

Social media use in ornithology

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@IBIS_journal



Presented as the introduction to the BOU & RSPB Science 'the role of social media in ornithology' Round Table at #EOU2015, Badajoz, Spain, 27 August 2015



Social media use in research

We are beginning to see papers on social media use in research sector appear in recent years, including:

Social media use in the research workflow

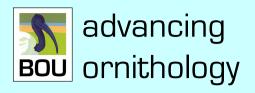
Rowlands et al. 2011. *Learned Publishing*http://www.uib.no/sites/w3.uib.no/files/attachments/nicholas_rowlands_social-media_research-workflow_2011.pdf

Online collaboration: Scientists and the social network

Van Noorden. 2014. *Nature*. [Open Access/Open Data] http://www.nature.com/news/online-collaboration-scientists-and-the-social-network-1.15711

Quantifying the role of online news in linking conservation research to Facebook and Twitter

Papworth et al. 2015. *Conservation Biology* http://onlinelibrary.wiley.com/doi/10.1111/cobi.12455/abstract



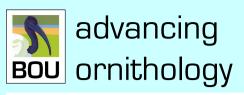
Source: Rowlands et al. 2011

Table 2: Use and non-use of social media in research by narrow subject discipline

Percentages within disciplines

| | Use social media tools in research | | | |
|------------------------------------|------------------------------------|------|--|--|
| | No | Yes | | |
| Farth sciences | 5.0 | 95.0 | | |
| Environmental sciences | 10.0 | 90.0 | | |
| Physics | 11.4 | 88.6 | | |
| Pharmacology and toxicology | 12.5 | 87.5 | | |
| Neuroscience | 13.0 | 87.0 | | |
| Life sciences | 15.8 | 84.2 | | |
| Social sciences | 16.0 | 84.0 | | |
| Mathematics and computer science | 16.3 | 83.7 | | |
| Chemistry and chemical engineering | 17.8 | 82.2 | | |
| Materials science and engineering | 17.9 | 82.1 | | |
| Arts and humanities | 20.8 | 79.2 | | |
| Biological sciences | 21.7 | 78.3 | | |
| Health sciences | 25.2 | 74.0 | | |
| Business and management | 26.3 | 73.7 | | |
| All disciplines | 20.3 | 79.7 | | |

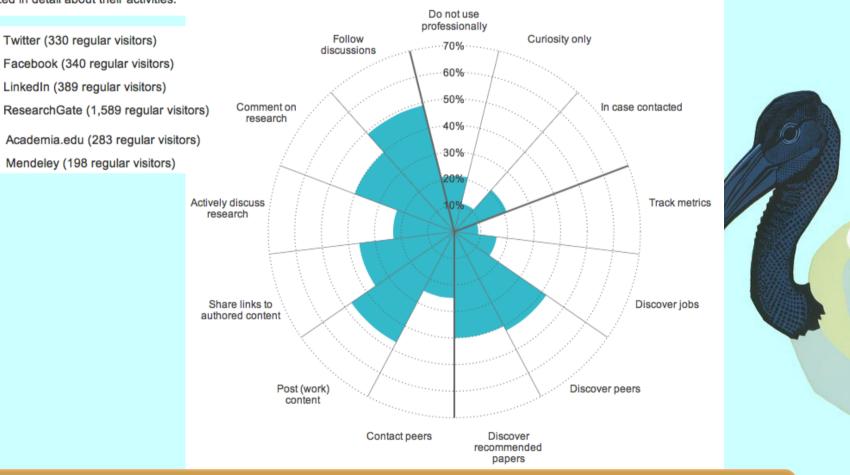
Rowlands et al (2011) showed that our sector was among the highest users of social media for our research needs



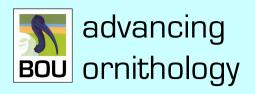
Interactive: Why scholars use social media

In *Nature*'s survey, a subset of scholars who said they 'regularly visited' social media sites were quizzed in detail about their activities.

Source: Van Noorden. 2014.

