ABSTRACT

The tourism and hospitality research and publishing landscape has faced radical changes over the last decade. As a result, there have been calls for more holistic approaches for evaluating an academic's research performance. Yet, updated research on the perceptions of what constitutes 'good' research performance remains under-studied. To address this gap, the objective of this study is to examine how current university program heads in tourism and hospitality evaluate and define 'good' research performance. In doing so, this study offers insights to academics on how the goal posts are indeed shifting for performance evaluation, and provides information for program heads to assess the relative salience of their own research targets.

KEYWORDS: performance evaluation; research productivity; publication; authorship; citations

INTRODUCTION

The progression of tourism and hospitality as a field of study depends largely on the sustained growth of research scholarship (McKercher & Tung, 2015). For academics, research can contribute to career development, satisfaction, and personal reputation in the subject area (Cobanoglu & Moreo, 2004; McGrail, Richard, & Jones, 2006; Tung & McKercher, 2017). For university management, the deepening of research, oftentimes reflected in major international world university rankings, such as by QS and Times Higher Education (THE), can inform government officials and funding bodies about the excellence of the institution. Today, research outputs, citations, and research funding are just a few of the proxies used to assess an academic's research performance (Law, 2017).

The use of proxies to evaluate research performance is not without controversy. For example, simply counting the number of published articles in selected journals could encourage the rise of fractional authorship, a fallacy of increased productivity by academic researchers when in reality, individual contributions to the field remains unchanged (McKercher & Tung, 2016). Assessing academics through citation counts from databases could be incomplete for forming expert judgment as these databases do not capture a full range of current research activities, including working papers, book chapters, conference proceedings, and other forms of scholarly outputs (Law, 2017). Moreover, measuring income from external research grants is a self-fulfilling prophecy where well-published, senior researchers are more likely to be further endowed with funding than junior scholars who are seeking to secure income to start their research programs (Hamann, 2016).

Our field has not been immune to the metrification of research performance. An early study by Law & Chon (2007) investigated the perceived importance of a number of research-related metrics for evaluating research performance from the perspective of university program heads in tourism and hospitality. These individuals carried the titles of heads,

directors, deans, and/or chairs of tourism and hospitality schools, departments, and/or divisions. Only seven metrics (e.g., publications in research books, full papers in first-tier and second-tier journals, sole authorship, chief editorship, winning external research grants, and supervising doctoral students) were viewed as important or very important out of a total of 31 items.

There have been calls for more holistic and comprehensive approaches for evaluating research performance given the radical changes in the tourism and hospitality research and publishing landscape over the last decade (Dev, Parsa, Parsa, & Bujisic, 2015; Law, Leung, & Buhalis, 2010). Sole authorship has been replaced with three or more authored papers as the norm (McKercher & Tung, 2015). The exponential growth in both the number of submissions to top-tier journals coupled with the long tail of tourism and hospitality research have exacerbated the significance of publishing in first- and second-tier journals (Airey, Tribe, Benckendorff, & Xiao, 2015). Consequently, perceptions of research performance are likely to differ among university heads today than over ten years ago.

The objective of this study is to examine how current university program heads in tourism and hospitality evaluate and define 'good' research performance. In doing so, this study offers insights to tourism and hospitality academics on how the goal posts are indeed shifting for performance thresholds from a broader perspective (Tung & McKercher, 2017), and provides information for program heads to assess the relative salience of their own research targets.

EVALUATING RESEARCH PERFORMANCE

Evaluating research performance is difficult, with proxies for assessing research performance controversially hinging on the balance between research quantity and quality. Research 'quantity' often refers to the use of straightforward counting methods, such as the

number of publications and authorship, as proxies of scientific impact (Hall, 2011; Haslam &
Laham, 2010). The key argument for the use of publication counts and authorship analysis is
that they reflect academic leadership in the field; that is, they reflect the superior capabilities
that scholars have in communicating and propagating knowledge throughout their respective
areas (Sheldon, 1991; Zhao & Ritchie, 2007). Publication counts can also encourage faster
dissemination of research; for example, scholars in the United Kingdom substantially
increased their journal article production after total publication counts were included in the
Research Assessment Exercise (RAE) (Moed, 2007).

