

## Q1 Contact Information

Answered: 50   Skipped: 0

ANSWER CHOICES	RESPONSES	
Name	100.00%	50
Agency	90.00%	45
Address	0.00%	0
Address 2	0.00%	0
City/Town	0.00%	0
State/Territory	100.00%	50
ZIP/Postal Code	0.00%	0
Country	0.00%	0
Email Address	100.00%	50
Phone Number	100.00%	50

#	NAME	DATE
1	Mark A Smith	10/25/2024 12:44 PM
2	Gurinderbir Chahal	10/25/2024 10:46 AM
3	Jessica Teague	10/24/2024 3:36 PM
4	Colton Bond	10/24/2024 3:06 PM
5	Jasmine Courville	10/22/2024 4:11 PM
6	Lukas Wagner	10/22/2024 12:10 PM
7	Kristen Lashley	10/22/2024 10:56 AM
8	Ryan King	10/22/2024 8:10 AM
9	Joe Herrera	10/21/2024 4:32 PM
10	Hannah Ferguson	10/21/2024 4:21 PM
11	Joe Ingrao	10/21/2024 3:05 PM
12	Stephen Baca	10/21/2024 3:05 PM
13	Libby Walsh	10/21/2024 2:15 PM
14	John Feagans	10/21/2024 2:06 PM
15	Diane Jorsey	10/21/2024 2:05 PM
16	Ryan Okey	10/21/2024 1:49 PM
17	Madeleine Smith	10/18/2024 2:47 PM
18	Hollie Ezze	10/15/2024 8:40 AM
19	Holly Hillebran	10/9/2024 1:13 PM
20	howard cook	10/9/2024 11:34 AM

21	GARY BUCKNER	10/8/2024 12:15 AM
22	Kory Hubabrd	10/7/2024 4:04 PM
23	Otto Oemig	10/4/2024 5:21 PM
24	Matt Cochran	10/4/2024 3:43 PM
25	Valerie Mitchell	10/4/2024 12:28 PM
26	Juan C Munoz	10/4/2024 11:03 AM
27	jeff Biakeddy	10/3/2024 5:21 PM
28	Adam Yamamoto	10/3/2024 2:48 PM
29	John (JAKE) Luger	10/3/2024 2:30 PM
30	Susie Nichols	10/3/2024 2:21 PM
31	Nicholas Sumner	10/3/2024 2:18 PM
32	Theodore Puetz	10/3/2024 2:14 PM
33	luis sanchez	10/3/2024 2:12 PM
34	Donald Nelson	10/3/2024 1:51 PM
35	James Jackson	10/3/2024 12:57 PM
36	Zach Szczukowski	10/3/2024 12:56 PM
37	Jack Peterson	10/3/2024 12:20 PM
38	Taryn LaScola	10/3/2024 11:55 AM
39	Megan Parker	10/3/2024 11:54 AM
40	Christopher Wade	10/3/2024 11:49 AM
41	Camilo Perez	10/3/2024 11:37 AM
42	Alexander Peacock	10/3/2024 11:26 AM
43	Charlene Farias	10/3/2024 11:23 AM
44	Kelly Navinsky-Wenzl	10/3/2024 11:18 AM
45	Nathan Davis	10/3/2024 11:11 AM
46	John Scott	10/3/2024 10:53 AM
47	Erin Christiansen	10/3/2024 10:52 AM
48	Rob Hofstetter	10/3/2024 10:52 AM
49	David J Rousseau	10/3/2024 10:44 AM
50	Luke Wagner	10/3/2024 10:27 AM
#	AGENCY	DATE
1	Iowa Dept. of Agriculture & Land Stewardship	10/25/2024 12:44 PM
2	Minnesota Department of Agriculture	10/25/2024 10:46 AM
3	Department of Pesticide Regulation	10/24/2024 3:36 PM
4	Oregon Dept. of Agriculture	10/24/2024 3:06 PM
5	CSKT	10/22/2024 4:11 PM
6	ND Department of Agriculture	10/22/2024 12:10 PM
7	Alabama Department of Agriculture and Industries	10/22/2024 10:56 AM

8	Ohio Dept of Ag	10/22/2024 8:10 AM
9	Yakama Nation	10/21/2024 4:32 PM
10	Mississippi Department of Agriculture	10/21/2024 4:21 PM
11	LDAF	10/21/2024 3:05 PM
12	New Mexico Dept. of Agriculture	10/21/2024 3:05 PM
13	Nebraska Dept. of Ag	10/21/2024 2:15 PM
14	NCDA&CS	10/21/2024 2:06 PM
15	Dept of Energy and Environmental Protection	10/21/2024 2:05 PM
16	Clemson University DPR	10/21/2024 1:49 PM
17	North Dakota State University	10/18/2024 2:47 PM
18	NJDEP	10/15/2024 8:40 AM
19	WA State Dept of Agriculture	10/8/2024 12:15 AM
20	Dept. of Ag	10/7/2024 4:04 PM
21	DATCP	10/4/2024 5:21 PM
22	Ohio Dept of Ag	10/4/2024 3:43 PM
23	Dept of Agriculture & Natural Resources	10/4/2024 12:28 PM
24	Puerto Rico Department of Agriculture	10/4/2024 11:03 AM
25	Department of Agriculture	10/3/2024 2:48 PM
26	STANDING ROCK SIOUX TRIBE	10/3/2024 2:30 PM
27	Arkansas Department of Agriculture	10/3/2024 2:21 PM
28	Georgia Department of Agriculture	10/3/2024 2:18 PM
29	Ak-Chin Indian Community	10/3/2024 2:14 PM
30	Cocopah Indian Tribe	10/3/2024 2:12 PM
31	Cherokee Nation	10/3/2024 12:57 PM
32	Agency of Agriculture, Food and Markets	10/3/2024 12:56 PM
33	AZ Dept of Ag	10/3/2024 12:20 PM
34	MA Department of Agricultural Resources	10/3/2024 11:55 AM
35	Oklahoma Department of Agriculture, Food, & Forestry	10/3/2024 11:54 AM
36	Delaware Dept. Ag.	10/3/2024 11:49 AM
37	Maine Board of Pesticides Control	10/3/2024 11:26 AM
38	TDA	10/3/2024 11:23 AM
39	Kansas Department of Agriculture	10/3/2024 11:18 AM
40	OISC	10/3/2024 11:11 AM
41	Colorado Department of Agriculture	10/3/2024 10:53 AM
42	Wyoming Department of Agriculture	10/3/2024 10:52 AM
43	Maryland Department of Agriculture	10/3/2024 10:52 AM
44	New Hampshire Division of Pesticide Control	10/3/2024 10:44 AM
45	Dept. of Ag	10/3/2024 10:27 AM

#	ADDRESS	DATE
	There are no responses.	
#	ADDRESS 2	DATE
	There are no responses.	
#	CITY/TOWN	DATE
	There are no responses.	
#	STATE/TERRITORY	DATE
1	Iowa	10/25/2024 12:44 PM
2	Minnesota	10/25/2024 10:46 AM
3	California	10/24/2024 3:36 PM
4	OR	10/24/2024 3:06 PM
5	Montana	10/22/2024 4:11 PM
6	North Dakota	10/22/2024 12:10 PM
7	AL	10/22/2024 10:56 AM
8	Ohio	10/22/2024 8:10 AM
9	WA	10/21/2024 4:32 PM
10	MS	10/21/2024 4:21 PM
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12	NM	10/21/2024 3:05 PM
13	Nebraska	10/21/2024 2:15 PM
14	North Carolina	10/21/2024 2:06 PM
15	CT	10/21/2024 2:05 PM
16	SC	10/21/2024 1:49 PM
17	North Dakota	10/18/2024 2:47 PM
18	NJ	10/15/2024 8:40 AM
19	NE	10/9/2024 1:13 PM
20	Rhode Island	10/9/2024 11:34 AM
21	WA	10/8/2024 12:15 AM
22	Missouri	10/7/2024 4:04 PM
23	Wisconsin	10/4/2024 5:21 PM
24	Ohio	10/4/2024 3:43 PM
25	South Dakota	10/4/2024 12:28 PM
26	Puerto Rico	10/4/2024 11:03 AM
27	Navajo Nation	10/3/2024 5:21 PM
28	Hawaii	10/3/2024 2:48 PM
29	ND	10/3/2024 2:30 PM
30	Arkansas	10/3/2024 2:21 PM
31	Georgia	10/3/2024 2:18 PM
32	AZ	10/3/2024 2:14 PM

33	AZ	10/3/2024 2:12 PM
34	New York	10/3/2024 1:51 PM
35	Oklahoma	10/3/2024 12:57 PM
36	Vermont	10/3/2024 12:56 PM
37	AZ	10/3/2024 12:20 PM
38	MA	10/3/2024 11:55 AM
39	Oklahoma	10/3/2024 11:54 AM
40	DE	10/3/2024 11:49 AM
41	AZ	10/3/2024 11:37 AM
42	Maine	10/3/2024 11:26 AM
43	Texas	10/3/2024 11:23 AM
44	Kansas	10/3/2024 11:18 AM
45	Indiana	10/3/2024 11:11 AM
46	Colorado	10/3/2024 10:53 AM
47	Wyoming	10/3/2024 10:52 AM
48	MD	10/3/2024 10:52 AM
49	New Hampshire	10/3/2024 10:44 AM
50	North Dakota	10/3/2024 10:27 AM
#	ZIP/POSTAL CODE	DATE
There are no responses.		
#	COUNTRY	DATE
There are no responses.		
#	EMAIL ADDRESS	DATE
1	mark.smith@iowaagriculture.gov	10/25/2024 12:44 PM
2	g.chahal@state.mn.us	10/25/2024 10:46 AM
3	jessica.teague@cdpr.ca.gov	10/24/2024 3:36 PM
4	colton.bond@oda.oregon.gov	10/24/2024 3:06 PM
5	jasmine.courville@cskt.org	10/22/2024 4:11 PM
6	ljwagner@nd.gov	10/22/2024 12:10 PM
7	Kristen.lashley@agi.alabama.gov	10/22/2024 10:56 AM
8	ryan.king@agri.ohio.gov	10/22/2024 8:10 AM
9	joe_herrera@yakama.com	10/21/2024 4:32 PM
10	hannahf@mdac.ms.gov	10/21/2024 4:21 PM
11	jingrao@ldaf.state.la.us	10/21/2024 3:05 PM
12	sbaca@nmda.nmsu.edu	10/21/2024 3:05 PM
13	elizabeth.smith@nebraska.gov	10/21/2024 2:15 PM
14	john.feagans@ncagr.gov	10/21/2024 2:06 PM
15	diane.jorsey@ct.gov	10/21/2024 2:05 PM

