

Editorial

The AALAS Journals: 2017 in Review

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The November 2017 issue of the *Journal of the American Association for Laboratory Animal Science (JAALAS)* volume 56 and the December 2017 issue of *Comparative Medicine (CM)* volume 67 mark the end of another year for the AALAS journals. Our sincere thanks go again to the talented support the journals receive from art director Amy Tippett, scientific editor Amy Frazier,

and editorial specialist, Virginia Dawson. This team together continues to sustain a timely flow of well-edited and professionally presented information through the entire process from manuscript submission to publication.

Publication statistics for the journals remain steady (Table 1, Figure 1). Acceptance rates were 61% for *CM* and 48% for *JAA-*

Table 1. Journal statistics

<i>JAALAS</i>	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Total submissions	132	172	167	191	170	179	158	148	162	163
International	52	61	52	71	57	74	75	54	60	64
% international	39	35	31	37	34	41	59	36	37	39
Disposition of submissions										
Referred to <i>CM</i>	11	15	18	31	16	17	25	23	36	19
Withdrawn	6	4	8	5	5	3	4	4	0	3
Rejected	35	41	43	55	64	75	62	44	60	50
Accepted	73	93	91	90	75	80	91	62	75	77
Total number reviewed*	108	134	134	145	139	155	153	106	135	127
% reviewed	82	78	80	76	82	87	97	72	83	78
% accepted of those reviewed	68	69	68	62	54	52	59	58	56	61
Days from submission to										
first decision	28	28	28	28	28	28	32	34	36	35
final decision	66	64	62	62	50	56	75	60	66	68
Manuscripts printed**	62	68	90	96	79	71	88	67	90	82
Manuscript pages printed	732	840	916	993	872	810	727	446	828	581
Average pages per manuscript	5.7	5.9	5.8	6.4	6.8	11.4	8.3	6.7	9.2	7.1
Impact factor	0.517	0.950	0.805	0.708	1.145	***	1.118	0.906	1.195	NA
5-year impact factor									1.545	
<i>CM</i>	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Total submissions	126	158	138	162	171	169	135	127	140	129
International	50	86	55	73	76	89	80	66	59	73
% international	40	54	40	45	44	53	59	52	42	57
Disposition of submissions										
Referred to <i>JAALAS</i>	24	39	36	31	29	23	12	9	12	15
Withdrawn	8	6	6	4	3	6	1	0	3	3
Rejected	37	51	35	54	75	69	75	54	54	62
Accepted	56	47	61	57	64	63	45	56	53	58
Total number reviewed*	93	98	96	111	139	132	120	110	107	120
% reviewed	74	62	70	69	81	78	89	87	76	93
% accepted of those reviewed	60	48	64	51	46	48	38	51	50	48
Days from submission to										
first decision	32	28	28	28	24	24	28	24	29	27
final decision	62	53	61	53	46	42	45	47	56	55
Manuscripts printed**	63	59	55	60	68	60	58	59	62	60
Pages published, articles	623	613	520	576	568	547	436	401	502	477
Average pages per article	7.4	7.7	6.9	7.0	6.7	9.1	7.5	6.8	8.1	8.0
Impact factor	1.089	1.094	1.205	1.052	1.120	***	0.742	1.00	0.832	NA
5-year impact factor									1.175	

* , some articles submitted in 2017 were still under review in 2018

** , some of the articles published in 2017 were accepted in 2016

*** , impact factors for 2013 were calculated based on 3 issues, rather than 6, for each journal and as a result were inaccurate.