The counterargument, however, is that publication count and authorship analysis
drives towards appeasing a quantitative-based evaluation system that could pressure
academics to adopt certain questionable research and publishing approaches (Tung &
McKercher, 2017). Publication quantity can be maximized through the salami slicing of a
larger research project into smallest publishable units (Boff, 2012). Researchers could opt for
marginal or derivative topics for the sake of increasing publication count (Haslam & Laham,
2010). A range of authorship tactics could also be adopted by academics to reach output
targets; for example, gift authorship could occur when authors' names are added in
expectation of some reciprocal benefit in the future (Dighe & Berquist, 2011).

In response to the above, evaluations of research performance typically include
proxies for measuring research 'quality', suggesting that quality work is more important than
mere quantity. Research 'quality' refers to the contribution that an idea, or an author, has
made to the progress of knowledge in a field (Meho & Sonnewald, 2000). Here, the prestige
and reputation of a journal is oftentimes used as a means of assessing research quality as
journal quality can have significant influence on inspiring potential research activities
(Aksnes & Rip, 2009; Dev et al., 2015). This is commonly based on the views of expert
panels, where experts provide knowledgeable and unbiased views on journal rankings (Lee &

Law, 2011; McKercher, Law, & Tam, 2006; Pechlaner, Zehrer, Matzler, & Abfalter, 2004). Understanding the rank and tier of academic journals is an important step toward comprehending research productivity (Lee & Law, 2011), and junior researchers are often advised to publish in the most selective and prestigious journals (Haslam & Laham, 2010).

Counting publications or appearance of authors in 'quality', selected journals have been common in tourism and hospitality for many years. Samenfink and Rutherford (2002) calculated the total appearance of different authors and identified the top 85 individuals with the most contributions to four hospitality journals within a 10-year period. Zhao and Ritchie (2007) counted the number of publications in eight tourism journals over a 20-year period and identified 57 leading tourism scholars. Recently, Zhang, Lan, Qi, and Wu (2017) ranked the top 100 tourism researchers in the Chinese tourism community based on the frequency of authors who appeared in selected journals.

Simply counting the number of publications an author has in 'quality' journals could also problematic. Multi-authorship is now the norm and the single author is an endangered species (McKercher & Tung, 2015). On one hand, multi-authorship could signal increased collaboration over single authorship (Jogaratnam et al., 2005). On the other hand, treating every author equally may not objectively reveal the performance of individual scholars, and the result is the rise of the phenomenon of fractional authorship: an illusion of increased productivity by academic researchers when in reality, individual contributions to the field remains unchanged (McKercher & Tung, 2016). Indeed, tourism and hospitality department heads have viewed sole authorship and first authorship as more important than second and third authorship in evaluating an academic's research performance (Law & Chon, 2007).

Another widely used approach to assess an academic's research performance is citation analysis (Alexander & Mabry, 1994; McKercher et al., 2006; Lee & Law, 2011). Citation indices seek to measure the frequency an article, or articles in a journal, are cited in

other papers and journals, over a period of time (McKercher et al., 2006). This is based on the notion that the actual use of journals and their articles should determine journal quality (Katerattanakul, Han, & Hong, 2004). McKercher (2008) suggested that a scholar's influence on research could also be evaluated by his/her citation performance. When applied at the individual-level, citation indices, such as the h-index and i-index, can be used as proxies to assess a scholar's quality of contributions and scientific reputation (Aksnes, 2006; Aksnes & Rip, 2009). In tourism and hospitality, Jamal, Smith, and Watson (2008) ranked tourism academic researchers by most cited articles using ISI and Google Scholar. McKercher (2008) listed the most frequently cited tourism researchers based on Google Scholar results for the periods 1970-2007 and 1998–2007, and included the h-index (i.e., reflecting a scholar having h publications with at least h citations each). However, critics of citation analysis argue that citation counts may implicitly bias only the 'top-tier' journals but neglect high-quality articles in 'lower-tier' journals (Dev et al., 2015). Moreover, citation indices could be inflated by self-citations (Law, 2017).

