# THE HISTORY OF THE AVIATION FIELD AT COLLEGE PARK

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#### INTRODUCTION

The desire of mankind to master the air can be traced from as early as the myths of Daedalus and Icarus, which shows that his attempts to soar above the earth commenced in prehistoric times.

Suetonius states that Simon Magus was killed in Rome during the reign of Nero by attempting to fly from one house to another. From that time on experimenters offered many ingenious, but for the most part impracticable flying machines. The first successful experiments in the navigation of the air took the form of hot air and hydrogen balloons, which were followed by the dirigible, a combination of a balloon with a motor and propeller.

Along with these experiments were those related to the airplane. Among the attempts to solve the problem of flight with heavier than air machines were those of Hiram S. Maxim, Otto Lilienthal, and Professor S. Langley, of the Smithsonian Institution. The most successful of these early experiments took the form of air gliders.

During the fall of 1903, the Wright brothers, Orville and Wilbur, constructed a most primitive machine in which they installed a twelve horse-power, two hundred pound gas engine. The construction required the operator to lie prone and control the front horizontal rudder with his hands and the vertical tail by a cradle in which his hips rested.

On December 17,1903, Wilbur Wright rose into the air with this machine . This was the first time that man

had ever flown in a mechanically driven heavier than air machine. Four short flights were made; the first three were barely skips above the ground, but the last covered eight hundred feet in a time of fifty-nine seconds.

In 1907, the Wright brothers offered to sell all their rights and interests to the United States Government, but the Board of Ordanance and Fortification replied that it had no money available for this purpose.

The War Department awakened to the possible military value of aircraft and on December 23,1907 issued the first airplane specifications ever drawn up by any Government.

These specifications were largely drawn by
Major George O.Squier. They required a speed of forty miles
per hour, a flight of one hour with two persons of a total
weight of three hundred and fifty pounds, fuel-carrying
capacity sufficient for a flight of one hundred and twentyfive miles, and the ability to steer in all directions
without difficulty.

On September 9,1908 the first tests were held under these specifications. They were held on the parade ground at Fort Meyer. At 7:50 A.M., Crville Wright took off and circled the grounds fifty seven times at a height of about one hundred feet. His time was just short of an hour.

That afternoon the first flight was made of over an hour.

A short time later while making a test flight with a passenger the plane crashed, killing the passenger

and injuring Wright. This stopped further tests until the following year.

July 1909 Wright returned to Fort Meyer with a new plane which was not only accepted by the government under the original agreement, but earned an additional bonus for the Wright brothers by a successful ten mile cross country flight.

The United States was now one of the first countries to own an airplane, but as yet it was of no value as they had no pilots.

## THE FIRST ARMY AVIATION FIELD

With the purchase of the Wright brothers'airplane by the United States Government, came the necessity of training pilots. The contract between the Wright brothers and the Government called for the instruction of two Army officers as pilots. For obvious reasons the drill field at Fort Meyer could not be used for training purposes, so it was necessary for the Government to acquire the use of another field.

The Wright plane was assigned to the Signal Corps for the airplane's only use seemed to be for observation.

The Signal Corps set out at once to select the site for the first training field. October 1909 a site at College Park, Maryland was selected. This field is located just east of the Baltimore and Ohio Railroad tracks and may be seen from passing trains.

The reasons for the selection of this field by
the Signal Corps were because of a large, fairly level
piece of ground that needed very little improvements to
be turned into a landing field. The soil was a grade of
gravel that dried very quickly and made possible landings
even in wet weather. The proximity of this field to
Washington also added to its choice.

The first pilot trained at this newly established field was Lieutenant Lahm, a Lieutenant in the Cavalry assigned to the Signal Corps for training. He is now a Brigadier General.

The second pilot trained by Wright was Lieutenant Humphreys who resigned at the completion of his training.

Although their part of the contract had been fulfilled, Orville Wright consented to train another officer in place of Lieutenant Humphreys. This officer was Lieutenant Foulois now a Brigadier General. Before Foulois' training was completed, Orville Wright had to sail for Europe, so Lieutenant Lahm completed the training of Lieutenant Foulois.

The training of the two officers was completed by the latter part of November 1909. The training of the two men having taken just about one month.

The Signal Corps had only the one plane that had been purchased from the Wright brothers. A short time after his training had been completed Lieutenant Foulois took this plane from College Park to San Antonio, Texas, so the College Park field was not used again by the Army for several years.

In the spring of 1911, the first appropriation ever allotted to aviation was made by Congress. On March 3, 1911 Congress appropriated one hundred and twenty-five thousand dollars for aviation.

The Quartermaster Corps built temporary hangers, and in June 1911 the first real flying school was established at College Park, with Captain Charles De Forest Chandler in command.

Three planes were bought and sent to College

Park as training planes. They consisted of one Wright, one

Curtiss and one Burgess biplane.