† , combined full text and pdf downloads from PubMedCentral and Ingenta

NA, not yet available

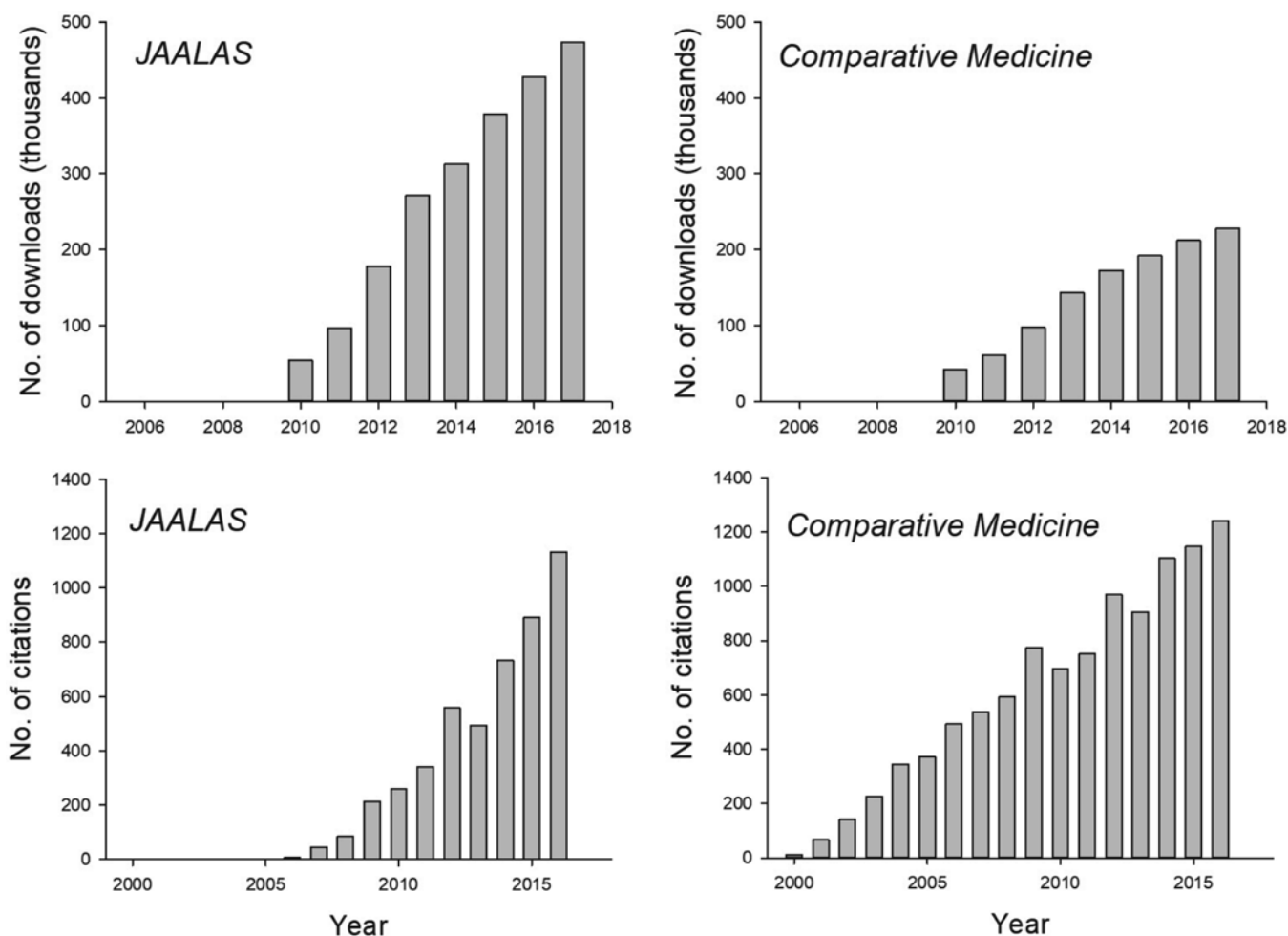


Figure 1.

LAS (Table 1). These percentages are consistent with previous years and allow us to obtain an adequate amount of high-quality content for each issue. Prospective authors should be aware that as more submissions are received, standards for acceptance will be higher. For example, manuscripts that contain relatively little data (only 1 table or figure) will be viewed as less desirable than articles that present a substantive and comprehensive investigation of a research question.

