

Translating management research into practice: a six-step path to engage stakeholders

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ABSTRACT

Scholars have observed that management research can miss opportunities to translate its findings into practice. Some emphasize the importance of academic-practice collaboration in designing, implementing, and disseminating management research to ensure academic rigor and practitioner relevance. These views align well with evidence-based management perspectives. This paper's objective aims to describe what a research-to-practice translation path might resemble. This effort describes a six-step model to bridge research and practice identification, engagement, dissemination, exploitation, evaluation, and refresh. It draws on diverse sources of information obtained via purposeful sampling to provide illustrative examples to reflect how researchers or practitioners who translate their work into practice engage with these steps. This work's contributions involve a roadmap for translation and extension of prior works in the extant literature calling for academic-practice collaboration in designing, implementing, and disseminating management research and multiple research-to-practice experience examples to illustrate how scholars and practitioners embrace such efforts for each phase. It also extends the ongoing academic conversation on this topic. This work proposes avenues for future research to address the limitations of this descriptive narrative. It seeks to refine the proposed model that can aid management researchers in their efforts to translate their works for managers and other practitioners.

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Introduction

Does management research miss the opportunity to translate its findings into practice? Starkey and Madan (2001), citing the lack of relevance to practice, provide insights into the long-running debate about 'knowledge for what purpose' (Lynd, 1939). Denyer et al. (2008) characterize management research as a large, fragmented science base with questionable relevance. Božič et al. (2022), De Frutos-Belizón et al. (2019) and Rousseau (2006) highlight the research-practice 'gap' and the failure of organizations to base practices on the best available evidence. Baldrige et al. (2004), observing limited overlap between academic quality and practical relevance, highlight differing stakeholders' views on what makes the research interesting and applicable. Pettigrew (2001) observes the long-standing issues around its significance and the challenges around users, needs, and engagements. Shepherd and Gruber (2021) report that practitioners fail to pay attention to such research, while researchers do not engage those in practice around questions or interpreting results.

A few current studies continue to emphasize this gap (Arteaga et al., 2024; Negt & Haunschild, 2024). These highlight communication barriers, methodological issues, and accessibility challenges that persist in hindering the practical application of research findings (Arteaga et al., 2024; Negt & Haunschild, 2024).

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Arteaga et al. (2024) observe that the gap is a bilateral issue, requiring both theory and practice to adapt and integrate more effectively. Also, Negt and Haunschild (2024) identify communication barriers, methodological issues, and the accessibility and visibility of research as key factors contributing to the gap.

Scholars offer insights to bridge this gap. Buckley et al. (1998) suggest strategies including (1) business-university partnerships, (2) accessibility of information and accountability, (3) business experience for professors, and (4) corporate sabbaticals. Huffman and Benson (2021) advocate for the need for practitioners' help in collaboration. Shapiro et al. (2007) highlights the need for two-way dialogue and boundary-spanning behavior and opportunities. Rynes et al. (2007) advocate for the reexamining of traditional knowledge transfer between academics and practitioners and propose new models (e.g. Nonaka SECI [socialization, externalization, combination, and internalization]) (Nonaka & Takeuchi, 1995) for interaction, allowing for 'double-loop' learning processes (Argyris & Schön, 1974, 1978).

Recently, a few frameworks have suggested that addressing such gaps (Arteaga et al., 2024; Haunschild, 2024). Arteaga et al. (2024) propose a construct to address the theory-practice gap (the challenge of applying theoretical knowledge effectively in real-world situations) built on a systematic review across multiple disciplines (health, science, governance, and business). It embraces bilateral perspective, cyclical and integrative approach (emphasizing continuous learning and reflection), and interdependence of theory and practice to influence and improve the latter (Arteaga et al., 2024). Haunschild (2024) adds to this contribution from Arteaga et al. (2024) by proposing a Socioeconomic Approach to Management (SEAM) participatory model that effectively bridges this gap by fostering collaboration and practical relevance. However, both efforts appear complicated and fail to provide detailed translation path examples to bolster these proposed constructs.