## 2024 AAPCO Tech Workgroup UAV Survey

SurveyMonkey

16	rokey@clemson.edu	10/21/2024 1:49 PM
17	madeleine.smith@ndus.edu	10/18/2024 2:47 PM
18	hollie.ezze@dep.nj.gov	10/15/2024 8:40 AM
19	holly.hillebran@nebraska.gov	10/9/2024 1:13 PM
20	howard.cook@dem.ri.gov	10/9/2024 11:34 AM
21	gbuckner@agr.wa.gov	10/8/2024 12:15 AM
22	Kory.hubbard@mda.mo.gov	10/7/2024 4:04 PM
23	otto.oemig@wisconsin.gov	10/4/2024 5:21 PM
24	matthewcochran81@gmail.com	10/4/2024 3:43 PM
25	valerie.mitchell@state.sd.us	10/4/2024 12:28 PM
26	jcmunoz@agricultura.pr.gov	10/4/2024 11:03 AM
27	jbiakeddy@navajo-nsn.gov	10/3/2024 5:21 PM
28	adam.y.yamamoto@hawaii.gov	10/3/2024 2:48 PM
29	jluger@standingrock.org	10/3/2024 2:30 PM
30	Susie.Nichols@agriculture.arkansas.gov	10/3/2024 2:21 PM
31	Nick.Sumner@agr.georgia.gov	10/3/2024 2:18 PM
32	Tpuetz@ak-chin.nsn.us	10/3/2024 2:14 PM
33	sanchezl@cocopah.gov	10/3/2024 2:12 PM
34	donald.nelson@dec.ny.gov	10/3/2024 1:51 PM
35	james-jackson@cherokee.org	10/3/2024 12:57 PM
36	zach.szczukowski@vermont.gov	10/3/2024 12:56 PM
37	jpetererson@azda.gov	10/3/2024 12:20 PM
38	taryn.lascola@mass.gov	10/3/2024 11:55 AM
39	megan.parker@ag.ok.gov	10/3/2024 11:54 AM
40	Christopher.Wade@delaware.gov	10/3/2024 11:49 AM
41	pesticidesofficer@quechantribe.com	10/3/2024 11:37 AM
42	alexander.r.peacock@maine.gov	10/3/2024 11:26 AM
43	charlene.farias@texasagriculture.gov	10/3/2024 11:23 AM
44	KDA.PestFert@ks.gov	10/3/2024 11:18 AM
45	davi1280@purdue.edu	10/3/2024 11:11 AM
46	johnw.scott@state.co.us	10/3/2024 10:53 AM
47	erin.christiansen@wyo.gov	10/3/2024 10:52 AM
48	rob.hofstetter@maryland.gov	10/3/2024 10:52 AM
49	David.J.Rousseau@agr.nh.gov	10/3/2024 10:44 AM
50	ljwagner@nd.gov	10/3/2024 10:27 AM
#	PHONE NUMBER	DATE
1	5152818506	10/25/2024 12:44 PM
2	651.201.6472	10/25/2024 10:46 AM

## 2024 AAPCO Tech Workgroup UAV Survey

## SurveyMonkey

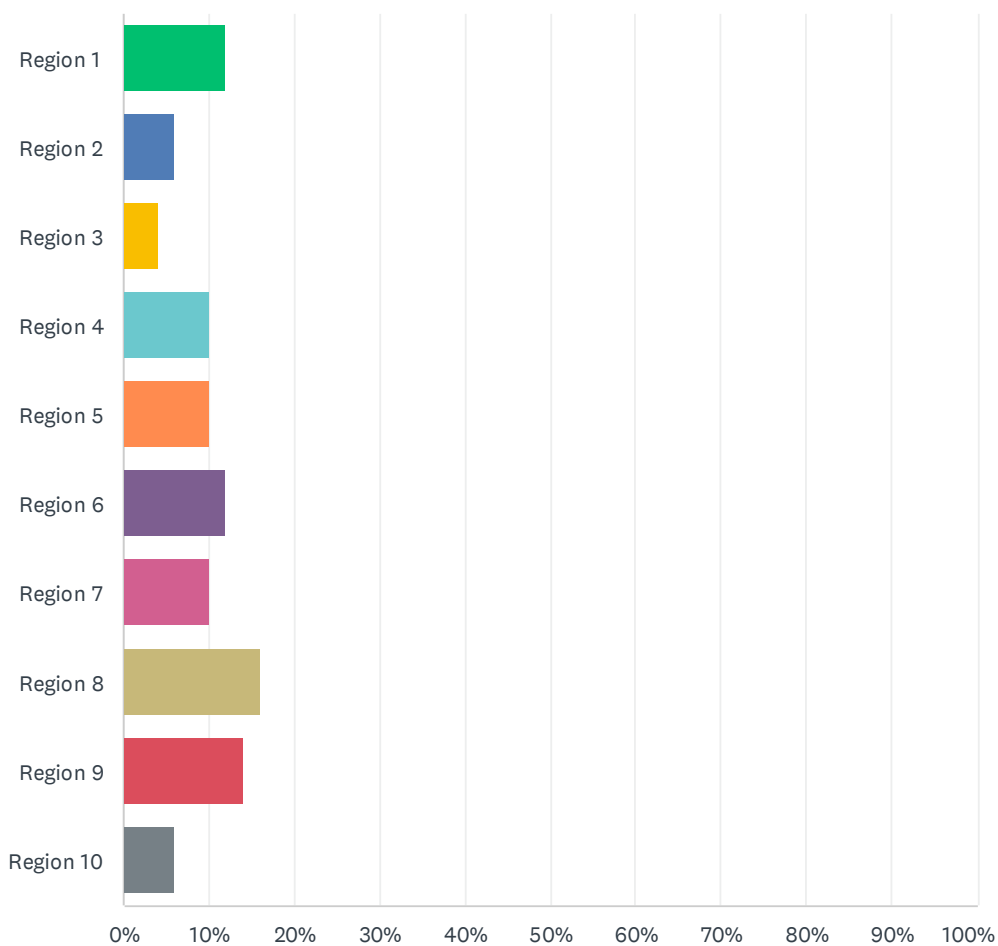
3	9166037794	10/24/2024 3:36 PM
4	503.986.6485	10/24/2024 3:06 PM
5	4064719240	10/22/2024 4:11 PM
6	701-328-4922	10/22/2024 12:10 PM
7	3342407224	10/22/2024 10:56 AM
8	614-728-6394	10/22/2024 8:10 AM
9	(509)865-5121 x6043	10/21/2024 4:32 PM
10	6623253393	10/21/2024 4:21 PM
11	225-952-8046	10/21/2024 3:05 PM
12	5753395026	10/21/2024 3:05 PM
13	402-471-6882	10/21/2024 2:15 PM
14	(984)236-4604	10/21/2024 2:06 PM
15	8604243328	10/21/2024 2:05 PM
16	8642938647	10/21/2024 1:49 PM
17	701-231-5525	10/18/2024 2:47 PM
18	609-351-8360	10/15/2024 8:40 AM
19	402-471-6852	10/9/2024 1:13 PM
20	4015374271	10/9/2024 11:34 AM
21	5099499370	10/8/2024 12:15 AM
22	5737515510	10/7/2024 4:04 PM
23	6082940815	10/4/2024 5:21 PM
24	3302065778	10/4/2024 3:43 PM
25	605-773-4432	10/4/2024 12:28 PM
26	7877961745	10/4/2024 11:03 AM
27	9284069679	10/3/2024 5:21 PM
28	8089739411	10/3/2024 2:48 PM
29	7014267455	10/3/2024 2:30 PM
30	501-225-1598	10/3/2024 2:21 PM
31	4706261894	10/3/2024 2:18 PM
32	520 510-9212	10/3/2024 2:14 PM
33	9287509071	10/3/2024 2:12 PM
34	(607) 753-3095 ext 230	10/3/2024 1:51 PM
35	918-772-8951	10/3/2024 12:57 PM
36	8026367029	10/3/2024 12:56 PM
37	602-542-3575	10/3/2024 12:20 PM
38	6178283793	10/3/2024 11:55 AM
39	(405) 522-5972	10/3/2024 11:54 AM
40	3026984570	10/3/2024 11:49 AM

41	760-572-0771	10/3/2024 11:37 AM
42	207-287-2731	10/3/2024 11:26 AM
43	5124630749	10/3/2024 11:23 AM
44	785-5646688	10/3/2024 11:18 AM
45	7654947108	10/3/2024 11:11 AM
46	3038699056	10/3/2024 10:53 AM
47	307-777-3502	10/3/2024 10:52 AM
48	4108415710	10/3/2024 10:52 AM
49	6032713640	10/3/2024 10:44 AM
50	701-328-4922	10/3/2024 10:27 AM



## Q2 What EPA Region are you in?

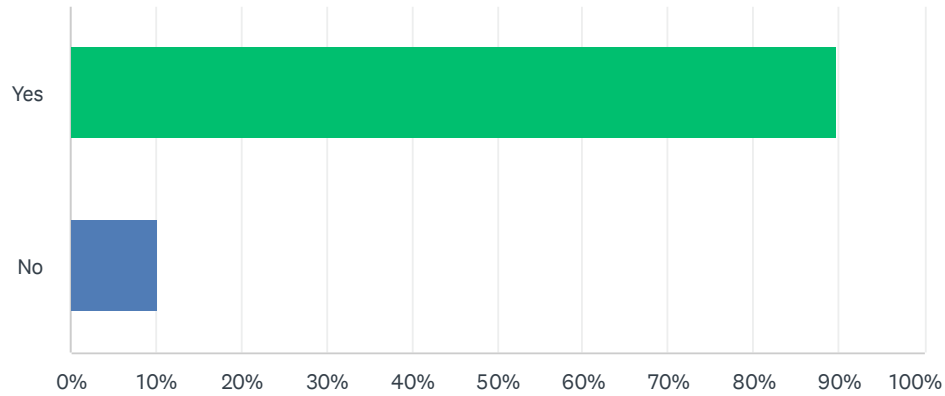
Answered: 50   Skipped: 0



ANSWER CHOICES	RESPONSES	
Region 1	12.00%	6
Region 2	6.00%	3
Region 3	4.00%	2
Region 4	10.00%	5
Region 5	10.00%	5
Region 6	12.00%	6
Region 7	10.00%	5
Region 8	16.00%	8
Region 9	14.00%	7
Region 10	6.00%	3
TOTAL		50