The number of downloaded articles for the two journals really highlight the value of the AALAS publications (Figure 1, Tables 2 and 3). As you can see, articles from the 2 journals are downloaded hundreds of thousands of times each year, and many articles have been downloaded thousands of times a year for many years after the publication date. These data show that even though the journal impact factors are not high, the articles are used by the community we serve and are durable in terms of content. The number of citations from both journals also continues to grow annually, with JAALAS citations increasing exponentially since the journal was re-named in 2005 (Figure 2). The list of top 10 cited articles has several new additions this year (Tables 4 and 5). An interesting feature of this information is that for both JAALAS and CM, only 2 articles for each made both the top ten cited and downloaded lists. This suggests that different audiences are using most of the publications in the lists, some with focus on publishing (the cited articles) and others on information (the download articles). Also, the top articles downloaded from Ingenta were different from those downloaded from PubMedCen-

tral (PMC), suggesting that different readers use these 2 avenues. Ingenta downloads were 6 to 7% of the total downloads in 2016 and 2017, the only years for which those data are available.

A notable highlight of 2017 was the special topic issue (issue 3) in *Comparative Medicine* entitled, "Infectious Disease Research: Animal Models and Risk Management." Edited by Jason Villano, this timely compilation of information and recommended practices included articles on institutional oversight of research involving biohazards, personal protective equipment, viral vector biosafety, general considerations for infectious disease research involving animals, and animal models for research on Ebola virus, Zika virus, and arthropod-borne viruses. We commend these editors and authors for their valuable contribution to promoting safe and effective research on infectious organisms. Readers interested in guest-editing a special topic issue in either journal should not hesitate to contact the editors or staff to explore the feasibility of a contribution.

Since November 2016, the journals have been using an article-based workflow, as opposed to an issue-based workflow. This means that accepted papers are no longer assigned to a specific future issue. Rather, printed issues are comprised of the first 10 completed articles for CM and the first 15 for JAALAS. This approach allows individual articles to get online and in print as quickly as possible. As soon as an article is approved in its final form, the article is immediately published to Fast Track so it can be cited without completion or publication of the journal issue. This new approach has helped to speed up the publication pro-

Table 2. *Comparative Medicine* - Top 10 Downloaded Articles from PubMed Central

Article	Live in PMC	Total Requests			
		2014	2015	2016	2017
Graham ML, Janecek JL, Kittredge JA, Hering BJ, Schuurman HJ. 2011. The streptozotocin-induced diabetic nude mouse model: differences between animals from different sources. <i>61</i> :356–360.	2/1/2012	5203	8759	9735	10205
Lynch WJ, Nicholson KL, Dance ME, Morgan RW, Foley PL. 2010. Animal models of substance abuse and addiction: implications for science, animal welfare, and society. <i>60</i> :177–188.	12/1/2010	4039	6825	6504	9679
Novak MA, Meyer JS. 2009. Alopecia: possible causes and treatments, particularly in captive nonhuman primates. <i>59</i> :18–26.	8/1/2009	18992	16504	12492	8621
Ericsson AC, Hagan CE, Davis DJ, Franklin CL. 2014. Segmented Filamentous bacteria: commensal microbes with potential effects on research. <i>64</i> :90–98.	10/1/2014	**	**	3700	5119
Cray C, Zaias J, Altman NH. 2009. Acute phase response in animals: a review. <i>59</i> :517–526.***	6/1/2010	4467	6629	5378	4656
Tartarov I, Panda A, Petkov D, Kolappaswamy K, Thompson K, Kavirayani A, Lipsky MM, Elson E, Davis, CC, Martin SS, DeTolla LJ. 2012. Effect of magnetic fields on tumor growth and viability. <i>61</i> :339–345.	2/1/2012	2107	3083	3504	4459
Nemzek JA, Hugunin KM, Opp MR. 2008. Modeling sepsis in the laboratory: merging sound science with animal well-being. <i>58</i> :120–128.	7/17/2009	2530	3597	3645	4450
Casals JB, Pieri NC, Feitosa ML, Ercolin AC, Roballo KC, Barreto RS, Bressan FF, Martins DS, Miglino MA, Ambrósio CE. 2011. The use of animal models for stroke research: a review. <i>61</i> :305–313.	2/1/2012	2932	4273	4391	4209
Toth LA, Bhargava P. 2013. Animal models of sleep disorders. <i>63</i> :91–104.	10/1/2013	**	**	3161	4126
Bagi CM, Berryman E, Moalli MR. 2011. Comparative bone anatomy of commonly used laboratory animals: implications for drug discovery. <i>61</i> :76–85.	8/1/2011	**	**	**	4046

