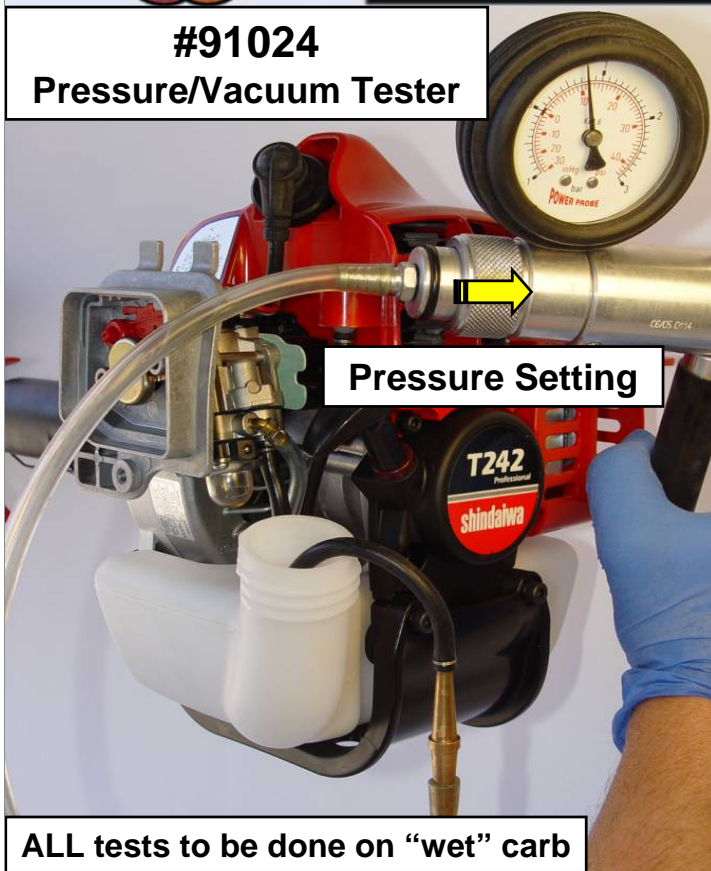


PRESSURE TEST

#91024
Pressure/Vacuum Tester



Checks for leaks at fuel line, inlet needle, & fuel pump body

- **Hook tester up to tank inlet line.**
- **Pump tester up to 10psi (.7 bar)**
- **The line and carb should hold pressure for 1-min.**

ALL tests to be done on “wet” carb

The pressure test will check for a leak in the inlet fuel line. The test will also show leaks in the carburetor up to the inlet needle, which includes the fuel pump body & gasket.

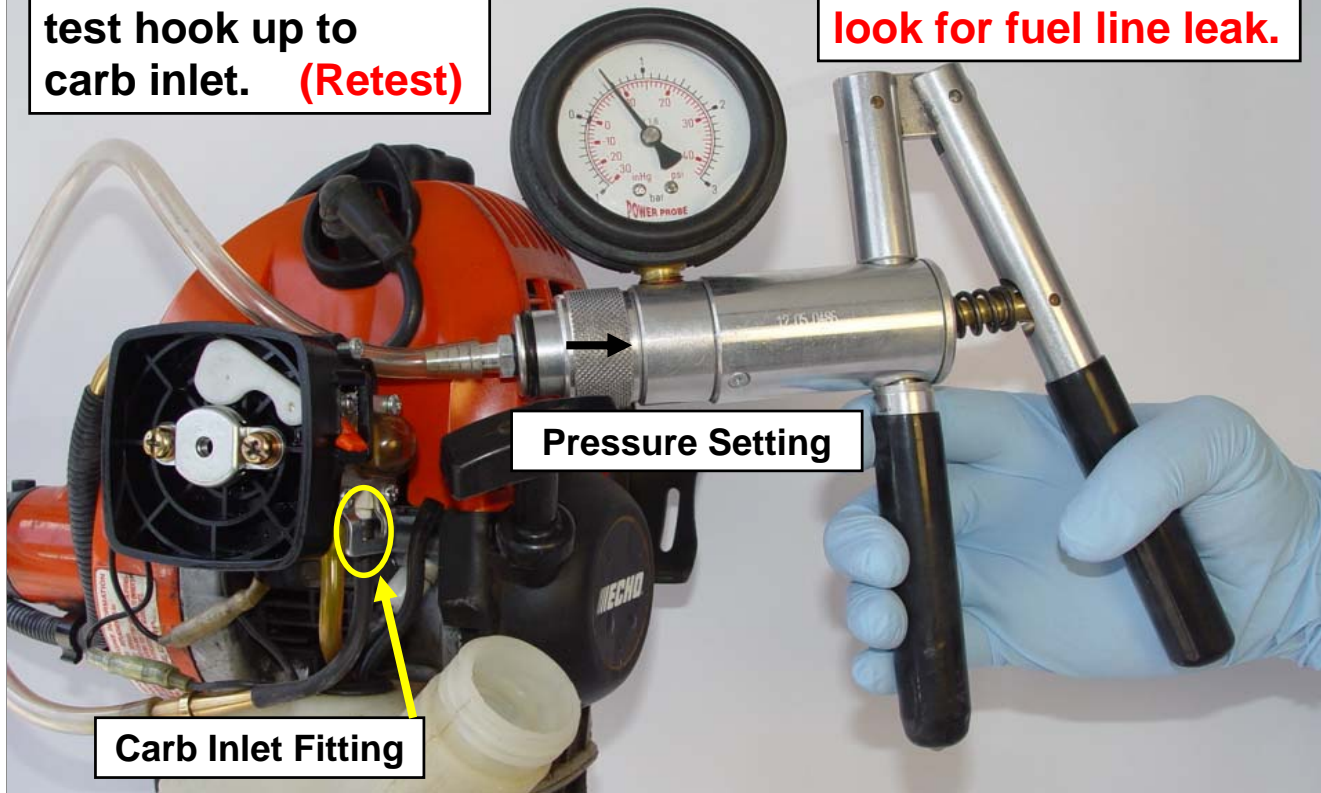
With the fuel filter off, plug the end of the #91024 Pressure/Vacuum Tester hose into the tank inlet line. Pump the tester up to 10psi (.7 bar). The pressure should hold for 1-minute.