### Q3 Has your agency received requests to apply pesticide products using Unmanned Aerial Vehicles (UAV)?

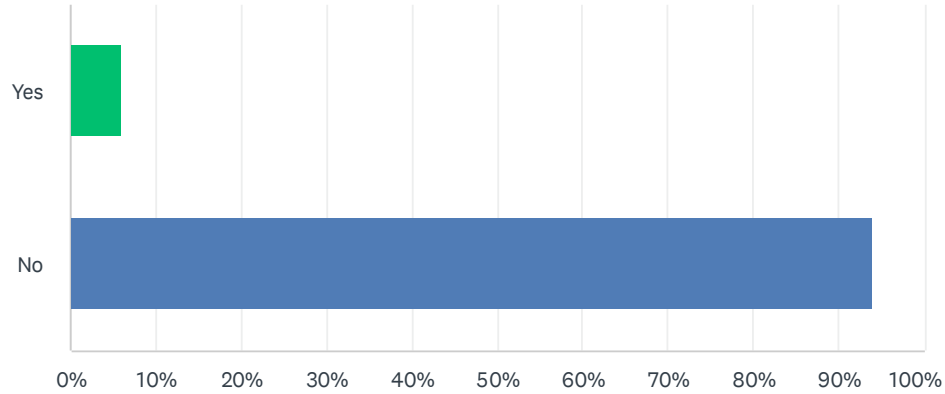
Answered: 49 Skipped: 1



ANSWER CHOICES	RESPONSES	
Yes	89.80%	44
No	10.20%	5
TOTAL		49

## Q4 Does your agency have a UAV specific category? If no, please skip to question 9.

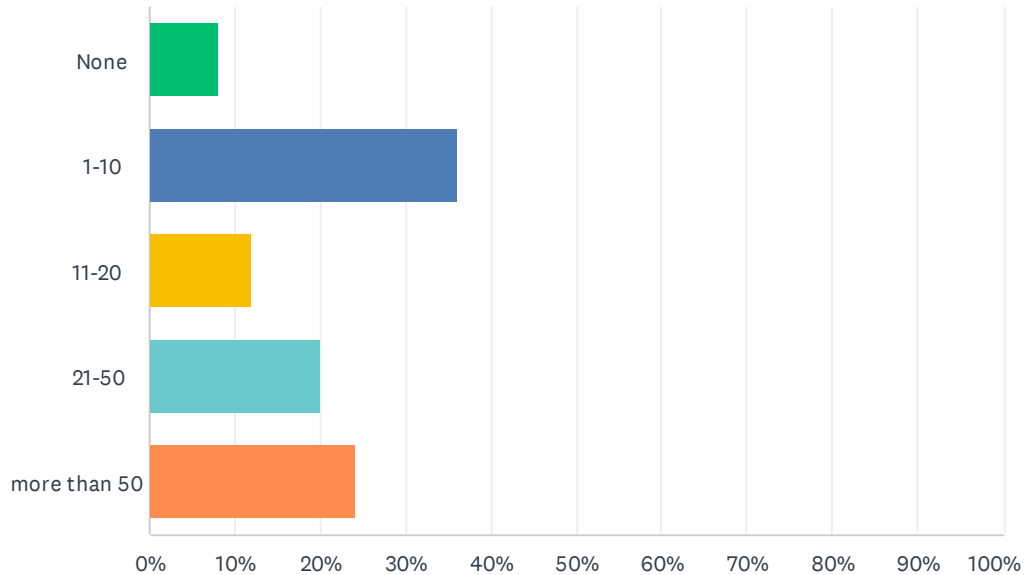
Answered: 50 Skipped: 0



ANSWER CHOICES		RESPONSES	
Yes		6.00%	3
No		94.00%	47
TOTAL			50

## Q5 How many certified and licensed UAV applicators do you have in your state?

Answered: 25 Skipped: 25



ANSWER CHOICES	RESPONSES	
None	8.00%	2
1-10	36.00%	9
11-20	12.00%	3
21-50	20.00%	5
more than 50	24.00%	6
TOTAL		25

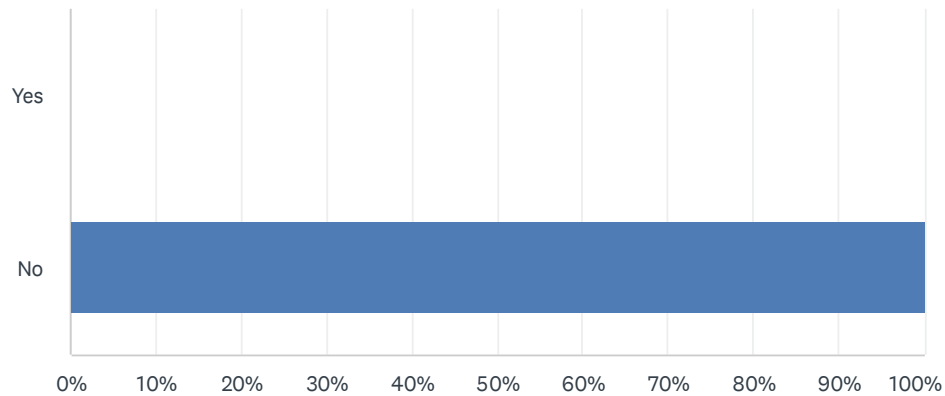
## Q6 What does your agency call your UAV category?

Answered: 22   Skipped: 28

#	RESPONSES	DATE
1	General Aerial	10/25/2024 10:46 AM
2	There are three UAV categories in California: Unmanned Apprentice Pest Control Aircraft Pilot, Unmanned Journeyman Pest Control Aircraft Pilot, and Unmanned Vector Control Technician.	10/24/2024 3:36 PM
3	Aerial	10/22/2024 4:11 PM
4	Commercial Air Core	10/22/2024 12:10 PM
5	N/A	10/21/2024 4:21 PM
6	11-Aerial Applicator	10/21/2024 3:05 PM
7	Unmanned Aerial Applicator	10/18/2024 2:47 PM
8	It is still wrapped into our Aerial Pest Control. This is what our pilots have to get to make applications.	10/9/2024 1:13 PM
9	We don't have one, but we do license them if commercial as a Commercial Applicator or Operator. If they are a farmer we license them as a Private Applicator, if public as a Public Operator.	10/8/2024 12:15 AM
10	January 1, 2025 it will be "Aerial Pest Control"	10/7/2024 4:04 PM
11	Commercial - 9.9 Aerial Applicator Private - 111 Aerial Applicator	10/4/2024 5:21 PM
12	Commercial Category C-1 "Aerial Pests"	10/4/2024 3:43 PM
13	We don't have category for this type of application and there is no Certified Applicator or authorization to use RUP's.	10/4/2024 11:03 AM
14	Private Applicator with Pilot Authorization or Commercial Aerial Applicator. Cannot answer #5 accurately. UAV is classified as air, I cannot differentiate between Fixed Wing, UAV, rotary etc at this time.	10/3/2024 2:21 PM
15	UAV not permitted at this time	10/3/2024 2:14 PM
16	Aerial Application	10/3/2024 2:12 PM
17	Aerial	10/3/2024 12:56 PM
18	We recently changed the rules - May, so we now have a UAV pilot category.	10/3/2024 12:20 PM
19	I follow California DPR Regulations	10/3/2024 11:37 AM
20	Currently we issue do not have an aerial category so we issue drone authorizations to pesticide business licensees.	10/3/2024 11:18 AM
21	N/A For Question 5, we don't have a way to confirm UAV certification at this time. We're considering amending rules to require confirmation, along with their Part 137.	10/3/2024 10:53 AM
22	No UAV specific category. Generally aerial or what ever category they conduct their business in (Ag, Ornamental, Aquatic, etc)	10/3/2024 10:52 AM

## Q7 Does your agency have a training manual for UAV applications?

Answered: 26 Skipped: 24

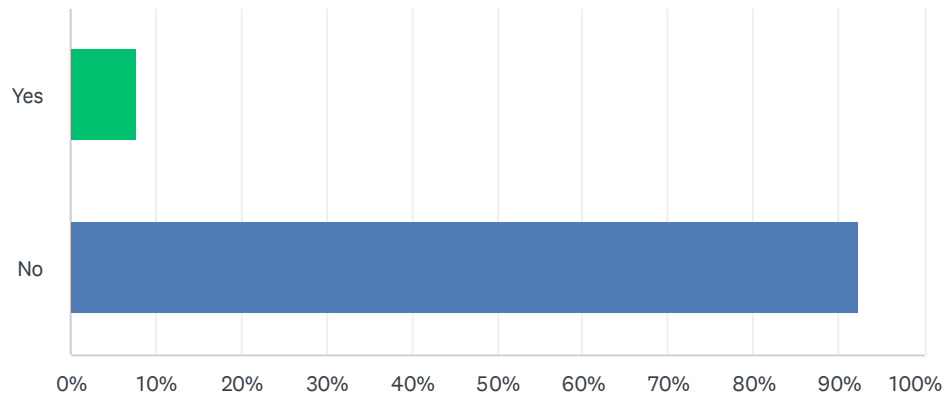


ANSWER CHOICES	RESPONSES
Yes	0.00% 0
No	100.00% 26
TOTAL	26

#	IF NO, DOES YOUR AGENCY'S AERIAL MANUAL INCLUDE UAV INFORMATION?	DATE
1	No, it does not.	10/25/2024 10:46 AM
2	The manual does not include UAV specific information.	10/24/2024 3:36 PM
3	No	10/22/2024 12:10 PM
4	No	10/21/2024 4:21 PM
5	No	10/21/2024 3:05 PM
6	No	10/18/2024 2:47 PM
7	Not as of right now	10/9/2024 1:13 PM
8	No	10/8/2024 12:15 AM
9	Yes	10/7/2024 4:04 PM
10	We utilize the national aerial manual, however we did incorporate our state's UAV laws/rules FAQ document into the guide.	10/4/2024 3:43 PM
11	NO	10/3/2024 2:21 PM
12	no	10/3/2024 2:12 PM
13	No	10/3/2024 12:56 PM
14	Not yet.	10/3/2024 12:20 PM
15	I follow California DPR Regulations	10/3/2024 11:37 AM
16	No	10/3/2024 11:11 AM
17	Not yet. New manual under construction.	10/3/2024 10:52 AM

## Q8 Does your agency have an exam for UAV applications?

Answered: 26 Skipped: 24



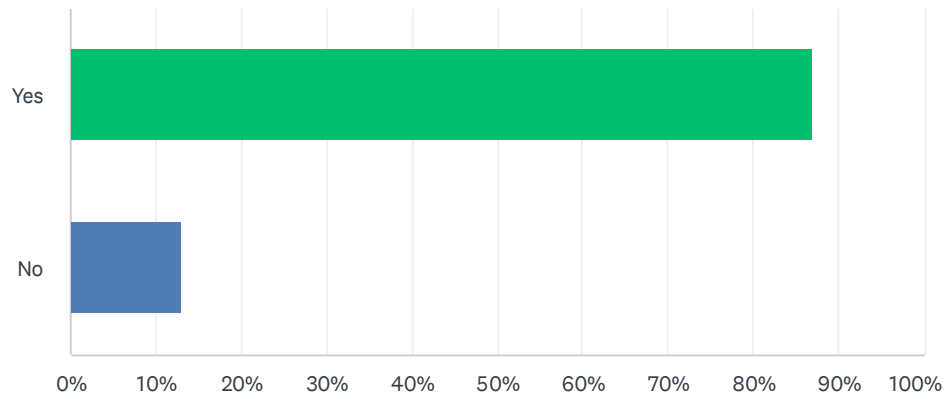
ANSWER CHOICES	RESPONSES
Yes	7.69% 2
No	92.31% 24
TOTAL	26