** New to top ten downloaded list

*** Also on the top ten cited list for 2017

Table 3. *JAALAS* - Top 10 Downloaded Articles from PubMed Central

Article	Live in PMC	Total Requests			
		2014	2015	2016	2017
Turner PV, Brabb T, Pekow C, Vasbinder MA. 2011. Administration of substances to laboratory animals: routes of administration and factors to consider. <i>50</i> :600–613.***	3/1/2012	21404	31034	40670	48836
Turner PV, Pekow C, Vasbinder MA, Brabb T. 2011. Administration of substances to laboratory animals: equipment considerations, vehicle selection, and solute preparation. <i>50</i> :614–627.	3/1/2012	8262	13013	13610	13568
Duran-Struuck R, Dysko RC. 2009. Principles of bone marrow transplantation (BMT): providing optimal veterinary and husbandry care to irradiated mice in BMT studies. <i>48</i> :11–22.***	7/1/2009	8328	11634	10792	10265
Matthews KA, Taylor DK. 2011. Assessment of sterility in fluid bags maintained for chronic use. <i>50</i> :708–712.	3/1/2012	**	**	**	7190
Cray C, Rodriguez M, Zaias J, Altman NH. 2009. Effects of storage temperature and time on clinical biochemical parameters from rat serum. <i>48</i> :202–204.	9/1/2009	3822	5974	6273	6343
Marx JO, Vudathala D, Murphy L, Rankin S, Hankenson FC. 2014. Antibiotic administration in the drinking water of mice. <i>53</i> :301–306.	11/1/14	**	**	4059	6004
Fernandez I, Pena A, Del Teso N, Perez V, Rodriguez-Cuesta J. 2010. Clinical biochemistry parameters in C57BL/6J mice after blood collection from the submandibular vein and retroorbital plexus. <i>49</i> :202–206.	9/1/2010	3109	6178	5861	5800
Turner DE, Daugherty EK, Altier C, Mauer KJ. 2010. Efficacy and limitations of an ATP-based monitoring system. <i>49</i> :190–195.	9/1/2010	4112	7131	6614	5733
Zaias J, Mineau M, Cray C, Yoon D, Altman NH. 2009. Reference values for serum proteins of common laboratory rodent strains. <i>48</i> :387–390.	1/1/2010	2490	4266	4929	5518
Keen JN, Austin M, Huang L, Messing S, Wyatt JD. 2010. Efficacy of soaking in 70% isopropyl alcohol on aerobic bacterial decontamination of surgical instruments and gloves for serial mouse laparotomies. <i>49</i> :832–837.	5/1/11	**	**	4059	4243

