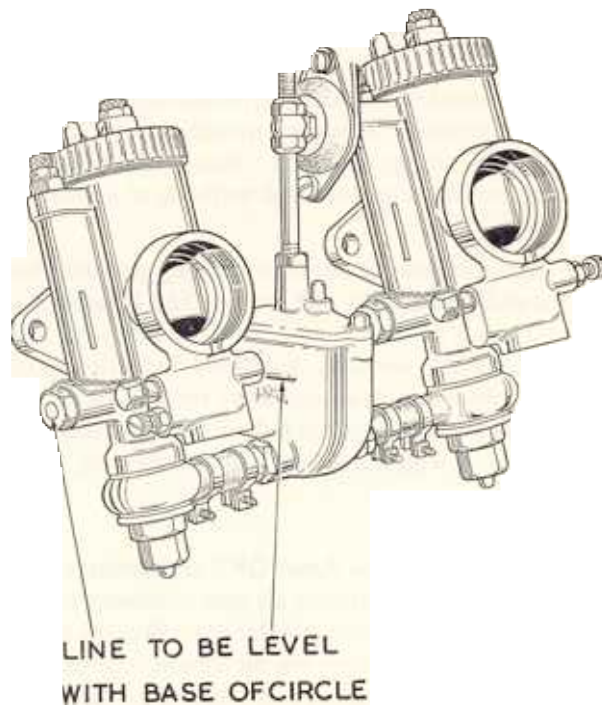


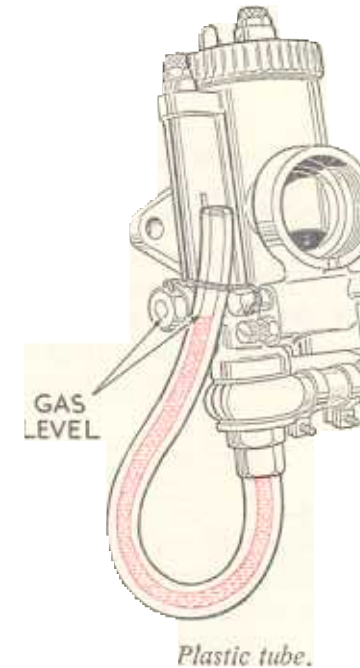
### Design Features

Fuel for the Twin GP.2 carburettors on your Spitfire is fed from the gas tank to a remotely mounted float chamber between the two instruments. You will see that the mounting of this float chamber is flexible. This is because its job of controlling the level of gas in relation to the carburetter jets is an essential element in the correct functioning of the system and the float chamber must be protected from the possible harmful effects of vibration at very high engine speeds. The position of the float chamber relative to the two carburetters is adjustable by means of the rod on which it is suspended from its top mounting. The gas level in the chamber is indicated by a raised line on the outside of the body and in positioning the float chamber this line should be on a level with the lowest point of a circular scribed mark on the carburetter air jet plugs. The following illustration will make this clear to you and you will probably notice that with the float chamber in this position the short pipes connecting it with each of the Twin carburetters are straight.



*Float chamber level.*

Normally it will not be necessary to do anything more than make a visual check of the float chamber level which is correctly set at the Factory. If, however, the instruments have been disturbed and you feel that you would like to make a more positive check then a transparent flexible pipe fitted to the bottom jet plug of each of the carburetters and looped in the way shown in the illustration will give you a very fine check which is, of course, beyond question. The level of the gas in the flexible pipe should again be the same as the bottom of the circle on the air jet plug.



**There is no point in endeavouring to tune a carburetter, the float chamber of which is inaccurately set.**

From the centre float chamber gas is fed to each of the carburetters through short flexible plastic pipes to a union surrounding the jet block. From here it is metered through a series of jets before being fed to the engine by a pilot bleed system or through the main spray tube where it mixes with a carefully controlled volume of air and is fed to the combustion chambers as a fully atomised highly combustible mixture. These jets and the important air passages are indicated in the following illustration, and a few moments spent in studying this illustration will clearly show their positions and the route taken by the gas and air on its way to the combustion chamber.