

February 24, 2012

Michael P. Huerta  
Acting Administrator  
United States Federal Aviation Administration  
800 Independence Avenue, SW  
Washington, D.C. 20591  
Facsimile (202)-267-5289

Dear Administrator Huerta,

We the undersigned consumer rights, human rights, technology, and civil liberties organizations, members of the EPIC Advisory Board, and members of the general public submit this Petition to the Federal Aviation Administration (“FAA”) to urge the Agency to conduct a rulemaking to address the threat to privacy and civil liberties that will result from the deployment of aerial drones within United States.<sup>1</sup> The FAA Modernization and Reform Act of 2012 provides a timely opportunity for you to address this critical question.<sup>2</sup>

#### Drone Use in the United States is Increasing

A “drone,” or “unmanned aircraft,” is an aerial vehicle designed to fly without a human pilot onboard. Current regulations only permit civil organizations to operate drones within the United States with an “experimental” designation.<sup>3</sup> Despite this limitation, many individuals have found the means to operate drones within the course of business.<sup>4</sup>

The Bureau of Customs and Border Protection (“CBP”) currently operates nine drone vehicles, which were procured specifically to monitor the United States borders.<sup>5</sup> In 2011, CBP allowed a local law enforcement unit in North Dakota the use

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<sup>1</sup> This is a petition under the Administrative Procedure Act. 5 U.S.C. § 553(e) (2011).

<sup>2</sup> FAA Modernization and Reform Act of 2012, Pub. L. 112-95 (2012), *available at* <http://www.gpo.gov/fdsys/pkg/BILLS-112hr658enr/pdf/BILLS-112hr658enr.pdf>.

<sup>3</sup> Unmanned Aircraft Operations in the National Airspace System, 14 C.F.R. 91 (2007), *available at* <https://www.federalregister.gov/articles/2007/02/13/E7-2402/unmanned-aircraft-operations-in-the-national-airspace-system#p-12> (“Under FAA policy, operators who wish to fly an unmanned aircraft for civil use must obtain an FAA airworthiness certificate the same as any other type aircraft. The FAA is currently only issuing special airworthiness certificates in the experimental category.”).

<sup>4</sup> Drones: Who is Watching You (ABC News 2012), *available at* <http://news.yahoo.com/video/us-15749625/drones-who-is-watching-you-28326842.html>.

<sup>5</sup> Press Release, United States Bureau of Customs and Border Protection, CBP Receives Fourth Predator-B in Arizona; Agency Now Operates 9 Unmanned Aircraft (Dec. 27, 2011), *available at* [http://www.cbp.gov/xp/cgov/newsroom/news\\_releases/national/2011\\_news\\_archive/12272011.xml](http://www.cbp.gov/xp/cgov/newsroom/news_releases/national/2011_news_archive/12272011.xml).

of a drone within the unit's normal operations.<sup>6</sup> This incident represented the first occasion where drone use resulted in an arrest of a U.S. Citizen.<sup>7</sup>

Many law enforcement agencies are acquiring drones that permit new forms of aerial surveillance.<sup>8</sup> In 2011, the Miami-Dade Police Department purchased a Honeywell T-hawk with funds from the federal stimulus.<sup>9</sup> Later that year, The Montgomery County Sheriff's Office in Texas purchased a ShadowHawk with a grant from the Department of Homeland Security ("DHS").<sup>10</sup> Drones are also used by police in South Carolina and Colorado, and drones may soon be used for surveillance in New York City.<sup>11</sup> Experts estimate that up to 30,000 new drones could be launched in the United States in the next decade.<sup>12</sup>

### Drones Pose Substantial Threats to Privacy

Drones greatly increase the capacity for domestic surveillance.<sup>13</sup> Gigapixel cameras used to outfit drones are among the highest definition cameras available, and can "provide real-time video streams at a rate of 10 frames a second."<sup>14</sup> On some drones, operators can track up to 65 different targets across a distance of 65 square miles.<sup>15</sup> Drones may also carry infrared cameras, heat sensors, GPS, sensors

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<sup>6</sup> Brian Bennett, *Police Employ Predator Drone Spy Planes on Home Front*, Los Angeles Times (Dec. 10, 2011), <http://articles.latimes.com/2011/dec/10/nation/la-na-drone-arrest-20111211>.

