Institutional Concentration of Leisure Research: A Follow-up to and Extension of Jackson (2004)

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Abstract

The purpose of this study was to examine whether the institutional concentration of North American leisure research has increased, decreased, or remained the same over the past two decades. To address this question, we compared data from 2000 to 2008, composed of 1,884 published articles and abstracts, 4,293 authorships, 1,461 authors, and 246 institutions, with data from 1990 to 1999 collected by Jackson (2004). Overall, our results suggest that while more are doing a little, a few are doing more. Findings are discussed, and it is proposed that leisure studies could benefit from even greater institutional concentration.

KEYWORDS: Leisure, metrics, productivity, research, university

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Although measuring and ranking universities first began over a century ago (Massengale, 1987), doing so has become increasingly common in this century. In our own broadly defined discipline, for example, Thomas and Reeve (2006) ranked U.S. kinesiology and physical education programs; Jackson (2004) ranked U.S. and Canadian recreation and leisure studies programs; and Severt, Teson, Bottorff, and Carpenter (2009) ranked hospitality and tourism programs worldwide.

Massengale (1987) held that rankings have long played a major role in higher education because "they serve as a measure of prestige, and prestige in higher education is very important" (p. 97). O'Meara (2007) posited that the pursuit of prestige—or what she called striving—has become increasingly rampant as the result of various economic, political, historical, ecological, and sociological factors.

Another reason ranking has become more common is the growing call for greater efficiency and accountability in higher education. The Association of Governing Boards of Universities and Colleges' publication recently stated:

Trustees should review indicators that monitor quality as well as financial performance in their dashboards [i.e., set of metrics]. Trend data for successive years at the board's own institution and comparative data from similar institutions can also be useful in keeping a broad perspective on the institution's progress and place in higher education. (Trusteeship, 2011, p. 8)

Such grading schemes, it should be noted, have already been implemented at the national level in Australia (i.e., Research Quantum), the United Kingdom (i.e., Research Assessment Exercise), and numerous other countries around the world (Barker, 2007; Butler & McAllister, 2011; Geuna & Martin, 2003).

Regardless of why ranking has become widespread, the reality is that this process can provide insight into the state of a department or university as well asand more importantly for this article—the state of a field that includes multiple departments and universities. In terms of leisure studies, for instance, Jackson (2004) reported the results of a comprehensive analysis of all of the research articles published in six major leisure journals, and all of the abstracts published in 14 leisure conference proceedings, during the 1990s. His stated purpose in doing so was to "identify key characteristics of the community of leisure scholars in North America and to use patterns derived from data about publication activity as a platform for discussing the nature and implications of concentration in leisure research at the individual and institutional levels" (p. 323). Among Jackson's findings were that the top 10 North American universities were responsible for 38.8% of all authorships while the top 3.4% of leisure researchers were responsible for 22.2% of all authorships. The potential consequences of such concentration, he held, included an insufficient critical mass of leisure researchers (and therefore greater risk of departmental amalgamation or even disestablishment), intellectual isolation (Samdahl & Kelly, 1999), and disciplinary irrelevancy (Shaw, 2000). Jackson concluded by stating that his was not the last word on this subject but rather a starting-point for further discussion.

Encouraged and guided by Jackson (2004), in this study we examine whether the institutional concentration of leisure research changed between 1990 to 1999 and 2000 to 2008, inclusive. For parsimony's sake, we focus on stability and change among the "Top 10" most productive North American universities. We extend Jackson's study by examining institutional concentration not only in terms of an institution's total authorships and per-capita research productivity, but also total article authorships, total abstract authorships, and per-share research productivity. Unlike Jackson, we do not investigate individual research productivity, because given his decision to use cluster analysis and not to identify the researchers who made up each cluster, comparisons between his and our work would be speculative.

Literature Review

Empirical assessments of the leisure studies field have been conducted regularly since the earlier 1970s (Jackson, 2004). In the first article of this type, Van Doren and Heit (1973) stated: "academic journals mirror the direction of research and serve as a medium for a discipline's communication. It is important to monitor them from time to time to recognize trends and to critically appraise their contributions" (p. 67). Other leisure scholars concurred (e.g., Jackson & Burton, 1989; Riddick, DeSchriver, & Weissinger, 1984). Jackson identified a dozen such empirical reviews (e.g., Henderson, Sessoms, Chen, & Hsiao, 1993; Samdahl & Kelly, 1999; Valentine, Allison, & Schneider, 1999), and another half dozen or so have subsequently been published (e.g., Bocarro, Greenwood, & Henderson, 2008; Floyd, Bocarro, & Thompson, 2008; Henderson & Hickerson, 2007; Henderson, Presley, & Bialeschki, 2004).