Despite these advances, a clear path for translating research into practice is still lacking. Thus, this paper's objective aims to describe what such a research-to-practice translation path might resemble. Accordingly, it describes a six-step roadmap that outlines a pragmatic process with illustrated examples to bridge the gap between research and practice. This effort extends prior works calling for academic-practice collaboration in designing, implementing, and disseminating management research. This paper starts with a review of the literature and moves to outline the methods. Then, it proceeds to introduce the six-step roadmap and a detailed discussion of each part with examples. It then proposes practical strategies for practitioners to review, closes with limitations and proposes ideas for future research.

Literature review

Considerations around the existing academic-practitioner gap

Multiple scholars reinforce the significance of the existing academic-practice gap concerning the translation of scholarly research to practice. Bartunek and Rynes (2014) report that this issue has been the subject of ongoing dialogue within the academic literature for the past 50 years. Rynes et al. (2001) acknowledge the lack of any systematic effort regarding the extent and nature of this gap and how to narrow it. In a later contribution, Rynes et al. (2007), noting that academics and practitioners live in separate worlds, highlight differences in the basic assumptions, beliefs, frames of reference, goals to influence, metaphors to construct the world meaningfully, 'sense-making', social systems, timeframes for problem-solving, and variables to manipulate for each of these two audiences.

Several recent studies continue to emphasize these differences and underscore these challenges, noting that communication barriers, methodological issues, and accessibility challenges persist in hindering the practical application of research findings (Cheang et al., 2015; Fenby-Hulse, 2019; Kuran, 2024; Negt & Haunschild, 2024; Shapiro et al., 2007). Negt and Haunschild (2024) identify communication barriers, methodological issues, and the accessibility and visibility of research as key factors contributing to the gap. Fenby-Hulse (2019) discusses how the practical application of business research is often relegated to a minor section of academic papers, thereby limiting its impact. Also, Shapiro et al. (2007) identify the 'lost in translation' and 'lost before translation' issues, emphasizing the need for more effective communication and collaboration between researchers and practitioners. Cheang et al. (2015) analyze the

structural influences in the scientific communication of business knowledge, emphasizing the need for multidimensional approaches to evaluate and improve research communication. Finally, Kuran's recent paper (2024) proposes the Socioeconomic Approach to Management (SEAM) as a participatory model to bridge this gap by fostering collaboration and practical relevance. These multiple perspectives highlight the multifaceted nature of the research-practice divide and suggest that addressing it requires a concerted effort from both academics and practitioners.

Structural factors within academics might facilitate this gap. Buckley et al. (1998) underscore that academic research's purpose, setting faculty incentives, is about publications and, ultimately, tenure. In order to reinforce this point, Shapiro et al. (2007) highlight the promotion and tenure system's disincentives/incentives and practitioner constraints. They add that the journal review process for academics involves reviewers pressing an author on methods and theory but not practical information or application (which in many papers may be a few sentences or paragraphs) (Shapiro et al., 2007).

Current works add to the conversation on structural factors (Akmal et al., 2024; Cote, 2023; Haunschild, 2024; Varma et al., 2021). Varma et al. (2021) identify structural barriers, such as environmental and organizational factors that hinder effective communication in the workplace. Akmal et al. (2024) highlight the irrelevance of business research outside of the closed circle of academics. Their survey of 67 academic business journals concludes that journal guidelines and requirements inhibit research communication to practice, contributing to the irrelevance of such contributions to practitioners. Cote (2023) discusses the importance of aligning organizational communication with strategic goals to overcome structural barriers. Others emphasize that addressing these structural factors requires a re-evaluation of academic incentives and a shift towards more practice-oriented research outputs (Arteaga et al., 2024; Haunschild, 2024). Moreover, Haunschild (2024) explores the socioeconomic approach to management, emphasizing the need for participatory models that bridge the gap by fostering collaboration and practical relevance. These perspectives highlight the multifaceted nature of the research-practice divide and suggest that addressing it requires a concerted effort from both academics and practitioners.

Recognizing the failure of management research to communicate with practitioners, Kelemen and Bansal (2002) highlight the lack of congruence between researchers' and managers' interests. They note that the academic research writing style alienates most practitioners (Kelemen & Bansal, 2002). Perea and Brady (2017) identify notable challenges when examining the gap between business journals and practice. Their survey of 150 senior business professionals reports that these individuals are not familiar with most academic journals, and they desire relevant content from experienced business people that is accessible online (Perea & Brady, 2017). Buckley and colleagues' (1998) survey of 113 human resource professionals reports that while these managers are familiar with some of the academic research, they fail to see the practical implications of such works. These scholars highlight multiple conflicts around articles, such as (1) theoretical versus practical, (2) data-supported versus logical, (3) scientific method versus case examples and common sense, (4) academic- versus practitioner-oriented publications, and (5) tenure versus organizational effectiveness (Buckley et al., 1998). Jemison (1981) discusses the potential for cross-fertilization in strategic management research by integrating perspectives from industrial organization, marketing, and administrative behavior.