<sup>7</sup> *Id.*

<sup>8</sup> Ana Campoy, *The Law's New Eye in the Sky; Police Departments' Use of Drones is Raising Concerns Over Privacy and Safety*, Wall Street Journal (Dec. 13, 2011), <http://online.wsj.com/article/SB10001424052970204319004577088891361782010.html> ("As of September, there were 285 active permits requested by 85 government groups, including public universities, federal law enforcement agencies, and police departments.").

<sup>9</sup> *Drone May be Coming to Miami-Dade*, WSVN-TV (Jan. 6, 2011), <http://www.wsvn.com/news/articles/local/21003198189967/>; *The Law's New Eye in the Sky*, *supra* note 8.

<sup>10</sup> Clay Dillow, *A Texas Sheriff's Department is Launching an Unmanned HeloDrone that Could Carry Weapons*, PopSci (Nov. 3, 2011, 8:27 AM), available at <http://www.popsci.com/technology/article/2011-11/texas-sheriffs-department-launching-unmanned-helo-could-carry-weapons>.

<sup>11</sup> *The Law's New Eye in the Sky*, *supra* note 8; Brian Naylor, *Look, Up in the Sky! It's a Drone, Looking at You*, NPR (Dec. 5, 2011), <http://www.npr.org/2011/12/05/143144146/drone-technology-finding-its-way-to-american-skies>.

<sup>12</sup> Lynn Herman, *30,000 Drones in American Skies, Civil Liberties in Jeopardy*, Digital Journal (Feb. 13, 2012), <http://www.digitaljournal.com/article/319564>. One report attributes the number to the FAA itself. Shaun Waterman, *Drones over U.S. get OK from Congress*, The Washington Times (Feb. 7, 2012), <http://www.washingtontimes.com/news/2012/feb/7/coming-to-a-sky-near-you/>.

<sup>13</sup> See Jay Stanley and Catherine Crump, *Protecting Privacy From Aerial Surveillance: Recommendations for Government Use of Drone Aircraft 4-6, 10-13* (American Civil Liberties Union 2011), available at <http://www.aclu.org/files/assets/protectingprivacyfromaerialsurveillance.pdf>.

<sup>14</sup> *US Army Unveils 1.8 Gigapixel Camera Helicopter Drone*, BBC News Technology (Dec. 29, 2011, 1:11 PM), <http://www.bbc.co.uk/news/technology-16358851>.

<sup>15</sup> *Id.*

that detect movement, and automated license plate readers.<sup>16</sup> In the near future these cameras may include facial recognition technology that would make it possible to remotely identify individuals in parks, schools, and at political gatherings.<sup>17</sup>

In addition, drones present a unique threat to privacy. Drones are designed to undertake constant, persistent surveillance to a degree that former methods of aerial surveillance were unable to achieve.<sup>18</sup> Also, “by virtue of their design, their size, and how high they can fly, [drones] can operate undetected in urban and rural environments.”<sup>19</sup>

The increased use of drones poses an ongoing threat to every person residing within the United States.<sup>20</sup> Companies are developing “paparazzi drones” in order to follow and photograph celebrities.<sup>21</sup> Private detectives are starting to use drones to track their targets.<sup>22</sup> Google, inc. has deployed street-level drones in other countries to supplement the images of Street View.<sup>23</sup> Criminals and others may use drones for purposes of stalking and harassment.<sup>24</sup>

The consequences of increased government surveillance through the use of drones are even more troubling. The ability to link facial recognition capabilities on drone cameras to the FBI’s Next Generation Identification database or DHS’ IDENT

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<sup>16</sup> Customs and Border Protection Today, Unmanned Aerial Vehicles Support Border Security (July/Aug. 2004), available at [http://www.cbp.gov/xp/CustomsToday/2004/Aug/other/aerial\\_vehicles.xml](http://www.cbp.gov/xp/CustomsToday/2004/Aug/other/aerial_vehicles.xml).

<sup>17</sup> Clay Dillow, *Army Developing Drones that Can Recognize Your Face From a Distance*, PopSci (Sept. 28, 2011, 4:01 PM), <http://www.popsci.com/technology/article/2011-09/army-wants-drones-can-recognize-your-face-and-read-your-mind>.