Finally, other studies have focused on an academic's ability to attract research grants as another proxy for evaluating research performance (Valadkhani & Worthington, 2006). In contrast to publication count, authorship, and citation indices, which are proxies of research outcomes, the ability to secure research grants in competitive funding environments reflect performance from proposed research input. This approach acknowledges the tremendous risks, high costs, and uncertainty that an academic is preparing to undertake to perform high quality research, instead of rewarding outputs that oftentimes only support existing knowledge through repetition, which adds limited value to existing knowledge (Ryan, 2005). Dev et al. (2015) developed a multi-criteria assessment method and included the ability to secure research grant as a measurement in their Dp2 index of research performance. The Research Excellence Framework (REF, 2014) in the UK required universities to submit items

in different categories, such as output, research income, and description of the environment and esteem indicator. The Research Assessment Exercise (RAE) in Hong Kong, which generally follows the REF system, also evaluates the achievements of researchers based on three criteria: research output, external research grants, and esteem measures (e.g. winning research awards and serving as journal editors) (University Grants Committee, 2017).

METHOD

Measurement instrument and sample

This study seeks to determine the views of university program heads on a range of issues relating to research performance. A questionnaire with both closed and open-ended questions was developed and pre-tested with three senior-level academics in tourism and hospitality programs who are responsible for research performance evaluations and academic affairs, including appointment and promotion decisions. Respondents were asked to provide feedback on the clarity of the questions and comment on the coverage and length of the questionnaire.

The closed ended questions sought information on how respondents perceived the importance of a range of proxies relating to publications, authorship, services to the field, and student supervision. Questions on citations and authorship indices (e.g., h-index) were also incorporated for a more inclusive coverage (Köseoglu, Sehitoglu, & Craft, 2015; Law, Lee, & Au, 2013). These questions were presented in a seven-point Likert-scale that ranged from 1 (very unimportant) to 7 (very important). Respondents were given an opportunity to specify additional items that they considered relevant in evaluating research performance, and then rate those items in the seven-point Likert-scale.

Open-ended questions sought elaboration on these issues by asking respondents to define what they consider as 'good' research and research performance of academic staff in their departments. Demographic questions were also collected, such as respondents'

education background, geographic location, and types of programs that are offered by the academic department that they are residing in (e.g., travel and tourism, hotel and hospitality management, food services, leisure and recreation, and/or events management).

An online questionnaire was finalized after the pretest, and an email invitation to the questionnaire was sent to program heads between January and March 2017 based on a database compiled from the membership lists of Council on Hotel, Restaurant, and Institutional Education (CHRIE), Asia Pacific Tourism Association (APTA), Law and Chon (2007), and personal contacts of the authors. Program heads are often involved in policy formulation and decision-making in research-related activities, and can carry the titles of heads, directors, deans, and chairs of tourism and hospitality schools, departments, and divisions. A total of 461 invitations were distributed and 85 individuals responded; however, 17 surveys had to be discarded, leaving a usable sample of 68 cases.

Data analysis

Quantitative data from the closed-ended questions was analyzed using SPSS. Descriptive statistics were used to obtain summaries for demographic variables. The perceived importance of each research performance indicator in the present study were compared with mean scores reported in Law and Chon (2007) in an effort to highlight whether today's changes signal a more balanced approach to performance evaluation compared to a decade ago. Change scores were calculated for each performance category from Law and Chon (2007) to the present study.

Content analysis was used to interpret qualitative data from the open-ended responses. The authors coded the open-ended responses to identify key domains. Each word or phrase that indicated a single exemplar was recorded. Words or phrases were deemed to reflect a common theme if they contained similar ideas; for example, responses that suggested the use

of sanctioned "journal lists" for defining good research performance included publications in "ABS" (Association of Business Schools) and "ABDC" (Australian Business Deans Council) lists. Original quotes and exemplars that were considered representative and insightful were extracted and presented in their original form.