More recent contributions continue to underscore these considerations, emphasizing the need for integrative approaches that consider both academic rigor and practical relevance (Arteaga et al., 2024; Kindelan, 2022; McLellan et al., 2017; MDPI, 2022). Kindelan (2022) highlights the value of a holistic education and an integrative curriculum, noting the importance of interdisciplinary collaboration to overcome disciplinary siloing and enhance educational outcomes. Also, MDPI's (2022) systematic review examines integrated learning in health professions education, focusing on actionable educational activities that bridge theory and practice. Further, Arteaga et al. (2024) propose a cyclical and integrative approach to address the theory-practice gap, emphasizing the interdependence of theory and practice that can enrich both theory-building and applied research by leveraging the strengths of different disciplines. Finally, McLellan et al. (2017) also highlight the importance of integrating worker health, safety, and well-being into organizational practices to achieve holistic improvements. These integrative approaches underscore the crucial role of collaboration in enhancing relevance, suggesting that addressing the theory-practice gap requires a concerted effort to blend academic rigor with practical relevance, fostering collaboration across various domains.

Huffman and Benson (2021) observe that collaboration between businesses and academics can be rare. Rynes et al. (2007) identify that practitioners need not only the evidence itself but also how to use it to meet continuing daily challenges effectively. Such is more complicated than just knowledge about the evidence or appreciating multifaceted issues like intelligence, personality, or goal setting in the vacuum presented in an academic paper (Rynes et al., 2007). In their survey of 548 researchers, Shapiro et al. (2007) highlight issues with lost before and lost in translation, and tenured faculty are less concerned with translation. Cohen (2007) identifies the reasons for this divide by pointing out differences in the orientations of academic and practitioner publications (problem analysis as a more theoretical research orientation providing a deeper examination of the underlying root causes for academics and implications of issues versus problem-focused for application to prioritize issues and solve problems for practitioners), as well as the fact that practitioners do not typically read academic journals.

Other works add to the conversation by suggesting that addressing these issues requires an iterative and integrative approach (Eckstein et al., 2024; Haunschild, 2024; Jemison, 1981; Kuran, 2024; McLellan et al., 2017). Jemison (1981) also highlights the potential for cross-fertilization in strategic management research by integrating perspectives from industrial organization, marketing, and administrative behavior. This integrative approach can enrich both theory-building and applied research by leveraging the strengths of different disciplines. McLellan et al. (2017) emphasize the importance of integrating worker health, safety, and well-being into organizational practices to achieve holistic improvements. Kuran (2024) discusses how collaborative, iterative problem-solving and the integration of social theories with practical actions can effectively bridge gaps. Eckstein and collaborators (2024) provide a comprehensive review of sensemaking in business and management, highlighting the importance of integrating sensemaking processes to manage dynamic environments effectively. These perspectives underscore the multifaceted nature of the research-practice divide and suggest that addressing it requires a concerted effort from both academics and practitioners.

Collaboration to enhance evidence-based management

Management researchers (Akmal et al., 2024; Baldridge et al., 2004; Belcher et al., 2017; Melnyk & Fineout-Overholt, 2023; Pettigrew, 2001; Ren & Bartunek, 2020; Starkey & Madan, 2001) stress the crucial role of academic-practitioner relationships in the generation and dissemination of knowledge. Akmal et al. (2024) and Melnyk and Fineout-Overholt (2023) highlight the role of evidence-based management in enhancing organizational decision-making and performance. Collaboration is essential for planning, conducting, and sharing management research, ensuring its rigor and usefulness for practitioners, which in turn leads to adoption and use. Pettigrew (2001) discusses the duality of scientific quality and relevance, emphasizing the need for those involved in the research to pursue significant themes in the social present. Starkey and Madan (2001) advocate increased user stockholding in multiple aspects of the process, from knowledge creation to dissemination. To compare their theory of change to evidence of outcomes, Belcher et al. (2017) use contribution analysis and purpose-built outcome evaluation. O'Shannassy (2017) highlights the importance and relevance of strategy research to practice and application, such as involving challenges, tasks, communication, collaboration, innovation, evolution, and organizational maturation. Rynes et al. (2007) recognize the impact of environmental changes such as globalism, public policy, and resource dependencies for private support.