<sup>18</sup> See Noel McKeegan, *Raven UAV Demonstrates 30-hour Persistent Surveillance*, GizMag (Apr. 2, 2009, 6:35 AM), <http://www.gizmag.com/raven-uav-demonstrates-30-hour-persistent-surveillance/11385/>.

<sup>19</sup> Jennifer Lynch, *Are Drones Watching You*, Electronic Frontier Foundation (Jan. 10, 2012), available at <https://www.eff.org/deeplinks/2012/01/drones-are-watching-you>.

<sup>20</sup> See M. Ryan Calo, *The Drone as a Privacy Catalyst*, 64 Stan. L. Rev. Online 29 (2011), available at <http://www.stanfordlawreview.org/online/drone-privacy-catalyst>.

<sup>21</sup> Clay Dillow, *Plan for Celebrity-Stalking Paparazzi Drone Reveals New Roles for Unmanned Civilian Aircraft*, PopSci (Nov. 11, 2010, 12:01 PM), <http://www.popsci.com/technology/article/2010-11/paparazzi-drone-reveals-emerging-roles-civilian-drone-aircraft>.

<sup>22</sup> See Neal Ungerleider, *Unmanned Drones Go From Afghanistan to Hollywood*, FastCompany (Feb. 15, 2012), <http://www.fastcompany.com/1816578/unmanned-drones-go-from-afghanistan-to-hollywood>.

<sup>23</sup> *Micro Drones for Google?*, Google Blogoscoped (Aug. 7, 2010), <http://blogoscoped.com/archive/2010-08-07-n43.html>, citing to von Sebastian Matthes and Bernd Mertens, *Zivile Drohnen für Google*, Wirtschafts Woche (Aug. 7, 2010), <http://www.wiwo.de/technologie/luftueberwachung-zivile-drohnen-fuer-google/5156046.html>.

<sup>24</sup> W.J. Hennigan, *Idea of Civilians Using Drone Aircraft May Soon Fly with FAA*, Los Angeles Times (Nov. 27, 2011), <http://articles.latimes.com/2011/nov/27/business/la-fi-drones-for-profit-20111127>; *Plan for Celebrity-Stalking Paparazzi Drone Reveals New Roles for Unmanned Civilian Aircraft*, *supra* note 21.

database, two of the largest collections of biometric data in the world,<sup>25</sup> increases the First Amendment risks for would-be political dissidents. In addition, the use of drones implicates significant Fourth Amendment interests and well established common law privacy rights.<sup>26</sup> With special capabilities and enhanced equipment, drones are able to conduct far-more detailed surveillance, obtaining high-resolution picture and video, peering inside high-level windows, and through solid barriers, such as fences, trees, and even walls.

### FAA Regulation of Drones

The FAA is required to “promote safe flight of civil aircraft.”<sup>27</sup> The FAA Modernization and Reform Act requires the FAA to, within a certain amount of time, “develop a comprehensive plan” to implement drones into civil commerce.<sup>28</sup> The plan must “define the acceptable standards for operation” for civil drone use.<sup>29</sup> In addition, the FAA is required to “provide guidance on a public entity’s responsibility when operating an unmanned aircraft.”<sup>30</sup> Before May 14, 2012, the FAA must “simplify the process” by which government entities operate drones in the national airspace.<sup>31</sup> The FAA should also assess the privacy problems associated with the highly intrusive nature of drone aircraft, and the ability of operators to gain access to private areas and to track individuals over large distances.<sup>32</sup>

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<sup>25</sup> See *Next Generation Identification*, Federal Bureau of Investigation, [http://www.fbi.gov/about-us/cjis/fingerprints\\_biometrics/ngi](http://www.fbi.gov/about-us/cjis/fingerprints_biometrics/ngi) (last visited Feb. 17, 2012); Elizabeth Montalbano, *DHS Expands US-VISIT Biometric Capabilities*, Information Week (Dec. 22, 2011, 8:00 AM), <http://www.informationweek.com/news/government/security/232300942>.