RESULTS

A good geographic spread of respondents participated in this study (see Table 1). Respondents represented a number of countries and regions in North America (e.g., US and Canada), Asia Pacific and Oceania (e.g., Mainland China, South Korea, Taiwan, and Australia), and Europe (e.g., UK, France, and Austria). Most respondents hold a doctoral degree (96.8%), and work in a department with less than 25 full-time academic staff (63.3%). Many institutions offer multiple research areas, including travel and tourism (33.3%), hotel and hospitality management (33.3%), events management (18.6%), leisure and recreation (7.8%), and food services (6.9%). There was a broad distribution of substantive degree programs by institutions: 38.9% offers a bachelor's degree, 30.9% offers a master's degree, and 22.1% offers a doctoral degree.

--- Insert Table 1 here ---

Publications and research grants

The importance of publishing and securing research grants is shown in Table 2. Publications are separated into three categories: journals, conferences, and books. Under publications, full papers in first-tier journals, SSCI journals, and second-tier journals were the most important research activities, followed by keynote presentations, refereed conference papers, research books, and monographs. In terms of ranking, the importance of these items are largely consistent with 2007 with the exception of full papers in SSCI journals, which is an additional measure in the present study.

Interestingly, the perceived importance of all publication metrics decreased dramatically from observed ratings in 2007. In 2007, full paper publications in first- and second-tier journals were rated as critically important, followed by full papers in other journals and research notes in first-tier journals. Today, only full papers in first-tier and SSCI journals were rated as "important" while almost all other publication activities were regarded as only "somewhat important." This finding is particularly surprising given the exponential growth in the number of papers published in tourism and hospitality over the past 40 years (McKercher & Tung, 2015). Academics, regardless of substantive rank, are feeling pressured to submit papers to refereed journals (Tung & McKercher, 2017); yet, program heads in tourism and hospitality reported here that simply measuring the raw number of published refereed articles have, in general, become less important in their evaluations of an academic's research performance.

When compared to the number of refereed full papers, securing external research grants has become the most important indicator for evaluating research performance, surpassing publications in journals, conferences, and books. Academics are increasingly encouraged to win external research grants to finance their research programs (Hottenrott & Lawson, 2017), and securing research grants remains an important and significant incentive even for the most productive researchers (Kelchtermans & Veugelers, 2011). This observation also lends support to the changing landscape of institutional funding and assessment. For example, Hamann (2016) analyzed UK history departments and their assessments in the three most recent Research Assessment Exercises (RAE) (i.e., 2001 and 2008) and Research Excellent Framework (REF) (i.e., 2014). Since departments file their funding data to the RAE/REF and the data directly influences the assessments, the RAE/REF further strengthens established institutions that are already successfully attracting external grants. This is a part of a self-fulfilling prophecy of rewarding those departments with the

best assessments that have already attracted the most external funding, which in effect, further endows departments that perform well in the RAE/REF assessments through public funds, enabling them to have advantages in future external funding competitions.

--- Insert Table 2 here ---

Authorship and citations indices

A number of previous studies have reported on authorship and citations indices in an attempt to capture the contributions of prolific scholars (Jogaratnam et al., 2005; Li & Xu 2014; Sheldon, 1990; Ryan, 2005; Zhao & Ritchie, 2007). Meanwhile, other scholars have sought to examine the trends toward multiple authorship in tourism research as the interdisciplinary nature of the field encourages scholars to work with others outside the field, and allows researchers from outside the field to publish within the field (McKercher & Tung, 2015). In this regard, are trends toward multiple authorship affecting how program heads evaluate research performance?

Table 3 summarizes the perceived importance of authorship and citations indices on performance evaluation. Overall, decreases were reported in the importance of authorship indicators from 2007 to 2017. Sole and first authorship were reported as important whereas second and other authorship were only somewhat important.

Citation indices represent activities captured in the present study that were not included in Law and Chon (2007). In general, total citations were perceived as more important than specific citation counts in Scopus, Google Scholar, or Web of Science. An academic's h-index in Scopus and Google Scholar were more relevant than the h-index in Web of Science.

--- Insert Table 3 here ---

Service to the field and the supervision of students

So far, the reported importance of publications, research grants, and authorship has generally declined from 2007 to 2017. So which activities for evaluating research performance have actually increased in significance over the last ten years? Insights to this question came from answers to the last set of proxies on the perceived importance of services to the field and supervision of students, as shown in Table 4.