NOTE: ALL TESTS SHOULD BE DONE ON A “WET” CARB. Tests should be done on a carb that has had fuel in it. Carburetor gaskets, check valves, and diaphragms tend to be a little porous when dry.

PRESSURE TEST CARB

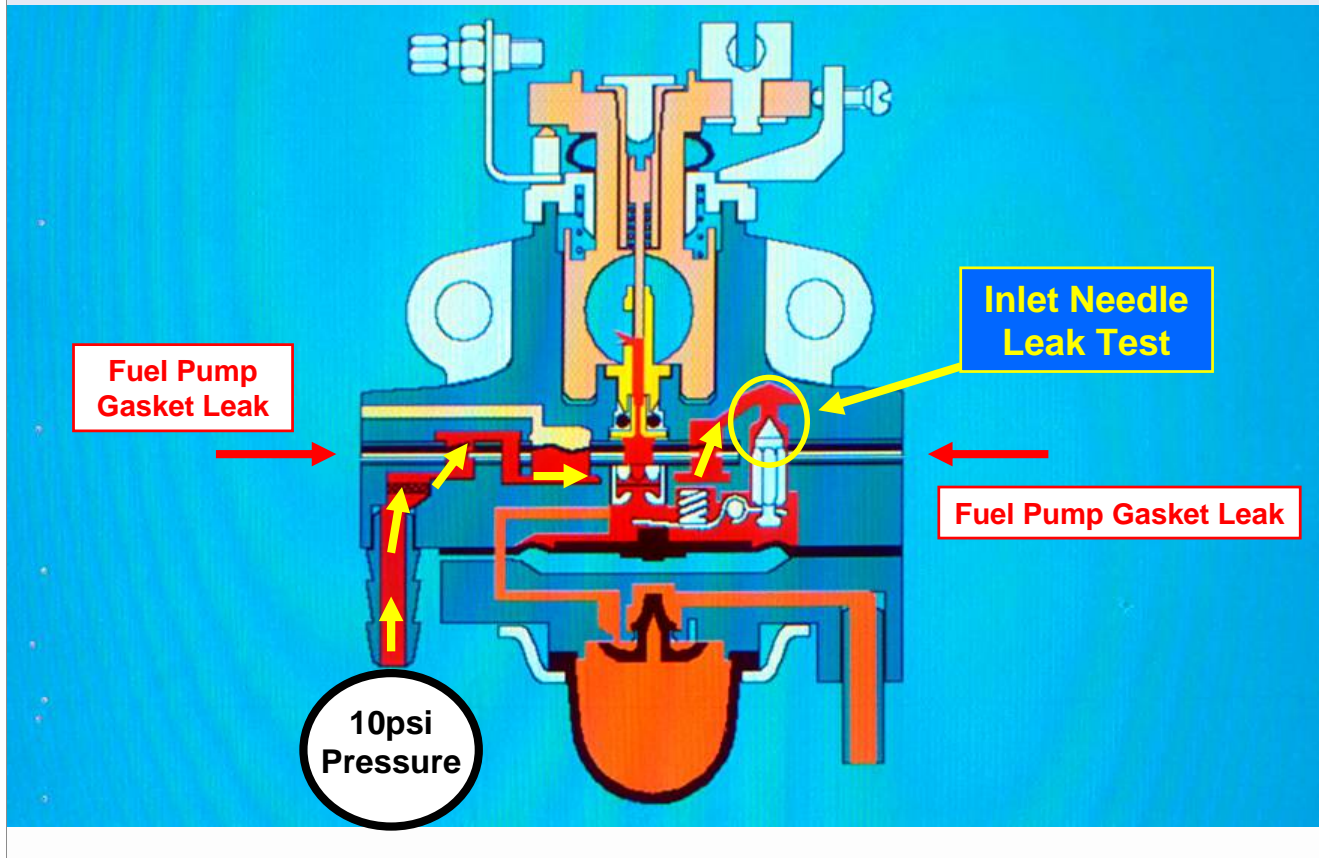
If unit fails pressure test hook up to carb inlet. **(Retest)**

