

A Vision of Responsible Research in Business and Management: Striving for Useful and Credible Knowledge

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Community for Responsible Research in Business and Management^{1, 2}

EXECUTIVE SUMMARY

This position paper presents a vision of a future in which business schools and scholars worldwide have successfully transformed their research toward *responsible science*,³ producing useful and credible knowledge that addresses problems important to business and society.⁴ This vision is based on the belief that business can be a means for a better world if it is informed by responsible research. The paper begins with a set of principles to support responsible research and proposes actions by different stakeholders to help realize this vision. It explains the impetus for the proposal by describing the current business research ecosystem, which encourages research oriented toward scholarly impact much more than societal relevance. Changing the incentives and culture around publications are essential to promoting responsible research. Research is the foundation of business education and practice, yet business research has failed to live up to its promise in promoting better policies and best practices. If nothing is done, business research will lose its legitimacy at best; at worst, it will waste money, talent, and opportunity. This paper ends with a call to action for directing research toward achieving humanity's highest aspirations. The paper invites discussion and debate on the prospect of creating a *responsible research ecosystem* to realize this future vision when business and management research has become a force for change toward a better world.

The *Position Paper* starts us on a journey toward a substantive rethinking of business research and, more broadly, about its scientific and social role in society. Our audience goes beyond the higher education community, and we invite broad participation in this discussion.

¹ The Community for Responsible Research in Business and Management (cRRBM) is a group of scholars dedicated to the advancement of responsible science—as defined in this position paper—in business and management schools worldwide. Authors of this position paper are founding members of the cRRBM. Their names with affiliations appear in the Appendix. Direct correspondence email to: atsui@nd.edu.

² Although the authors are largely based in North America, Europe, and a few from Asia, we believe the concerns addressed in this position paper have broad applications, as the research community, and its standards for evaluating research in business and management, becomes increasingly global.

³ Responsible or socially responsible science (used interchangeably) is a well-known concept in the philosophy of science circles (Brown, 2013; Kourany, 2010, 2013). The basic argument is that beyond producing reliable and valid knowledge, science should be more socially engaged and socially responsible than is advocated by the value-free ideal (Tsui, 2016). Responsible research and responsible science are synonymous ideas in this paper.

⁴ The word 'credible' here refers to knowledge based on carefully executed research either quantitatively or qualitatively, or both, and in quantitative work that meets the standards of both reliability and validity.

VISION 2030

In 2030, business and management schools worldwide are widely admired for their contributions to societal well-being. Business and management scholarship has been central to solving society's challenges, such as the achievement of the United Nation's Sustainable Development Goals.⁵ Research is timely and cutting edge, producing well-grounded knowledge on pressing problems. Both schools and scholars are committed to the principles of responsible research, which are embedded in the core curriculum of doctoral education and shape how students at all levels are educated. The results of responsible research are widely taught in the classroom, training students as responsible leaders in their chosen professions. Research has helped students, organizations, and communities of all kinds to develop effective systems leading to high and responsible economic performance, great innovations, positive employee and customer well-being, a thriving natural environment, and strong communities. Many schools have focused programs for research and centers of excellence in their chosen areas of expertise. Standards of excellence are attuned to local conditions and the needs of surrounding communities; business schools in different parts of the world have followed different paths to achieve excellence. Many schools have contributed valuable knowledge to support humanity's highest aspirations within the planetary boundaries, including poverty alleviation; access to food, clean water, and education; sustainable consumption and responsible use of natural resources; greater gender and social equality; inclusion; growing prosperity; fair wealth distribution; and a responsible and resilient financial sector. Business leaders and government officials are frequent guests in business and management schools, seeking advice on policies and offering support for research on issues that need understanding. Business and management research is a model of "responsible science" after a major transformation that began in 2017.

A. BACKGROUND

Business schools around the world are home to some of the most brilliant and well-supported scholars in all of the social sciences. Research feeds knowledge to business education, yet currently, research is often disconnected from real-world challenges. There is no shortage of problems whose solutions implicate business, from alleviating poverty and hunger to creating clean energy and livable cities. Moreover, there are signs that we are reaching the limits of the lavish resources required for business research. Government funding for research is shrinking in many places around the world while remaining funders increasingly demand to see tangible, especially societal outcomes. If unchanged, the era of unconstrained support for business research may be drawing to a close.

We believe it is time to reorient the ecosystem of business research to produce more credible and actionable knowledge for better policies and practices, and ultimately a better world. It is time to reclaim the high ground for business and management research.