--- Insert Table 4 here ---

In contrast to the declining significance of publications activities and authorship metrics as indicators of research performance, the values attributed to services to the field have not dramatically dropped between 2007 and 2017. Instead, during this time, merit from organizing conferences have increased, overtaking the importance of holding leadership positions, being members of scholarly organizations, and acting as editors and reviewers for conferences. Organizing conferences was reported almost as important as being a guest editor, reviewer, and member of an editorial board. This observation comes with a number of caveats, though, the ratings do not provide insight into the relative value of organizing some conferences over others. Some conferences have a long history of being multi-national, attracting a relatively large number of attendees annually, while some are regional, representing chapters of a larger organization. Still, there are other conferences that are relatively local, as in the case of conferences in some Asian economies.

Defining good research and research performance

A number of different views were provided when respondents were asked to define what they perceived as 'good' research. A respondent in Canada suggested that, "quality research is research that gets published in upper tier journals and research that gets funded externally." This view is echoed by a number of respondents, with many based in the United States (US), Australia, and South Korea, adding that good research is "based on the rank of journals", "publications in top tier journals", and "published papers [in] SSCI journals with high IF (impact factor)." In contrast, a number of scholars in Europe provided an alternative perspective, reflecting views that good research should be "theoretically sophisticated and - if appropriate - empirically robust" (Respondent from the UK) and "methodologically state-of-the-art and at the same time relevant to professionals" (Respondent from Netherlands)." Insightfully, several respondents also expressed different views beyond traditional approaches, suggesting good research is based on whether "the outcomes yield new intellectual property that has the potential for generating patents, licenses or new business start-ups" (Respondent from the US), and the "application of findings in industry or government context" (Respondent from Australia). Indeed, a respondent from the US reminded us that the definition of good research could also depend on the substantive-level of the faculty member being evaluated: "For senior faculty, reputation of research matters. For junior faculty, evaluation by external evaluators is key."

Despite the above comments acknowledged by respondents to embrace a more holistic approach to defining good research, how program heads evaluate research performance continues to be dominated by output-based measures. These include publications in first-tier journals, SSCI journals, "ABS rankings", "ABDC lists", or a "list agreed upon by faculty." Other proxies include "order of authorship", "citations", and "h-

index", as covered by the closed-ended questions in this study. These were considered "standard publication reporting requirements."

DISCUSSION

This study investigated how program heads in tourism and hospitality are evaluating research performance. The findings provide insight into what they view as important criteria covering publications, research grants, authorship, citation indices, services to the field, and student supervision. The question becomes are the observations in the present study a general reflection of "business as usual" as ten years ago in Law and Chon (2007), or indicative of changing priorities in performance evaluation by program heads in tourism and hospitality? The findings here suggest the latter.

The findings suggest that program heads in tourism and hospitality are progressing away from a fundamentally output-driven approach to a more selective view; in fact, publishing full papers in first-tier and SSCI-listed journals were the only two outlets that were rated as "important" while all other channels of dissemination, including second-tier journals, research notes, conference papers, and books, were regarded as "neither important nor unimportant" or "somewhat important." This observation suggests that although evaluating academics by 'counting their output' has traditionally helped universities worldwide increase their number of publications, program heads are now better aware of the potential, and perhaps collateral damage that 'increased productivity' may cause to the institution's academic reputation if faculty are pressured into publishing repetitive and uninspiring work that hampers the intellectual development of the field.

Program heads are likely now more motivated to enhance their academic reputation as an institution's academic reputation is imperative (and even measureable), at least in the latest QS World University Rankings by Subject 2017 for Hospitality and Leisure

Management (QS Top Universities, 2017). While the debate surrounding this ranking is beyond the scope of this paper, the key point is that the ranking is now in the public domain, and university management, current and prospective students, and parents will look towards this ranking in their respective decision-making capacities. Universities are gradually more concerned with, and interested in, having their institutions ranked highly, and surely, program heads in tourism and hospitality will try to improve their programs' reputation among their academic peers. Furthermore, since a large part of the ranking is based on research output, program heads may discourage faculty from publishing 'quantity' in 'lower-tier' journals over 'quality' in SSCI-listed or 'top tier' journals.