These reviews have provided systematic topical and methodological assessments of the leisure field, either as a whole or in topical areas (e.g., race, gender, youth). For example, Henderson et al. (2004) found that theoretical research began replacing descriptive research between the 1980s and 1990s. Henderson and colleagues cautioned, however, that because Jackson (2004) found "only a few people are doing a good deal of the published work that occurs in our field ... the use of theory may be limited or enhanced by the topics these individuals study" (p. 417).

In Jackson's (2004) study, data were collected from the four major American leisure research journals (i.e., *Journal of Leisure Research, Journal of Park and Recreation Administration, Leisure Sciences, Therapeutic Recreation Journal*), two Canadian leisure research journals (i.e., *Leisure/Loisir, Loisir et Société*), and abstracts from the 10 NRPA Leisure Research Symposiums and four Canadian Congresses of Leisure Research, from 1990 to 1999 inclusive. A total of 4,645 "authorships" (2,436 abstract and 2,209 article authorships), representing 213 different institutions and 1,631 different authors were identified.

Jackson's (2004) findings made a compelling case for the institutional concentration of leisure research in North America. At one end of the spectrum, for example, 89 universities (41.8%) were responsible for three or less authorships (3.6% of the total) while at the other end ten universities (4.7%) were responsible for 38.8% of all authorships. Of these "Top 10," the University of Waterloo ranked

first in total authorships (n = 318), followed by Texas A & M University (n = 203), the University of Georgia (n = 192), the University of Illinois (Urbana-Champaign; n = 190), and Pennsylvania State University (n = 184). Jackson also found that 30.8% of all authors were affiliated with these 10 institutions, with the University of Waterloo, Texas A & M University, and the University of Illinois (Urbana-Champaign) each reporting 56 authors, followed by Clemson University and Indiana University (n = 46 and n = 43, respectively). By combining these data Jackson was able to calculate an institutional "per capita research productivity" index (i.e., total authorships divided by total authors). Of the Top 10 institutions based on total authorships, the University of North Carolina (Chapel-Hill) ranked first in terms of per capita productivity (M = 6.62), followed by the University of Georgia (M = 6.40), and the University of Waterloo (M = 5.68). Interestingly, the institution with the highest index (M = 11.50) was actually 38th-ranked University of New Orleans, with only two authors being responsible for 23 authorships.

In interpreting his findings, Jackson (2004) felt strongly that an uneven distribution of leisure research productivity was exhibited across universities. Although Jackson chose to discuss the implications of this concentration only in general terms, a close reading of his article suggests two propositions at the institutional level. First, in regard to being overly inward-looking, he recommended leisure studies "establish a collective set of research themes and goals that simultaneously offers the potential for practical applications and set the agenda for future theoretical developments and empirical research" by forging "a closer researcher-practitioner-policy maker partnership" (p. 346). This has not happened, however, in the intervening years nor, given the drastic impact the recession has had on local, state/provincial, and federal parks and recreation funding (e.g., Finkelman, 2010), does it seem likely in the near future. Moreover, even if practitioners were interested in or capable of contributing to such an initiative, this type of relationship requires a large, diverse, and productive group of researchers—and therefore even greater institutional concentration is required.

Second, Jackson (2004) estimated that there were only 180 to 250 comparatively productive and sustained leisure studies researchers. He stated that this approximation "does not even closely approach the critical mass of scholars that will be required to raise the profile and enhance the external acceptance of and respect for the field that will be needed in the years to come from university administrations" (p. 345). While the exact number of leisure scholars needed is nearly impossible to ascertain, it is certainly a question that leisure scholars have previously entertained (e.g., Bocarro et al., 2008).

Recreation and leisure studies department heads may be less concerned with how the field is broadly perceived and more concerned with: (a) how their department compares with other departments at the same institution; and (b) how their department compares with similar departments at other institutions. If our reasoning about the latter is correct we would expect to find that some top ranked institutions have cited Jackson's article in their internal and external communications. Anecdotal evidence suggests this has indeed happened, with the lead author being aware of one university that specifically identified Jackson's rankings when a background report was requested by an incoming president. Additionally, as of

this article's writing, Jackson's top-ranked institution's website states that "the internationally renowned Department of Recreation and Leisure Studies is the highest ranked leisure studies department amongst the top 41 of 213 North American institutions in terms of research publications in peer-reviewed scholarly leisure journals" (University of Waterloo, 2010, para. 3). Thus, departments that are highly ranked may also be the ones best able to justify their continued existence.

Jackson (2004) noted that his work had limitations, although we believe he overlooked two of the most important. First, because Jackson's counting scheme did not differentiate between, for example, single- and multiple-authored articles and abstracts, an institution would have accrued only one credit in the former case versus four, five, six, or more credits in the latter case. This is problematic because it cannot be clearly ascertained whether a large multiauthored publication is the result of actual research collaboration or an instance of either a "guest authorship" (i.e., "inclusion of an individual in the by-line who does not meet the authorship criteria"), or a "pressured authorship" (i.e., "a person who uses their position of authority to apply pressure upon staff more junior than them to include them as a author, even though they do not qualify"; Bennett & McD Taylor, 2003, p. 266), or both.

