriction, and has 50% less restriction than the C6 MAF, which makes 436 HP from the factory.

Our 1/8" (.125") honeycomb cell will not restrict flow, and you will find big time changes in your performance, from throttle response, to mileage, less surging from turbulence, to more importantly, NO MORE LEAN CODES.

We have sold only 8 of these to date and here are 5 testimonials hot off the press:

Installed mine today. Perfect fit. One suggestion; be very careful with the edges, as there're small particles like flashings that can easily break off, and wind up ingested by your motor. Metal down the cylinder is never a great idea. It would no doubt increase the unit price to make the outer circumference encased somehow, but since I believe that this is a very effective product, the market would pay a little more for peace of mind. All things considered, it does seem to work as advertised, and even helped throttle response, at least on my application. Kudos. 🙌

Here's an update on my experience to date ('03 Z06 - stock other than Corsa extreme and x-pipe)

Installed a Halltech tunnel plate, C5 venom and the flow straightener about a week ago. Clocked the MAF to match the TB plates. Have driven the car about 300 miles. Throttle-response is better, idle is slightly smoother, and the car sounds really angry at WOT! Seat-o-pants meter says maybe more power.

Not a single code to date. Great job on this little tweak, Jim! 🍻

6/1: Update. After driving the car on a nice 100 mile jaunt over the weekend, my throttle response on the freeway has markedly improved. The Venom is doing its job, along with the Halltech tunnel plate for fresh air. Still no codes after about 500 miles!

Doug

I have installed the screen and have driven the car about 300 miles so far.

No more lean codes and no surging. I had it down to 20 mph in 4th gear and no surge. Will keep you posted. Larry

I have an 03 Z with a Vararam, CF power duct with silicone couplers, predator tune and Borla cat back. In warm weather I got CELs for lean left and/or right banks almost everyday. Always at very low throttle angles, like when coming to a light, or inching along in traffic. I pulled the system apart at least four times working to eliminate any possible air leaks.

I put the honeycomb screen in my MAF, put the system back together, once again being super critical of possible air leaks.

I instantly, like in 50 feet, knew something was different on the first drive. The car sounded different and the lean feeling, not quite a stumble I've always had when the engine is cold was much less. The car drove better, throttle response and smoothness, from the time it warmed up.

I have about 6 trips to work (35 miles, mix of fast back roads and some traffic) and no CEL. The car continues to feel and sound different as the LTFT are adjusting. Throttle response, and general smoothness remain improved. I have noticed soot on the back of the car and tail pipes, which I've never seen before, possibly from when the car had not adjusted to the new readings. I'll know more after I wash the car. and it either comes back or doesn't.

When I saw the product I told Jim that this looked like a simple fix that would work, and it does. I can't

believe I spent so much time trying to adjust my way out of the CELs with the predator tuner, and fixing leaks that were probably never there, with a \$30 almost drop in part. I am back to the canned predator tune, the car runs better than it has in as long as I can remember. It's like you just did a tune up, everything is just a little bit better than it was before.

One question, how long does it take the LTFT to adjust and settle in? Is my car settled with 175 miles or so on it? If yes, I'm perfectly happy the way it is.

I was not a Beta tester, though I asked to be. I asked to pay the original asking price and get free shipping, and didn't get it. I paid full price, and am getting nothing in return for this review. Like the title of the thread says, at least in my case, this simple part has ended my lean codes. Quite a simple product that does what it's sold to do.

Mike

I'm not a "tester", but just happened to buy one after reading this thread. I'm still reviewing the screen (that's some work for a water jet). I disconnected the battery, and also went thru the idle relearn steps. I've only been thru 2 cold cycles so far and can already tell some difference with reduced surging. I didn't have any prior lean code issues, just low speed light throttle surges. Mine also sounds different, but I also installed a Jantzer ported throttle body at the same time. 😊 I'm glad they made it so pretty so I could just cover it all up... The first drive was wild with the idle hanging at 1200 until fully stopped, and went thru swings down to 500 rpm, but all that mostly cleared up during the second drive. So far there's an improvement. I didn't want to report my findings until after a couple more drives just to make sure. Be back in a couple days.

BTW, the packaging method was great!

Here's an update. I had been running a dual cone intake on my 02 Z06. Lean code would pop up, and live data revealed that long term fuel trims were above 25 percent. I verified that there were no post MAF air leaks. After reinstalling the stock air box, the LTFT's were way down. I recently installed the Halltech screen, and reinstalled the dual cone intake. I let it idle, and drove it about 150 miles here and there under various conditions. No lean code ever showed up, and live data shows LTFT values as 10 - 12 percent at idle, never higher. Fourth gear acceleration seems to be much more responsive, under very similar conditions. All in all, a very good product at a very good price. I would highly recommend it!

2002-2004 Z06 MAF sensor

Lay it down with the metal side up, on a level table.



Place the Halltech HC.125 Honeycomb into the MAF. Be very careful of sharp edges from the Flow Jet cutter. The aluminum edges can cut you.

WEAR GLOVES!





Start at one side and work your way around the perimeter with your thumb pushing in the screen until it is level with the MAF Surface

**Almost done; now flip
the MAF over.**



Push down evenly to seat the screen.



**Finished Halltech unit on the right vs. GM C6 unit on the left
The Halltech Laminar Airflow .125" Honeycomb Screen works!**



Halltech™