

## Eine technische und taktische Anweisung für die Albatros D Reihe

Einsitzer Rampfflugzeug

Herausgeben durch die Albatros Flugzeugwerke; erstellt auf Befehl der Deutschen Luftstreitkräfte und der Obersten Heeresleitung und Seekriegsleitung



# Technical Data

## Albatros D.II

Width: Length: Height: Weight (empty): Max. Weight: Engine:

Armament: Top speed: Max. Ceiling: Endurance: Climb to 1.000m: Climb to 2.000m: Climb to 5.000m: Max. Range:

Width: Length: Height: Weight (empty): Max. Weight: Engine:

Armament: Top speed: Max. Ceiling: Endurance: Climb to 1.000m: Climb to 2.000m: Climb to 5.000m: Max. Range: 8,50 m (27.8 ft) 7,33 m (24 ft) 2,64 m (8.6 ft) 637 kg (1,404 lbs) 888 kg (1,957 lbs) Mercedes D.III 160 PS (157.8 bhp) water-cooled 6cylinder inline 2x LMG 08/15 starr nach vorn 175 km/h (108.7 mph) 6.000 m (19,685 ft)

4 Min 50 Sek 9 Min 30 Sek 37 Min 10 Sek 230 km (143 miles)

## Albatros D.V

9,05 m (29.5 ft) 7,33 m (24 ft) 2,70 m (9.77 ft) 717 kg (1,580 lbs) 915 kg (2,017 lbs) Mercedes D III mit 175 PS (172.6 bhp)

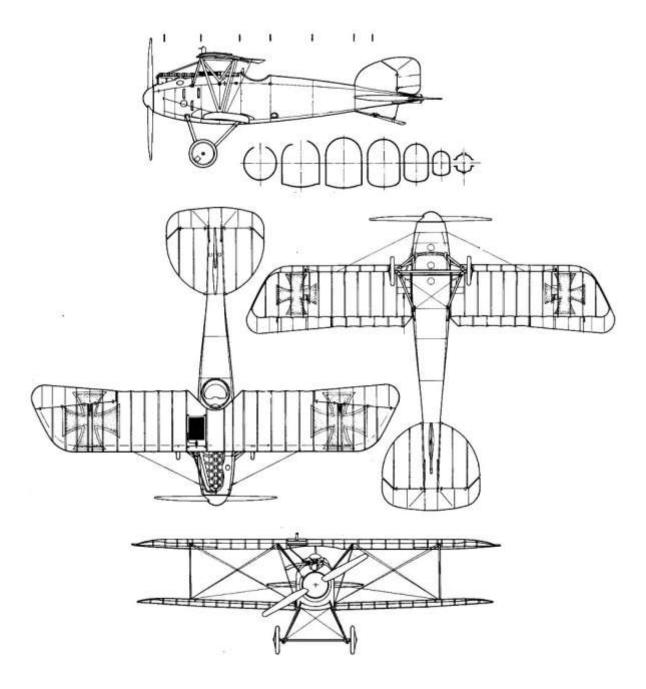
2x LMG 08/15 'Spandau' (0.312 in) 180 km/h (111.8 mph) 6500 m (21,325 ft) 2 h 4 Min 20 Sek 14 Min 30 Sek 32 Min 380 km (236 miles)

## Albatros D.III Early / D.III Late

9.05 m (29.5 ft) 7.33 m (24 ft) 2.98 m (9.77 ft) 661 kg (1.457 lbs) 886 kg (1.957 lbs) Early: Mercedes D Illa 160 PS (157.8 bhp) Late: Mercedes D.Illa 175 PS (172.6 bhp) 2x 7.92 mm LMG 08/15 (0.312 in) 175 km/h at 1000 m (108.7 mph) 5.000 m (16,404 ft) 2 h 3 Min 30 Sek 12 Min 29 Min 330 km (205 miles)

## Albatros D.Va

9,05 m (29.5 ft) 7,33 m (24 ft) 2,70 m (9.77 ft) 730 kg (1,609 lbs) 937 kg (2,065 lbs) D.Va: Mercedes D IIIa 185 PS (182.5 bhp) D.Va 200: Mercedes D.IIIa 200 PS (197.2 bhp) 2x LMG 08/15 'Spandau' (0.312 in) 187 km/h (116.2 mph) 6.250 m (20,505 ft) 2 h 4 Min 20 Sek 17 Min 8 Sek 35 Min 350 km (217 miles)



Albatros D.III

## General Characteristics

The Albatros is not a light fighter with its plywood fuselage and the Mercedes D.III inline engine. If you come from a rotary aircraft, you will first find her heavy, almost inert, without that typical rotary 'twitchiness'. Take some flying time to understand the neutral steadiness of the craft, that will keep your mind free of too much controlling; and provide you with a stable gun platform.