The actual flying started at the field July 1,

The training consisted of those officers who already knew how to fly, teaching other officers who in turn acted as instructors.

On July 7,1911 Lieutenant Arnold reached an altitude of three thousand two hundred feet.

August 21,1911 is a day to be remembered in Army aviation history, as on that day the first flight of over an hour was made by an Army aviator. The flight was made by Lieutenant Arnold and lasted one hour and two minutes, covering a distance of forty-two miles.

By September 1911 the Signal Corps planes and their pilots stationed at College Park were as follows, Lieutenant T.De.W.Milling, piloting a Burgess-Wright plane, Lieutenant Harry N.Arnold, piloting a Wright plane. These men having been trained at the Wright factory and they in turn had trained Captain Charles De F.Chandler and Lieutenant R.C.Kirtland. Captain Paul W.Beck was flying an eight cylinder Curtiss.

Lieutenant Frank M. Kennedy of the College Park
Field was to be sent as the first Curtiss pupil. A great
deal of rivalry then existed at the field between the Wright
and Curtiss men.

The longest cross country flight that had been made up to that time was made by Captain Chandler and Lieutenant Arnold from College Park to Frederick, Maryland a distance of forty-one miles, air line. Returning that night they broke up the machine landing at Gaithersburg.

The first experiment in the use of an instrument of war with an airplane was conducted at College Park, October 10,1911 when a bomb sight developed by Lieutenant R.E.Scott was tested on a Signal Corps plane. To operate this sight the bomber had to lie down between the aviator and the engine in order to look thru the telescope of the sight. In the test two bombs were dropped within six feet of a cloth target and six inches apart from an elevation of one thousand feet.

Because of the open type of planes then in use the Signal Corps flying school was transferred from College Park to Augusta, Georgia for the winter flying and flying was not resumed at College Park by the Signal Corps until April 1912.

The first real accident at College Park was June 11,1912, when Lieutenant Hazelhurst, who had been detailed from the Infantry for instruction, and Welsh, a commercial pilot were killed while testing a Type C Wright plane. Besides the men additional weights were carried, an anvil being one. The strain resulted in the wings snapping.

The second accident resulted in the death of Lieutenant Rockwell and Corporal Scott.

Flying fields were named in honor of these pioneers in Army flying.

The greatest single forward step of the airplane as an instrument of war took place during the same month at College Park. This was the first machine gun being fired from an airplane. The gun used was a Lewis gun, one of the

brought to the College Park field by Colonel Lewis the inventor and instruction in its operation given Captain Chandler on the ground. The gun was then held on the plane by Captain Chandler so that the barrell rested between his knees and the muzzle rested against the foot rest. The plane was piloted by Lieutenant Milling. A cloth target sixty feet long by five feet wide was placed on the ground. The plane was traveling at a speed of forty five miles per hour and fourteen hits were recorded out of fifty shots. The gun could not be fired for any length of time because of the manner in which it was mounted.

Colonel Lewis never accepted royalties for his gun from the United States Government.

at College Park had grown to consist of twelve officers, thirty-nine enlisted men, twelve planes, and eight hangars in comparison with two officers, six enlisted men and one plane in 1909 and 1910.

Still further developments were made with the airplane as an instrument of warfare, when the airplane was used for the first time in the United States in connection with control of artillery fire. Tests were carried on at College Park from November 5,1912 to November 13,1912. Three methods were used, radio, dropping cards and smoke signals.

During the latter part of 1912 the first so called "Military Planes" were received at College Park.

They were speed-scout single-seater type having a cruising radius of one hundred miles at a speed of sixty-five miles per hour, and two-seater scout type with forty-five miles per hour speed, three hours flight endurance and a weight carrying capacity of four hundred and fifty pounds. The machines previously used had been the ordinary commercial planes, lacking power, speed and carrying capacity necessary for military use.

The flying school was ordered south for the winter of 1912, but did not return to College Park in the summer of 1913, as the Air Service branch of the Signal Corps was sent to Texas for duty on the border.

Why the Signal Corps did not return to College Park after the trouble on the border had quieted down I could not ascertain, but no record can be found of the College Park field being again used by the government until 1918, when the government again took over the field and established the first air mail station running mail from New York to Washington.

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# EARLY AVIATION COMPANIES AT COLLEGE PARK

Many early experimenters and aeroplane companies made use of the College Park field at the same time the Signal Corps was using it.

About the first of these companies was the one formed by Dr.Christmas, which used the hangers left by Wright. Very little is known about this company except that it was one of the pioneer aviation companies.

The best known companies that operated at College Park were the Rex Smith Aviation Company and the Washington Aeroplane Company. Possibly the best known of the two was the Washington Aeroplane Company. Mr J. Lee Simmons was the president of this company and the builder of the Simmons Propeller. Mr Berliner, who is well known in Washington at the present time in connection with Hoover Field was also interested in this company.