More current contributions emphasize the need for structured collaboration frameworks to enhance the practical relevance of management research in business and healthcare (Arteaga et al., 2024; Calancie et al., 2021; Eckstein et al., 2024; Ganeshu et al., 2024; Haunschild, 2024). Calancie et al. (2021) developed the Consolidated Framework for Collaboration Research (CFCR), synthesizing various theories, models, and principles for cross-sector collaboration, highlighting the importance of structured frameworks in facilitating effective collaboration. Ganeshu et al. (2024) discuss the role of inter-organizational collaboration structures, emphasizing the need for hybrid forms of hierarchy and network arrangements to enhance collaboration among organizations. Additionally, Eckstein et al. (2024) provide a comprehensive review of sensemaking in business and management, underscoring the importance of integrating sensemaking processes to manage dynamic environments effectively. Others (Bachynsky, 2020; Itchhaporia,

2021; Melnyk & Fineout-Overholt, 2023) emphasize the importance of collaborative frameworks in enhancing the practical application of management research. When looking across these works, they emphasize the multifaceted nature of the research-practice divide and suggest that addressing it requires a concerted effort from both academics and practitioners.

Such practical collaborations offer local and national benefits (Belcher et al., 2017; Owen-Smith, 2003) and align with evidence-based management perspectives (Briner et al., 2009; Rousseau, 2006; Rousseau & McCarthy, 2007). Evidence-based management is about making decisions through the conscientious, explicit, and judicious use of (1) practitioner expertise and judgment, (2) local context evidence, (3) critical evaluation of the best available evidence, and (4) perspectives of stakeholders (needs and expectations) affected by the decision (Briner et al., 2009). This idea reflects a family of approaches to support decision-making that practitioners engage, but not scholars (Briner et al., 2009).

Recent publications indicate that integrating these approaches into organizational practices can significantly enhance decision-making processes and outcomes (Brown et al., 2021; Gorsuch & Boss, 2024; Johnson & Lee, 2022; Smith et al., 2023; Välimäki et al., 2024). For example, Gorsuch and Boss (2024) highlight the success of a nurse-led collaboration in promoting evidence-based practice, which resulted in improved patient outcomes and staff satisfaction. Välimäki et al. (2024) demonstrate that evidence-based nursing leadership can lead to better healthcare settings by fostering a culture of continuous improvement and innovation. Additionally, Smith et al. (2023) discuss the impact of integrating data analytics into organizational decision-making, showing how data-driven strategies can lead to more informed and effective decisions. Johnson and Lee (2022) explore the benefits of cross-functional teams in enhancing organizational agility and innovation, emphasizing the importance of diverse perspectives in problem-solving. Finally, Brown et al. (2021) examine the role of continuous professional development in healthcare, highlighting how ongoing training and education can improve clinical outcomes and staff competencies. Together, these studies underscore the value of integrating various approaches to enhance organizational practices and outcomes.

Interestingly, scholars note that this task is not so easy. Cohen (2007) emphasizes that for evidence-based management to be taken seriously and embedded in the practitioner community, academics need to make a concentrated effort to close gaps. For example, such considerations include recognizing that practitioners do not read academic publications and that they look at problems differently (analysis for root cause and theory development for academics versus focus on problem-solving for practitioners) (Cohen, 2007). Rynes et al. (2007) observe that managers need more than exposure and be able to embrace the scientific evidence for evidence-based management. Such translation needs to be applied to address current problems, appropriate business cases, and concrete solutions for achieving the use of evidence-based management (Rynes et al., 2007). Akmal et al. (2024) add that, despite different bridging approaches, such as Mode 2 research, engaged scholarship, evidence-based management, action research with active stakeholder involvement, and aligning academic incentives for practice-relevant research, the research-practice chasm persists.