Business and management researchers have a unique capacity to guide the actions of organizational leaders to create a prosperous and sustainable future. Research is a core activity of

⁵ United Nations. (2015). *Sustainable development goals*, <https://sustainabledevelopment.un.org/>.

most university-based business and management schools.⁶ Yet, both the relevance and quality of research in business schools has been under attack for more than two decades.⁷ These attacks can be summarized in terms of two core issues. The first issue is the widening *gap between research and practice*, with business research in many domains increasingly divorced from the real-world practices. Because research is evaluated primarily by its placement in elite journals and its impact on subsequent research, rather than on its ability to address real-world problems, its link to practice is often muted. High-quality problem-driven research, if not published in the top journals, is often undervalued.⁸ The second concern is the *quality and integrity* of research. Academic evaluation systems can promote bad research practices by encouraging quantity over quality and novelty over replicability, resulting in little cumulative progress in knowledge. The two core problems are connected: relevance is moot when quality is in doubt. Responsible research is about both useful and credible knowledge.

Research in business schools is costly⁹, and business schools face competition from alternative low-cost education providers that are not burdened by the expense of research. Resource providers, including students, donors, legislators, and funding agencies, deserve to understand how business research provides a benefit to society.

It is not our intention to turn business schools into consultancies. Not every paper needs to solve a current problem, and not every researcher needs to be on the frontlines of practice. Rather, we envision schools adopting a *portfolio approach*, with a diverse mix of research combining current problems and more speculative and theoretical work.

This *Position Paper* starts us on a journey toward a substantive rethinking of business and management research and, more broadly, about its evolving roles and expectations in society. Our audience goes beyond the higher education community, and we invite broad participation in this discussion. While scholars, editors, university presidents, deans, professional societies, accrediting associations, funding agencies, and the public (e.g., media) have faulted elements of the current business research ecosystem, Vision 2030 portrays a promising future and advocates principles that underpin its ultimate success.

B. PRINCIPLES OF RESPONSIBLE RESEARCH

What would it take to achieve Vision 2030? The following seven principles support responsible

⁶ We recognize the nuanced difference between business and management schools with the latter less wedded to a capitalist model and more focused on public and third-sector bodies and other market mechanisms. In this paper, we use the two terms interchangeably because: a) we see the research issues as consistent between these schools, and b) there is a good degree of overlap between them, especially in terms of vision and product portfolios.

⁷ For example, Don Hambrick's (1994) presidential address at the 1993 Academy of Management's annual meeting is often cited as the beginning of this conversation in the management field.

⁸ Many articles have been written reflecting on and criticizing the problems of both the quality and relevance of research in the business disciplines. A partial list of such articles (Appendix A) is available on www.rrbm.network.

⁹ One study (Terwiesch & Ulrich, 2014), on the cost of MBA education, estimated that an A-journal article costs about \$400,000 of investment in faculty time and research support.

research that will help in realizing this vision. These principles can guide business and management research to build a sound body of knowledge that serves society. They are not mutually exclusive although Principles 1, 2, 3, and 7 aim primarily to improve the usefulness of knowledge and Principles 4, 5, and 6 aim to improve the credibility of knowledge.

Principle 1—Service to Society: Business research aims to develop knowledge that benefits business and the broader society, locally and globally, for the ultimate purpose of creating a better world.

Implication: The aim of research is to systematize knowledge of best practices, past and current, and to shape the future by creating knowledge based on emerging scenarios. Innovative research can inform future practice. Business research serves a critical social function by observing the blind spots and potential downsides of the business world. Business education does not focus only on knowledge of the past, but also knowledge, skills, and values relevant to both managing in the current context and dealing with emerging changes.

Principle 2—Stakeholder Involvement: Business and management research values the involvement of different stakeholders who can play a critical role at various stages of the scientific process, without compromising the independence or autonomy of inquiry.

Implication: The research ecosystem consists of many participants including the researchers as the producers of knowledge, journal editors, tenure and promotion committee members, school leadership, directors of Ph.D. programs, accreditation agencies, funding organizations, ranking publishers, and business leaders and students as beneficiaries of knowledge. The broader society also has a stake in business research. Business and management schools can benefit from “co-creation” of knowledge with all types of organizations (businesses, NGOs, trade unions, governments, industry associations, social enterprises, customers, and consumers.) However, academic integrity and independence require that research not be “captured” or reported findings influenced by vested interests.

Principle 3—Impact on Stakeholders: Business and management schools, funders, and accrediting agencies acknowledge and reward research that has an impact on diverse stakeholders, especially research that contributes to better business and a better world.