If carb passes retest **look for fuel line leak.**



If the unit fails a pressure test, hook up the tester directly to the carb inlet and retest. If it leaks, the carb has the problem. If the gauge holds pressure while hooked up directly to the carb you know the problem is in the fuel line.

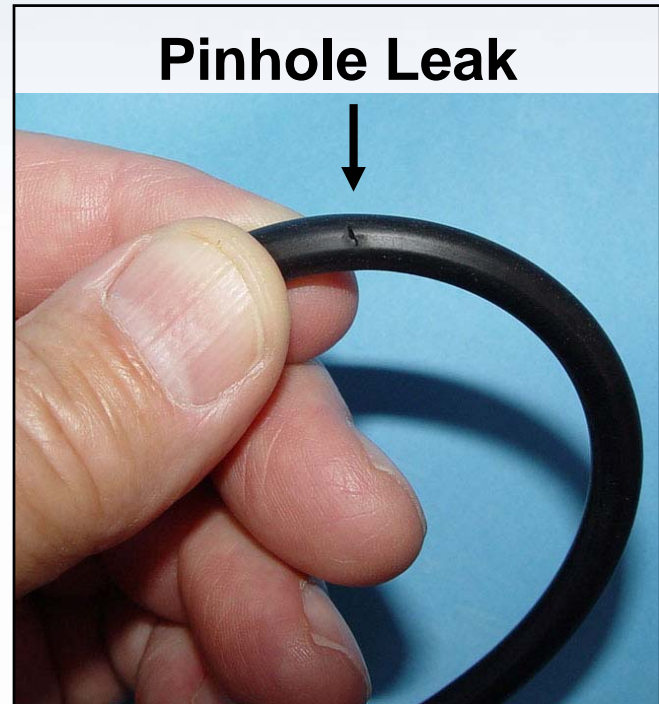
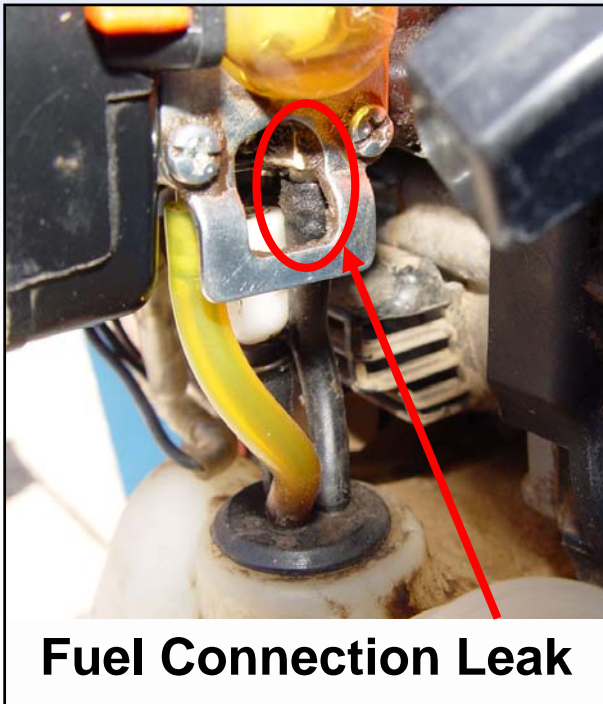
PRESSURE TEST



The 10psi pressure applied by the pump goes through the carb fuel pump body to the inlet needle and seat. If the tester leaks down, it could be at the fuel pump body or gasket. Remember, this gasket could leak a little if dry.

Spring pressure should seal the inlet needle to the seat. If the carb fails a pressure test the most likely cause of the problem is a leaking inlet needle. The pressure test will not evaluate any leaks in the metering side of the carb, since it is past the inlet needle.