<sup>26</sup> Many state governments have enacted legislation to protect individuals from the type of persistent surveillance that drones would facilitate. Sometimes called “Peeping Tom” laws, each state prohibits the intrusion upon a person’s seclusion. See *Elements of an Intrusion Claim*, Citizen Media Law Project, <http://www.citmedialaw.org/legal-guide/elements-intrusion-claim> (last visited Feb. 21, 2012) See also, e.g. Cal. Civ. Code § 1708.8 (West 2011); Neb. Rev. Stat. § 20-203 (2011). Unlike trespass laws, intrusion does not require a physical trespass. *Id.* This is important since the United States has established that a person has no property rights in the airspace over their property. See *U.S. v. Causby*, 328 U.S. 256 (1946); See also 49 U.S.C. § 40103 (2011) (“The United States Government has exclusive sovereignty of airspace of the United States.”). However, there is a possibility that certain drone operators may be guilty of common law trespass, particularly in regard to small-sized drones flying at low altitudes. *Id.* Many states have laws with even higher levels of privacy protection, such as California’s regulation on the use of telephoto lenses to photograph private property. Cal. Civ. Code § 1708.8 (West 2011).

<sup>27</sup> 49 U.S.C. § 44701(a).

<sup>28</sup> FAA Modernization and Reform Act § 322(a)(1).

<sup>29</sup> FAA Modernization and Reform Act § 322 (a)(2)(B)(i).

<sup>30</sup> FAA Modernization and Reform Act § 324(a)(4).

<sup>31</sup> FAA Modernization and Reform Act § 324(c)(1).

<sup>32</sup> See, e.g., Vehicle Safety Communications – Applications VSC-A 17 (National Highway Traffic Safety Administration 2011), available at <http://www.nhtsa.gov/DOT/NHTSA/NVS/.../2011/811466.pdf> (Stating, “privacy of vehicle owners will need to be a primary component of DSRC-based vehicular communication.” NHTSA is tasked with carrying out safety programs related to highways. *This is NHTSA: People Saving People*, National Highway Traffic Safety Administration, <http://www.nhtsa.gov/About> (last visited Feb. 22, 2012)); See also Caroline Broder, *Privacy Concerns Accompany Push for EMRs*, Healthcare IT News (Feb. 28, 2005), <http://healthcareitnews.com/news/privacy-concerns-accompany-push-emrs> (“Ensuring the privacy

## Request for Agency Action

The privacy threat posed by the deployment of drone aircraft in the United States is great. The public should be given the opportunity to comment on this development. In light of the aforementioned considerations, the undersigned petition the FAA as follows:

1. The FAA should conduct a notice and comment rulemaking on the impact of privacy and civil liberties related to the use of drones in the United States. In order to adequately address all of the potential threats, the FAA should examine and report on the impact on privacy to individuals within the scope of their comprehensive plan to safely integrate civil drones into the national airspace, required under § 322(a) of the FAA Modernization and Reform Act.
2. The FAA should conduct a notice and comment rulemaking on the impact of privacy and civil liberties related to the use of drones by government operators pursuant to the agency actions required under § 324(c) of the FAA Modernization and Reform Act.
3. The notice and comment rulemakings should take into consideration the use and retention of data acquired by drone operators; the relation between drone operation and property rights; the ability of an individual to obtain a restraining order against a drone vehicle; and use limitations on drone vehicles and requirements for enforcement of those limitations. In relation to the government use of drones, the rulemakings should also consider the application of the Privacy Act of 1974 to the information gathered by drone operators.

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Sincerely,

### Organizations

American Civil Liberties Union  
American Library Association  
Bill of Rights Defense Committee  
Center for Democracy and Technology  
Center for Digital Democracy  
Center for Financial Privacy and Human Rights

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and security of electronic medical records could be one of the biggest challenges to public acceptance of EMRs.”).

Center for National Security Studies  
Center for the Study of Responsive Law  
The Constitution Project  
Consumer Watchdog  
Council of American-Islamic Relations  
Cyber Privacy Project  
Defending Dissent Foundation  
Demand Progress  
Electronic Frontier Foundation  
Electronic Privacy Information Center  
Essential Information  
Global Justice Clinic (New York University School of Law)  
Government Accountability Project  
Liberty Coalition  
Muslim Public Affairs Council  
National Association of Criminal Defense Lawyers  
National Immigration Project at the National Lawyers Guild  
OneAmerica  
Patient Privacy Rights  
Principled Action in Government  
Privacy Activism  
Privacy Camp  
Privacy Rights Clearinghouse  
Rights Working Group  
Rutherford Institute  
TakeBackWashington.org  
U.S. Bill of Rights Foundation  
World Privacy Forum

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