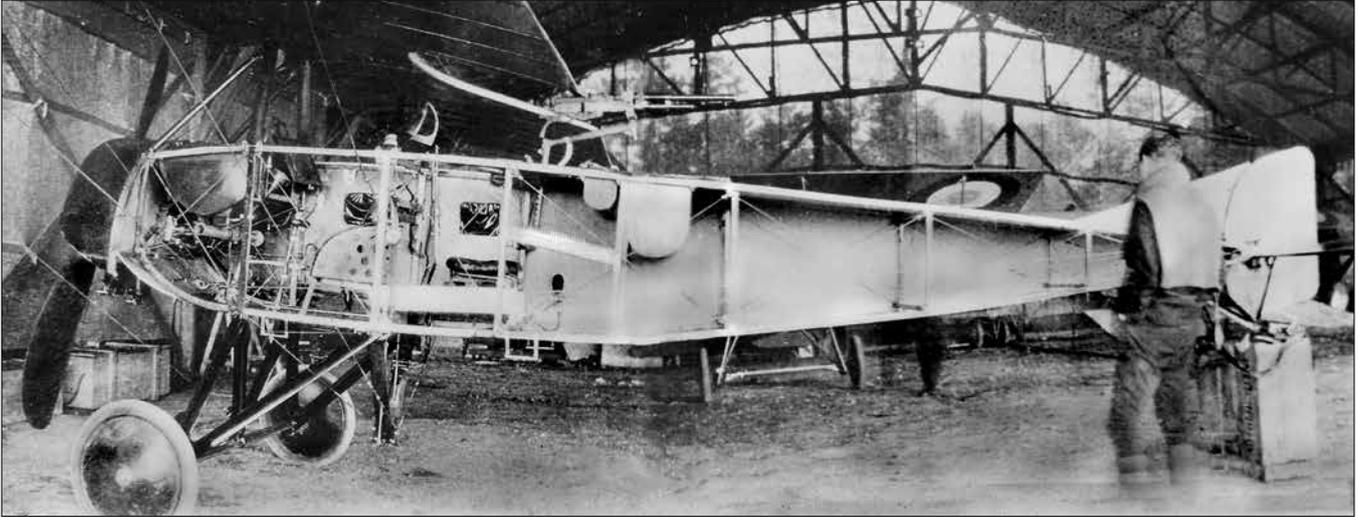


Notes on the Morane Parasol 80hp Le Rhone

June 1915

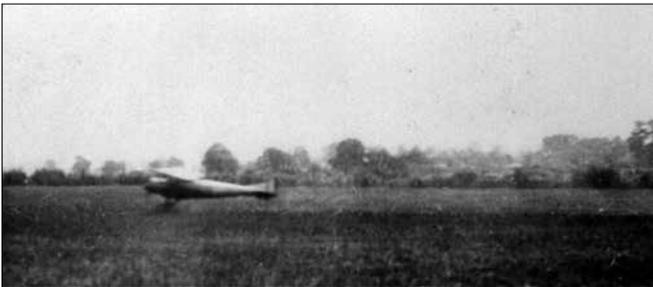
TNA File AIR1/738/204/2/26 via Trevor Henshaw



1. When flying a Morane

a) Setting off

Get tail well up as soon as possible and put machine into flying position before attempting to leave the ground. The machine will take itself off when it has gained sufficient speed. Having no fixed tail-plane they are very sensitive fore and aft – this being found particularly so when leaving the ground. Leaving the ground correctly requires as much practice as landing these machines.



If weather is bumpy lateral stability must not be obtained by too much use of rudder, due to 'spinning.' A useful warp can be got by moving the stick over quickly and then bringing it central again (repeating if not enough).

The tail is a great improvement and gives a good increased lateral stability allowing more rudder to be used.



b) Flying

The best climbing position is flatter than on most machines (the tail being kept high always).

c) Landing

Don't let the machine touch the ground until it has lost flying speed.

After flattening out, keep the machine off the ground as long as possible, finally letting it pancake the last foot or so. To do this it will be found that the stick must be gradually pulled back and at the moment of touching the ground is back almost as far as it will go.

The machine should then land with wheels and tail skid almost simultaneously. If this is done it will run no distance at all.

If the tail is allowed to touch before the machine wants to pancake the machine is liable to swing right round and at least, tear off a tyre.

2. Rigging

A Morane Parasol has no dihedral. There should be a slight wash-in on each wing tip trailing edge. All cables to main (leading) spar should be very taut (both top and bottom).

When a flying wire is slack it does not necessarily mean that that particular wire requires tightening, it may be the corresponding one on top. This is determined by looking along the spars (from both ends of the wings) and seeing if they are dead straight. NB This point of tightening up wires and keeping spars straight may seem obvious but all riggers take a long time before they seem to understand it.

If spars are kept straight from the beginning the wings last very well.

The warp cables should be fairly taut but not so taut as cables to the leading spar.

The idea of having cables so tight is to relieve strain on wing bolts and prevent tendency to a dihedral when in the air.

The two diagonal cross bracing cables at centre section should be very taut indeed. These are most important as the stop the tendency for wings and fuselage to swing oppositely.

All cables on Moranes stretch very quickly – sometimes due to bad or loose splicing.

The fuselage requires looking at after about the first ten hours flying. A well tuned up taut fuselage makes an enormous difference to the flying and air behaviour.

Moranés are often very carelessly rigged on delivery and should be carefully gone over on taking over – otherwise the spars will quickly warp and bend.