FUEL LINE LEAKS



Here are two leaks found with a pressure tester. The picture on the left shows an SRM-265 with a loose inlet fuel line connection. Besides a slight external leak, this line could leak air into the diaphragm carb and cause a running problem.

The line on the right is off a PB-755 that was dying off idle and not accelerating well. The line had no external leak, but the pinhole in the line was allowing a little air to get into the carb. Without making the line pressure test, the tech could have wasted a lot of time needlessly working on the carb.

PURGE/INLET TEST



Verifies integrity of inlet needle & seat

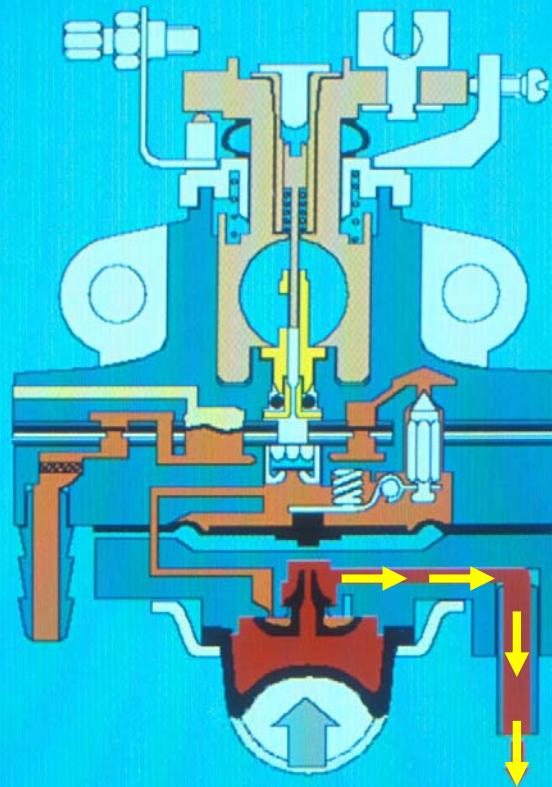
- The gauge should still be holding 10psi (.7 bar)
- **PUSH PURGE 1-TIME.**
- The needle should drop & hold at least 7psi (.5 bar) for 1-min.

ALL tests to be done on "wet" carb

The Purge/Inlet test is a continuation of the pressure test. With the gauge still holding 10psi, push on the purge bulb. The pressure gauge needle should not drop below 7psi (.5bar) and hold for 1-minute. If the gauge needle continues to drop after the bulb is released there is a leak at the carb needle and seat.