## Difference between Albatros D.ii and D.iii

The Albatros D.III has completely new designed wings. The upper wing was lowered quite a bit, to give you better view. Also, the lower wings are much smaller in width for the same reason. Since the Nieuport fighters were so extremely agile, our constructors copied its smaller low wings. This is now almost a sesquiplane, which gives you a much better downward view. But the smaller wing in combination with the V-strut is also the weakest spot of the D.III! You will not be able to perform steep dives like in a D.II! When you feel, that the lower wings start vibrating, you must reduce your dive angle. We had incidents, where wings partly broke! Pulling up hard from even only a shallow dive can damage your wings! So, while the D.II can perform even steep dives quite well, you should never do that with the D.III!

### Albatros D.v

The typical aerodynamic plywood covered fuselage is noticeably rounder than on the D.III. The radiator was moved from the centre of the top wing to the right of the pilot, to protect him from the boiling water, if it is punctured in battle. The upper wing was lowered by another 10 cm, which improved the pilot's view again. A headrest was added, but this was later left out, because it hindered the pilot's view to the rear. The rudder was more rounded. The aileron cables were now led through the upper wings. This particular change would make it possible to control the craft with the ailerons, even if one of the lower wings should partly break near the strut.

### Albatros D.va

On the D.Va, the aileron cables were put back and led through the lower wings again. The D.Va has a reinforced and slightly heavier fuselage, and a stronger engine with 185 PS; in some models even 200 PS (Albatros D.Va 200).

## Pre-flight and Take Off

The start will take a bit more of the runway, and take off will feel more solid, but then she will climb very well for the first 1.000 metres. On the runway, she may have a slight tendency to the left; so carefully apply some right rudder. Apply full throttle and wait until she raises her tail plane off the ground at around 104 km/h (60 mph), and then pull the stick back gently, her wheels will unstick at something between 128 and 136 km/h (80 to 85 mph).

## Normal Flight

She is easy to fly; you won't have sudden undesired reactions from doing something wrong. The Albatros may not be able to do any special tricks very well - if you like to do such; you should fly a rotary aircraft. But she is a sturdy battle horse and will carry you well through your air combats. If you come from the Halberstadt, you'll feel familiar with her almost immediately. Make sure your riggers trim the craft correctly for level flight at maximum speed. (See OFF Controls for trimming up or down)

## Combat (Air)

All Albatros Staffeln make the best of a fight, when they operate well together. So the foremost tactic you should employ is to help your wingmen - and bring them back alive. It is imperative to read and to memorise the 'DICTA BOELCKE'. The steadiness of the Albatros makes her an ideal gun platform for her two LMG, which provide you with an immense and devastating fire power. In fact, her firepower, and the very good overall view, may be your biggest advantages.

### General Notes

Don't go for the deck easily - your safety is advantage of height. Height gives you the chance to dive and gain speed again. You can't do that at low level. Don't try to run from a close opponent turn into his attack. The closer you get on a target, the more devastating will your fire be. Fire short bursts. Long bursts will only lead to gun jams, and then you are easy meat! If you turn with an opponent, turn left! All rotaries turn rather well in a right turn, but not better than the Albatros in left turns. If you cannot get into the turn of your opponent, leave the circle in a shallow dive to gain speed, then climb a bit and turn round tight into the enemy's attack. With a solid engine in front of you, you have good cover, and your two LMG give you double fire power - so you have the advantage in a head on attack. (Exceptions are the S.E.5a, the Sopwith Camel and the SPAD XIII).

## Turn-fighting

Experienced Albatros pilots fly turn fights like this: Apply rudder in the same direction you want to turn in. Bank the craft as far as possible. Keep the nose at horizon level or a bit below; don't lift the nose above the horizon - it will reduce your speed and make a stall more likely to happen! Reduce throttle at times to get around tighter. When the enemy climbs in a turn: don't do the same; follow round at horizon level! His speed will bleed off, and he will have to come down again. Then you can catch him!