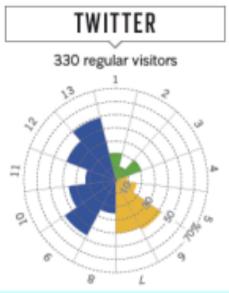


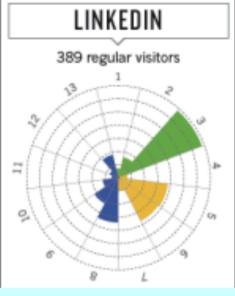
The Nature survey (2014) found increasing numbers of researchers using social media

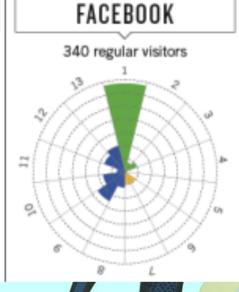


Source: Van Noorden. 2014.











- Do not use professionally
- Curiosity only; not maintaining profile
- In case contacted



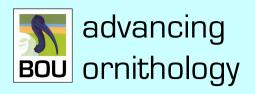
- 4. Track metrics
- Discover jobs
- Discover peers
- Discover recommended papers



- 13. Follow discussions
- 12. Comment on research
- 11. Actively discuss research
- 10. Share links to authored content
- Post (work) content
- 8. Contact peers



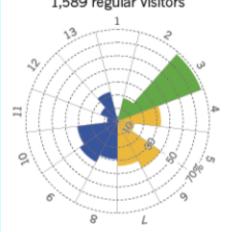
The *Nature* survey illustrated how different social media are being used by researchers, with Facebook being largely dismissed as irrelevant, and Twitter being used to actively promote research way ahead of the so-called professional platforms of ResearchGate and LinkedIn which are largely used 'to be found/contacted' and for searching for papers and peers.



Source: Van Noorden, 2014.

RESEARCHGATE

1,589 regular visitors

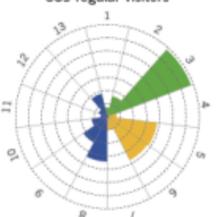


330 regular visitors



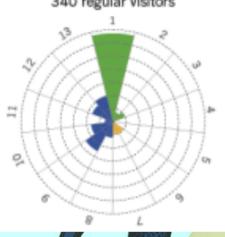
LINKEDIN

389 regular visitors



FACEBOOK

340 regular visitors



- "Mainly, a source of stress every time an e-mail pops in showing that my colleagues/ competitors are publishing more than myself." AGE 35-44, PROFESSOR, BRAZIL
- "It is the only useful community website for research purposes." AGE 55-64, PROFESSOR, HUNGARY
- "Extremely useful in conference settings."

AGE 35-44, RESEARCH SCIENTIST. UNITED STATES

"Great way to keep up-to-date on what is happening NOW in the research community."

AGE 45-54, HEAD OF ACADEMIC DEPARTMENT, UNITED STATES

"Mainly useful for job hunting." AGE 25-34, PHD STUDENT. UNITED STATES

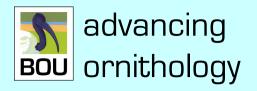
"It is too much like Facebook fluffy forwards and such that are not scientific or related to professionalism."

AGE 45-54, ASSOCIATE PROFESSOR, UNITED STATES "Facebook has zero credibility in my professional life." AGE 35-44, STAFF SCIENTIST,

UNITED STATES

"The (invitation-only) groups for professional astronomers and pulsar astronomers have become vibrant discussion fora." 35-44, RESEARCH SCIENTISTS. UNITED STATES

The survey participants comments are also quite telling



Social media aims of BOU/IBIS:

to establish an active online #ornithology community

- to promote research output/publications
 - all journals/sources not just IBIS
- to collaborate with other organisations and researchers
- to engage other researchers
- to promote ornithology within the wider ecology community



Social media tools used by BOU/IBIS:

Social networking

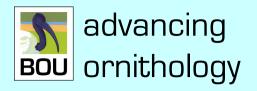
Twitter @IBIS_journal

Facebook /ibisjournal

Blogging#theBOUblog



We have kept things simple and focused on three main outlets for our social media and engagement



Social media output growth by BOU/IBIS:

| | 2012 | 2013 | 2014 |
|----------|-------|-------|-------|
| Twitter | 2,254 | 4,321 | 6,340 |
| Facebook | 1,130 | 2,317 | 5,805 |
| Blogs | 6 | 9 | 32 |

Our social media output has grown considerably in the three years to the end of 2014



1.7 Which social media platforms do you use for work or for personal use?

| responses | | | | | | | |
|-----------|------|--|--|--|--|--|--|
| Personal | Both | | | | | | |
| 54 | 32 | | | | | | |
| 11 | 22 | | | | | | |
| 0 | 0 | | | | | | |
| 0 | 0 | | | | | | |
| 0 | 0 | | | | | | |
| 0 | 0 | | | | | | |
| 8 | 0 | | | | | | |
| 2 | 0 | | | | | | |
| 2 | 0 | | | | | | |
| | | | | | | | |

Overall workplace users 19%

22%

10%

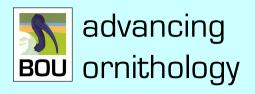
10%



Source: BOU Survey 2015

In 2015 we surveyed our IBIS readers and took the opportunity to ask them about their social media use.

Twice as many IBIS readers use Twitter and Facebook than ResearchGate and LinkedIn

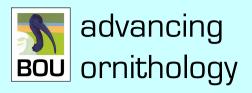


| 1.8 Do you have an online profile? If so, where? | | |
|--|-------|--|
| responses | 171 | |
| | % | |
| ResearchGate | 51.5% | |
| Institute website | 50.3% | |
| LinkedIn | 40.9% | |
| I use my Facebook account | 17.5% | |
| No profile | 17.0% | |
| I use my Twitter account | 15.8% | |
| Personal website | 13.5% | |
| Academia.edu | 12.9% | |
| Mendeley | 7.0% | |
| about.me | 2.3% | |
| Google Scholar | 3.5% | |
| Other | 2.0% | |
| | | |

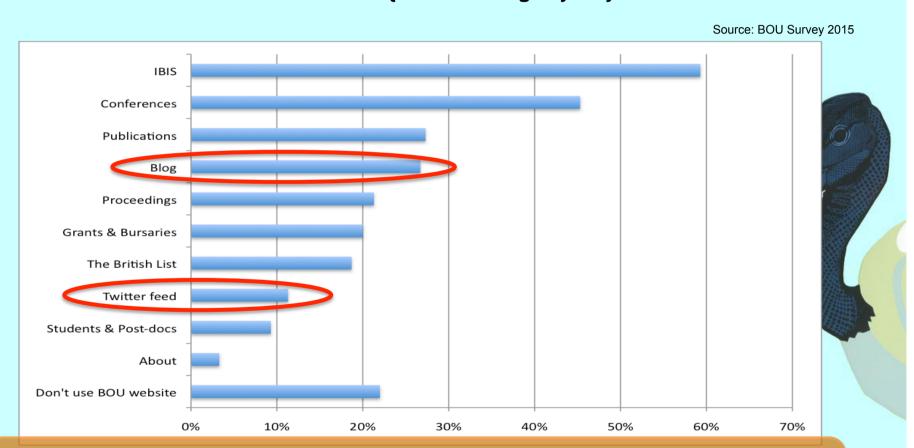
Source: BOU Survey 2015



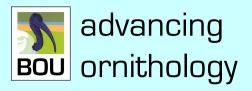
Whilst most IBIS readers had their online profile on a professional platform, over 30% use Twitter and Facebook for this. BEWARE – it is not always good to mix personal and professional needs on social media which are seen by all – friends, peers, employers, collaborators and potential future employers. Be careful of those late night boozy tweets/posts you might regret later. It maybe best to keep things separate.



What content on the BOU website (www.bou.org.uk) do you access?