PURGE/INLET TEST

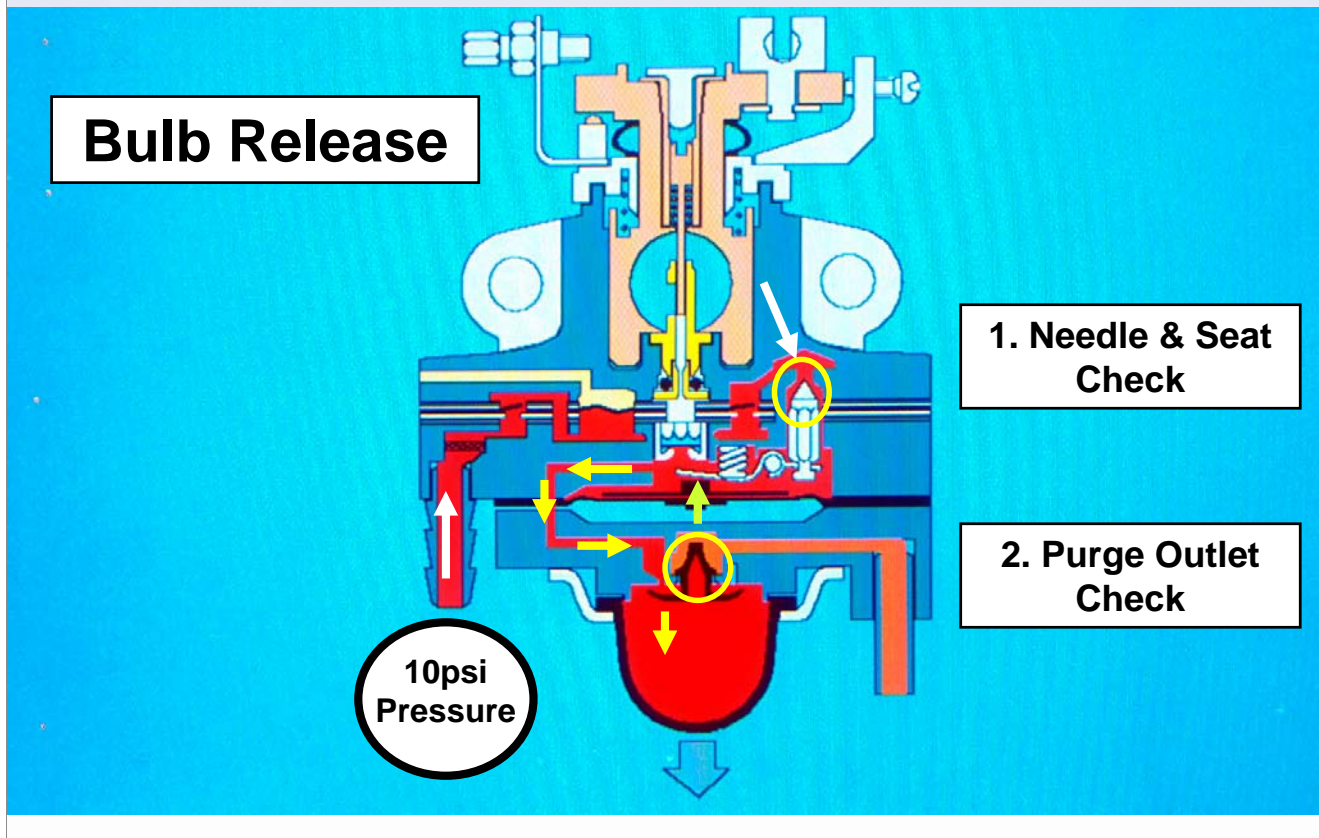
Bulb Push



**Air & Fuel
pushed out
to return line**

When the bulb is pushed, air & any fuel in the purge bulb is purged into the tank.

PURGE/INLET TEST



Bulb Release

1. Needle & Seat Check

2. Purge Outlet Check

10psi Pressure

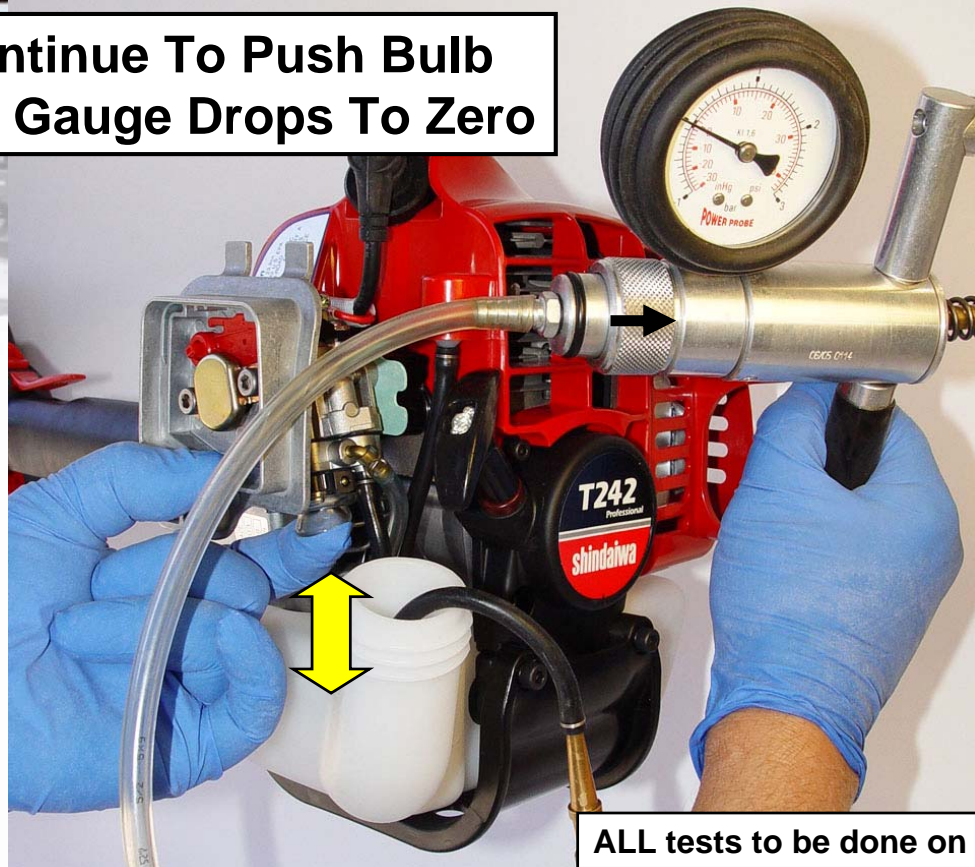
TEN psi from the pressure test is still pushing on the inlet needle. As the bulb is released, a vacuum is created in the metering side of the carb. That vacuum should momentarily pull the metering diaphragm against the inlet needle lever, pulling the needle off its seat, and releasing a small amount of pressure off the gauge. ,

1. If the needle drops and continues to leak down after pushing the bulb, the likely problem is a leaking inlet needle.
2. If the needle does not drop when the bulb is pushed the problem is a leaking purge outlet check valve.