Implication: Business and management schools recognize that the publication itself is not the outcome or the end goal, but a step in the journey to scholarly and/or societal impact. Assessing influence may require multiple papers, dissemination of findings to non-academic circles, and tracking whether companies, communities or policy makers benefit from this program of research. Impact also includes the teaching of the findings from evidence-based responsible science in undergraduate, masters, doctoral, and executive education programs. Promotion and tenure requirements reflect this requirement to institutionalize research’s positive influence on society.

Principle 4—Valuing Both Basic and Applied Contributions: Business school deans, journal

editors, funders, accrediting agencies, and other stakeholders respect and recognize contributions in both theoretical and applied research.

Implication: Theories are important to guide our collective understandings and to explain empirical patterns that defy common sense. Applied research aims to analyze management practices such as incentive systems and governance (economics, finance, management), consumer and firm behavior (marketing, strategy), or customer service and supply chain (marketing, operations, information systems). Integrating theory- and practice-led problems in business research will both contribute to basic knowledge development and enhance its applied utility for stakeholders who support this research.

Principle 5—Valuing Plurality and Multidisciplinary Collaboration: Business school deans, senior leadership, journal editors, funders, and accreditation agencies value diversity in research themes, methods, forms of scholarship, types of inquiry, and interdisciplinary collaboration to reflect the plurality and complexity of business and societal problems.

Implication: Business and management research supports pluralism in its theories, grounded in different assumptions about human nature, multiple perspectives, and alternative models of business and its role in society. Rich, in-depth ethnographic studies of corporate practices yielding reflective and imaginative thinking that contribute to new theorizing are as valuable as quantitative or experimental studies. In the global context, business and management research values both “global” and “local” knowledge development. Stakeholders value interdisciplinary research, both within business disciplines and across other social science disciplines as well as engineering, medicine, education, or humanities. Interdisciplinary research has the potential to provide new understandings of business due to complementarities between disparate disciplines.

Principle 6—Sound Methodology: Business research implements sound scientific methods and processes in both quantitative and qualitative or both theoretical and empirical domains.

Implication: The robustness of empirical work in business research takes into account emerging practices in good science. For example, research practices that value replication, falsification of theory, and reproducibility are encouraged. Journals and professional societies adopt open science practices such as data, materials, and code repositories, and transparency of sample construction and measures. Similar expectations though different criteria of rigor may apply to in-depth, ethnographic field studies and lab or field experiments. The expectation of data transparency might reduce the volume of studies, but could improve the quality and comprehensiveness of studies by discouraging data slicing and other questionable practices. Mathematical models are calibrated using real data and assumptions are ultimately validated using empirical evidence.

Principle 7—Broad Dissemination: Business and management schools value diverse forms of knowledge dissemination that collectively advance basic knowledge and practice.

Implication: The digitization of the global economy has suggested new forms of dissemination of research findings, including online, open source and open access

publishing. Business schools have opportunities to improve the visibility of ongoing research through creative translation, publishing and dissemination methods, as well as drawing insights in simple and powerful ways to influence the target audience and non-academic stakeholder communities. Open source and access publishing embrace rigorous peer review for building and disseminating credible knowledge.

C. POSSIBLE ACTIONS TOWARD VISION 2030

Acting on these principles of responsible research requires a revision of criteria, processes and incentive systems at all levels: individual faculty, journals, and schools. Proclaiming principles is not sufficient: we need to modify the ecosystem of research so that individual researchers are rewarded for making progress toward the achievement of our higher goals. To realize Vision 2030 and to pursue responsible research will require concurrent and coordinated actions across all relevant stakeholder groups with the common goal of valuing rigorous scholarship resulting in actionable knowledge. We suggest a few possible actions by the key stakeholders.

1. Journal Editors and Publishers

- a. Journals, particularly those that set field standards, are essential to any efforts at change. Elite journals can encourage and publish problem-centered research oriented toward critical social and business questions that are complex and span disciplinary boundaries.
- b. Emphasize research context, important phenomena, and their implications for impact on broader stakeholder communities, while developing innovative and generalizable theories and insights.
- c. Publish replications, negative findings, and non-significant findings for robust knowledge that challenges positive or theory-supporting findings.
- d. Form a mutually supportive community of editors to pledge a commitment to the practice of responsible science in their journals.

2. Scholarly Association Leaders

- a. Reinforce professional commitment, among current and new members, to a higher aim of service to society and humanity in addition to contributions to the business field.
- b. Identify and share with members the grand challenges in business and society and professional practices as opportunities for research with societal impact.
- c. Strengthen and actively promote problem-based, applied and impactful research in their mission statements.
- d. Encourage and promote inter-disciplinary research.