Considerable research has been conducted on guest authorships in the biomedical field (e.g., Bennett & McD Taylor, 2003; Flanagin et al., 1998); with these studies typically finding that lead authors subsequently identified between one in three and one in five of their articles as having honorary or unjustified authors. Similar ratios have also been discovered in business articles (Manton & English, 2008). Less is known about the frequency of pressured authorships, although Kwok (2005) has described the type of senior researcher who is likely to serially bully and abuse junior researchers, whom he calls "White Bulls." Although no comparable research has been conducted in leisure studies, it is noteworthy that Jackson (2004) developed—but did not report the results of—a "per-share research productivity" measure (calculated by dividing each single article by the number of authors) that, while it did not establish why an article or abstract had a given number of authors, it did take this information into account when calculating output. Use of this and other alternative metrics (e.g., separating authorships by articles and abstracts, which we do in the current article) could provide greater insight into how research productivity may vary across North American universities.

A second limitation of Jackson's (2004) work was that it did not discuss whether research productivity was similarly concentrated in other social sciences. To illustrate this possibility, for example, a study (Neri & Rodgers, 2006) of Australian universities found that economics departments in the highest quartile published 12 times the number of pages in the top 159 journals compared with those departments in the lowest quartile. These and other (e.g., Fabel, Hein, & Hofmeister, 2008) economists also found that research productivity generally increased as the number of faculty members in a department increased, perhaps because larger institutions usually have a research intensive focus. A comprehensive study (Dundar & Lewis, 1998) of 274 American universities concurred, with these researchers concluding that "the results indicate that program and department size in numbers of faculty is, indeed, a strong predictor of average department publication"

(p. 622; but for a dissenting opinion, see Bland, Center, Finstad, Risbey, & Staples, 2005, who asserted that mentoring and facilitative networks are what drive productive departments). Based on the above, Jackson's (2004) discovery that leisure research in the 1990s was concentrated in larger departments and universities is less surprising. It behooves the question, however: Has the institutional concentration of leisure research subsequently increased, decreased, or remained the same?

Method

Following Jackson's (2004) example, we collected data from the same six leisure research journals and two conferences. The names and institutional affiliations provided in each publication were recorded, with lead- and co-authorships being valued equally. As per Jackson, once we had compiled a complete list, we deleted all North American non-educational institutions (e.g., U.S. Forest Service) and all non-North American educational institutions (e.g., Griffith University). Data were imported into SAS to determine: (a) total number of authorships per institution (i.e., total number of articles published by all the authors affiliated with a university), (b) total number of authors per institution, (c) articles published in leisure research journals by institution and, (d) abstracts published in leisure research proceedings by institution. Additionally, although Jackson did not report any results related to authorship "share" in his article, he did calculate this metric. Thus, we also calculated each person's "share" (i.e., one author, 1.0 share; two authors, 0.50 share per; three authors, 0.33 share per) and entered this information into SAS for analyses.

Results

Our data set was composed of a total of 1,884 published articles and abstracts. The top section of Table 1 reports the total number of authors and institutions; the middle section reports the total number of article, abstract, and combined authorships; and the bottom section reports the mean number of authorships per author and institution. For comparative purposes, Jackson's (2004) results are also reported in this Table. Overall, these numbers seem similar, even after taking into account our study examined a nine year period while his examined a ten year period. The one exception appears to be the total number of institutions reported in each study, with a 15.5% increase between 1990 to 1999 and 2000 to 2008. Using Jackson's criterion of three or less authorships to limit his overall sample of 213 institutions, then 52.8% of the 246 institutions in our sample met this nominal level compared to just 41.8% in his study.

Comparably, the total number of authorships reported for the "Top 10" institutions increased from 1,803 in Jackson's (2004) study to 1,983 in our study (if only one of the institutions that tied for tenth in our rankings is included). When averages are calculated we find that the mean authorships of the "Top 10" institutions increased 10.0%, from 180.3 in 1990-1999 to 198.3 in 2000-2008. Even more telling, while Jackson's "Top 10" accounted for 38.8% of all authorships, after excluding the authorships of one of the institutions that tied for tenth

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Table 1

Category	Jackson	Current Study
Total number of authors	1,631	1,461
Total number of institutions	213	246
Total number of article authorships	2,209	1,969
Total number of abstract authorships	2,436	2,324
Total of both types of authorships	4,645	4,293
Mean authorships per author	2.85	2.94
Mean authorships per institution	21.81	17.45

Note: Jackson's (2004) study was over a 10-year period while the current study was over a nine-year period.

in our rankings, our study's "Top 10" accounted for 46.2% of all authorships. In summary, from an institutional concentration of leisure research perspective, our study's overall and Top 10 results suggest that while more are doing a little, a few are doing more.