If the carb fails the Purge/Inlet test, fully evaluate the problem in the carburetor section of this program.

PURGE/INLET TEST

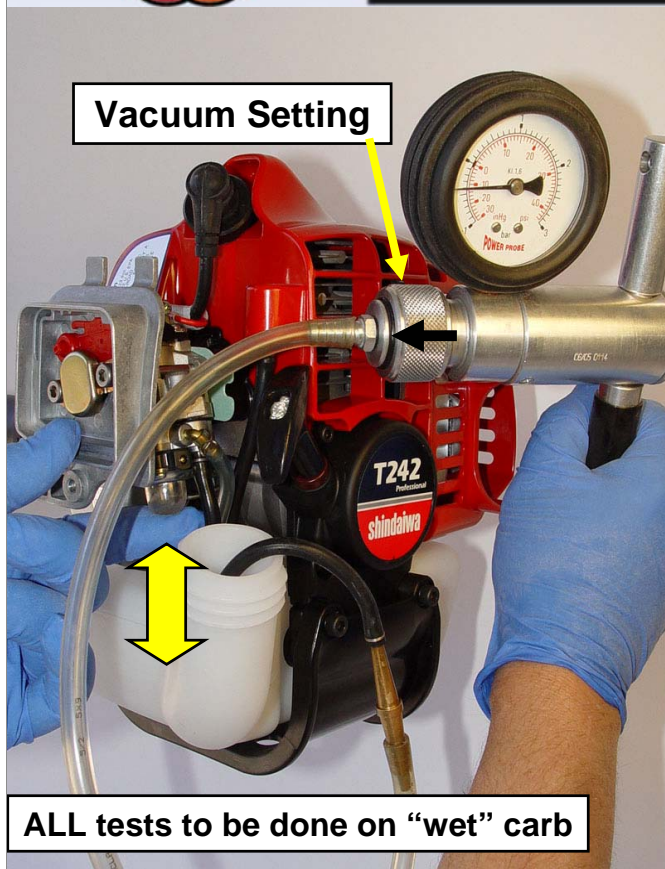
**Continue To Push Bulb
Until Gauge Drops To Zero**



ALL tests to be done on "wet" carb

Continue to push & release the bulb until the gauge gets down to zero. The needle should drop and stay each time the bulb is released.

METERING VACUUM TEST



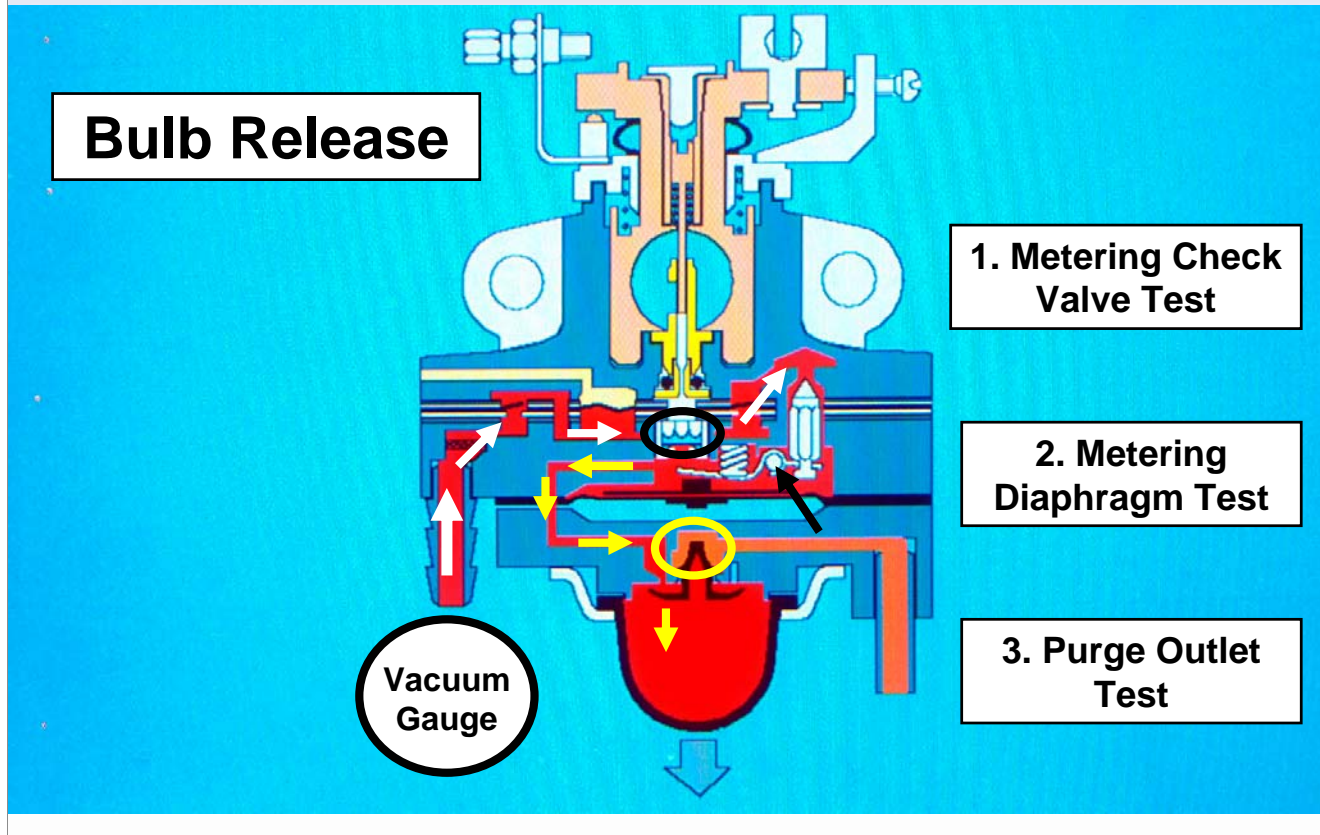
Checks for leaks at metering check valve & diaphragm

