

### Museum planes still flying

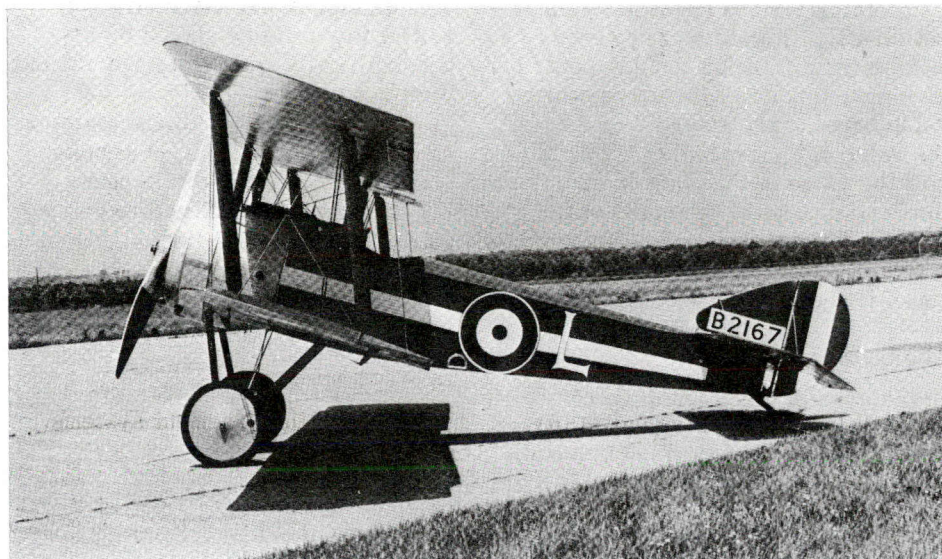
The National Aeronautical Collection, part of the National Museum of Science and Technology, was represented in the biggest airshow and aviation exhibition ever held in Eastern Canada recently. On September 4, 5 and 6 a *Sopwith Pup* and a *Nieuport 17*, exact reproductions of two fighter aircraft of the First World War, were flown in the Spectair '76 program at the Institut Aerotechnique in Montreal.

The National Aeronautical Collection, comprising over 90 aircraft and 200 engines, was originally formed in 1964 from the collections of the Royal Aviation Museum. It became part of the National Museum of Science and Technology in spring 1967.

Aircraft from the Museum's National Aeronautical Collection have been flown in air shows as far east as Summerside, Prince Edward Island, and as far west as Abbotsford, British Columbia, illustrating the technology of the airplane as it was 60 years ago.

The two aircraft in Spectair '76, the *Nieuport 17* and the *Sopwith Pup*, both of which are exact full-scale reproductions, are powered with original rotary engines of the First World War period. They were flown by two test pilots, Paul Hartman who is now with the National Research Council, and George Neal, Chief Production Test Pilot for de Havilland Aircraft of Canada.

The *Nieuport 17* is finished in the Flying Corps markings of Billy



*The Sopwith Pup*

Bishop's aircraft B1566, in which he won the Victoria Cross for his attack on Esnes airfield on June 2, 1917. The plane has a wing span of 26 feet and a length of 19 feet 7 inches. It weighs 1,252 pounds fully loaded, and is powered with an original 110 hp. Le Rhone rotary engine. It can fly for two hours and has a maximum speed of 107 mph at 6,500 feet.

The *Sopwith Pup*, also an exact reproduction, is powered with an original rotary engine. It is an ancestor of the *Sopwith Triplane* and the more famous *Sopwith Camel*. The name "Pup" was applied by the pilots, who considered it to be the offspring of the larger 2-seat *Sopwith 1½ Strutter*. The name stuck despite officialdom's insistence that the aircraft be known by its as-

signed designation *Sopwith Scout*. The *Sopwith Pup* has a wing span of 26 feet, 6 inches and is 19 feet, 3¾ inches long. It weighs 1,225 pounds fully loaded, and is powered with an 80 hp. Le Rhone rotary engine. It can fly for three hours and has a maximum speed of 106 mph at 8,500 feet.

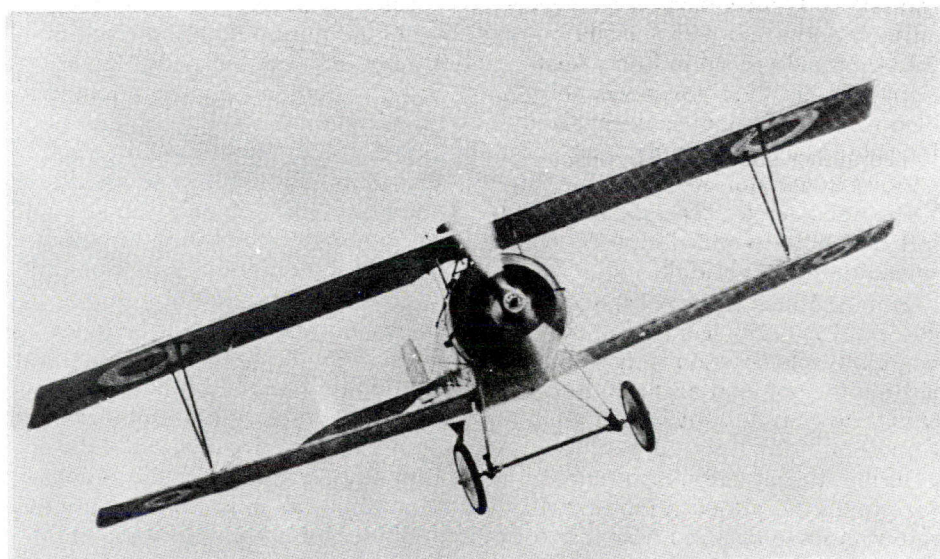
### Glimmer of hope for cardiac victims

*Québec en bref*, May 1976 issue, reports that a researcher and doctor of physics Eloi Bolduc has invented a new mathematical procedure intended for use in atomic physics but which is now seen to have possible applications in such fields as astrophysics, molecular biology, radiology, the medical sciences, chemistry, and the social sciences — areas where information is studied in numerical form and where data are shown by means of curves on charts.

Of particular interest is that this scientific discovery may save the lives of many cardiac patients by enabling doctors to detect latent signs well before a possibly-fatal attack occurs.

#### Mathematical method

The method, called "smoothing the curves", is simple enough to be applied to all data processed by computer or even by a "mini-computer". It is explained as follows: by straightening out certain curves using Bolduc's new mathematical method, data which were almost unnoticeable before the



*The Nieuport 17*