** New to top ten downloaded list

*** Also a top ten cited article in 2017

Table 4. *Comparative Medicine* - Top 10 cited articles*

Article	Publication year	Total number of citations as of			
		May 6, 2015	Apr. 4, 2016	Mar. 1, 2017	Feb. 14, 2018
Cray C, Zaias J, Altman NH. Acute phase response in animals: a review. 59:517–526.***	2009	137	178	223	287
Lelovas PP, Xanthos TT, Thoma SE, Lyritis GP, Dontas IA. The laboratory rat as an animal model for osteoporosis research. 58:424–430.	2008	134	162	164	203
Mansfield K. Marmoset models commonly used in biomedical research. 53:383–392.	2003	122	143	160	175
Abbott DH, Barnett DK, Colman RJ, Yamamoto ME, Schultz-Darken NJ. Aspects of common marmoset basic biology and life history important for biomedical research. 53:339–350.	2003	99	110	121	139
Dyson MC, Alloosh M, Vuchetich JP, Mokelke EA, Sturek M. Components of metabolic syndrome and coronary artery disease in female Ossabaw swine fed excess atherogenic diet. 56:35–45.	2006	93	104	113	124
Callicott RJ, Womack JE. Real-time PCR for measurement of mouse telomeres. 56:17–22.	2006	74	82	97	110
Arras M, Autenried P, Rettich A, Spaeni D, Rüllicke T. Optimization of intraperitoneal injection anesthesia in mice: drugs, dosages, adverse effects, and anesthesia depth. 51:443–456.	2001	67	79	86	93
Martini L, Fini M, Giavaresi G, Giardino R. Sheep model in orthopedic research: a literature review. 51:292–299.	2001	**	**	80	92
Hsu CC, Riley LK, Wills HM, Livingston RS. Persistent infection with and serologic cross-reactivity of three novel murine noroviruses. 56:247–251.	2006	73	80	81	86
Garner JP, Weisker SM, Dufour B, Mench JA. Barbering (fur and whisker trimming) by laboratory mice as a model of human trichotillomania and obsessive-compulsive spectrum disorders. 54:216–224.	2004	70	76	80	85

*Data collected from Web of Science

** New to top ten cited list

*** Also on the top ten downloaded list for 2017

Table 5. *JAALAS* - Top 10 cited articles*

Article	Publication year	Total number of citations as of			
		May 6, 2015	Apr. 4, 2016	Mar. 1, 2017	Feb. 14, 2018
Portfors CV. Types and functions of ultrasonic vocalizations in laboratory rats and mice. 46:28–34.	2007	138	172	191	219
Turner PV, Brabb T, Pekow C, Vasbinder MA. Administration of substances to laboratory animals: routes of administration and factors to consider. 50:600–613.***	2011	**	48	81	135
Wilson JM, Bunte RM, Carty AJ. Evaluation of rapid cooling and tricainemethanesulfonate (MS222) as methods of euthanasia in zebrafish (<i>Danio rerio</i>). 48:785–789.	2009	34	49	63	89
Matsumiya LC, Sorge RE, Sotocinal SG, Tabaka JM, Wieskopf JS, Zaloum A, King OD, Mogil JS. Using the mouse grimace scale to reevaluate the efficacy of postoperative analgesics in laboratory mice. 51:42–49.	2012	28	44	56	68
Hess SE, Rohr S, Dufour BD, Gaskill BN, Pajor EA, Garner JP. Home improvement: C57BL/6J mice given more naturalistic nesting materials build better nests. 47:25–31.	2008	**	43	52	61
Duran-Struuck R, Dysko RC. Principles of bone marrow transplantation (BMT): Providing optimal veterinary husbandry care to irradiated mice in BMT studies. 48:11–22.***	2009	**	**	44	56
Probst RJ, Lim JM, Bird DN, Pole GL, Sato AK, Claybaugh JR. Gender differences in the blood volume of conscious Sprague-Dawley rats. 45:49–52.	2006	30	35	39	49
Fernandez I, Pena A, Del Teso N, Perez V, Rodriguez-Cuesta J. Clinical biochemistry parameters in C57BL/6J mice after blood collection from the submandibular vein and retroorbital plexus. 49:202–206.***	2010	**	**	**	49
Buitrago S, Martin TE, Tetens-Woodring J, Belicha-Villanueva A, Wilding GE. Safety and efficacy of various combinations of injectable anesthetics in BALB/c mice. 47:11–17.	2008	**	**	41	47
Foley PL, Liang H, Crichlow AR. Evaluation of a sustained release formulation of buprenorphine for analgesia in rats. 50:198–204.	2011	**	**	37	46