3. University Leaders, Deans, Associate Deans, Department Heads, Senior Scholars

- a. Develop a vision and a strategy to encourage faculty to work on research that would make a positive difference in practice and society.
- b. Design promotion and tenure criteria that value research offering reliable incremental knowledge as well as innovative, groundbreaking research with potential for scholarly, business, and societal impact.
- c. Expand the metrics for assessing research contributions at the department and school levels to include both scholarly and professional-practical impact. Recognize that some publications in the non-A, specialty, or regional journals may be of high quality

- (credibility) in addition to usefulness (with positive societal impact).
- d. Revamp the Ph.D. program by providing training on responsible research and its dissemination (e.g., the teaching of evidence-based problem-solving skills) to develop a new generation of responsible business and management social scientists.

4. Business School Associations, Accrediting and Ranking Agencies

- a. Include political, cultural, business, societal and pedagogic impact of research in assessment standards.
- b. Convene deans and academic leaders to discuss responsible research and the proposed principles.
- c. Document and share the best practices in responsible research and assist in benchmarking by schools.
- d. Work in collaboration with business school ranking publishers to adopt the principles of responsible research in assessing the educational and research contributions of the schools.¹⁰

5. Funding Agencies and Government

- a. Broaden the criteria for funding decisions to include potential business and societal impact in addition to intellectual merit.¹¹
- b. Government or public funding organizations can expand the criteria for assessing research accomplishment by including the criterion of societal impact.¹²
- c. Funding agencies, public (e.g., NSF, EU) or private (e.g., Ford, Templeton), provide grants on topics that relate to the grand challenges in business and society.

6. Scholars

- a. Commit to pursuing scholarship that contributes to credible knowledge, protects the integrity of science, and gives priority to problems that are relevant for business and important to society.
- b. Engage in a responsible review of other scientists' manuscripts using relevant epistemic criteria to evaluate the quality of the work and relevant criteria to assess the potential business or societal impact of the findings.
- c. When evaluating the scientific accomplishments of individual scholars, engage in thoughtful evaluation of the importance of the ideas and quality of the knowledge produced; do not rely only on proxies such as perceived journal quality or citations.
- d. Follow the principles of responsible science in all scholarly activities in their roles as

¹⁰ A group of 21 leaders of business schools (Bachrach et al., 2017) urge the ranking publishers to employ rigorous methods in developing the rankings of business schools, including careful selection and weighing of multiple criteria, full disclosure of the methodology, and avoiding potential conflict between private gain and social good.

¹¹ The U.S. National Science Foundation has added "broader impacts criterion" in its review of proposals.
<https://www.nsf.gov/od/oia/special/broaderimpacts/>.

¹² The UK Research Excellence Framework (2014) placed 20% weight on societal impact in assessing universities' research programs. Lord Nicholas Stern's U.K. (2016) review of the Research Excellence Framework calls for a broadening of their definition of impact to embrace public engagement, culture and pedagogy as well as the traditional emphasis on policy and applications. It advises that the impact and research environment be combined in the next REF assessment to form 35% of the weighting.

authors, reviewers, editors, educators, and evaluation committee members.

7. Other External Stakeholders (businesses, social organizations, alumni, students, society)

- a. As recipients of knowledge from research, members of society in both commercial and non-commercial sectors share their challenges as potential subjects or topics of business and management research.
- b. Articulate and sensitize researchers to the challenges faced by organizations, and assist in framing important research problems that are directly relevant to business and society.
- c. Share data, allow access to data collection sites, and facilitate the collection of reliable empirical evidence to solve societal and business problems.
- d. Share best practices in business and management and open their organizations to support responsible science for the betterment of business and societies.

8. Coordinated Commitment Mechanisms

The success of the actions of each stakeholder will require the support of similarly oriented actions by all stakeholders. Coordinated actions with a focus on responsible science in business and management will have a greater promise of success. Below, we suggest a few examples of such coordinated commitment mechanisms.

a. Commitment to “responsible research” by all scholar-scientists

The core responsibility for the production of relevant or actionable knowledge rests with the community of scholar-scientists working in business and management schools as well as allied social science disciplines such as economics, sociology, psychology, education, communications, anthropology, or political science. Their commitment to responsible science is central to the transformation of research from the current focus on publications and careers to a focus on producing credible and useful knowledge. We seek a commitment from research scholars to uphold responsible science, by joining the Community for Responsible Research in Business and Management (cRRBM).¹³ The vision is to advance the long-term goal of transforming business and management research toward both useful and credible scholarship to create a better world.

b. Commitment to “responsible research” by a vanguard of business schools around the world

We see the power of a group of pioneering business schools around the world committed to the principles of responsible research. These schools can serve as role models providing examples of how to increase the societal relevance of their research. These business schools can partner with accreditation agencies to share their approaches to faculty development and evaluation as well as doctoral education that will advance responsible science. We see the potential of a consortium of business schools that pledge to develop and share best practices in responsible research, using the platform of deans’ conferences organized by the accreditation agencies around the world.