Which institutions comprise this select few? The University of Waterloo maintained its number one ranking in North America, with a 15.7% increase in authorships between 1990 to 1999 and 2000 to 2008 (see Table 2). Among other notable changes are that Pennsylvania State University rose from fifth to second (+58.7%); the University of Georgia fell from third to sixth (-24.5%); and three new universities joined our "Top 10" (i.e., Brigham Young University, the University of Florida, the University of Utah). The rise of the University of Florida (+427.6% increase) and Brigham Young University are particularly noteworthy, as the former was ranked 31st in Jackson's (2004) study, while the latter was unranked (Jackson reported only the top 41 institutions). Finally, two previous "Top 10" universities (i.e., Arizona State University, the University of North Carolina-Chapel Hill) dropped out of our rankings.

UNC (Chapel Hill's) disappearance is not too surprising given the disestablishment of its recreation and leisure studies department, but trying to explain why other institutions rose, fell, or remained the same is beyond the scope of this study. On the other hand, by examining article and abstract authorships separately, we may be able to discern whether any identifiable patterns exist in our rankings (see Table 3). (Note: Unfortunately, because Jackson, 2004, did not report these two types of authorships separately we cannot compare our findings with his.) It is clear, for example, that the University of Waterloo's top ranking is a result of it having the greatest number of both article and abstract authorships. Moreover, it

Table 2"Top 10" North American Universities by Total Number of Authorships, 1990-1999 and 2000-2008

	1990 to 1999		2000 to 2	2000 to 2008		
	University	Number of Authorship		Number of Authorships	Per cent Change	
1	University of Waterloo	318	University of Waterloo	368	+15.7	
2	Texas A & M University	203	Pennsylvania State U.	292	+58.7	
3	University of Georgia	192	Texas A & M Universi	ty 259	+27.6	
4	University of Illinois (U-C)	190	University of Illinois ((U-C) 257	+35.3	
5	Pennsylvania State University	184	Clemson University	163	-8.4	
6	Clemson University	178	University of Georgia	145	-24.5	
7	Arizona State University	150	Brigham Young Unive	ersity 129	N/A	
8	Indiana University	144	Indiana University	126	-12.5	
9	University of North Carolina (C-	H) 139	University of Florida	124	+427.6	
10	University of Alberta	105	University of Alberta	120	+14.3	
			University of Utah	120	+26.3	

Note: Total Number of Authorships = Number of Abstract Authorships + Number of Article Authorships. Percent Change indicates the percent increase or decrease of each institution's total authorships as they deviate from Jackson (2004). N/A = "Not Available" because BYU was not included in Jackson's (2004) list of the top 41 universities.

appears that the "Top 10" institutions on each list are largely the same, though there are some notable exceptions. When only article authorships are assessed, the University of Vermont and Colorado State University replaced Indiana University, Brigham Young University, and the University of Utah. In contrast, when only abstract authorships are assessed, the University of Alberta dropped out of the "Top 10." Taken together, the above suggests that researchers at some universities may be more inclined to present their findings at leisure conferences rather than to publish their results in leisure journals (e.g., Brigham Young University) and vice versa (e.g., University of Vermont, Colorado State University). These differences may potentially exist because of variation in academic culture, extrinsic rewards, travel funding, and so forth.

We also followed Jackson's (2004) example and calculated the per-capita research productivity of each of our "Top 10" universities (see Table 4). When we compared our total authorship and per-capita productivity rankings, the University of Waterloo remained first; the University of Illinois (Urbana-Champaign) rose from fourth to second; the University of Georgia rose from sixth to third; and the University of Utah and the University of Alberta rose from tied for tenth to fifth and eighth, respectively. In contrast, Pennsylvania State University fell from second to fourth while Texas A & M fell from third to seventh.

Table 3"Top 10" Universities by Total Number of Article Authorships and Total Number of Abstract Authorships, 2000-2008

	Articles		Abstracts	
Ranl	=-	umber of uthorships	University	Number of Authorships
1	University of Waterloo	151	University of Waterloo	217
2	Pennsylvania State Universit	y 138	University of Illinois (U-C)	162
3	Texas A & M University	109	Pennsylvania State University	y 154
4	University of Illinois (U-C)	95	Texas A & M University	150
5	Clemson University	70	Brigham Young University	100
5	University of Vermont	57	Clemson University	93
7	University of Georgia	56	University of Georgia	89
8	University of Alberta	52	Indiana University	81
9	University of Florida	49	University of Utah	78
10	Colorado State University	48	University of Florida	75

Table 4Per-Capita Research Productivity of the "Top 10" Universities by Total Number of Authorships, 2000-2008