Contributions over recent years highlight the importance of multi-level stakeholder engagement and the development of shared tools and processes to facilitate evidence-based practices (Aarons et al., 2024; Akmal et al., 2024; Concannon et al., 2019; Holcomb et al., 2022; Melnyk & Fineout-Overholt, 2023; Pew Trusts, 2022; Wei, 2022). Aarons et al. (2024) discuss the complexities of implementing and sustaining evidence-based practices within community mental health, underscoring the necessity of engaging cross-functional partners at multiple levels of influence. Holcomb et al. (2022) add to the conversation by exploring the role of multi-level stakeholder engagement in the adoption and implementation of evidence-based interventions. They emphasize the importance of building mutual trust and providing clear communication to ensure effective adoption and sustainability (Holcomb et al., 2022). Concannon et al. (2019) provide practical guidance for involving stakeholders, highlighting the need for systematic engagement strategies to improve the relevance and impact of research outcomes. Pew Trusts (2022) discusses how cross-branch collaboration in policymaking can strengthen evidence-based approaches, leading to more effective and sustainable outcomes. Wei (2022) emphasizes the role of convergent care theory in transforming nursing practice through teamwork and interprofessional collaborations, which can serve as a model for other fields seeking to bridge the research-practice gap. Accordingly, these works help to define the value of structured collaboration frameworks and multi-level stakeholder engagement in enhancing the practical application of evidence-based practices.

Methods

This work's objective endeavored to describe what a research-to-practice path might resemble. It does so by proposing a six-step model for translation. This effort's aim was not to identify the pros or cons associated with each step, the implications to academic practice, or to test whether such a model works. Further, this effort did not employ structured case study methods, such as those of Eisenhardt (1989, 2021), Gioia (2021), Langley and Stensaker (2012), or Yin (2009), to build theory.

The research process involved three parts. First, this effort proposed a six-step model for translation based on guidance from the Cranfield School of Management's doctoral handbook (Cranfield DBA Handbook, 2019) and the authors' experiences. The next entailed characterizing each step in detail to provide defining elements. The third engaged in choosing supportive examples based on purposeful sampling (Stratton, 2024). Scholarly qualitative research utilizes this population sampling approach as part of a synthesis effort where the researcher's basis for selecting participants, cases, or examples resides on their presence within a particular population, characteristics, experiences, or other criteria of interest to address a defined study objective (Stratton, 2024). Hence, this research effort drew on examples from multiple academics and practitioners who had generated practical translations from their Ph.D. research in diverse parts of the world to provide an illustrative sample of the target population, characteristics, and experiences. Such a sample of examples sought to emphasize the 'real world' applications seen with each step.

Data sources included published peer-reviewed and gray literature, thought leader interviews, and the authors' experiences and personal networks. This analysis involved culling relevant data to provide background information and supportive examples or evidence for each step in the model. It did not evaluate source or data quality. This approach led to evidence illustrating how individuals who have conducted scholarly research have translated such efforts and how such actions took shape within the construct. Such evidence supports each step of the process and the whole model and sets the basis for further research.

Results

The six-step model

Multiple scholars offer a mix of constructs, standards, and strategies to bridge the translation of research to practice gaps (Briner et al., 2009; Denyer et al., 2008; Lawler & Benson, 2022; Ren & Bartunek, 2020; Rousseau, 2020). Interestingly, such insight reflects the movement of knowledge and innovations through organizations and communities (Crossan et al., 1999; Rogers, 1963). However, none provide a pragmatic stepwise process and illustrative examples for each step.

This paper offers a six-step process model (Figure 1) developed following guidance from the Cranfield Doctor of Business Administration practice impact assignment (Cranfield DBA Handbook, 2019) to embrace these ideas. The first two steps involve identifying and engaging stakeholders and future beneficiaries/users. The second step begins the collaborative process involving inputs around methods, brokering or sourcing potential subjects and teams, and getting a first look at the initial data to provide translation to practice insights. They will assist in developing the dissemination, exploitation, and evaluation plans. The next two extend the collaborative efforts to engage and disseminate the research via outreach, education, and application tactics. The penultimate step involves evaluating the translation effort, which should collaboratively engage the stakeholders using qualitative and quantitative techniques. It leads to the final step, which may involve working to refresh, update, and expand the research. These efforts can loop back to the earlier efforts of identification and engagement.