¹³ The website for cRRBM (rrbm.network) will host this position paper, a page to pledge support to the seven principles of responsible research, and an interactive section to share ideas and exchange resources.

c. Commitment to “responsible research” by professional societies of all disciplines

The value of the leadership of professional societies of the disciplines of the business and management schools, including accounting, finance, information systems, human resource management, marketing, strategy, supply chain and operations management, to support the principles of “responsible research” cannot be over-estimated. These professional societies can publish joint guidelines for responsible science such as metrics for measuring research quality that does not rely on journals’ impact factor alone and metrics for measuring societal and business impact without intruding into the academic freedom of scholars. These societies can promote the value of discovering knowledge useful for practice. They can encourage their journals to publish research on important societal problems like the “grand challenges” that have guided engineering and health sciences research over the past decade. They can jointly encourage and work with business schools to reduce the silo of disciplinary journal preference and reward research that crosses disciplinary boundaries.

D. THE CURRENT BUSINESS SCHOOL RESEARCH ECOSYSTEM

Why is the above proposal necessary? What led to the desire to introduce an initiative for responsible research in business and management? The impetus came from witnessing a broad crisis of credibility in science today. This crisis has two parts. The first is the crisis of integrity. The credibility of the knowledge published in journals is in doubt. The second is the crisis of relevance, a major criticism of business school research for more than two decades. These two are connected: without the assurance of credible research findings, the question of relevance is irrelevant.

1. Crisis of Integrity

From funding agencies and legislators to citizens on the street, the integrity of the scientific enterprise is under siege. A widely reported study published in *Science* (LaCour & Green, 2014) claimed that public opinion on controversial issues could be changed through face-to-face canvassing. Within weeks, the article had to be retracted when other investigators discovered that the data had been fabricated by one of the authors. Other problems arise from the scientific publication process itself. An article titled “Why most published research findings are false” (Ioannidis, 2005) describes how standard practices in research create a bias toward exaggerated findings that are often, essentially, flukes. Because journals favor positive findings over replications or null results, flukes are regularly published and fail to be dislodged. Thus, a more recent study by Open Science Collaboration (2015) aiming to reproduce the findings of 100 articles published in elite psychology journals reported that most of these findings failed to replicate. Inevitably, other researchers claimed that the replications themselves were flawed. In light of these controversies, the public has reason to question how much credibility to give to the published record. These problems are especially pernicious in fields where science guides practice that has life and death implications, such as medicine.¹⁴

¹⁴ According to the editor of the *British Medical Journal* (Crowe, 2016, CBS news), “Drugs with harms are used and patients are unaware of those harms. Devices that shouldn’t be on the market are on the market. So yes, we do know that patients are harmed, and we know that the health systems are harmed *as a result of poor science.*”

The science in business schools has been criticized for these general trends also. Scholars have documented the prevalence of questionable research practices and found that many conclusions in the published work are not to be trusted. Like medicine, prescribing practices based on bad research can do more harm than good. Thankfully, efforts are underway in the natural and social sciences, as well as in the business disciplines, to promote replicable science and to restore integrity to the process of scientific publication.¹⁵

2. Crisis of Relevance

Professional schools in universities have a mission of providing education guided by research. Schools of law, medicine, social work, engineering, education, and other professional schools both draw on and contribute to research in the natural and social sciences. Academics in schools of education, for instance, rely on research in cognitive and developmental psychology to develop and evaluate educational practices. As part of the broader university, professional schools serve as a bridge between science and practice.

Graduates of schools of education and social work are trained for specific professions. Law and medical schools equip their graduates with the skills to pass rigorous certification exams before going into actual practice. Business schools are distinctive because their constituencies are broad and diffuse. Countless people go into business with no specialized training. “Business” can mean anything from a small retail shop to a multinational corporation. The range of ideas that can be researched and taught in business schools is correspondingly vast. Business school graduates can go on to work in established businesses, start their own enterprise, work in finance, consulting, or other domains, including public service and the non-profit sector. As a result, the question of the “relevance” of business school research is a conundrum.

