

**Name and Address of the Organization:**

Historic Flight Foundation  
10719 Bernie Webber Drive  
Mukilteo, WA 98275

SUMMARY DESCRIBING THE PROJECT
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After a year of planning and research, Historic Flight Foundation and three partner school districts (Mukilteo, North Shore Academy, and Archbishop Murphy) are creating an innovative site-based STEM (science, technology, engineering, and math) program that will serve 1500-2000 students in its first year and grow to serve 3500 and more schools annually by year three.

Classes from grade schools and middle schools will participate in a two-step program in which HFF Docent Educators visit the classroom for a preliminary program which is followed by a field trip to the Historic Flight Foundation (at Paine Field) where they will finish their instructional module incorporating the artifacts into real world learning situations. Each class will receive approximately five hours of instruction focused on 1-2 of twelve STEM modules that align with state mandated teaching requirements for STEM learning.

The 2013-2014 school year will be the field test for the program to refine and improve materials teaching strategies, determine what age groups will benefit most, and create a shared cost structure that the schools can sustain.

At the conclusion of their second class, students will receive an orientation to the aerospace industry in Washington State with an emphasis on how hundreds of suppliers contribute to the development and maintenance of Boeing aircraft. In addition to helping students gain competence in specific STEM subjects, the programs are created to excite and inspire young people to continue to seek learning opportunities in science, math, engineering, and technology.

DESCRIPTION OF THE HISTORIC FLIGHT FOUNDATION
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The Historic Flight Foundation, located at Paine Field in Mukilteo, WA is a museum and educational center committed to preserving aviation history, flying a comprehensive collection of historic aircraft, and using the wonder and excitement of flight to promote STEM education among young people from throughout the Puget Sound corridor.

Founded in 2003 by John Sessions, the organization brings together pilots, engineers, mechanics, 9Ang oh.n

those who built and flew these scientific marvels, and how they advanced aircraft and flight technology.

Historic Flight Foundation educates, entertains, and inspires over 500,000 people a year who visit the museum at Paine Field; attend special flight weekends, and who see HFF's flying fleet at events and air shows during the year.

HFF is operated by a staff of 5 full and part-time paid personnel and 200 volunteers, many with extensive experience and background in aviation.

#### HISTORIC FLIGHT FOUNDATION ACTIVITIES AND PROGRAMS

- Historical presentations – Lectures, multi-media shows, first person accounts of historic events
- Pilot training – Assisting pilots to qualify on vintage aircraft and gain flying hours
- Vintage aircraft maintenance – Teaching mechanics how to repair and maintain vintage and historic aircraft artifacts
- General education venues for others – Exhibits and Docents who will help visitors to receive a comprehensive educational experience during their visit to the facility
- Management retreats—A visually interesting full service venue for regional corporations to retreat and meet
- Community gatherings – a facility that can accommodate groups of up to 500 and available for community gatherings and meetings
- Air show performance – A group of vintage aircraft that appear in air shows throughout the United States and Canada
- Movie performance – a venue for members and residents of the area to watch aviation themed classic films often accompanied by appearances of those involved either in the event portrayed or in the making of the film

## POPULATIONS NOW SERVED BY HISTORIC FLIGHT FOUNDATION

- Veterans and their families visiting to see the aircraft from their time of service and to share their own stories with their loved ones.
- Aerospace engineering professionals seeking close contact with historic artifacts to better design and build current adaptations.
- History buffs seeking to learn more about the development of modern aviation and the people who made significant

describe it in their own words, and have an understanding how the concepts and theories apply to real world problems and products. Students will comp

3. Develop a curriculum based around educational requirements and objectives identified by the schools as critical for their STEM learning strategy.
4. Ongoing recruitment of schools and teachers to participate throughout the year.
5. Creation of a survey tool or post test to measure student comprehension.
6. Development of a Docent Educator training manual and recruitment process
7. Recruit and train at least eight Docent Educators
8. Assign, manage, and supervise Docent Educators
9. Perform individualized follow up with teachers (during the beta test phase) to get feedback on the program for continuous project improvement

HFF will continue to seek business sponsorships for the program or tied to specific schools. Foundations will be approached for funding. Individuals will be approach to underwrite the financial aid component to assist schools with low income populations.

The large local aerospace community has much