Today, a number of jurisdictions are adopting the RAE system as a reflection of accountability for public money in publicly funded universities. The RAE system continues to change, and this influences the way in which research is evaluated. More universities that are subject to some forms of RAE are beginning to recognize only high impact research publications as qualified research output. For example, a large government-funded university in Hong Kong has moved to the stage of recognizing (1) any published output; (2) only output in refereed journals; (3) only top-tier output in the institution's list of recognized journals; and finally, (4) output that clearly demonstrates an impact.

There are currently over 300 dedicated tourism, hospitality, and event journals in our field (International Academy for the Study of Tourism, 2016), but only 58 titles are reported in the Scopus database (McKercher & Tung, 2015). Aside from the three traditionally highly rated journals, overall tourism research is still perceived as relatively weak with a long tail of mediocre outputs (Airey et al., 2015). If program heads spurn research output in second-tier or other journals, and only encourage publications in SSCI-listed or top-tier journals, one must wonder how this trend may affect the broader structure of tourism research and publishing. On the one hand, researchers may be pressured to submit their manuscripts to a

handful of journals, regardless of whether their research is truly the best fit, in the hopes of publication. On the other hand, researchers may limit their research programs to only those topics that they think would fit the aims and scopes of certain titles.

The qualitative responses differed dramatically from the observed indicators, which emphasized the supervision of doctoral and master-level students as the key performance criteria. Only a limited number of respondents commented on the "completion of PhD supervisions" and "mentoring of graduate students" as a part of the evaluation process. If so, how may the two views – publications and student supervision – reconcile in the broader context of performance evaluation? Insights to this issue could potentially come by combining the observations in the present study with current trends in the tourism and hospitality research career landscape.

Today, there are a record number of doctoral students, and prospective tourism academics face a much tougher environment. The high supply of graduates vying for a full time position means that candidates must hold a doctorate qualification, and have an extensive publication record just to qualify for an interview. As a result, new and emerging scholars, including doctoral students nearing the end of their studies, are under pressure to collaborate with faculty members and choose research projects that can be completed quickly (Tung & McKercher, 2017). In response, faculty members are publishing evermore frequently with students, as faculty members are responsible, at least partially, for ensuring the success of their graduates. Faculty members who supervise a growing number of productive students could exponentially increase their own publication record, particularly at institutions that award 'doctorates by publication' or use the 'papers' doctorate model – by contrast to the traditional thesis model – that consists of usually three or more separate but related papers of publishable quality (Draper, 2012; Jump, 2015). In effect, this could enable a faculty member to satisfy two critical performance metrics concurrently (e.g., supervision

and journal publications), and see increases in their citation counts and publication indices over time.

Limitations, and future research

There are limitations from this study and opportunities for future research that needs to be acknowledged. The current sample of 68 cases is respectable, but it is by no means exhaustive or representative of all tourism and hospitality programs worldwide. While this study achieved better geographical proportion from respondents in Europe compared to Law and Chon (2007), the number of completed questionnaires is not large in its absolute sense. Also clearly missing from the sample are respondents from South America and Africa, which also have growing numbers of tourism and hospitality programs. Future research should aim to better understand the proxies used to define 'good' research performance in these regions.

A number of changes have been evident since 2007; for example, some program heads retired since 2007 while new faculty members have been promoted to head of department by 2017. The current sample correspond to individuals who hold this position in 2017, rather than equivalence in respondents themselves per se. In this regard, the limitation is that the differences over the 10 years are based on the substantive positions of respondents who may not be in that same position in 2007; hence, the results could be influenced by the respondents themselves as they are not equivalent to respondents from 10 years ago.

The questionnaire primarily focused on how respondents perceived the importance of a range of proxies related to publications, authorship, service to the field, student supervision, citations and authorship indices. Respondents may have been influenced by their university guidelines such that they responded accordingly, despite situations where their opinions may differ from those of their institutions. This study asked respondents to share their own personal perceptions when they responded; nevertheless, a limitation is that this study did not

control for potential biases in their responses. Furthermore, this study sought to assess research evaluation, but it did not seek to identify "where" the pressure on university program heads is coming from.