#	IF NO, DOES YOUR AGENCY AERIAL EXAM INCLUDE UAV QUESTIONS?	DATE
1	No, it does not.	10/25/2024 10:46 AM
2	No	10/22/2024 12:10 PM
3	No	10/21/2024 4:21 PM
4	No	10/18/2024 2:47 PM
5	No it does not	10/9/2024 1:13 PM
6	No	10/8/2024 12:15 AM
7	Yes	10/7/2024 4:04 PM
8	Just one all encompassing aerial exam.	10/4/2024 3:43 PM
9	NO	10/3/2024 2:21 PM
10	no	10/3/2024 2:12 PM
11	No	10/3/2024 12:56 PM
12	Not yet.	10/3/2024 12:20 PM
13	I follow California DPR Regulations	10/3/2024 11:37 AM
14	No	10/3/2024 11:18 AM
15	In the process of adding UAV to Aerial	10/3/2024 11:11 AM
16	Not yet. New exams are under construction	10/3/2024 10:52 AM



## Q9 Are UAV applicators licensed as aerial applicators?

Answered: 46 Skipped: 4

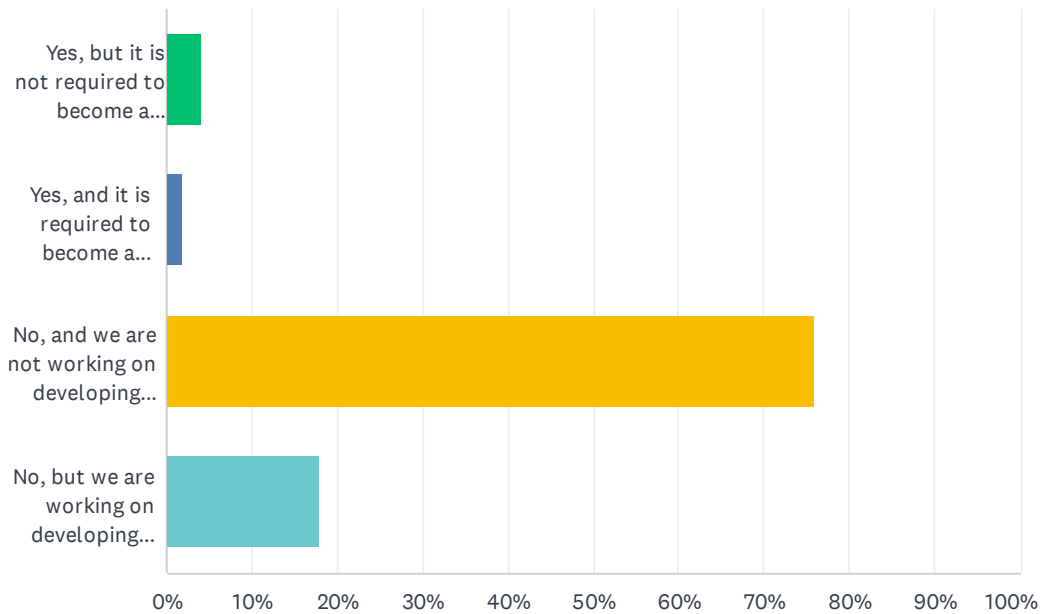


ANSWER CHOICES	RESPONSES	
Yes	86.96%	40
No	13.04%	6
TOTAL		46

#	IF THEY AREN'T LICENSED AS AERIAL APPLICATORS, HOW DO YOU LICENSE THEM?	DATE
1	just a license, we don't have a specific UAV license	10/9/2024 11:34 AM
2	We license them if commercial as a Commercial Applicator or Operator. If they are a farmer we license them as a Private Applicator, if public as a Public Operator.	10/8/2024 12:15 AM
3	DONT HAVE ANY UAV APPLICATORS	10/3/2024 2:30 PM
4	n/a	10/3/2024 2:14 PM
5	They are licensed as UAV pilots and custom air.	10/3/2024 12:20 PM
6	Commercial applicator certification	10/3/2024 11:18 AM
7	Either aerial or the category in which they conduct their business	10/3/2024 10:52 AM

## Q10 Does your agency offer any specialized training for UAV?

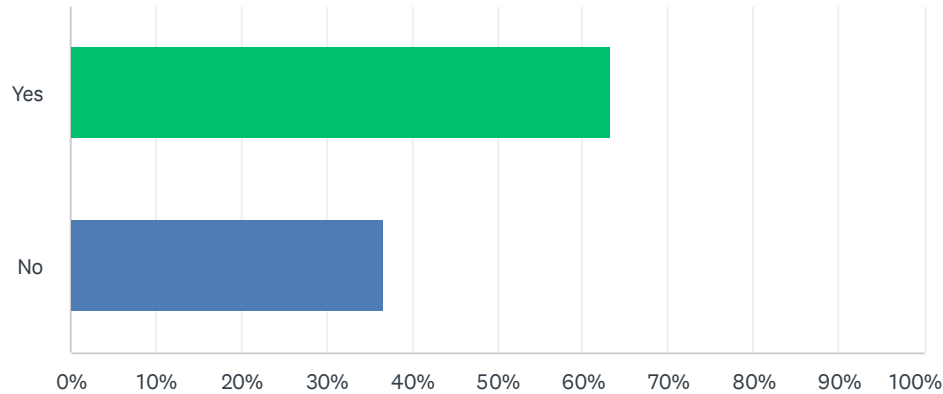
Answered: 50 Skipped: 0



ANSWER CHOICES	RESPONSES	
Yes, but it is not required to become a certified/licensed UAV applicator.	4.00%	2
Yes, and it is required to become a certified/licensed UAV applicator.	2.00%	1
No, and we are not working on developing specialized training for UAV applications at this time.	76.00%	38
No, but we are working on developing specialized training for UAV applications.	18.00%	9
TOTAL		50

## Q11 Is your agency familiar with current EPA guidance on applying pesticides by UAV?

Answered: 49 Skipped: 1

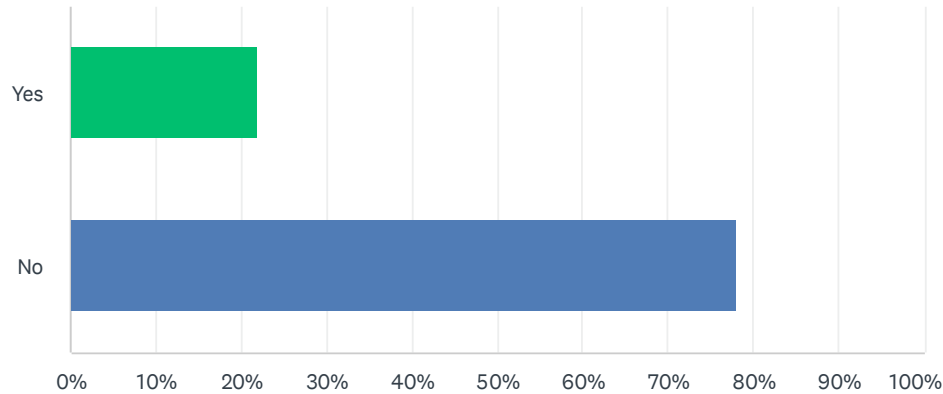


ANSWER CHOICES	RESPONSES	
Yes	63.27%	31
No	36.73%	18
TOTAL		49

#	COMMENTS	DATE
1	No guidance has been issued that I have found, except a short slide document from 2019 that is really not a guidance document.	10/25/2024 12:44 PM
2	Respectfully, the EPA guidance is not helpful in addressing questions that SLAs and the regulated community have. Given the significant increase in UAS applicators in our state, the formulation and communication of state-specific policy is necessary to support SLA processes and to provide some degree of regulatory certainty to UAS applicators.	10/24/2024 3:06 PM
3	More specific directions for use on EPA approved labels would be helpful.	10/21/2024 3:05 PM
4	At this time I am under the impression that EPA guidance is a work in progress	10/18/2024 2:47 PM
5	I am not.	10/15/2024 8:40 AM
6	I feel there is a need for the National Aerial Manual to be re-written with UAV applications included.	10/4/2024 3:43 PM
7	There really isn't any	10/3/2024 2:21 PM
8	Not aware, but will check after survey. :)	10/3/2024 11:49 AM
9	Where is this guidance located?	10/3/2024 11:23 AM

## Q12 Does your agency offer any FAA UAV guidance documents to applicators?

Answered: 50 Skipped: 0



ANSWER CHOICES	RESPONSES
Yes	22.00% 11
No	78.00% 39
TOTAL	50

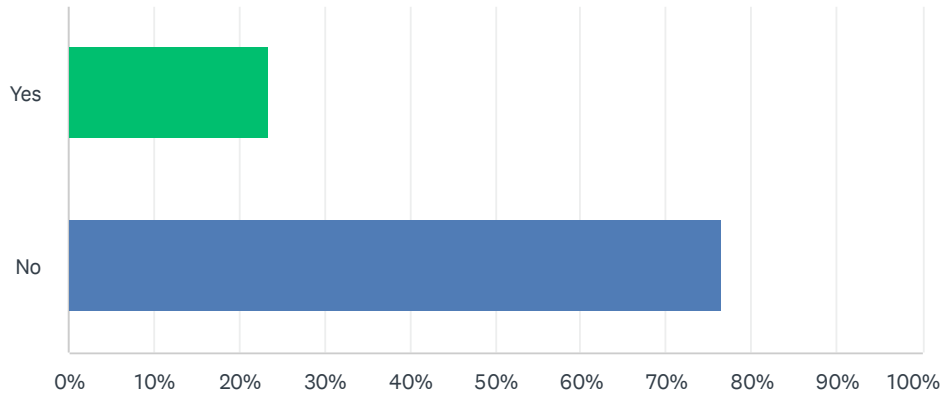
#	COMMENTS	DATE
1	No, but we are working on a short UAV licensing/certification guidance document that will be available soon.	10/25/2024 12:44 PM
2	MDA has developed a guidance document for UAV applicators where they can find MDA, MN Department of Transportation, and FAA requirements and contact these agencies to get latest information.	10/25/2024 10:46 AM
3	No, but we refer them to our aeronautics commission and they handle it.	10/22/2024 12:10 PM
4	We have a document outlining the various Federal & State requirements that must be met and each requirement has a link to the location where the information is explained in more detail.	10/21/2024 2:06 PM
5	Aerial certification is reciprocal	10/21/2024 2:05 PM
6	NDSU Extension only provides links to FAA relevant webpages. ND UAV applicators must hold a remote pilot certificate from the FAA (part 107) and an Agricultural Aircraft Operator Certificate from the FAA (Part 137), North Dakota Air/Ground Core Commercial Certification from NDSU and an Unmanned Aerial Applicators License from the ND Aeronautics Commission as well as satisfying other safety training requirements	10/18/2024 2:47 PM
7	we do require that license	10/15/2024 8:40 AM
8	We have information on our website.	10/8/2024 12:15 AM
9	Direct them to the FAA website for info.	10/4/2024 3:43 PM
10	Similar guidance as NC first created.	10/3/2024 12:56 PM
11	We require that they have their part 107 license before we issued pesticide business license. So when they inquire we direct them to FAA website.	10/3/2024 11:49 AM
12	We do express to UAV applicators they need to have the proper FAA certifications in in	10/3/2024 11:26 AM

addition to proper applicator licensing.