Both #theBOUblog and our website Twitter feed are accessed regularly by our IBIS readers. We promote the blog heavily on Twitter and Facebook and overall it accounts for 12% of all page views on our society website.



Where do IBIS readers get their IBIS content alerts from?

Source: BOU Survey 2015

| BOU e-newsletter | 60.2% |
|------------------|-------|
|------------------|-------|

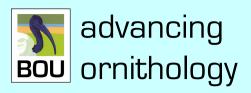
Wiley journal alerts 32.8%

BOU social media 21.1%

NA / Other 15.7%



Over 20% of our IBIS readers obtain their IBIS content alerts from our social media output. This fits with increasing numbers of people telling us that they have cancelled individual journal alerts and follow us on Twitter as their primary source of alerts for online papers as they are published.

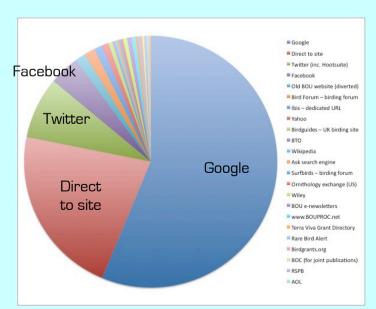


Social media originating sources to . . . [% of overall traffic]

2.5%

BOU website IBIS website
2012 4% 1%
2013 6% 1.5%

2014 11%



Source: BOU Survey 2015



We can also track the amount of traffic social media delivers to our society and journal websites, with each receiving nearly a 3x increase in three years.



The #ornithology hashtag on Twitter

Introduced for 2014

Table 4. Summary of #ornithology usage at 31 Dec 2014

| >260 |
|----------|
| |
| >29,000 |
| 54% |
| 44% |
| >400,000 |
| |

Source: BOU



In January 2014 we introduced the #ornithology hashtag on Twitter and by the end of the year it had clearly delivered a distinct group actively using the tag. Tags can be saved as a stream by users in their dashboards for immediate access to ornithology content.



The #ornithology hashtag on Twitter

BOU tweets focus on promoting papers

- 94% linked to online papers
- 6% linked to other #ornithology content



@IBIS_journal output on Twitter focuses primarily on promoting published research (mainly direct links to papers in journals) with a small amount linked to ornithological news items on the more mainstream science news sites (such as ScienceDaily, Phys.org).



Individual article metrics (Altmetrics)

Often referred to simply as Altmetrics (which is actually one company in this sector), a score is given to each published paper and is essentially a social immediacy impact factor, i.e. how much your paper is being talked about online.

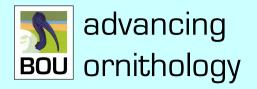
- measures the attention generated by, not quality of, an article
- only tracks public online attention
- tracks direct attention (that is items with direct links to the article)
- provides a single metric per article

Different media ranked as follows -

- News media (highest score)
- Blogs
- Social media
 - Twitter
 - Facebook (lowest score)

All items **MUST** have a direct link to your paper!

No link = no score ⊗



Individual article metrics

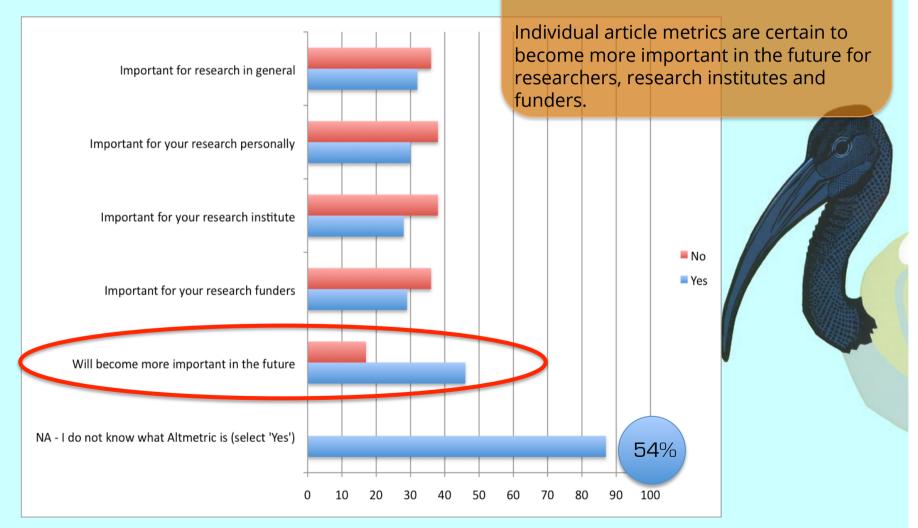
But is it important?