- Set tester to Vacuum setting
- PUSH PURGE BULB
- Needle should drop & hold vacuum of 10 in.hg (.4bar) for 10 sec.

Leave the tester hooked up to the carb INLET and switch it to the vacuum mode. Push the purge bulb multiple times to pull a vacuum on the metering side of the carb. The gauge should hold 10 in. hg (.4bar) for 10-full seconds

If the gauge holds vacuum the test verifies the metering check valves and metering diaphragm are not leaking.

METERING VACUUM TEST

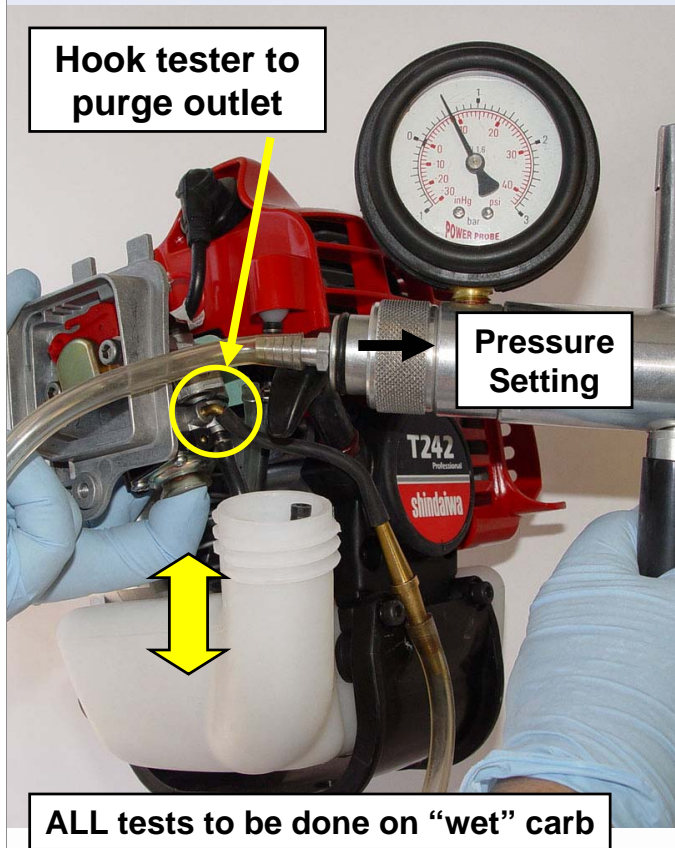


To perform the Metering Vacuum Test the tester should be set on vacuum mode and hooked up to the carb inlet. Each time the purge bulb is released a vacuum is created in the metering section of the carb. That vacuum should pull against the metering diaphragm, lifting the inlet needle of its seat and pulling a vacuum on the tester.

1. If little or no vacuum is created the most likely source of the problem is leaking metering check valves. ,
2. A lack of vacuum could be caused by a leaking metering diaphragm, however it is very rare. ,
3. A leaking outlet purge valve could also cause the test to show little or no vacuum.