13	No, but that is a great idea!	10/3/2024 10:52 AM
14	NDAC handles that side of it	10/3/2024 10:27 AM

## Q13 Does your agency allow for supervision of a non-credentialed UAV applications by a certified and licensed UAV applicator?

Answered: 47 Skipped: 3



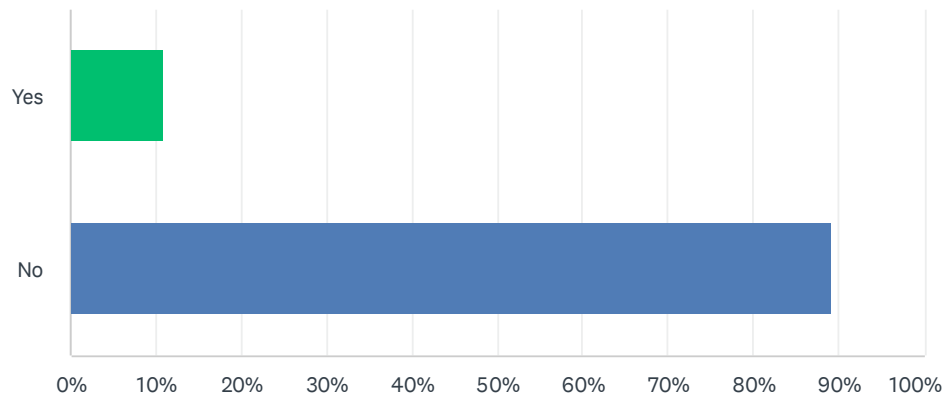
ANSWER CHOICES	RESPONSES	
Yes	23.40%	11
No	76.60%	36
TOTAL		47

#	IF YES, WHAT TYPE OF SUPERVISION, PLEASE DESCRIBE.	DATE
1	But, only if allowed by the label and under direct supervision or a correctly certified applicator (category) during the first 21 days of employment, after which certification is required by all Iowa commercial pesticide applicators.	10/25/2024 12:44 PM
2	The ND Aeronautics Commission allows this if the applicator is being supervised by someone with a valid part 137 (see above)	10/18/2024 2:47 PM
3	For a UAV application it will depend on the license type and product use. For example, a farmer wanting to apply a restricted use pesticide could have an employee make that application as long as the certified private applicator is immediately available if and when needed, even though the certified private applicator is not physically present. In addition, the UAV pilot would be required to be appropriately certified by FAA. For a commercial application, direct supervision means direct on-the-job supervision and requires the certified applicator be physically present at the application site and that the person making the application be in voice and visual contact with the certified applicator at all times during the application.	10/8/2024 12:15 AM
4	GUP pesticides only	10/7/2024 4:04 PM
5	Must be licensed to make an application aerially in Ohio.	10/4/2024 3:43 PM
6	UNKNOWN, BUT I WOULD BE AGAINST IT	10/3/2024 2:30 PM
7	On site supervision of a NYS certified technician in the appropriate category by a Certified Applicator in the appropriate category	10/3/2024 1:51 PM
8	The certified and licensed UAV applicator must be on-site in visual and voice contact with the uncertified applicator and visual observation of the UAV must be maintained throughout the application.	10/3/2024 11:26 AM
9	NA	10/3/2024 11:23 AM

10	Supervision of a non-credentialed UAV flight is under the Part 107 requirements, and FAA jurisdiction, that allow this. I'm not sure this is something an SLA would have the ability to have the authority to create provisions that conflict with federal law. Now...it would apply if the non-credentialed AND unlicensed applicator pilot in charge was applying an RUP under the direct supervision of the certified applicator who was licensed with their Part 107.	10/3/2024 10:53 AM
11	Direct Supervision. The licensed applicator must be within 50 air miles, or 1 hour drive time from the unlicensed applicator unless stated otherwise by the label of the pesticide in use.	10/3/2024 10:52 AM
12	Must be a registered employee of licensed business and certified applicator must be "available".	10/3/2024 10:52 AM

## Q14 Does your agency require specific training hours (apprenticeship program) with a certified and licensed UAV applicator prior to becoming a certified and licensed UAV applicator?

Answered: 46 Skipped: 4



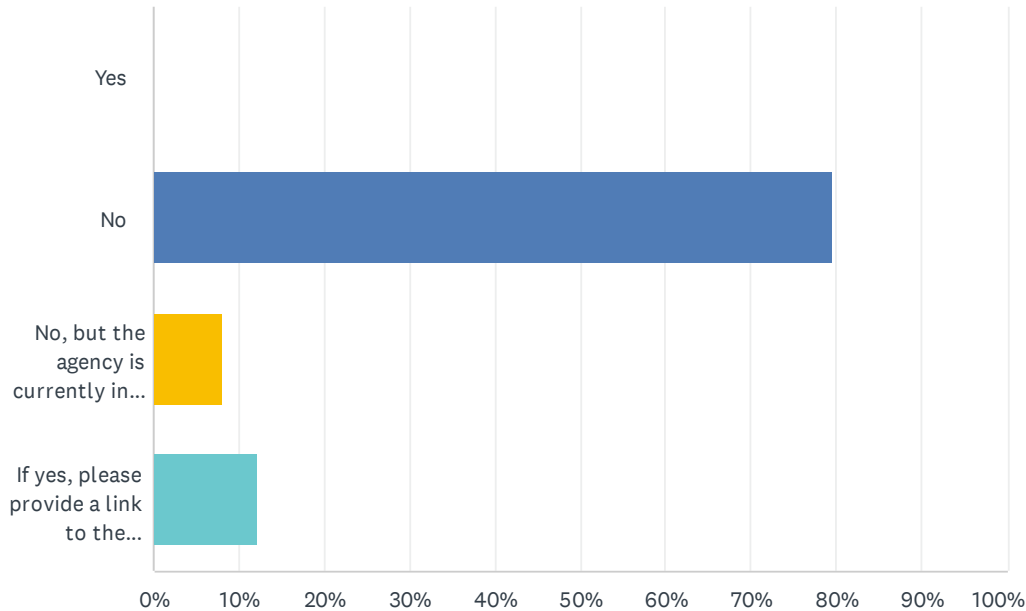
ANSWER CHOICES	RESPONSES
Yes	10.87% 5
No	89.13% 41
TOTAL	46

#	IF YES, HOW MANY HOURS?	DATE
1	At least 1 year under supervision or a journeyman with not less than 150 hours of operation of fixed-wing aircraft or 50 hours of operation of nonfixed-wing aircraft within the previous two calendar years in pest control activities.	10/24/2024 3:36 PM
2	Statutory requirement is 50 hours. ORS 634.128(2)(d) Has 50 or more hours of experience as a licensed pesticide applicator, licensed public applicator, licensed noncommercial pesticide applicator or certified private applicator, or as a pesticide trainee, public trainee or noncommercial pesticide trainee under the supervision of a certified aerial pesticide applicator, on flights conducted for the purpose of carrying out, or training to carry out, spraying or otherwise applying pesticides by aircraft;	10/24/2024 3:06 PM
3	An individual is required to have 1yr & 125hrs experience making aerial pesticide applications to be licensed as a "Pilot". Those not meeting this requirement must be licensed as an "Apprentice" making supervised applications until the experience requirements have been met.	10/21/2024 2:06 PM
4	either an approved training program OR 10 or more hours of direct ground supervised solo flight at operational loads	10/18/2024 2:47 PM
5	N/A	10/3/2024 2:30 PM
6	What FAA Requires	10/3/2024 11:37 AM
7	NA	10/3/2024 11:23 AM



## Q15 Has your agency passed any rules, regulations, or legislation related to UAV pesticide licensing and or application?

Answered: 49 Skipped: 1



ANSWER CHOICES	RESPONSES	
Yes	0.00%	0
No	79.59%	39
No, but the agency is currently in the process of passing rules, regulations, or legislation related to UAV pesticide licensing and or application.	8.16%	4
If yes, please provide a link to the regulation if possible, or use this section to explain.	12.24%	6
TOTAL		49