Step 1 – stakeholder identification

The first step of this plan focuses on identifying key stakeholders who can engage in the practice-related impact process. Such individuals should emerge from one's network and situate themselves in practice. They will help lay the foundations for the translation plan. Key stakeholders are advisors, beneficiaries,

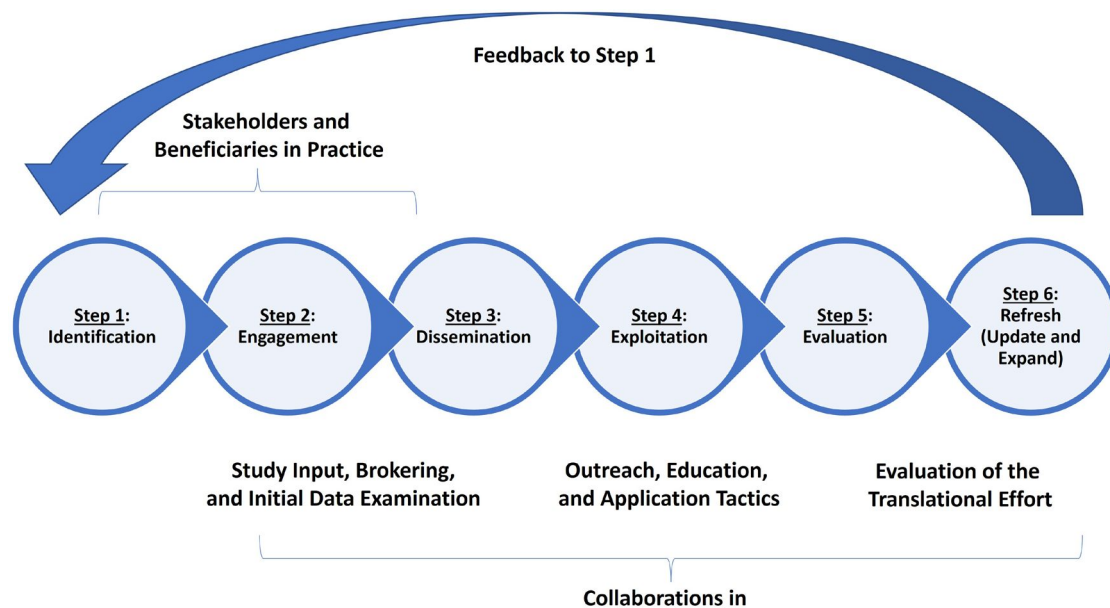


Figure 1. Six-step translation from research to practice process model.

and users. They can comprise practitioners (entrepreneurs, investors, managers, mentors), administrative leaders, customers (or proto-customers), and policymakers. All should enjoy benefits and utilize and potentially be customers of the research's output. The levels of stakeholders can be local, regional, national, and international.

One approach considers two levels of stakeholders: a core advisory board and a secondary group. These individuals will be critical to the translation process. Initiating this effort will involve the creation of an advisory board. Members will engage individuals vested in this research who can offer strategic guidance and fulfill multiple roles: (1) co-creators, who contribute to the intellectual content and ideas of the research and its applications; (2) brokers of the research into fieldwork sites; (3) initial evaluators of the project findings; and (4) advisors on dissemination, exploitation, and evaluation.

These individuals will bring insights from their backgrounds in practice, research, working with particular programs, jobs, investment, and starting new ventures (and managing existing ones). Members provide a mix of ties to practice, education, investment, and targeted programs on which the research might focus. They bring expertise, networks, or influence to aid the research and translation process. The research has established relationships and can access input from these advisors, individually or collectively, on a timely basis. These individuals have had a close relationship with the researcher. They can be relied on to provide straightforward feedback and ultimately look for ways to disseminate and exploit this work. Empirical evidence supports the need for open and candid discussions. These efforts enhance research and development effectiveness and overall performance (Wilson, 2019; Wilson & Liguori, 2023; Wilson & Perepelkin, 2022). External spheres of influence can range from local to regional, national, and international. Some will have multiple spheres due to their programs, consulting, or involvement with the researcher's targeted area. The researcher would want regular contact (e.g. monthly) on various issues related to the research and its translations. These individuals can commit their time to routine engagement and play multiple roles.

