



## Afstellen van DCOE Webers

*Hieronder treft u een stuk (engelse) tekst aan waarin beschreven staat hoe de basis afstellingen van de Weber DCOE's dient te geschieden. Dit is ervan uitgaande dat de hoofdsproeiers, venturi's en mengbuizen passend zijn voor de configuratie.*

### Setting the Idle and slow running

Before adjusting the carbs you must make sure that the following conditions are met:

- 1) The engine is at normal operating temperature
- 2) That the throttle return spring/mechanism is working OK
- 3) That there are no air leaks or electrical faults
- 4) That the fuel pressure is okay (not too high)

A reasonable idle speed for a moderately modified engine on Webers is 900 - 1100 RPM.

Start the engine and let it reach normal operating temperature. This may mean adjusting the idle speed as the engine warms up. Spitting back (coughing or even backfires) through the back of the carburettor normally indicates that the mixture is too weak, or the timing is off spec. If this happens when the engine is warm and you know that the timing is OK, then the mixture will need trimming richer on that cylinder. Set the idle as near as you can to 900RPM.

Using an airflow meter or carb synchroniser adjust the balance mechanism in between the two carbs to balance the airflow between them. If the Idle speed varies at this point, adjust it back to 900 RPM.

When you are sure that the carbs are drawing the same volume of air, visit each idle mixture screw, turn the screw counter clockwise (richening) in small increments (quarter of a turn), allowing a good 5 - 10 seconds for the engine to settle after each adjustment. Note whether the engine speed increases or decreases:

-If it *increases* continue turning in that direction and checking for engine speed, then the moment that engine speed starts to fall, back off a quarter of a turn. If the engine speed goes well over 1000RPM, then trim it down using the idle speed screw, and re-adjust the idle mixture screw.

-If the engine speed *decreases* then turn the mixture screw clockwise (weakening) in small increments, again if engine speed continues to rise, continue in that direction, then the moment it starts to fall, back off a quarter a turn.

During this procedure, the idle speed may become higher, so re-adjust it and repeat the procedure for each carb barrel. The mixture is correct when a quarter of a turn in either direction causes the engine speed to fall.

After all the mixture screws have been set, the idle should be fairly even with no discernible 'rocking' of the engine, if the engine is pulsing, spitting or hunting then the mixture screws will need further adjustment. If the engine is rocking or shaking then the balance is out, so revisit with the airflow meter/ carb synchroniser.

## Starting technique / Using the choke (engine cold)

DCOE Webers have a cold start circuit (choke). It is very easy to flood the engine and wet plugs using the cold start mechanism, as it very crude in operation. The alternative technique for cold starting is as follows:

In stead of using the choke mechanism, fully depress the accelerator rapidly a few times, then on a light throttle, start the engine. The carbs accelerator pump causes a little fuel to be injected in the carbs each time you depress the accelerator. If the engine does not start immediately, repeat the procedure. The engine should fire, but may need 'nursing' for a minute or two before it will idle, gentle prodding of the accelerator should keep it alive long enough for it to warm up. If the engine does not fire within three attempts, then try a few more quick pumps on the accelerator.

If this still does not work, the engine might be flooded by too much fuel. In that case depress the accelerator fully and hold it open while turning the engine over until it starts.