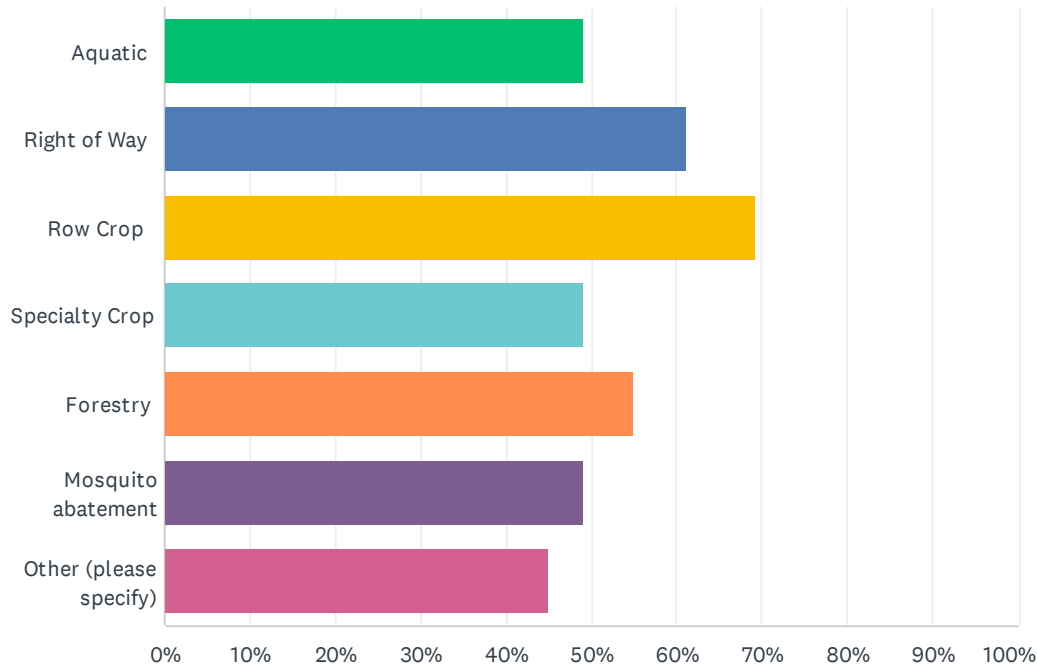
#	IF YES, PLEASE PROVIDE A LINK TO THE REGULATION IF POSSIBLE, OR USE THIS SECTION TO EXPLAIN.	DATE
1	Food and Agriculture Code Division 6, Chapter 5. Aircraft Operation Regulation: <a href="https://leginfo.legislature.ca.gov/faces/codes_displayText.xhtml?lawCode=FAC&amp;division=6.&amp;title=&amp;part=&amp;chapter=5.&amp;article=1">https://leginfo.legislature.ca.gov/faces/codes_displayText.xhtml?lawCode=FAC&amp;division=6.&amp;title=&amp;part=&amp;chapter=5.&amp;article=1</a> . Assembly Bill 1016: <a href="https://leginfo.legislature.ca.gov/faces/billNavClient.xhtml?bill_id=202320240AB1016">https://leginfo.legislature.ca.gov/faces/billNavClient.xhtml?bill_id=202320240AB1016</a> Pest Control Aircraft Pilot Certificate Application (incorporated into regulation by reference): <a href="https://www.cdpr.ca.gov/docs/license/app_packets/pilot.pdf">https://www.cdpr.ca.gov/docs/license/app_packets/pilot.pdf</a>	10/24/2024 3:36 PM
2	Rules updated in Aug 2024 to include UAV under aerial applicators. Still going through the administrative process at this time.	10/21/2024 3:05 PM
3	we wrote a policy	10/15/2024 8:40 AM
4	Rules were amended in 2023 to include in the definition of "aerial" UAV applications. All aerial applications require a permit. Link: <a href="https://agriculture.vermont.gov/sites/agriculture/files/doc_library/Vermont%20Rule%20for%20C">https://agriculture.vermont.gov/sites/agriculture/files/doc_library/Vermont%20Rule%20for%20C</a>	10/3/2024 12:56 PM

ontrol%20of%20Pesticides%20in%20Accordance%20with%206%20V.S.A.%20Chapter%2087  
%20%283.8.23%29.pdf

5	<a href="https://apps.azsos.gov/public_services/Title_03/3-03.pdf">https://apps.azsos.gov/public_services/Title_03/3-03.pdf</a> , 204 and 206 specifically	10/3/2024 12:20 PM
6	Agency has not passed legislation, but state legislators passed legislation for agricultural use with restrictions. RSA 430:34-a,IV	10/3/2024 10:44 AM

## Q16 Select UAV application types in your state, territory, or tribe (select all that apply).

Answered: 49 Skipped: 1



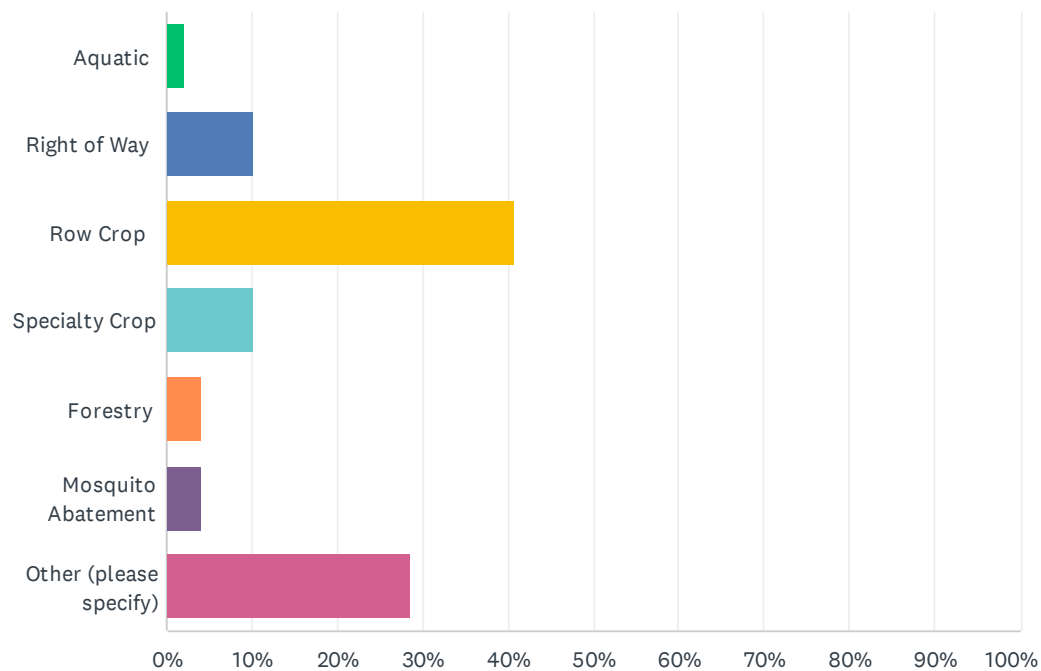
ANSWER CHOICES	RESPONSES	
Aquatic	48.98%	24
Right of Way	61.22%	30
Row Crop	69.39%	34
Specialty Crop	48.98%	24
Forestry	55.10%	27
Mosquito abatement	48.98%	24
Other (please specify)	44.90%	22
Total Respondents: 49		

#	OTHER (PLEASE SPECIFY)	DATE
1	All of the above are possible.	10/24/2024 3:36 PM
2	Demonstration & Research, Regulatory Weed (Noxious Weeds)	10/24/2024 3:06 PM
3	None	10/21/2024 4:32 PM
4	We have some applicators with Ornamental & Turf making commercial applications on large nurseries.	10/21/2024 2:06 PM
5	10-acre minimum - no UAV treatments made to date	10/21/2024 2:05 PM

6	currently Department Ag tracks Insecticide, Fungicide, Herbicide, Fertilizer and Other	10/18/2024 2:47 PM
7	Agricultural	10/15/2024 8:40 AM
8	tree fruit	10/8/2024 12:15 AM
9	Inaccessible Ag Land	10/4/2024 12:28 PM
10	Dairy y Cattle farm	10/4/2024 11:03 AM
11	Rangeland invasive species	10/3/2024 5:21 PM
12	Ornamental	10/3/2024 2:48 PM
13	N/A	10/3/2024 2:30 PM
14	Drones currently banned from use	10/3/2024 2:14 PM
15	ornamental trees	10/3/2024 1:51 PM
16	antimicrobial	10/3/2024 12:20 PM
17	Ornamental and Turf - Golf Course	10/3/2024 11:49 AM
18	Unsure what types of applications are made.	10/3/2024 11:23 AM
19	Stump treatment, Ornamental and Turf	10/3/2024 11:18 AM
20	These are what we are aware, but may not be all inclusive.	10/3/2024 10:53 AM
21	Any of our categories as long as there are no aerial restrictions on the label	10/3/2024 10:52 AM
22	Agricultural Use	10/3/2024 10:44 AM

## Q17 What is the most prominent UAV application type in your state?

Answered: 49   Skipped: 1



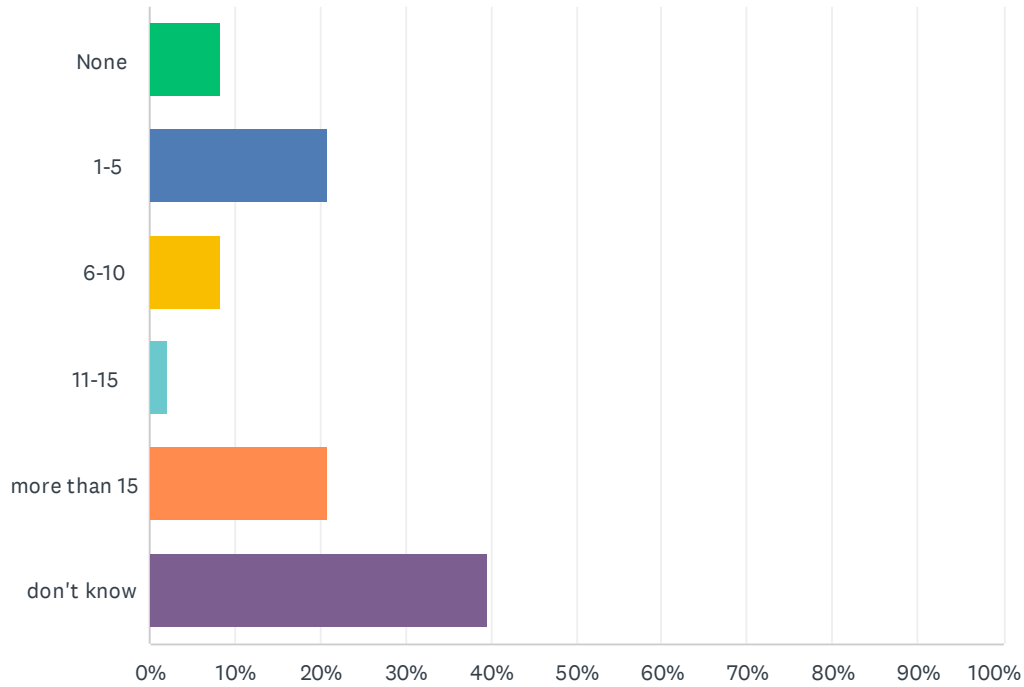
ANSWER CHOICES	RESPONSES	
Aquatic	2.04%	1
Right of Way	10.20%	5
Row Crop	40.82%	20
Specialty Crop	10.20%	5
Forestry	4.08%	2
Mosquito Abatement	4.08%	2
Other (please specify)	28.57%	14
TOTAL		49

#	OTHER (PLEASE SPECIFY)	DATE
1	All of the above are possible. We do not collect this specific information.	10/24/2024 3:36 PM
2	A combination of Row Crop, Right of Way, and Pasture/Rangeland	10/22/2024 12:10 PM
3	None	10/21/2024 4:32 PM
4	none have been made	10/21/2024 2:05 PM
5	Unknown see above regardign categories. Secondly operations have until December 31st to report and so we do not have all the reports in for the State at the moment	10/18/2024 2:47 PM
6	unknown	10/15/2024 8:40 AM

7	Dairy and Cattle farms	10/4/2024 11:03 AM
8	Rangeland invasive species (only used once by NRCS)	10/3/2024 5:21 PM
9	Ornamental	10/3/2024 2:48 PM
10	N/A	10/3/2024 2:30 PM
11	n/a	10/3/2024 2:14 PM
12	Unsure what types of applications are made.	10/3/2024 11:23 AM
13	Likely row crop.	10/3/2024 10:53 AM
14	Legislation effective for agricultural use September 1, 2024	10/3/2024 10:44 AM

