

1 **Northwest Public Power Association**
2 **Resolution 2019-17**
3 **Support Use of Drones by Consumer-Owned Utilities**
4

5 **Background**
6

7 The electric utility industry sees significant potential benefits from the use of drones, or
8 Unmanned Aircraft Systems (UAS), to help ensure the reliability, safety, security, and resilience
9 of the electric grid and the safety of utility workers.
10

11 Working on and around electric power equipment can be hazardous, costly, and time
12 consuming. For utility crews climbing on equipment, and for those working in manned aircraft
13 flying near the equipment, it can be particularly dangerous, especially during a crisis situation.
14 Hazards present during even routine maintenance procedures are multiplied when equipment
15 has been damaged, or the surrounding terrain has been made hazardous by natural or man-
16 made events.
17

18 UAS equipped with high-resolution cameras provide substantially better information than
19 utility crews performing visual inspections. Using UAS to conduct inspections of damage
20 removes the threat to the crew, or those flying manned aircraft. Night-time assessments and
21 damaged equipment assessments can also be done much faster, and more efficiently, which
22 could help restore power sooner.
23

24 Research from the Electric Power Research Institute shows that UAS could reduce these
25 hazards, while increasing electric reliability, reducing the duration and impact of outages, and
26 reducing the cost of recovery efforts. UAS can reduce inspection over mountainous terrain by
27 days. Moreover, the costs of purchasing and operating UAS are a fraction of the costs of using
28 helicopters to inspect lines or disaster-related damage.
29

30 At the direction of Congress, the Federal Aviation Administration (FAA) finalized federal
31 regulations to govern the use of commercial drones by businesses and public agencies. While
32 these policies take steps in the right direction by authorizing drone use for critical infrastructure
33 repair, restrictions on using drones beyond the line of sight, at night, and over people limit the
34 full benefit of this emerging technology to the utility sector. The most recent FAA
35 reauthorization directs the FAA to test ways to safely lift these restrictions.
36

37 **NWPPA's Position**
38

- 39 • NWPPA supports policies that allow utility use of UAS to enhance electric reliability by
40 helping maintain electric power delivery services and restoring electric power more
41 quickly and safely after an outage.
42

- 43 • NWPPA supports FAA rules that will ensure safety and privacy, while allowing UAS use
44 to enhance essential public services.
45
- 46 • NWPPA strongly supports regulations or legislation that qualifies the use of drones by
47 public power utilities as a “public aircraft operation” carrying out a “governmental
48 function.”
49

50 Origination Date: 2016, Revised 2017 and 2019.