Academics in tourism and hospitality are working in an applied field that seeks to provide managerial, sociocultural, environmental, and/or economical implications based on relevant and rigorous research to a broad readership that includes government policymakers, managers in industry, and destination management organizations. These stakeholders are critical readers of our work, and they too, will evaluate the relevance and rigour of research. Future research can certainly extend this study and identify areas that are most relevant for different readers when they evaluate individual pieces of research, as well as the aggregated research performance of tourism and hospitality institutions.

REFERENCES

Aksnes, D. W. (2006). Citation rates and perceptions of scientific contribution. *Journal of the American Society for Information Science and Technology*, *57*(2), 169-185.

Aksnes, D. W., & Rip, A. (2009). Researchers' perceptions of citations. *Research Policy*, *38*(6), 895-905.

Alexander, J. C., & Mabry, R. H. (1994). Relative significance of journals, authors, and articles cited in financial research. *Journal of Finance*, *49*(2), 697-712.

Airey, D., Tribe, J., Benckendorff, P., & Xiao, H. (2015). The managerial gaze: The long tail of tourism education and research. *Journal of Travel Research*, *54*(2), 139-151.

Boff, G. (2012). *Ethics among scholars in academic publishing.* Retrieve from http://proc.isecon.org/2012/pdf/1948.pdf

Cobanoglu, C., & Moreo, P. J. (2004). Hospitality research: Educators' perceptions. *Journal of Hospitality & Tourism Education*, 16(2), 9–20.

Dev, C. S., Parsa, H. G., Parsa, R. A., & Bujisic, M. (2015). Assessing Faculty Productivity by Research Impact: Introducing Dp2 Index. *Journal of Teaching in Travel & Tourism*, *15*(2), 93-124.

Dighe, M. K., & Berquist, T. H. (2011). Education in authorship ethics: should it be compulsory?. *American Journal of Roentgenology*, *196*(2), 235-236.

Draper, S. W. (2012). *PhDs by publication.* Retrieved from http://www.psy.gla.ac.uk/~steve/resources/phd.html

Hamann, J. (2016). The visible hand of research performance assessment. *Higher Education*, 72(6), 761-779.

Haslam, N., & Laham, S. M. (2010). Quality, quantity, and impact in academic publication. *European Journal of Social Psychology*, *40*(2), 216-220.

Hottenrott, H., & Lawson, C. (2017). Fishing for Complementarities: Research Grants and Research Productivity. *International Journal of Industrial Organization*, 51, 1-38.

International Academy for the Study of Tourism. (2016). *Dedicated Tourism, Hospitality and Events Journals*. Retrieved from http://www.polyu.edu.hk/htm/academy/journals.php.

Jamal, T., Smith, B., & Watson, E. (2008). Ranking, rating and scoring of tourism journals: Interdisciplinary challenges and innovations. *Tourism Management*, 29(1), 66–78.

Jogaratnam, G., Chon, K., McCleary, K., Mena, M., & Yoo, J. (2005). An analysis of institutional contributors to three major academic tourism journals: 1992–2001. *Tourism Management*, *26*(5), 641-648.

Jump, P. (2015). *PhD: Is the doctoral thesis obsolete*. Retrieved from https://www.timeshighereducation.com/features/phd-is-the-doctoral-thesis-obsolete/2020255.article

Katerattanakul, P., Han, B., & Hong, S. (2003). Objective quality ranking of computing journals. *Communications of the ACM*, *46*(10), 111-114.

Kelchtermans, S., & Veugelers, R. (2011). The great divide in scientific productivity: Why the average scientist does not exist. *Industrial and Corporate Change*, *20*(1), 295-336.

Köseoglu, M. A., Sehitoglu, Y., & Craft, J. (2015). Academic foundations of hospitality management research with an emerging country focus: A citation and co-citation analysis. *International Journal of Hospitality Management*, *45*, 130-144.

Law, R. (2017). Ranking individuals in tourism and hospitality research. *Tourism Recreation Research*, 42(3), 392-397.