The engines used in the planes built by the Washington Aeroplane Company were built by the Gyro Motor Company of Washington.

Possibly the best known plane built by this company was the Columbia Monoplane, the first monoplane built in America. It had a spread of twenty nine feet, weighed five hundred and thirty pounds, had a twenty horsepower engine and developed a speed of seventy miles per hour.

On May 24,1912 a new duration record was set by Paul Peck of four hours, twenty-three minutes and fifteen

seconds. It was made in the Miss Columbia a Washington
Aeroplane Company biplane with a seven cylinder, fifty
horse-power Gyro engine. This plane was given its initial
tests at College Park.

Among the first of the enclosed cockpit or

Nacelle type of planes built in America were those built

by the Washington Aeroplane Company and tested at College

Park.

A record was made in aeroplane building by

Mr J.Lee Simmons of this company when he built a special

biplane, similar to the Curtiss June Bug in twenty one days

including the day of signing the contract and of shipping

the plane. The plane was sent to the Crystal Palace

Exposition.

On June 22,1912 there were four planes in the air at one time over the field, the planes being a Wright, a Burgess, a Curtiss and a Columbia monoplane. How unusual this was at this time is shown by a quotation from the Washington Star as follows, "unusual sight for the aviation field".

Among the well known fliers of that day who flew at College Park were in addition to Paul Peck, Lincoln Beachey who flew a Wright Gyro, Oscar Brindley, one of the first licensed Wright fliers who flew a Columbia machine, Harry A Orme who flew a Wright plane with a four cylinder motor cycle engine and Cecil Peoli, the first man to fly across the Andes in SouthAmerica. Peoli was killed while testing a machine of his own design assembled for him by

the Washington Aeroplane Company. The reason for his crash is laid to the fact that a different engine was installed from the one that the plane was designed for causing the plane to be out of balance.

Another man who did a great deal of work a College Park is Rex Smith.Before entering the aviation field he was an amateur trick bicycle rider and was the first man to ride a bicycle down the Capitol steps.

He started building his first plane about April 1910 and completed it about November the same year. It was a single surfaced headless biplane of the Curtiss type and used an Emerson one hundred and fifty horse-power engine. It was flown by Antony Jannus, who also flew for the Washington Aeroplane Company.

Rex Smith finished his second plane in the spring of 1911. Soon after its completion it was taken on an exhibition trip by Paul Peck. This machine had a total weight with gas, oil and operator ready for flight of one thousand pounds. It left the ground at a speed of thirty-five miles per hour and had a speed in flight of fifty-five miles per hour. It was capable of carrying three hundred pounds of passengers or freight.

The third machine built by Smith was finished about October 1911 and was practically a duplicate of the second machine.

Paul Peck was one of the most important test pilots that flew at College Park. He taught himself to fly in less than ten days. He started to learn July 20,1911 and nine days

later was a bona fide pilot.

On August 6,1911 he flew from College Park to
Washington circled the dome of the Capitol, flew down
Pennsylvania Avenue, around the Washington Monument and over
into Virginia and then back to the speedway where he landed
completeing the flight in half an hour. The next morning he
flew back to College Park.

He flew only about two years, being killed September 11,1913 while flying a Columbia plane. This was a long life for a test pilot at that time.

In addition to these successful companies many small companies were formed at College Park from time to time but none of them were very successful.

Flying progressed smoothly at College Park until the entrance of the United States into the World War when all commercial flying had to be abolished and all civilian fliers were called to the colors.

College Park was not used again for flying until taken over by the government for an air mail station.

The World War brought the early history of the College Park Aviation field to a close.

### CONCLUSION

I have endevored to give in this thesis a brief history of the aviation field at College Park from its establishment to the World War, bringing out the most important events that occurred at the field, or any incidents of interest that happened to men or planes connected with the field in any capacity.

There are periods of time which may appear not to have been covered, but it is either that nothing can be found covering this time or the events that took place were not of sufficient importance to be given a place in this thesis.

From the World War to the present day forms a new chapter in the history of the College Park field and there was not sufficient time to cover it in this thesis.

## BIBLIOGRAPHY

Lieutenant Colonel Charles De Forest Chandler

Commander of the Signal Corps Flying School

College Park, Md.

Mr J.Lee Simmons

President of the Washington Aeroplane Company
College Park, Md.

Mr Moore

Washington Aeroplane Company

and

Aeornautical Division

Department of Commerce

Early copies of "Aeronautics"

Army Air Service Library

"Textbook of Military Aeronautics"

Henry Woodhouse

Army Air Service Library

"The American Air Service"

Arthur Sweetser

Army Air Service Library

"History of U.S. Naval Aviation"

Bureau of Aeronautics

Navy Department



View of the Signal Corps Aviation Field, College Park, Md., 1912, taken from an Army machine. (From "Flying.")



The Hangars at the U.S. Army Aviation School at College Park, Md., 1911.