*Data collected from Web of Science

** New to top ten cited list

*** Also a top ten downloaded article in 2017

Table 6. Journals with greatest number of citations of and citations in AALAS journals in 2017

Rank	Cited <i>Comp Med</i> articles	Cited in <i>Comp Med</i> articles	Cited JAALAS articles	Cited in JAALAS articles
1	<i>PLOS One</i> (63)	<i>Comp Med</i> (58)	JAALAS (138)	JAALAS (138)
2	<i>Comp Med</i> (58)	JAALAS (56)	<i>PLOS One</i> (69)	<i>Lab Animal-UK</i> (99)
3	JAALAS (40)	<i>J Med Primatol</i> (38)	<i>Comp Med</i> (56)	CTLAS (62)
4	<i>Vet Pathol</i> (37)	<i>Guide Care Use LA</i> (31)	<i>Lab Animal</i> (43)	<i>Lab Anim Sci</i> (42)
5	<i>J Med Primatol</i> (24)	<i>Vet Pathol</i> (28)	<i>Lab Animal-UK</i> (36)	<i>Guide Car Use LA</i> (41)
6	<i>Zebrafish</i> (21)	<i>Circulation</i> (23)*	<i>Appl Anim Behav Sci</i> (21)*	<i>Comp Med</i> (40)
7	<i>J Zoo Wildlife Med</i> (20)*	PNAS (23)*	<i>Zebrafish</i> (21)*	<i>Appl Anim Behav Sci</i> (38)
8	<i>Sci-Rep-UK</i> (20)*	<i>PLOS One</i> (23)*	<i>Sci-Rep-UK</i> (16)*	Non-traditional (34)
9	<i>Lab Animal</i> (19)*	<i>Blood</i> (19)*	<i>Vet Path</i> (16)*	<i>Am J Primatol</i> (33)
10	<i>Tox Path</i> (19)*	JAVMA (19)* <i>Lab Animal Sci</i> (19)*	<i>Exp Anim Tokyo</i> (14)	<i>Physiol Behav</i> (29)

*Tied rank

cess. In the past, we experienced a backlog of articles; however, since the implementation of this new method, the backlog of articles has been diminished. For example, we had several JAALAS articles that were accepted for publication in July and went to press in the September issue.

In October 2017, staff began using social media as a tool to help promote the journals. We are using the AALAS LinkedIn group (comprised of 6,147 members) to provide free exposure for the journals and to increase traffic to our website and our potential customer base. We hope this new approach will help the authors' network, give them valuable exposure, and increase overall customer satisfaction.

Several software enhancements to the journals will begin in the first quarter 2018. "iThenticate" gives the editors and staff the ability to check a manuscript for plagiarism at any point during the process: submission, acceptance, or just prior to pub-

lication. A new membership to "CrossRef" will configure our site to assign a digital object identifier (DOI) to manuscripts that have received a decision type of accept. A DOI is a string of numbers, letters and symbols used to permanently identify an article or document and link to it on the web. The DOI helps readers to easily locate an article from the citation and is also an advantage to prospective authors, as their accepted work will be easier to locate and cite. "Reviewer Locator" has been extended for 2018. This tool generates a list of prospective reviewers and is being used by the editors to help decrease the overall time in peer review.

As always, we welcome suggestions for improvements in the journals and encourage readers and authors to give us your opinions, perspective, concerns, and suggestions. You have our continued thanks for your support in the development and growth of the journals.