## Q18 How many companies in your state are licensed to conduct UAV applications?

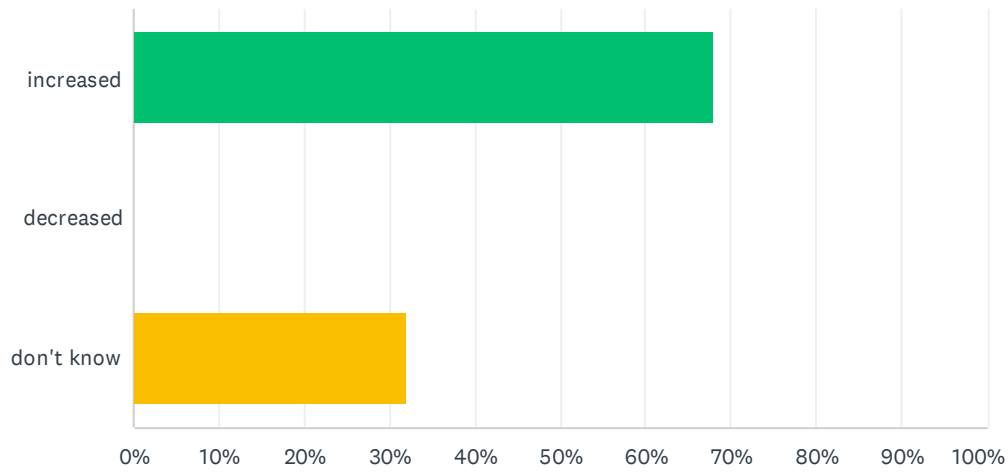
Answered: 48 Skipped: 2



ANSWER CHOICES	RESPONSES	
None	8.33%	4
1-5	20.83%	10
6-10	8.33%	4
11-15	2.08%	1
more than 15	20.83%	10
don't know	39.58%	19
TOTAL		48

## Q19 Since 2022 has the number of UAV companies in your state:

Answered: 47   Skipped: 3

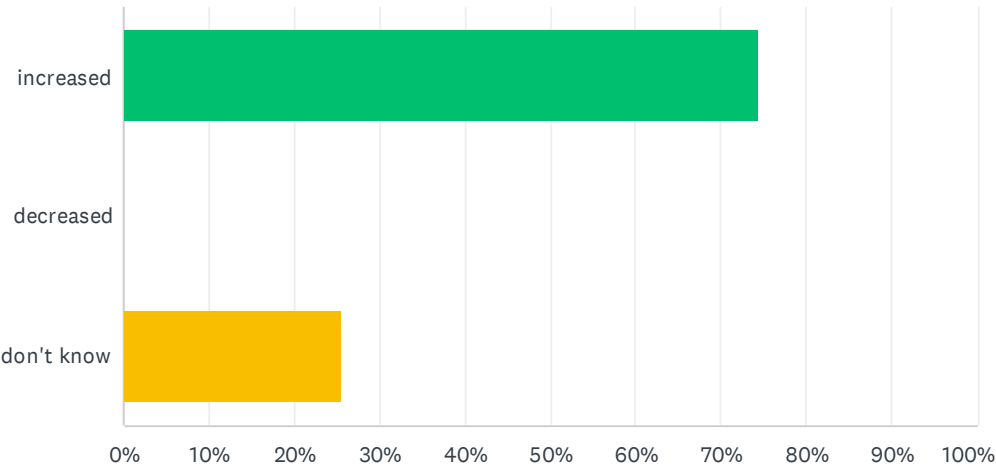


ANSWER CHOICES		RESPONSES	
increased		68.09%	32
decreased		0.00%	0
don't know		31.91%	15
TOTAL			47



Q20 Since 2022, has the number of UAV applicators in your state:

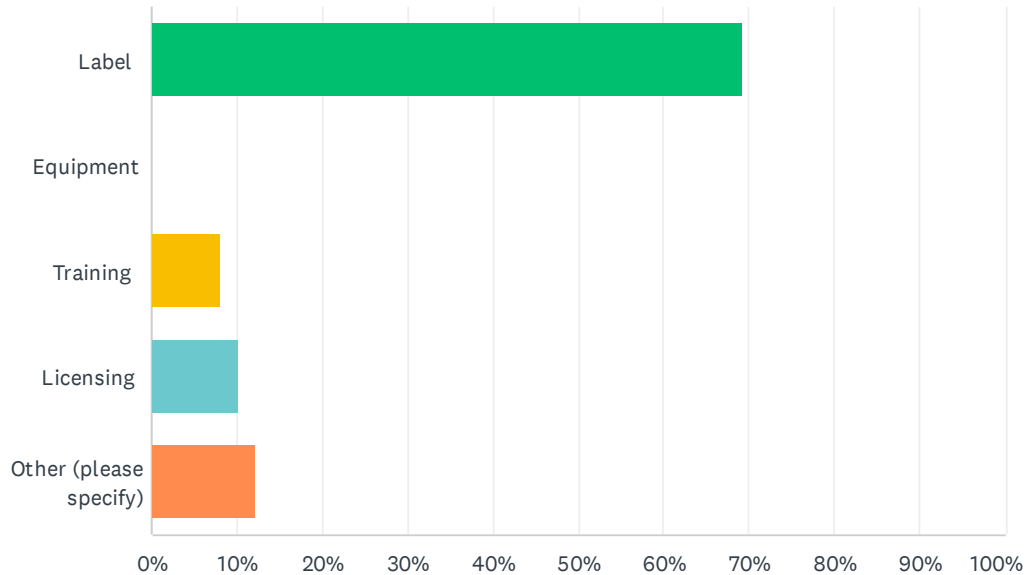
Answered: 47    Skipped: 3



ANSWER CHOICES		RESPONSES	
increased		74.47%	35
decreased		0.00%	0
don't know		25.53%	12
TOTAL			47

## Q21 What does your agency see as the single biggest regulatory issue with UAV pesticide applications (Select one).

Answered: 49 Skipped: 1

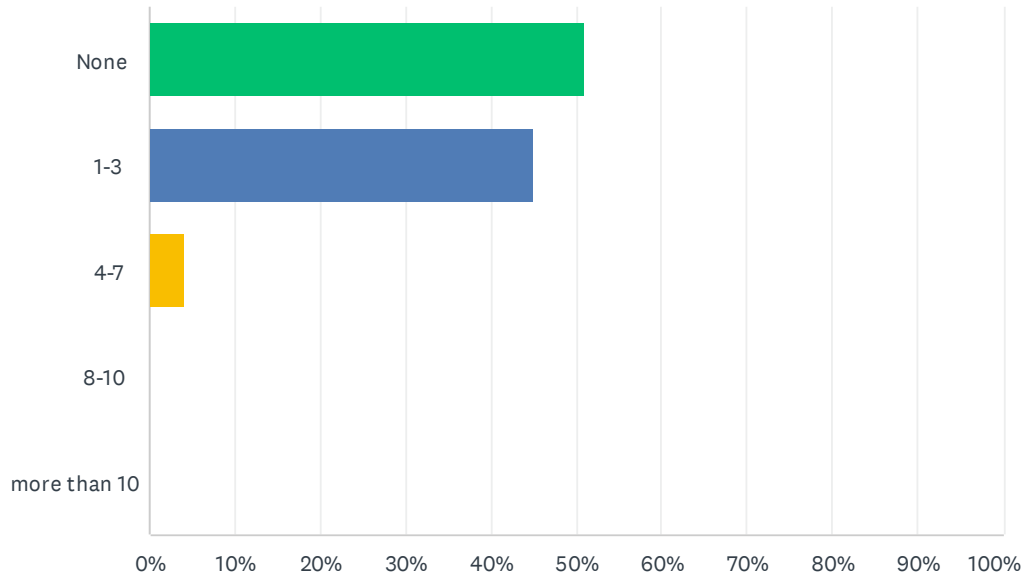


ANSWER CHOICES	RESPONSES	
Label	69.39%	34
Equipment	0.00%	0
Training	8.16%	4
Licensing	10.20%	5
Other (please specify)	12.24%	6
TOTAL		49

#	OTHER (PLEASE SPECIFY)	DATE
1	Label & Training	10/24/2024 3:36 PM
2	public opposition	10/21/2024 2:05 PM
3	N/A	10/3/2024 2:30 PM
4	n/a	10/3/2024 2:14 PM
5	All of the above.	10/3/2024 10:53 AM
6	Complaints	10/3/2024 10:44 AM

## Q22 Has your agency received any complaints of UAV pesticide application misuse or off-target movement?

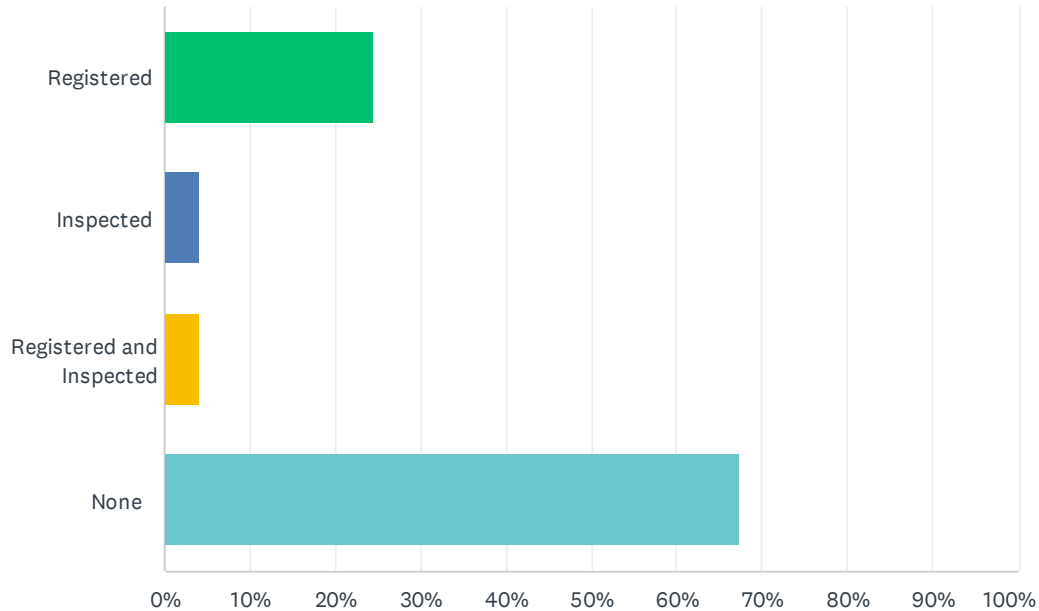
Answered: 49 Skipped: 1



ANSWER CHOICES	RESPONSES	
None	51.02%	25
1-3	44.90%	22
4-7	4.08%	2
8-10	0.00%	0
more than 10	0.00%	0
TOTAL		49