Fully evaluate the carb in the carburetor section if it fails this test.

PURGE TEST



The best way to test purge check valves

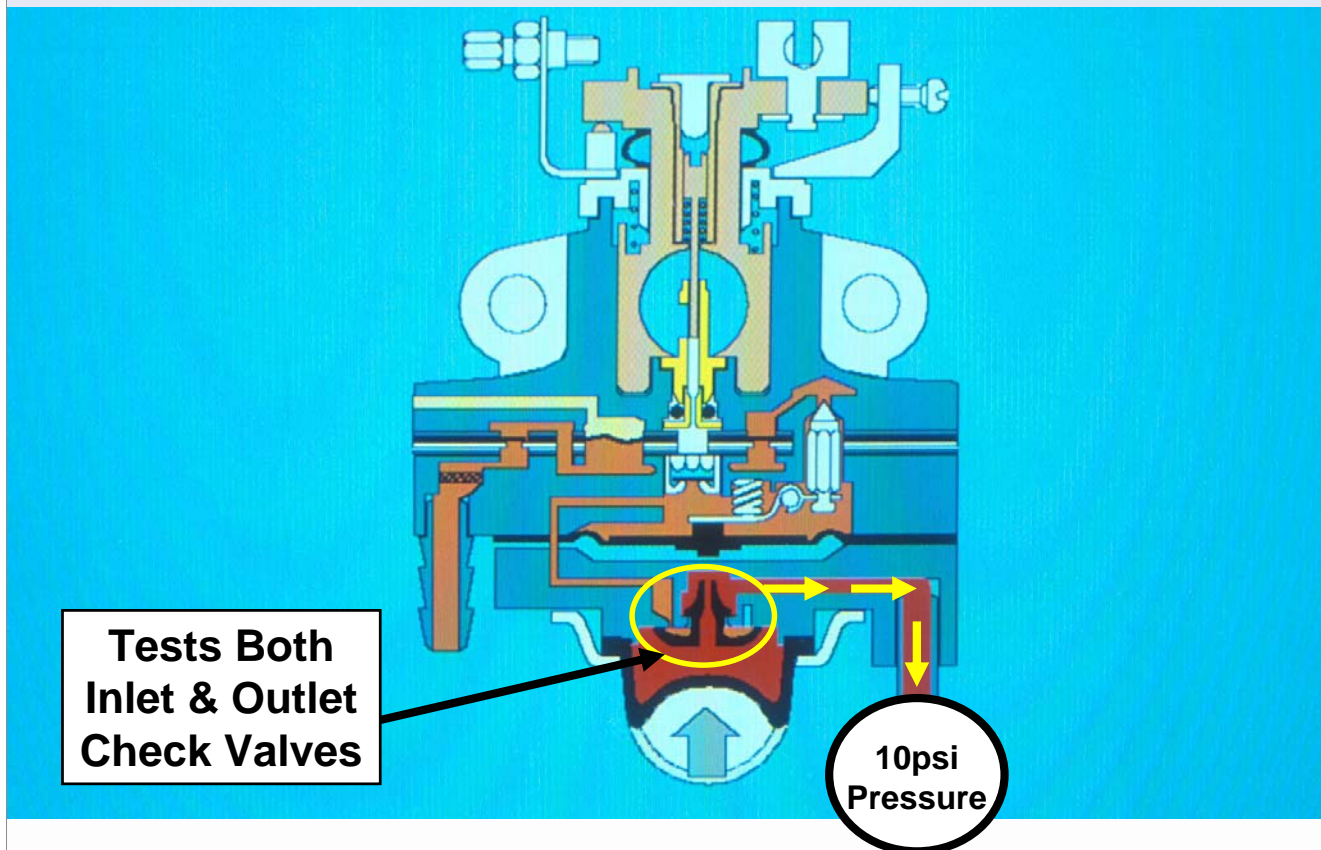
- Set tester to pressure setting
- PUSH PURGE BULB
- Needle should rise up to 10psi (.7 bar) & hold for 1-min.

The Purge Test is the best way to check the operation of both inlet and outlet purge check valves. To perform the test, hook the tester up to the carb outlet/return line connection.

- Set the tester to the pressure mode.
- Push the purge bulb multiple times.
- The gauge needle should rise up to 10psi (.7 bar) and hold for 1-minute.

If the carb fails this test, the purge check valves or purge body will have to be replaced.

PURGE TEST



This is a very simple test and the most effective way to check for leaks of both the purge inlet and outlet check valves. The pressure gauge is hooked to the carb return line connection. The carb purge pump is then used to pump up the tester gauge up to 10psi (.7 bar). The pressure should hold.

If the carb fails this test, the purge check valves or purge body will have to be replaced.