

How students in America are affected by limiting the use of Unmanned Air Vehicles in the National Airspace System

100,000 High Paying Technology Jobs in the USA in Jeopardy of being Filled in Time

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Exton, PA (July 29, 2013) – One wonders if our President, Senators, Representatives, State and Local officials fully understand why commercial access to the National Airspace System (NAS) for companies providing Unmanned Aircraft Systems (UAS), is vital to the growth of America? There are many companies, groups, organizations and individuals affected by this delay in action, but one in particular is a current [STEM](#) student in grades K-12.

Throughout the recent past, our governmental leadership has taken a strong position with respect to supporting education for Science, Technology, Engineering and Mathematics (STEM). President Obama declared during The White House Science Fair in April of 2013, that:

“One of the things that I’ve been focused on as President is how we create an all-hands-on-deck approach to science, technology, engineering, and math... We need to make this a priority to train an army of new teachers in these subject areas, and to make sure that all of us as a country are lifting up these subjects for the respect that they deserve.”

We know that the Obama Administration stands committed to providing students at every level with the skills they need to excel in the high-paid, highly-rewarding fields of science, technology, engineering, and math (STEM).

However a question arises around what to do with these students after they have been taught the importance of this STEM initiative and have prepared themselves by completing a formal education and are now looking for employment.

A key and growing area that can support the employment of these individuals is the commercial use of Unmanned Aircraft Systems (UAS) within the National Airspace System (NAS) for such worthwhile activities as agriculture, bridge inspection, resource management, forestry and Search & Rescue, to highlight a few.

According to a study done in March by the Association for Unmanned Vehicle Systems International (AUVSI), the unmanned aircraft industry is poised to create more than 70,000 new American jobs in the first three years following the integration of Unmanned Aircraft Systems (UAS) into U.S. National Airspace System (NAS). Furthermore, beyond the first three years, the study projects that more than 100,000 new jobs will be created by 2025, supporting an almost \$10B market.

However, recent controversy surrounding the flying of “drones” in the US has negatively impacted access to the National Airspace System (NAS). Without the ability for the industry as a whole to gain regulated access to the NAS in the next two years, any further development of the technology and their applications will be curtailed and thereby reduce the number of jobs created by domestic companies.

It is openly understood that in order for the general public to support this domestic access to the NAS, certain conditions must be instituted. Foremost is the exclusive use of qualified, certified, registered and regulated pilots to insure that operating conditions coincide with that used for private pilot operation. For this reason, each pilot must be formally trained and follow the existing private pilot requirements currently imposed by the FAA, which includes filing a flight plan. This insures that we know who, what and where a UAS is operating. Similarly, the health of the pilot must be considered, and all pilots must undergo yearly medicals, also currently mandated by the FAA. Similarly the aircraft itself must be certified as air worthy and meet the guidelines imposed on traditional manned aircraft. By combining these elements, all unmanned aircraft will be operated within a structured and documented safe operating environment. To complete the process, it is also important that the pilots be taught the key aspects of individual privacy regulations thus insuring compliance with laws already in effect.

Opening the NAS and championing these guidelines requires strong leadership and bi-partisan support. The advantage of getting behind these initiatives and streamlining the process positively impacts the future generation of STEM students seeking work. Any long-term delays will result in the loss of sustainable economic growth and a reduction in the world technological leadership of the United States of America, in this market. The President, Congress, State and Local Officials are urged by the members of The Cluster for Unmanned Vehicles and Robotics (CUVR) to consider these aspects when future decisions and actions arise relative to Unmanned Aircraft Systems (UAS) in the National Airspace System (NAS).

About CUVR

[The Cluster for Unmanned Vehicles and Robotics \(CUVR\)](#) is a grass-roots, member-driven, economic development organization (EDO) that supports all forms of locomotion including ground, air and marine vehicles coupled with a broad spectrum of robotic initiatives including medical, military, personal, industrial and consumer applications. Working closely with industry, CUVR provides its members with well-defined integrated business opportunities that meet an existing economic

demand. CUVR works with colleges and universities, individuals, industry and other regional economic development organizations (EDO) for transitioning commercial products that are identified, designed, prototyped, engineered, produced, marketed and sold by member companies. CUVR supports economic growth by seeking out existing targeted research, supporting new company formation in the region, endorsing corporate growth and fostering technology specific start-ups. Funding comes from individual and corporate memberships, public federal, state and local programs, and private and corporate organizations support. CUVR champions efforts directed towards academic networking and K-12 education focusing on current STEM activities. In the future, CUVR will provide, Permanent and Traveling Exhibits, Training, Entrepreneurship Support and Advocacy for its members.