Additionally, there may be a secondary group of stakeholders. This group will consist of a mix of individuals with whom the researcher can engage intermittently. Sometimes, if the researcher does not have a core set of advisors, this group will function as the primary feedback and collaboration source. These stakeholders may or may not bring the same expertise to aid the research and translation effort. They offer valuable insights and connections. However, they might not have time to devote to the project. The researcher may engage these participants quarterly on an ad hoc basis. Some might be involved with the researcher's targeted area, and a few might involve national- and international-level leaders in the areas of interest. The researcher will engage them relative to brokering, disseminating, and exploiting

the results; some will have had experience, especially with the latter two. As the researcher works with these stakeholders, he/she may include one or more in a primary stakeholder advisory board. The basis for this action should consider the degree and quality of interactions and inputs, as well as the ability to source potential cases.

Researcher-to-practice experience examples illustrating stakeholder identification. Baldassarre et al. (2017) experience user-driven innovation for developing solutions and sustainable business models with stakeholders. They initiated the project by identifying multiple stakeholders, including customers, shareholders, suppliers, partners, and society, through a design approach within the framework of the Climate-KIC, a European knowledge and innovation non-profit cooperative program focused on transitioning to a zero-carbon economy to balance economic, environmental, and societal needs (Baldassarre et al., 2017). Sharon Tal, Ph.D., creator of the market opportunity navigator and co-author of 'Where to Play', engaged her stakeholders less formally by having a robust network and following from talks and social media (Personal communication). As she and her co-author, Marc Gruber, Ph.D., developed their tool for practice and the book from these efforts, they engaged multiple individuals, who ranged from advisors for feedback such as Alexander Osterwalder, Ph.D., and Yves Pigneur, Ph.D. (the developers of the business model canvas) to target users, beneficiaries, and proto-customers to American entrepreneurship thought leaders such as Steve Blank.

Stephanie Hussels, Ph.D., director of the Bettany Centre at the Cranfield School of Management, highlighted efforts to identify local and national small-to-medium enterprises (SMEs) and policymakers in the United Kingdom. Their efforts focused on creating thought leadership, influencing practice to support and shape policy by sitting on these entities' steering groups and advisory boards.

Step 2 – engagement

Engagement involves different phases, roles, and activities. Gaining input and collaboration around various translational steps is essential to the engagement effort.

The researcher may involve some stakeholders due to past relationships and local institutions and program collaborations, as well as others due to requisite needs in the research area. Since many of these stakeholders will have multiple roles, the researcher shall engage most of them early in the process to gain their support around the impact plan. Items discussed will include roles and input timing to ensure each stakeholder is enthusiastic about aiding in the impact plan and translational effort. The most valuable part of the process will be those who are co-creators and brokers. The researcher will engage these individuals early to gain relevant input that might influence the research methods or identify and/or secure cases to investigate. This effort will allow the researcher and stakeholders to review the current research background, the study methods, and the engagement plan. Also, these individuals may provide introductions or referrals to newer stakeholders with whom the researcher has not established a working relationship.

The next step involves contacting secondary stakeholders. Some individuals will be easy to connect with due to established relationships, while others will require referrals to provide credibility. Following these initial contacts, the researcher will engage with advisory board members monthly and other stakeholders, as needed, every one to three months.

Timing for these engagements can run throughout the research effort to publication. The initial period will require engagement around methods and identifying cases. Once the research effort has commenced, the researcher will update stakeholders on the progress. Later, upon completing the initial data analysis, the researcher will share a first look at the data with various stakeholders. These discussions will engage ideas and feedback regarding the data and plans (and collaborative efforts) related to dissemination, exploitation, and evaluation.

The researcher can engage via live synchronous (e.g., face-to-face, Zoom, phone) or asynchronous (e.g., email or platform communications) means. The timing for initial meetings will be thirty to sixty minutes. Later contacts may involve longer individual engagements, group meetings, or contact via digital community mechanisms (e.g., Basecamp, LinkedIn Groups, personal websites, and blogs). As serious discussion emerges around a first look at the data, dissemination, exploitation, and evaluation, these contacts shall be synchronous, personal, more extensive (approximately sixty minutes), and potentially in small groups for data review. Also, based on the type of feedback, these engagements might be iterative and involve both live and asynchronous mechanisms. Due to geographic location or stature, some

individuals will require individual contact, flexibility in scheduling feedback and planning sessions, and asynchronous approaches to engage in dialogue and feedback.