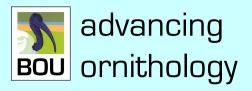
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Do you consider Altmetric . . .

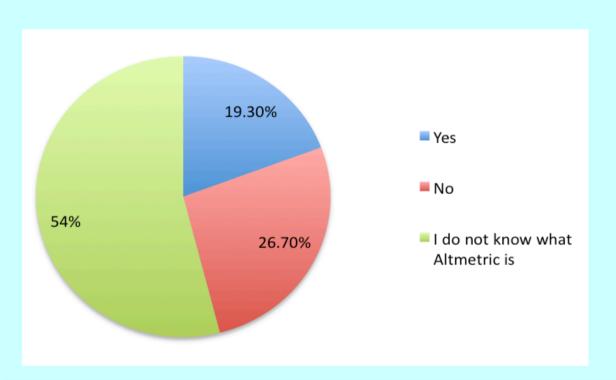
We were very surprised to find over 50% of our IBIS readers didn't know what Altmetric was.



Source: BOU Survey 2015



Would you choose to submit your work to a journal based on their Altmetric performance (i.e. as a measure of how well the journal promotes their content)?





Source: BOU Survey 2015

Those already engaged with Altmetric see the advantages to the extent that 20% of those surveyed would submit their paper to a journal which actively promotes their content on social media in order to drive their papers' Altmetric score.

Table 12. Breakdown of scoring activity for top 10 IBIS Altmetric papers (2014)

| Paper | Score | Blogs | TW | News | FB |
|--|-------|-------|-------------------------|------|-----|
| A review of the impacts of corvids on bird productivity and | 183 | 1 | 208 | 3 | 140 |
| abundance | | | | | |
| Geolocator tagging reveals Pacific migration of Red-necked | 92 | 1 | 115 | 0 | 4 |
| Phalarope breeding in Scotland | | | | | |
| Assessing the potential for Grey Squirrels to compete with birds | 60 | 0 | 47 | 3 | 2 |
| at supplementary feeding stations | | | | | |
| A horizon scanning assessment of current and potential future | 40 | 1 | 43 | 0 | 3 |
| threats to migratory shorebirds | | | | | |
| The decline of Afro-Palaearctic migrants and an assessment of | 36 | 1 | 53 | 0 | 5 |
| potential causes | | | | | |
| Age-specific survival and movement among major African | 28 | 2 | 26 | 0 | 2 |
| Penguin colonies | | | | | |
| Understanding bird collisions with man-made objects: a sensory | 26 | 1 | 22 | 0 | 1 |
| ecology approach | | | | | |
| Exposing hidden endemism in a Neotropical forest raptor using | 27 | 1 | 29 | 0 | 4 |
| citizen science | | | | | |
| A Plains-wanderer (Pedionomidae) that did not wander plains: a | 25 | 1 | 25 | 0 | 1 |
| new species from the Oligocene of South Australia | | | | | |
| Supplementary feeding increases Common Buzzard Buteo buteo | 24 | 0 | 17 | 1 | 5 |
| productivity but only in poor-quality habitat | | | | | |
| productivity but only in poor-quality habitat | | | $\downarrow \downarrow$ | | |

As seen here, we largely drive IBIS papers' Atmetric score via twitter.