In the early days, fellow academics viewed business school research as too applied in its orientation, and they saw business schools as essentially vocational training centers. This led to the famous Gordon and Howell report in 1959, funded by the Ford Foundation, about the need to improve the scientific rigor of business school research. Business schools began to hire economists, psychologists, and sociologists to improve the scientific rigor of their studies. Subsequently, concerns for rigor often overtook questions of relevance. Business scholars are encouraged to aim their work at the most scientifically rigorous journals, especially those receiving the greatest number of citations, which come primarily from peer-reviewed academic journals. Further, most business and management researchers are not dependent on research grants tied to societal impact. This creates an exaggerated emphasis on citation-based metrics as the gold standard for research quality.¹⁶ Books, chapters, and reports, which are not as amenable

¹⁵ A list of such efforts “Initiatives to change the status quo” (Appendix B) is available on www.rrbm.network. For example, the *Strategic Management Journal* (Bettis et al., 2016) will publish replication studies, *Management and Organization Review* (Lewin et al., 2016) will offer pre-approval for studies, drawing on the model of *registered reports* in the natural and social sciences field. Nosek et al. (2015) introduced author guidelines for journals to promote an open research culture that have been adopted by a rapidly growing list of top journals and supported by the Center for Open Science (<https://cos.io/>).

¹⁶ It has been pointed out in the scientific communities that the quality of the journal does not imply the quality of the papers published in it; see American Society for Cell Biology’s (2012) *San Francisco Declaration of Research Assessment*; thus, journal quality (e.g., citation rate of the journal) should not be used as a surrogate for the quality

to these metrics, are often devalued relative to articles in A-ranked scientific journals. Emphasis on citation-based metrics and top journal publications reinforce the sole focus on the academic audience and feed the tendency of scientific writing style and selection of esoteric topics. Such journal articles are often inaccessible to practitioners, and people in business often find business school research to be too obscure to be put into practice. As we have argued, business school research has the potential to serve as a credible source that can inform solutions to the pressing business or social issues of our time and offer best practices that generate prosperity.¹⁷ It can occupy “Pasteur’s quadrant”: basic research inspired by use.

3. Diagnosing the Problem

If business school research has such great potential, then why is its promise not fulfilled? For a more systematic diagnosis, we carefully read the published works discussing business school’s research problem, and conducted a Delphi survey¹⁸ of scholars, deans, members of accreditation bodies, and a sample of authors who have written about this problem. Thirty-two participants responded to four open-ended questions, and 27 of these 32 completed the second round of a structured survey consisting of statements synthesized from the responses to the open-ended questions in the first round. The results identified gaps between where we are and where we should be across several domains.

a. What are the major issues in our current research?

The three most pressing problems identified are: (1) Current research does not produce knowledge relevant for business purposes. (2) A strong orientation toward A-ranked journals distorts incentives towards a narrow focus and excludes many important research studies that are published in lesser-ranked journals. (3) An over-emphasis on theory (which ironically discourages the development of new theories) leads to a focus on form more than substance; a bias against negative findings; and less value placed on inter-disciplinary, problem-solving research and non-mainstream topics. Contents of textbooks lag behind the current challenges of businesses, society, and stakeholders.

This diagnosis confirms our current knowledge, but it certainly does not fit all disciplines and all scholars in the business school. For example, some finance research has revolutionized financial practices (albeit not always with a positive impact on society), contributions in operations management have helped vastly improve business efficiency and effectiveness, and there are faculty members in all disciplines working on problems with immediate policy aspirations. However, too many researchers in business schools write the next “me too” papers, while similarly rigorous research on important practical topics in applied outlets does not get the same valuation as papers in top ranked journals. A failing across all the business disciplines is that we have not explicitly recognized and agreed that the goal of doing research is to make business and society better, rather than simply publishing in outlets that “count”.

of individual articles or individual scientists’ contributions. It is further recognized that citations can be manipulated and may not be the right measure of journal quality (Davis, 2014).

¹⁷ We recognize that some schools have adopted the research mission of creating “knowledge with impact” or undertake research for “public value” or “public purpose”.

¹⁸ The Delphi report (Appendix C) explaining the Delphi method and findings is available on www.rrbm.network.

b. Who benefits from our research?

Currently, research primarily benefits the researchers who conduct it (for career advancement) and those who read it, which consists primarily of other scholars. Articles are recognized as being interesting or novel rather than providing actionable insights. There is a low priority given to how research could benefit business and the broader society, including employees, customers, and communities.

c. What kinds of topics are we studying?

The choice of topics is often driven by the prior literature and its gaps, regardless of the importance of the topic to the world at large in the contemporary context. Topics are also shaped by the availability of data suitable for analysis and publication. This often limits research to organizations that are required to disclose information on a regular basis, in particular, exchange-listed corporations, at the expense of other forms of enterprises (e.g., family firms, non-profits). Yet, the availability of data may not correspond to the importance of the question. Experimental research often favors topics that can be studied in a lab using undergraduate students or on Amazon MTurk. Finally, business school research often takes the form of “bite-sized chunks” that can be conducted in a few months and conveyed in a short article. Books are often not valued. Large-scale projects are seldom pursued.

d. What topics SHOULD business school research focus on?