Ranl	k University	Number of Authorships	Number of Authors	Per-Capita Productivity
1	University of Waterloo	368	77	4.78
2	University of Illinois (U-C)	257	56	4.59
3	University of Georgia	145	34	4.26
4	Pennsylvania State University	292	81	3.60
5	University of Utah	120	35	3.43
6	Clemson University	163	48	3.40
7	Texas A & M University	259	78	3.32
8	University of Alberta	120	39	3.08
9	Brigham Young University	129	46	2.80
10	Indiana University	126	50	2.52
11	University of Florida	124	50	2.48

Note: Per Capita Research Productivity = Number of Authorships / Number of Authors

More importantly, however, was the decline in the "Top 10" universities' per capita research productivity between 1990 to 1999 (M = 4.58) and 2000 to 2008 (M = 3.48). Based on our earlier report that this equation's denominator (i.e., the number of authorships per institution) increased, then it follows that numerator (i.e., the number of authors per institution) must have increased at an even greater rate. This proposition is supported, as Jackson's (2004) "Top 10" universities reported, on average, 40.9 authors per institution while ours reported, on average, 54.4 authors per institution. Though speculative, much of this increase may be a result of the growing pressure on graduate students to present—if not publish—their research before graduating, thereby having a major effect on an institution's number of authors but, comparatively, a minor effect on an institution's number of authorships. Notably, therefore, institutions without graduate programs may be unintentionally penalized in this study.

There is another possible reason why our "Top 10" universities' authorships increased, and that is because there are now more authors listed on each article, abstract, or both. As we noted in our introduction, because Jackson's (2004) counting scheme does not differentiate between, for example, single- and multiple-authored articles and abstracts, an institution would accrue only one credit in the former case versus four, five, six, or even more credits in the latter case. It is certainly possible the large multiauthored publications in our study are the result of actual research collaboration. One circumstance where this would be evident is the published graduate student whose supervisor is listed as a second or third although the supervisor is likely a principal contributor. However, given studies in other fields (e.g., Bennett & McD Taylor, 2003; Flanagin et al., 1998) have found between one in three and one in five articles reported having guest authorships, we confess to being curious how a half dozen or more leisure scholars can all have made a "substantial scientific contribution" (italics added, American Psychological Association, 2009, p. 18) to a conference abstract. Similarly, in terms of "pressured authorships," where a researcher insists on being formally included as an author, (Bennett & McD Taylor, 2003) although we have never personally felt forced to add someone's name to one of our own publications, we have heard a first-person account of exactly such a case.

Regardless of why our "Top 10" universities' number of authorships has risen, it is worthwhile exploring whether taking into account the mean share per authorship has any effect on our rankings. Although perhaps the academy as a whole has encouraged the inclusion of more authors, this may influence some institutions more than others. As reported in Table 5 concerning per-share research productivity: (a) the University of Waterloo was once again ranked first; (b) the usual trio of American institutions (i.e., University of Illinois, Urbana-Champaign, Texas A & M University, and Pennsylvania State University) was next; and (c) the University of Alberta rose from tied for tenth to fifth, whereas Brock University, which was unranked, rose to ninth. Taken as a whole, these results suggest that institutions (e.g., University of Alberta) where two or less authors per publication are relatively common (i.e., mean share of .50 or more) may be advantaged by this alternative research productivity metric, while institutions (e.g., Brigham Young University) where three or more authors per publication are relatively common (i.e., mean

Table 5Per-Share Research Productivity of the "Top 10" Universities by Total Number of Authorships, 2000-2008

Ran	ık University	Number of Authorships	Mean Share Per Authorship	Per Share Productivity
1 U	University of Waterloo	368	0.52	191.36
2 U	University of Illinois (U-C)	257	0.48	123.36
3 7	Texas A & M University	259	0.43	111.37
4 I	Pennsylvania State University	292	0.37	108.04
5 U	University of Alberta	120	0.59	70.80
6 U	University of Georgia	145	0.46	66.70
7 (Clemson University	163	0.38	61.94
8 I	ndiana University	126	0.42	52.92
9 I	Brock University	101	0.51	51.51
10 U	University of Florida	124	0.38	47.12
11 I	Brigham Young University	129	0.33	42.57

Note: Per Share Research Productivity = (Number of Authorships)(Mean Share Per Authorship)

share of .33 or less) may be disadvantaged. On the other hand, for those institutions that fall in-between these two approximate cutoff points, their rankings do not appear to vary greatly regardless of whether total number of authorships or per share research productivity is examined.

Discussion

As per Jackson (2004), we prefer not to dwell on the relative rankings of individual institutions and wish instead to focus on the "Why?" and "So what?" questions generated by the increasing institutional concentration of leisure research. Having stated this, we also recognize that his results were used by recreation and leisure studies departments to, for example, recruit graduate students and demonstrate import to senior university administrators. Thus, we provide the following brief comments.