The Sopwith Triplane and the Sopwith Camel are the most dangerous turn-fighters you may encounter. Their right turn, especially that of the Camel, is extremely tight and quick to perform. Don't turn-fight with these craft!

### Evasive Manoeuvres

If you have to evade a Camel, use the following battle-proven method: Go into a right turning dive. When the Camel follows, pull your craft into a sudden left climb. The Camel cannot do that very well and will mostly prefer to continue the right turn and fly a full circle to get behind you again. This will give you valuable seconds to get your Albatros round in your left turn. You have shaken the Camel off and can face the enemy again. If you can, fire at it head to head now. Its rotary will break sooner than your inline engine.

### Reducing Height Quickly

If you need to lose height quickly (it may be that you want to help another pilot, or that you want to escape a situation) you cannot just enter a steep dive: your wings would break. Use a hard banked side slip instead. You will almost fall from the sky, without generating any vibration of the lower wings.

#### For Advanced Pilots: Petrol Management

The Albatros can be quite agile, when her tank is not totally filled. For your sorties behind German lines, you should fill in the amount of petrol for your total route, plus 50% of it. That means, if your flight path shows a total of 60 miles, fill in petrol for at least 90 miles. For patrols over enemy territory, you should fill in at least the amount for double the way. This won't be a filling of 100 % in most cases, and sometimes you may be able to fly with only 30 or 40% - then you will be able to enjoy a much lighter

and more agile aircraft. Make sure your mechanics trim her correctly, according to the amounts of petrol you want to use, so she will fly level. Then your flying won't tire you much.

#### Our Most Dangerous Opponents

#### NIEUPORT 17 / SOPWITH PUP

The NI7 and the Pup have slightly less top speed, and more or less the same climb rate as the Albatros D.III. As light rotary fighters, they are very agile, but the Albatros can turn with them in left turns. A good pilot can even get behind them in a left turn; but never turn right with them they will beat you every time!

#### SOPWITH TRIPLANE / SOPWITH CAMEL

The Sopwith Triplane is faster, and both craft climb better than the Albatros. They are extremely agile! They should always only be attacked with good advantages on your side. You should have advantage in height, outnumber them, and be over our own territory. If you come under attack with all advantages on their side, you will not be able to run neither in a dive nor in a climb! You may try to do so, but when they stick with you, you must fight them. Your best strength is your armament. Like all Sopwith fighters, they both cannot take as much structural damage as the Albatros can. Try to hit many of your attackers. Damage their craft, so that they lose some manoeuvrability. Don't go for a single kill - go for a chance to get away from them. If you should have turned the blade and they rush off, you should only attack the highest flying craft, if you must. But beware! They are given to the enemy's best units. We have

reports, that some Triplanes may be equipped with two machine guns. So take good care and keep your eyes open!

#### SPAD VII / SPAD XIII / S.E.5a

These fighters all have powerful engines, which make them very fast and give them good climbing power. If they don't want to fight, they will just fly away or climb above you. They are very robust, so they will always be able to escape you in steep dives, which you can't follow with the Albatros' fragile lower wings! Your only chance to kill them is in a surprise attack, or when they want to fight. If the pilot is good, he will use dive and zoom tactics - you will then only be able to receive his next attack, or to fire after him, when he passes you. The worst mistake he could make is that he tries to turn-fight you. In this case you will find it possible to get behind him. Neither SPAD turns as well as the Albatros can, but the S.E.5 is equal at least to it there. Both the SPAD XIII and the Scout Experimental have 2 machine guns; so their armament is also equal to yours. All these craft can fly very high, and they do so most of the time; so you'll find it hard to surprise them in an attack from higher altitude. But if you can do so, use your speed to climb back to a safer altitude, and if you don't outnumber the enemy, leave the scene after this surprise attack.

## Landing

Landing the Albatros is rather easy, as its heaviness helps to keep a straight approach to the field, even under windy conditions. You should approach the field at treetop level with full speed. Don't touch down too hard, because she will bounce off the grass quite a bit; better keep the angle very shallow on the last 10 feet, and she will perform a straight and solid touchdown and roll-out.