The Delphi respondents expressed significant consensus on a delimited set of big topics framed as “grand challenges.” The five topics receiving the greatest assent included:

1. Understanding the broader impact of firms on and their roles in society, beyond the creation of shareholder value.
2. Understanding the changing nature of work and the workforce, as well as the changing nature of consumers and their role in co-creating value.
3. Examining the social sustainability of business organizations, including their impact on the health and well-being of employees, customers, and community.
4. Enhancing environmental sustainability, managing the use of natural resources, and reducing negative environmental impact.
5. Alleviating poverty, creating greater prosperity, and reducing economic inequality, both locally and globally.

The above topics may reflect the disciplinary background of the respondents, but they align well with the United Nation’s “Sustainable Development Goals,” and the World Economic Forum’s Global Risks reports (2014 to 2017), which identify income disparity, unemployment and underemployment, asset bubbles, and failure of financial institutions as the major economic risks.¹⁹ The Special Research Forum on Grand Challenges in Management serves as an exemplar for business school research tackling societally relevant problems.²⁰

¹⁹ <https://www.weforum.org/reports/the-global-risks-report-2017>

²⁰ “Grand Challenges in Management” appears in the December 2016 issue (vol. 59, issue 6) of the *Academy of Management Journal*. Also see introduction to the forum by George, Howard-Grenville, Joshi, & Tihanyi (2016).

4. *The Underlying Research Ecosystem and its Equilibrium*

Why is there such a gap between what business school research could do and what it actually does? The insights gained from the Delphi study help us identify points of leverage and provide a map of the academic career system and the incentives it provides to research. The relevant actors, their priorities, and inter-relationships among the actors constitute the research ecosystem. The actors include researchers; journals, editors and their editorial boards; faculty evaluation committees; senior faculty; deans, provosts, and presidents; funding agencies like NSF, NIH, or private foundations; school or university-ranking publishers such as *Business Week* and *Financial Times*; and business school associations such as EFMD, AACSB, CEEMAN, and AMBA. Practitioners and policymakers are also part of the ecosystem. They are the “consumers” of our products (knowledge from research) and services (teaching and consulting).

Within this system, the journal article is the essential unit of currency. Faculty members are evaluated based on their publications in a small set of elite journals—defined by “impact factor” (despite doubt on its value as an accurate measure of quality)—or its appearance on agreed-upon lists of top journals (e.g., the *Financial Times* 50, which also has concerns about the political nature of journal selection). Schools themselves are evaluated in part on their faculty’s record of publications in these journals. Prospective faculty members, in turn, weigh job opportunities by the schools’ reputations, based in part on their publication records. Thus, those who want to be rewarded orient their work toward the perceived standards of elite journal editors and reviewers. These standards, in turn, reflect the values of editorial board members, who tend to be accomplished scholars who have been successful in the current system based on their publications in the list of elite journals. Taken together, we have achieved an equilibrium where one set of actions supports another set of actions in a reciprocal and mutually reinforcing way. However, this equilibrium reflects the local isolation of academics and a clear disconnect from the society embedding the research ecosystem. The localized equilibrium has led to questions on both scientific credibility and the societal value of the research.

It is clear that systemic change in this equilibrium is difficult, as any change will require coordinated actions by key actors in all the relevant decision posts: deans and evaluation committees; journal editors and boards; funding agencies; and accreditation bodies. None of them can do it alone. Suppose that a visionary dean decided to encourage a different, more “responsible” kind of work that was not currently rewarded by elite journals. Faculty might then aim their publications at specialized or local journals, which are usually not on the “list.” This would harm the school’s reputation, making it difficult to hire top scholars and perhaps harming the school’s accreditation and funding. Alternatively, suppose that a visionary editor of an elite journal sought to break away from the pack and publish research on important social problems without a strong theory or advanced methods. S/he is likely to find that both the associate editors and the editorial board are not enthusiastic about abandoning the standards in which they have been trained (such as contribution to theory, sophisticated statistics, novelty). Even if an editor were successful in replacing the entire team with more malleable scholars, the result is almost certain to be a decline in impact and reputation of the journal and its removal from the elite list. Or, imagine that an accrediting body sought to radically change its standards, without the participation of faculty, deans, and journal editors. Much the same problem arises, and it is easy

to imagine that a new accreditor would quickly arise to take its place. Systemic change requires coordinated action. Without it, independent stakeholder attempts will likely fail.