Firstly, the University of Waterloo was ranked first across all five of our research productivity rankings (i.e., total number of authorships, total number of article authorships, total number of abstract authorships, per capita research productivity, per share research productivity). This consistency leads us to reaffirm Jackson's (2004) conclusion that "the University of Waterloo is the ranking department of leisure studies in North America" (p. 340). Secondly, Pennsylvania State University, Texas A & M University, and the University of Illinois (Urbana-Champaign) clearly compose the penultimate group of recreation and leisure studies programs

in North America. Though each could likely argue why it alone is actually second, we prefer to group them together (and alphabetically!) to indicate this cluster is composed of the top ranked programs in the United States. Thirdly, there is both consistency and variation in regard to the rest of our "Top 10," with some institutions demonstrating continued strength across multiple metrics (e.g., Clemson University, the University of Georgia) while others exhibited greater competency in certain areas (e.g., the University of Vermont in terms of article authorships, the University of Alberta in terms of per share research productivity). Lastly, there is great pleasure in reporting the rise of new research institutions (e.g., the University of Florida) and considerable angst in noting the demise of historically strong research institutions (e.g., the University of North Carolina-Chapel Hill).

In summarizing our overall findings, regardless of which metric is used, it is apparent that the institutional concentration of leisure research first identified by Jackson (2004) has continued to increase. One reason for this may be that smaller recreation and leisure studies programs are more at risk of disestablishment than larger programs. Examination of Jackson's "Top 10" institutions, for example, indicates that of the two universities that had the smallest number of authorships, one was once targeted for disestablishment (i.e., the University of Alberta, n = 105) while the other was subsequently disestablished (i.e., the University of North Carolina-Chapel Hill, n = 139). A second, complementary, reason may be that nearly all of our study's "Top 10" institutions have high (i.e., over 25,000) student enrollment levels. Assuming that a university's enrollment is positively related with the size of its recreation and leisure studies program, then it is not startling to find that institutions such as Pennsylvania State University, Texas A & M University, the University of Florida, and the University of Illinois (Urbana-Champaign) are ranked near the top in total authorships. A third reason for the increasing institutional concentration in our field may lie in the type of university that was just noted—that is, all four of the above as well as all of the rest of the U.S. universities on, for example, our article authorship list, are land-grant institutions (Association of Public and Land-Grant Institutions, 2010). According to O'Meara (2007), American land-grant universities often have a great deal to gain from striving (i.e., "the pursuit of prestige within the academic hierarchy"; p. 122), because "in many state systems there is the one major, often flagship, university and then 'close seconds,' or other state universities that compete with the flagship for resources or prestige" (p. 157). As noted earlier, O'Meara also put forward a convincing argument that the forces compelling institutional—and, by extension, departmental—striving are not only economic but political, historical, ecological, and sociological. Based on the above, it seems likely that the growing institutional concentration of research we found in leisure studies is also being experienced by other social science fields.

It is critical, though, to distinguish between what is happening and what ought to happen (Browne & Keeley, 1994). In the case of leisure research becoming increasingly institutionally concentrated, for example, both we and Jackson (2004) found support for this trend, but while he proposed solutions (which we suggested would likely have the opposite effect), we contend that the leisure studies field would benefit from even greater institutional concentration. How so? First,

Kyvik (1995) held that large departments were better able to facilitate collaborative research groups which, in turn, led to what he called "intellectual synergy." Large departments, he added, were also more likely to attract higher-producing researchers because they had more resources available and greater freedom in how they were disbursed. Second, larger recreation and leisure studies programs compared with smaller programs, we believe, are better poised to address some of the key research issues in our field. For example, the former are: (a) more likely to include scholars trained in other areas (e.g., geography, anthropology, cultural studies) who can integrate their theoretical frameworks and methodological approaches with ours; (b) more likely to include scholars who regularly publish outside our field and, in doing so, educate non-leisure researchers about what we do and what we have done (thus mitigating "disciplinary irrelevance"; Shaw, 2000); and (c) better able to foster multi-, inter-, and trans-disciplinary, as well as multi-institutional, cross-national, and cross-cultural, leisure research (thus mitigating concerns raised by, for example, Chick & Dong, 2005; Henderson, 2006; Valentine et al., 1999).

Our assertion that there is much to be gained by increasing leisure concentration does not mean that there are no limits nor no limitations. There is some evidence, for instance, that productivity can actually decline if a department becomes "too big" (Dundar & Lewis, 1998; Fabel et al., 2008), possibly because larger departments are more able to differentiate between those who primarily teach and those who primarily do research. Other issues that could be a concern include the possibility of groupthink and therefore decreased creativity and individual responsibility, and, if for example a severe economic downturn occurred and a "Top 5" leisure studies department was disestablished, potential dire consequences for our field as a whole. In spite of these problems, we still believe there is much more to be gained than lost from the increasing institutional concentration of leisure research.

