

Historica Canada Education Portal

William Wallace Gibson

Overview

This lesson is based on viewing the William Gibson biography from [The Canadians](#) series. It explores the accomplishments of Gibson, who, at the beginning of the twentieth century, became the first Canadian to study, design, build, and fly his own aircraft in Canada.

Aims

In a variety of role-playing and writing activities, students will examine the life of William Gibson to discover the roots of his obsession with flying and they will assess his contributions to aviation history.

Background

Like hundreds of others at the turn of the century, W.W. (Billy) Gibson dreamt of flying. At the age of 12, his passion to fly resulted in various experiments such as a basket carrying a gopher, attached to his kite. While the Wright brothers were experimenting with their heavier than air airplane, Billy was busy building a four cylinder, air-cooled, engine for his aircraft design. He did this in the privacy of his farm about 4 miles south of Balgonie, Saskatchewan.

To avoid ridicule, he tested the flying ability of his model airplanes in the early hours of the morning. He would conduct such experiments by releasing his models from the roof of the highest building in town.

From Balgonie, he moved to Victoria and built another Canadian first: an aircraft engine that weighed 210 lbs and generated 40-60 horsepower. This engine is now in the collection of the Canadian Aviation and Space Museum.

Risking his life - physically and financially - he continued his flying experiments in Victoria. He redesigned his twin plane to a multi-plane in order to get better lift.

When John McCurdy, Glen Curtis, Thomas Selfridge, and Alexander Graham Bell were pursuing their flying interests as members of the Aerial Experiment Association of Nova Scotia in 1907-8, Billy was busy experimenting with his machines in Victoria. One year after McCurdy's successful flight in 1909, Billy succeeded in a short flight in September 1910 near Mount Tolmie, Victoria.

In 1911, he moved to the outskirts of Calgary and his assistant demonstrated the capability of his machine with a mile long flight. Unfortunately he wrecked his plane on landing. He later moved to San Francisco, California where he went into gold mining and the manufacturing of mining machinery. Being first an inventor, he invented mining machinery and exported it to other countries. Nevertheless, his contributions to the early days of aviation ensure his place in aviation history.

Activities

Time Allowance: 1 - 4 hours

Procedures:

1. William Wallace Gibson was born in Scotland and came to Canada when he was seven. Have your students make a chart listing reasons why Gibson's parents wanted to immigrate to Canada, and what factors they may have considered in making this kind of decision. Divide the class into groups of three and let them brainstorm to create lists of the Pro's and Con's of immigrating to Canada. When the groups have created their lists, have them present to each other and post the charts on a wall or bulletin board.

2. In 1904 Gibson began experimenting with paper models. Without any knowledge of flight, he made many observations that would eventually lead him to design, build, and fly the first aircraft in Canada. Gibson was really a scientist. What kinds of observations would he have made? Using paper, tissue paper, toothpicks, straws, popsicle sticks etc. have students work in teams of 2 or 3 to design and build their own model aircraft. Call on them to fly their paper models and make at least three relevant observations.

3. Gibson was influenced in his youth by many factors, including:

- his parents' dream of fulfillment and adventure
- the vastness of this productive new land
- Aboriginal Canadians
- his study of birds, wind, and kites
- the Wright brothers
- modern technology such as the automobile

Work with the students to create a list on the chalkboard of the major influences in Gibson's life. Let the students choose one or two of these influences and then, assuming the persona of Gibson, have them write a journal entry discussing his dream and what he wanted to achieve. They should create a title for this journal entry that reflects his ideas and feelings. Call on students to volunteer to read their journal entry.

4. Gibson flew his models in the early hours of the morning because he didn't want others to discover what he was doing. The video discusses how this fear was a large part of his life as an inventor. Why might Gibson have feared being exposed? Have students make a chart of the people Gibson feared would find out he wanted to fly. Have them include: the police, bankers, family members, neighbours, and hardware customers. Have students describe the particular fear pertaining to each of these people. Then rank the people from 1 to 6 according to whom Gibson feared the most, with 1 as most feared and 6 as the least.

5. In 1910 there was a lot of media hype. Everyone was excited about the potential, and then successful flight of the Birdman. Have your students act as reporters and write a newspaper article, either before or after the much anticipated flight! They might include pictures of the plane, the flight and the crash landing. Have fun and use tea bags to stain the articles to give them an aged look.

6. Only thirty-four years old, and with no flying experience, Gibson became the first Canadian to fly an airplane that he had constructed. Many years later he wrote a poem about the event. Ask your students how Gibson might feel. Have students work in pairs. Cut the following list of topics up, and drop all of the titles in a hat. Have the teams draw a title (an event in Gibson's life) and write a short description, list, or poem

about this time in his life. Then connect all of the writings about these events to create a timeline to be displayed in the classroom.

- Born in Scotland
- Models and Observations
- Immigrates to Canada at age seven
- The Media catches on
- Dreams of Flying
- The Flight
- Kites and the Wind
- The Crash Landing
- A Hardware Business
- A Gold Mine
- A Railroad Contract
- A Promise (to his wife never to fly again)

8. Gibson's contributions to the Canadian landscape, first in flying, and secondly in the mining industry might have changed the way people viewed him. Have students develop the following lists:

Before people might have thought he was...

(e.g. crazy, a dreamer)

After people might have thought he was...

(e.g. a hero, a genius)

Required Materials:

The second activity requires some basic art materials for building model airplanes. You will need a selection of paper, toothpicks, straws, popsicle sticks etc.

Resources

[William Wallace Gibson Worksheet](#)

[William Wallace Gibson - The Canadian Encyclopedia](#)

[Aviation - The Canadian Encyclopedia](#)