E. CONCLUSION: SCIENCE FOR A BETTER WORLD

The current system is falling short of fulfilling our collective potential. The goal for researchers and their institutions should include business and societal impact, not simply to publish in a small set of journals with limited readership. The results of research are an important input into the curriculum and are the basis for informing public policies and advising best practices. Responsible research feeds into responsible teaching and preparation of responsible managers, but our current ecosystem is reinforcing research that is narrow, outdated and insulated from the real world. We encourage increasing the diversity of topics, methods, disciplinary perspectives, assumptions, contexts, and dissemination methods. Diversity should be a central part of our research vision, with societal impact as a central goal of responsible research. The research ecosystem has a web of interrelated players. Each has a role to play in encouraging and supporting efforts to move the current citation-based publication-oriented ecosystem to one that supports the principles associated with responsible research. Complementary and coordinated actions involving all players in the ecosystem are necessary to reach Vision 2030.

1. Consequences of a “Do-nothing” Option

Doing nothing and letting things evolve on their natural course is certainly an option. This option describes how things have progressed over the past few decades. However, do we want to continue to invest in an activity with limited substantive returns? Business and management research is extremely costly. With increasing competition for resources, there will be increasing pressure to demonstrate the societal value of research to resource providers, or business schools will run the risk of losing legitimacy. Life in business schools will become more and more stressful as faculty researchers continue to compete to publish in prestigious journals. With talented faculty members finding such work to be both stressful and demeaning, business schools may begin to lose valuable educators to their non-university-based competitors. This talent exit has already begun, with scores of academics joining high tech start-ups and established technology and consulting firms, which offer the promise to change the world or provide a big payoff. Young talents aspiring to make a difference in the world and finding meaning in their life may not be attracted to business schools if the current research culture remains.

2. The Changing Context of Business and Management Schools

The macro business environment is changing more rapidly than academic scholars seem to have realized. There are unprecedented technological changes: the ubiquity of e-commerce, increasing use of artificial intelligence and robotics to replace human decision-making and tasks in many fields including manufacturing, electronics, healthcare, and education. For the business school, there is at best stagnant enrollment, escalating tuition, declining budget support, increasing the call for accountability and transparency, rising use of MOOCs, the rapid expansion of non-research teaching faculty, along with global competition among over 14,000 business schools worldwide. This is precisely the time when we need to step back and reflect on the role of business schools in the society at large, and specifically the role and potential impact of research

in the business schools. What can we do to ensure that we are using our resources and talents effectively to address the pressing problems confronting business and society in the twenty-first century? Engaging in responsible research in the manner described in this position paper is not only important for the epistemic and societal goals of science but more importantly for the flourishing of the businesses and society that business schools serve. Business schools hold a unique position to create a research-based path to a better future.

3. A Call to Action: “Responsible Research for Better Business and a Better World”

At the dawn of the 21st century, the world is facing challenging tensions in all aspects of society: economic, political, technological, social, and environmental. In 2015, the United Nations pledged to end poverty, protect the planet, and ensure prosperity for the next fifteen years through implementing 17 sustainable goals by its 195 member states.²¹ In 2008, the National Academy of Engineering identified 14 grand challenges in the areas of education, artificial intelligence, healthcare, clean water, energy, urban infrastructure, cyberspace security, and more.²² Leaders in government, business, and civil societies have identified a myriad of similar challenges. Business and management research can do much more to contribute to meeting these challenges by discovering management processes and systems to improve collective work at the organizational and national levels. These could include the responsible use of financial resources, accounting methods for assessing societal impacts, innovative products and services to meet the needs of the base of the pyramid, sustainable marketing and supply chain, logistics to reach currently inaccessible regions, strategies for economic growth and significant innovation, attention to both wealth creation and wealth distribution, to name a few. Academic freedom is important but research is not value-free, and there are consequences of business school research not staking its claim to societally valuable work. Contributing to a better world is the ultimate goal of science. Science in business and management can live up to its obligation and realize its potential through engaging in responsible research that we humbly propose.

We invite widespread debate and dialogue on the ideas discussed in this position paper.

²¹ Please go to the SDG website (<http://www.un.org/sustainabledevelopment/sustainable-development-goals/>) for the list of 17 goals, suggestions on implementation actions, calendar, and what each person can do to help in the achievement of these goals.

²² The National Academy of Engineering. (2008). “14 grand challenges for engineering in the 21st century.” <http://www.engineeringchallenges.org/challenges.aspx>.

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Appendix

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Co-signers

85 senior scholars and leaders, representing multiple business disciplines (including 30 school, university and business leaders) from 75 institutions in 21 countries, provided valuable suggestions that greatly improved the paper during the six-month consultation period, April to September 2017. The names and affiliations of the full list of co-signers are on the “Supporters” page of the website RRBM.network.