Conclusion

Limitations of this study include some instances where an author's complete institutional affiliation was not listed and therefore could not be counted. Additionally, although every effort was made to compile authorships for those who changed their names, we cannot be sure that we correctly identified all of these cases. Other factors that could influence our tallying are graduate students, post-doctoral fellows, and researchers who conceived their work at one institution but published it while at another. Additionally, as a University of Waterloo professor pointed out to us, use of Jackson's (2004) metrics may have meant that Canadian universities' rankings were "boosted" because professors at these institutions are more likely than their American counterparts to publish in both Canadian and U.S. journals and to attend both Canadian and U.S. conferences. (And for more on the "two solitudes" that subsequently result, see Jackson, 2003.)

Following Jackson's (2004) counting scheme also meant that we did not include articles and abstracts published in other North American leisure journals (e.g., *Schole*), or in any non-North American leisure journals (e.g., *Annals of Leisure Research, Leisure Studies, World Leisure Journal*) or proceedings (e.g., from the Leisure

Studies Association, or the Australia and New Zealand Association for Leisure Studies conferences). Similarly, we did not include other types of leisure research publications, such as books and book chapters, from either North America or elsewhere. Because doing so would provide a more realistic picture of the state of recreation and leisure studies worldwide, as well as provide a comparison point future studies could use to examine globalization's effect on leisure research, we recommend upcoming work on this topic consider doing so.

Following Jackson's (2004) example also meant that we excluded articles and abstracts published in, for example, tourism journals and conference proceedings. On the one hand, because large leisure studies departments often intentionally extend their reach into such allied areas, it could be argued that our metrics fail to accurately reflect what is actually going on in these units. On the other hand, because parallel research projects to ours have been conducted in the tourism literature, we do not see this as a fatal (or even serious) flaw. Severt's et al. (2009) study is especially enlightening in this regard as none of the 11 journals they examined overlapped with the six in the current study. These researchers exclusion of Leisure Sciences and Leisure/Loisir, both of which specifically identify travel and tourism articles as suitable for submission, suggests that the bifurcation of leisure and tourism is well along. This proposition is further strengthened by institutions, such as Brock University, where leisure studies and tourism studies are housed in separate departments. In sum, while we are not against future research examining leisure and tourism journals combined, a simpler alternative would seem to be to develop a joint ranking scheme of some type. For instance, because Pennsylvania State University was ranked second (by total authorships) in our study and fourth in Severt and associates' study, they could potentially argue that they are the top leisure and tourism studies institution in North America.

Because our study did not address the overall quality of the research published, future research should consider the inclusion of metrics that can evaluate this variable (e.g., a citation index). Additionally, we suggest a case study approach be considered to gain greater insight into why, over time, some universities rise, others fall, and still others remain consistently highly ranked. Finally, because an institution's research productivity is ultimately dependent upon its faculty members' research productivity, future research should examine the factors that facilitate and constrain the most prolific leisure scholars. By better understanding the reasons these individuals are so productive, others—graduate students, untenured and not-yet-promoted professors, department chairs, faculty deans, and university administrators—will benefit.

In conclusion, it seems clear that measuring and ranking universities and departments will remain common—if not increase in prevalence—in the future. The development of valid and reliable metrics, and their regular and wise use, is critical for all areas of academe, including leisure studies.