## Q23 Does your agency require UAV's to be registered and or inspected by your agency prior to use?

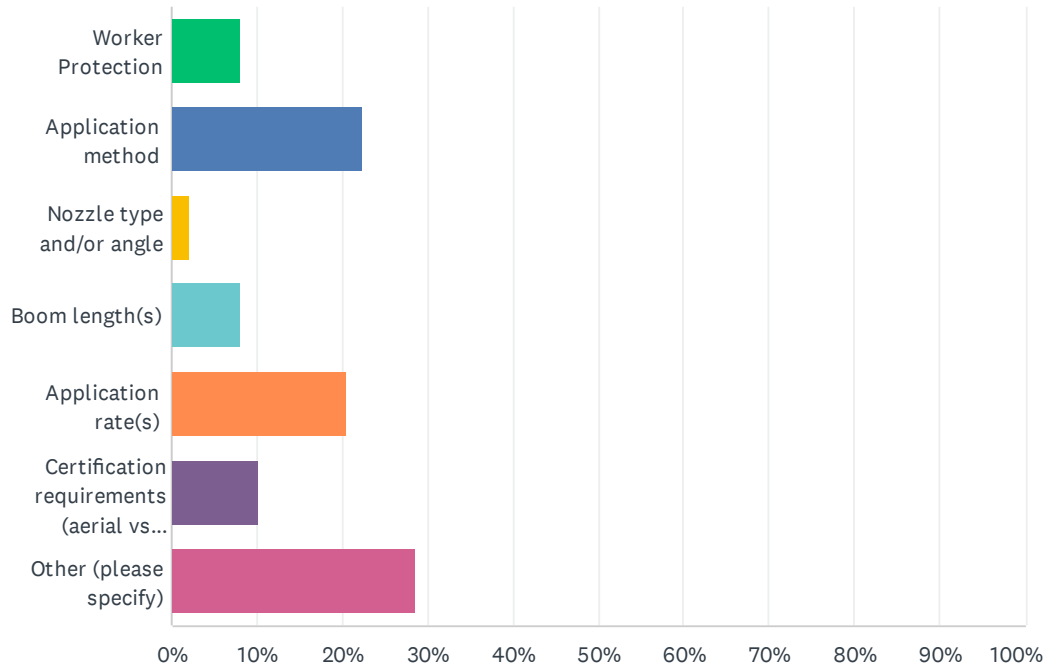
Answered: 49 Skipped: 1



ANSWER CHOICES		RESPONSES	
Registered		24.49%	12
Inspected		4.08%	2
Registered and Inspected		4.08%	2
None		67.35%	33
TOTAL			49

## Q24 Which part of the label is your agency having the most difficulties interpreting when it comes to UAV applications (Select one).

Answered: 49 Skipped: 1



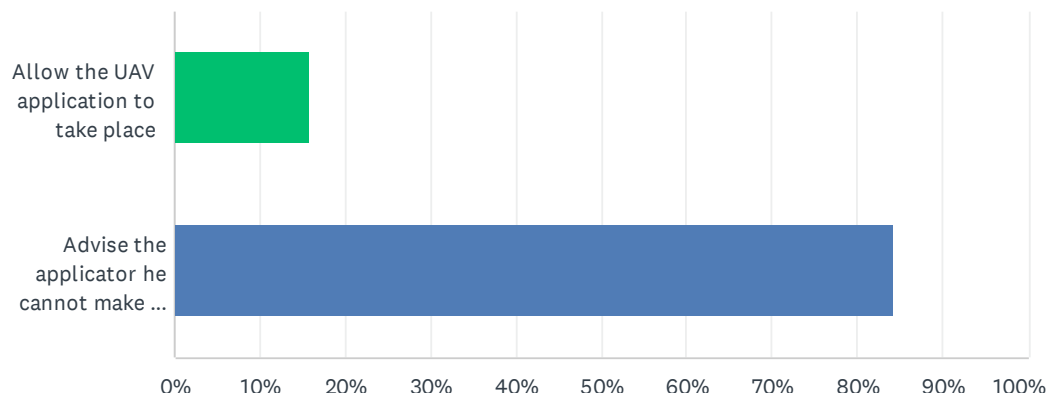
ANSWER CHOICES	RESPONSES	
Worker Protection	8.16%	4
Application method	22.45%	11
Nozzle type and/or angle	2.04%	1
Boom length(s)	8.16%	4
Application rate(s)	20.41%	10
Certification requirements (aerial vs site)	10.20%	5
Other (please specify)	28.57%	14
TOTAL		49

#	OTHER (PLEASE SPECIFY)	DATE
1	Application rates, worker protection, application method	10/24/2024 3:36 PM
2	Labels do not fit well for UAVs/drones. In other words, labels are not up to date with latest technology. For example, labels are made for equipment with larger tanks so makes math challenging, labels may state need closed cockpit but not applicable to drones, label may state helicopter only (but say you have a drone with rotary top), PPE requirements, etc.	10/24/2024 3:06 PM
3	Both Application Method and Application Rate	10/22/2024 12:10 PM
4	no UAV treatments have been made	10/21/2024 2:05 PM

5	If it is an allowable method of application	10/15/2024 8:40 AM
6	All of the above	10/4/2024 5:21 PM
7	None	10/4/2024 12:28 PM
8	Drift	10/4/2024 11:03 AM
9	N/A	10/3/2024 2:30 PM
10	If UAV application is allowed per the label. Roundup Powermax III has specific equipment (fixed wing and rotary) so from an enforcement perspective, UAV application are not allowed.	10/3/2024 2:21 PM
11	n/a	10/3/2024 2:14 PM
12	WPS and Rate	10/3/2024 11:18 AM
13	None have come to our attention to date.	10/3/2024 10:53 AM
14	N/A at this time	10/3/2024 10:44 AM

**Q25 A certified and licensed UAV applicator wants to apply an aquatic herbicide but has a question on the label. The label states: "aerial applications to aquatic sites are restricted to helicopter only". Does your agency:**

Answered: 38 Skipped: 12



ANSWER CHOICES	RESPONSES	
Allow the UAV application to take place	15.79%	6
Advise the applicator he cannot make the application via UAV due to the label restriction	84.21%	32
TOTAL		38

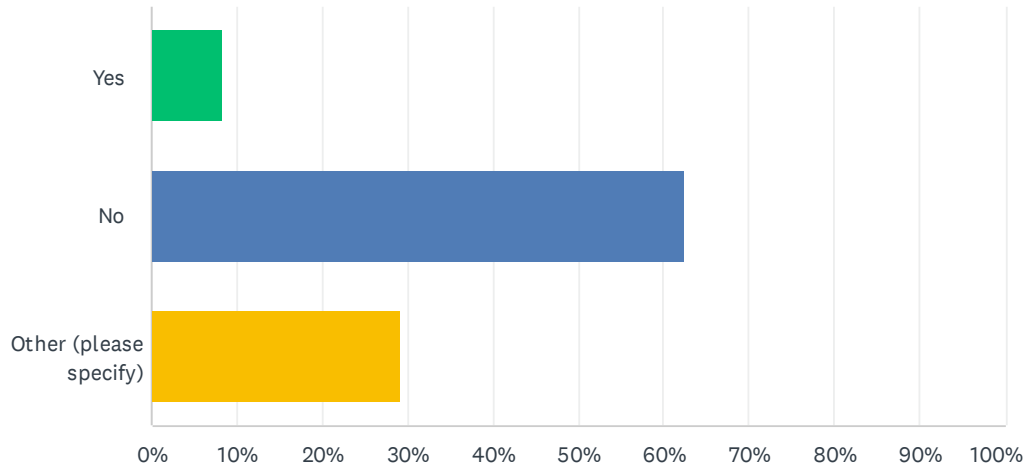
#	OTHER (PLEASE SPECIFY)	DATE
1	We have not had that question come up.	10/25/2024 12:44 PM
2	Other (please specify) It depends on the type of drone. If the applicator is using a fixed-wing drone, would not allow. Most applicators have multi rotor drones, so it would likely be ok.	10/25/2024 10:46 AM
3	If a UAV is a helicopter, UAV is not expressly prohibited from being used, and can meet the applicaiton rate requirements on the pesticide label, the application may be allowed to take place.	10/24/2024 3:36 PM
4	Depends, would need to evaluate more information such as the full label and the actual equipment. For example, some UAS aircraft appear to have the same structure/function as a traditional helicopter ( <a href="https://rotor.ai/r550-sprayhawk">https://rotor.ai/r550-sprayhawk</a> ). In the absence of clear federal guidance, we would need to carefully review the totality of evidence to support any decision-making on this issue.	10/24/2024 3:06 PM
5	None	10/21/2024 4:32 PM
6	It is possible that we may depending on specifics of the application.	10/8/2024 12:15 AM
7	Per Ed Messina at the August 2024 PREP in Fort Collins, Co, the label must state UAV/Drone or be a generic "Aerial Site" statement on the label.	10/4/2024 3:43 PM
8	We haven't had a case, but probably won't allow	10/4/2024 11:03 AM
9	IDK, haven't encounter this type of situation	10/3/2024 5:21 PM
10	N/A	10/3/2024 2:30 PM

11	n/a	10/3/2024 2:14 PM
12	Will consult with State.	10/3/2024 2:12 PM
13	I would defer this to my EPA region for clarification.	10/3/2024 11:54 AM
14	any application to aquatic sites requires permitting by Maine DEP and are rarely approved.	10/3/2024 11:26 AM



## Q26 Has your agency registered any products with new labels containing specific instructions for UAV applications?

Answered: 48 Skipped: 2



ANSWER CHOICES	RESPONSES	
Yes	8.33%	4
No	62.50%	30
Other (please specify)	29.17%	14
TOTAL		48

#	OTHER (PLEASE SPECIFY)	DATE
1	Not that we are aware of.	10/25/2024 12:44 PM
2	We are not aware of any containing UAV application directions. If we came across a label with these directions, we would likely flag the label and check with EPA due to this different application method.	10/25/2024 10:46 AM
3	Not that I am aware of.	10/22/2024 8:10 AM
4	Not sure about this one	10/21/2024 2:06 PM
5	not sure	10/15/2024 8:40 AM
6	Not sure	10/9/2024 1:13 PM
7	3 adjuvants	10/8/2024 12:15 AM
8	I believe so.	10/4/2024 3:43 PM
9	Don't know	10/3/2024 2:48 PM
10	n/a	10/3/2024 2:14 PM
11	I do not review incoming labels. Nor if a label were submitted, would our registration folks.	10/3/2024 12:20 PM
12	unknown	10/3/2024 11:55 AM
13	Not sure.	10/3/2024 11:26 AM

14	Not sure. Registration done by State Chemist. However, if registered with EPA most-likely registered in MD
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10/3/2024 10:52 AM