Table 13. Breakdown of Twitter activity for top 10 IBIS Altmetric papers

| Paper | Score | Tweeps | Tweets | BOU | BOU | BOU | Men | Reach |
|--------------------------------------|-------|--------|--------|-----|-----|-------|------|----------------|
| | | | | Ts | RTs | + RTs | | |
| Corvids | 183 | 208 | 225 | 10 | 22 | 14% | 28% | 486k |
| Red-necked Phalarope | 92 | 115 | 174 | 17 | 53 | 40% | 38% | 142k |
| Grey Squirrels competing with birds | 60 | 47 | 46 | 6 | 10 | 35% | 36% | 89.1k |
| Threats to migratory shorebirds | 40 | 43 | 51 | 4 | 4 | 16% | 49% | 513k |
| Decline of Afro-Palaearctic migrants | 36 | 53 | 66 | 6 | 27 | 50% | 45% | 82.9k |
| African Penguin colonies | 28 | 27 | 44 | 10 | 24 | 77% | 82% | 25 . 5k |
| Endemism Neotropical forest raptor | 27 | 29 | 35 | 8 | 24 | 91% | 98% | 37.6k |
| Understanding bird collisions | 26 | 22 | 25 | 4 | 14 | 72% | 28% | 60 . 3k |
| Plains-wanderer (Pedionomidae) | 25 | 25 | 14 | 6 | 8 | 100% | 100% | 17.5K |
| Common Buzzard supp feeding | 24 | 17 | 17 | 1 | 4 | 29% | 29% | 15.7k |

The **BOU + RTs** column is the % share of Twitter activity which can be tracked to @IBIS_journal. The **Men** column indicates the overall % of tweets that mentioned @IBIS_journal.

We help to drive a paper's Altmetric score jointly with the author (top, Corvids with @arjundevamar – see Arjun's talk summary for more on this), with the research institute (second top, Red-necked Phalarope with @RSPBScience) or on our own (second bottom, Plainswanderer) when neither the author or institute is on Twitter.

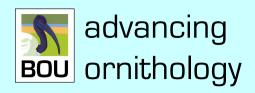


Table 18. Altmetric data for ornithology journals to 31 Dec 2014. Top performing journal in each category highlighted

| Journal | Score | Media | Blogs | Twitter | Facebook | Google+ | Mendeley | CiteULike |
|----------------------------|-------|-------|-------|---------|----------|---------|----------|-----------|
| IBIS | 2,578 | 19 | 77 | 2,508 | 275 | 19 | 7,526 | 43 |
| J of Avian Biology | 2,043 | 19 | 38 | 1,983 | 217 | 83 | 3,919 | 25 |
| Auk | 1,628 | 36 | 76 | 935 | 105 | 20 | 4,685 | 5 |
| Bird Study | 1,286 | 2 | 9 | 1,691 | 103 | 1 | 1,026 | 5 |
| J of Ornithology | 1,147 | 36 | 30 | 812 | 131 | 16 | 2,366 | 64 |
| Condor | 857 | 17 | 26 | 673 | 74 | 7 | 2,299 | 6 |
| Wilson J Ornithology | 853 | 12 | 20 | 745 | 104 | 5 | 1,308 | 0 |
| Bird Conservation Int | 820 | 16 | 8 | 842 | 61 | 0 | 1,145 | 2 |
| J Raptor Research | 784 | 53 | 9 | 347 | 42 | 0 | 427 | 1 |
| Emu | 405 | 12 | 6 | 350 | 49 | 4 | 684 | 0 |
| J Field Ornithology | 267 | 2 | 1 | 333 | 43 | 1 | 912 | 10 |
| Ostrich | 179 | 2 | 6 | 150 | 29 | 0 | 156 | 1 |
| Ardea | 188 | 0 | 1 | 225 | 48 | 2 | 172 | 0 |
| Acta Ornitholigica | 80 | 0 | 0 | 111 | 14 | 0 | 171 | 0 |
| Avian Conserv & Ecology | 43 | 1 | 0 | 31 | 6 | 0 | 172 | 0 |

IBIS is the top Altmetric performing journal in ornithology in 2014, coming top in four out of the above seven social media platforms in Altmetric, second in another and third in the remaining two.