References

- American Psychological Association. (2009). *Publication manual of the American Psychological Association* (6th ed.). Washington, DC: American Psychological Association.
- Association of Public and Land-Grant Institutions. (2010). About us: APLU members. Retrieved June 28, 2010 from www.aplu.org/NetCommunity/Page. aspx?pid=249
- Barker, K. (2007). The UK Research Assessment Exercise: The evolution of a national research evaluation system. *Research Evaluation*, 16, 3-12.
- Bennett, D., & McD Taylor, D. (2003). Unethical practices in the authorship of scientific papers. *Emergency Medicine*, 15, 263-270.
- Bland, C., Center, B., Finstad, D., Risbey, K., & Staples, J. (2005). A theoretical, practical, predictive model of faculty and department research productivity. *Academic Medicine*, 80, 225-237.
- Bocarro, J., Greenwood, P. B., & Henderson, K. (2008). An integrative review of youth development research in selected United States recreation journals. *Journal of Park and Recreation Administration*, 26, 4-27.
- Browne, M. N., & Keeley, S. (1994). *Asking the right questions: A guide to critical thinking* (4th ed.). Englewood Cliffs, NJ: Prentice-Hall
- Butler, L., & McAllister, I. (2011). Evaluating university research performance using metrics. *European Political Science*, *10*, 1-15.
- Chick, G., & Dong, E. (2005). Cultural constraints on leisure. In E. L. Jackson (Ed.), *Constraints to leisure* (pp. 169-183). State College, PA: Venture.
- Dundar, H., & Lewis, D. (1998). Determinants of research productivity in higher education. *Research on Higher Education*, *39*, 607-631.
- Fabel, O., Hein, M., & Hofmeister, R. (2008). Research productivity in business economics: An investigation of Austrian, German, and Swiss universities. *German Economic Review*, *9*, 506-531.
- Finkelman, L. (2010, July). Opportunities. Parks & Recreation, 4.
- Flanagin, A., Carey, L., Fontanarosa, P., Phillips, St., Pace, B., Lundberg, G., & Rennie, D. (1998). Prevalence of articles with honorary authors and ghost authors in peer-reviewed medical journals. *Journal of the American Medical Association*, 280, 222-224.
- Floyd, M., Bocarro, J., & Thompson, T. (2008). Research on race and ethnicity in leisure studies: A review of five major journals. *Journal of Leisure Research*, 40, 1-22.
- Geuna, A., & Martin, B. (2003). University research evaluation and funding: An international comparison. *Minerva*, 41, 277-304.
- Henderson, K. (2006). False dichotomies and leisure research. *Leisure Studies*, 25, 391-395.
- Henderson, K., & Hickerson, B. (2007). Women and leisure: Premises and performances uncovered in an integrative review. *Journal of Leisure Research*, 39, 591-610.
- Henderson, K., Presley, J., & Bialeschki, M. D. (2004). Theory in recreation and leisure research: Reflections from the Editors. *Leisure Sciences*, *26*, 411-425.

- Henderson, K. A., Sessoms, H. D., Chen, Y., & Hsiao, C. C. (1993). Using faculty publications rates to measure the quality of PR&L curricula. *Journal of Physical Education, Recreation and Dance, 64,* 59-62.
- Jackson, E. L. (2003). Leisure research by Canadian and Americans: One community or two solitudes? *Journal of Leisure Research*, 35, 292-315.
- Jackson, E. L. (2004). Individual and institutional concentration of leisure research in North America. *Leisure Sciences*, 26, 323-348.
- Jackson, E. L., & Burton, T. (1989). Leisure research and the social sciences: An exploratory study of active researchers. *Leisure Studies*, *8*, 263-280.
- Kwok, L. S. (2005). The White Bull effect: Abusive coauthorship and publication parasitism. *Journal of Medical Ethics*, *31*, 554-556.
- Kyvik, S. (1995). Are big university departments better than small ones? *Higher Education*, 30, 295-304.
- Manton, E., & English, D. (2008). An empirical study of gift authorships in business journals. *Journal of Education for Business*, 83, 283-287.
- Massengale, J. (1987). Current status of graduate physical education: Program demography and the issue of program ranking. *Quest*, *39*, 97-102.
- Neri, F., & Rodgers, J. (2006). Ranking Australian economics departments by research productivity. *The Economic Record*, 82, S74-S84.
- O'Meara, K. (2007). Striving for what? Exploring the pursuit of prestige. In J. C. Smart (Ed.), *Higher education: Handbook of theory and research* (Vol. XXII, pp. 121-179). AA Dordrecht, the Netherlands: Springer.
- Riddick, C. C., DeSchriver, M., & Weissinger, E. (1984). A methodological review of research in *Journal of Leisure Research* from 1978 to 1982. *Journal of Leisure Research*, 16, 311-321.
- Samdahl, D., & Kelly, J. (1999). Speaking only to ourselves? Citation analysis of *Journal of Leisure Research* and *Leisure Sciences*. *Journal of Leisure Research*, 31, 171-180.
- Severt, D. E., Tesone, D. V., Bottorff, T. J. & Carpenter, M. L. (2009). A world ranking of the top 100 hospitality and tourism programs. *Journal of Hospitality & Tourism Research*, 33, p.451-470.
- Shaw, S. (2000). If our research is relevant, why is nobody listening? *Journal of Leisure Research*, 32, 147-151.
- Thomas, J., & Reeve, T. (2006). A review and evaluation of doctoral programs 2000-2004 by the American Academy of Kinesiology and Physical Education. *Quest*, 58, 176-196.
- Trusteeship. (2011). Making metrics matter: How to use indicators to govern effectively. *Trusteeship*, 19, 8-14.
- University of Waterloo. (2010). Recreation and leisure studies: Our reputation. Retrieved June 15, 2010 from www.ahs.uwaterloo.ca/rec/
- Valentine, K., Allison, M., & Schneider, I. (1999). The one-way mirror of leisure research: A need for cross-national social scientific perspectives. *Leisure Sciences*, 21, 241-246.
- Van Doren, C. S., & Heit, M. J. (1973). Where it's at: A content analysis and appraisal of the *Journal of Leisure Research*. *Journal of Leisure Research*, 5, 67-73.