Law, R., & Chon, K. (2007). Evaluating research performance in tourism and hospitality: The perspective of university program heads. *Tourism Management*, *28*(5), 1203-1211.

Law, R., Lee, H. A., & Au, N. (2013). Which journal articles are uncited? The case of the Asia Pacific Journal of Tourism Research and the Journal of Travel and Tourism Marketing. *Asia Pacific Journal of Tourism Research*, *18*(6), 661-684.

Law, R., Leung, R., & Buhalis, D. (2010). An analysis of academic leadership in hospitality and tourism journals. *Journal of Hospitality & Tourism Research*, *34*(4), 455-477.

Lee, H. A., & Law, R. (2011). Research productivity and institutional characteristics of hospitality and tourism programs. *Journal of Travel & Tourism Marketing*, *28*(4), 432-450.

Li, J.-L., & Xu, Y.-M. (2014). Author analyses of tourism research in the past thirty years based on ATR, JTR and TM. *Tourism Management Perspectives*, 13, 1-6.

McGrail, M. R., Rickard, C. M., & Jones, R. (2006). Publish or perish: a systematic review of interventions to increase academic publication rates. *Higher Education Research & Development*, *25*(1), 19-35.

McKercher, B. (2008). A citation analysis of tourism scholars. *Tourism Management*, 29, 1226–1232.

McKercher, B., Law, R., & Lam, T. (2006). Rating tourism and hospitality journals. *Tourism Management*, *27*(6), 1235-1252.

McKercher, B., & Tung, V. (2015). Publishing in tourism and hospitality journals: Is the past a prelude to the future?. *Tourism Management*, *50*, 306-315.

McKercher, B., & Tung, V. (2016). The rise of fractional authors. *Annals of Tourism Research*, *61*, 213-215.

Meho, L. I., & Sonnenwald, D. H. (2000). Citation ranking versus peer evaluation of senior faculty research performance: A case study of Kurdish scholarship. *Journal of the American society for Information Science*, *51*(2), 123-138.

Moed, H. (2007). UK Research Assessment Exercises: Informed judgments on research quality or quantity? *Scientometrics*, *74*(1), 153-161.

Pechlaner, H., Zehrer, A., Matzler, K., & Abfalter, D. (2004). A ranking of international tourism and hospitality journals. *Journal of Travel Research*, *42*(4), 328-332.

QS Top Universities. (2017). *QS World University Rankings by Subject 2017 for Hospitality and Leisure Management*. Retrieved from https://www.topuniversities.com/university-rankings/university-subject-rankings/2017/hospitality-leisure-management.

Research Excellence Framework. (2014). *REF2014*. Retrieved from http://www.ref.ac.uk/.

Ryan, C. (2005). The ranking and rating of academics and journals in tourism research. *Tourism Management*, 26, 657–662.

Samenfink, W. H., & Rutherford, D. G. (2002). Most frequent contributors to the hospitality literature: A ten-year update. *Journal of Hospitality & Tourism Education*, 14(3), 5–15.

Sheldon, P. J. (1991). An authorship analysis of tourism research. *Annals of Tourism Research*, *18*(3), 473-484.

University Grants Committee. (2017). *Research Assessment Exercise 2014*. Retrieved from http://www.ugc.edu.hk/eng/ugc/activity/research/rae/rae2014.html

Valadkhani, A., & Worthington, A. (2006). Ranking and clustering Australian university research performance, 1998–2002. *Journal of Higher Education Policy and Management*, *28*(2), 189-210.

Tung, V. W. S., & McKercher, B. (2017). Negotiating the rapidly changing research, publishing, and career landscape. *Tourism Management*, *60*, 322-331.

Zhang, L., Lan, C., Qi, F., & Wu, P. (2017). Development pattern, classification and evaluation of the tourism academic community in China in the last ten years: From the perspective of big data of articles of tourism academic journals. *Tourism Management*, 58, 235–244.

Zhao, W., & Ritchie, J. B. (2007). An investigation of academic leadership in tourism research: 1985–2004. *Tourism Management*, *28*(2), 476-490.