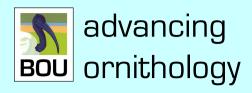


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| Condor | 857 | 17 | 26 | 673 | | 75 0/ | 7 | 2,299 | 6 |
| Wilson I Ornithology | 853 | 12 | 20 | 745 | | 75% | 5 | 1.308 | 0 |
| Bird Conservation Int | 820 | 16 | 8 | 842 | 4 | 95% | 0 | 1,145 | 2 |
| J Raptor Research | 784 | 53 | 9 | 347 | | | 0 | 427 | 1 |
| Emu | 405 | 12 | 6 | 350 | | - I J | 4 | 684 | 0 |
| J Field Ornithology | 267 | 2 | 1 | 333 | | 43 | 1 | 912 | 10 |
| Ostrich | 179 | 2 | 6 | 150 | | 29 | 0 | 156 | 1 |
| Ardea | 188 | 0 | 1 | 225 | | 48 | 2 | 172 | 0 |
| Acta Ornitholigica | 80 | 0 | 0 | 111 | | 14 | 0 | 171 | 0 |
| Ecology | 43 | 1 | 0 | 31 | | 6 | 0 | 172 | 0 |

None of the boxed journals had a dedicated Twitter account in 2014 (most still don't).

Between 75% - 95% of their respective Twitter scoring within their overall Altmetric score can be tracked back to @IBIS_journal. We are working for all authors irrespective of journal.

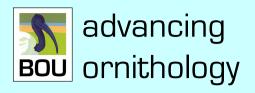


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| | IRIS | 2,578 | 19 | 77 | 2 508 | 275 | 19 | 7,526 | 43 |
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| Ì | Auk | 1,628 | 36 | /6 | 935 | 105 | 20 | 4,685 | 5 |
| | Bird Study | 1,286 | 2 | 9 | 1,691 | 103 | 1 | 1,026 | 5 |
| | J of Ornithology | 1,147 | 36 | 30 | 812 | 131 | 16 | 2,366 | 64 |
| Ц | Condor | 257 | 17 | 26 | 673 | 70 | 7 | 2,200 | 6 |
| | Wilson J Ornithology | 853 | 12 | 20 | 745 | 1 | 55% - | 1,308 | 0 |
| Ì | Bird Conservation Int | 820 | 16 | 8 | 842 | | | 1,145 | 2 |
| | J Raptor Research | 784 | 53 | 9 | 347 | | 85% | 427 | 1 |
| | Emu | 405 | 12 | 6 | 350 | 4 | _ | 684 | 0 |
| | J Field Ornithology | 267 | 2 | 1 | 333 | 43 | 1 | 912 | 10 |
| | Ostrich | 179 | 2 | 6 | 150 | 29 | 0 | 156 | 1 |
| | Ardea | 188 | 0 | 1 | 225 | 48 | 2 | 172 | 0 |
| Ц | Acta Ornitholigica | 80 | 0 | 0 | 111 | 14 | 0 | 171 | 0 |
| | Avian Conserv & Ecology | 43 | 1 | 0 | 31 | 6 | 0 | 172 | 0 |

Even for the three journals that did have a dedicated Twitter account, @IBIS_journal still contributed between 55% - 95% of their Twitter scoring, further illustrating our wider role of promoting ornithology, not just the BOU and IBIS.



If Altmetric is important to you

Publish in IBIS

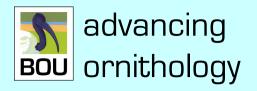
- we will drive your paper
 - 4+ original tweets per paper
 - priority access to #theBOUblog

Publish in any journal

we will still cover your paper!







My articles on #theBOUblog

- What is Altmetric?
- Social media is relevant to your research
- Making social media and the web work for you
- Twitter #masterclass 1 8 . . . and counting
- Community blogs
- See www.bou.org.uk/social-media/