Researcher-to-practice experience examples illustrating stakeholder engagement. Baldassarre et al. (2017) engaged multiple stakeholders early in the engagement process around their sustainable value proposition design. This effort involved a complete, dynamic, and iterative approach (Baldassarre et al., 2017). This effort involved talking with stakeholders, thinking about the problem, and testing the product/service (Baldassarre et al., 2017). More specifically, using the initial framework to understand the stakeholders (especially users) broadly, then identifying and progressively incorporating their needs, interests, and feedback into developing an enriched value proposition to introduce to the community (Baldassarre et al., 2017).

Sharon Tal, Ph.D., approached both formal and informal stakeholders in a process akin to initiating a new venture, employing lean startup methods (experimentation using a build – measure – learn effort with a minimum viable product) to facilitate the translation of her doctoral research work and the development of the market opportunity navigator (Personal communication, S. Tal, Ph.D.). She saw engagement as an opportunity to build a bridge with the practitioner community and to use the process of honing these stakeholders' needs as the ultimate tool to deliver. This entrepreneur also utilized engagement to gain guidance on disseminating and exploiting the translated knowledge and tools. Tal also used these interactions to lead to other thought leaders who could amplify awareness about the free tool and relevant programs, such as their Massive Open Online Course (MOOC) via edX.

Stephanie Hussels, Ph.D., at Cranfield, proactively engaged local and national councils and enterprise partnerships such as Unilever and Rolls-Royce. Such efforts involved stakeholders planning and translating research into service and educational projects, such as Cranfield's Grand Challenge efforts with government and corporate sponsors.

Step 3 – dissemination

The next area of this plan involves disseminating information about the study, progress, findings, and practical applications and tools via multiple approaches. It creates awareness and helps build credibility and brand recognition. Accordingly, such efforts involve multiple strategies involving print, platform, and digital opportunities that engage stakeholder collaboration to broaden awareness and reach.

Print. The key way to disseminate this research is through print opportunities in peer and non-peer-reviewed publications. Notable are peer-reviewed publications. Such outputs will only enhance the work's credibility and disseminate the content, ideas explored, and ongoing research effort and outputs. This research can then use these works to amplify awareness through entrepreneurial trade and practitioner journals, business periodicals, and social channels. Cohen (2007) suggests that authors approach their work with a perspective of how they can use their capabilities to help practitioners versus shouting and paying attention to personal works these individuals deem to be important. Akmal et al. (2024) propose changing journal requirements for shorter (3000–4000 words), styled for a generalized audience, faster reviews, and simplified structures similar to those seen in science journals (introduction, methods, results, discussion, and conclusion) to make articles readable for practitioners. Bansal et al. (2012) identifies the need to bridge the stylistic conventions in how the research is presented in academic papers to overcome the alienation of such works to practitioners due to the structure and style of such works. He advocates the use of the Mode 2 approach (academic and practitioner research teams collaborate to disseminate to both academics and managers in other contexts) versus the traditional Mode 1 (academic to academic and the need to translate to manager) (Bansal et al., 2012). Perea and Brady (2017), some ways to improve print are: (1) letting people know about academic journals; (2) focusing articles on case study research; (3) encouraging academics and practitioners to work together as co-authors; (4) making sure practitioner papers are written in clear language; (5) making sure practitioner papers have useful content (for example, content that one can use, informs best practice, is innovative, practical, and relevant); and (6) making sure they are easy to find and do not cost too much. Cohen (2007) reinforces the same message based on feedback that she gets from the Society of Human Resource Managers, such as practical, real-world info that is easy to read and understand, up-to-date on trends and competitive practices, avoiding legal and regulatory problems, understanding critical strategic issues, staying ahead of such issues, and saving time in seeking important/useful information.

Furthermore, it is not just the peer review contribution but also other outlets that are more relevant to practitioners. For example, Fisher (2020a, 2020b) emphasizes the importance of the value of practitioner outlets. Bansal et al. (2012) suggests using bridging agents, like editors of practitioner journals, funding agents, and academic institutions, to make sure that Mode 1 research gets to practitioners more quickly and Mode 2 research makes the networks stronger. Cohen (2007) adds that perhaps not only do such academic journal articles have more practical applications, but also practice journals include more research within them, which *Business Horizons* and *Harvard Business Review*, for example, do.

Also, consolidation of the experience into a book represents an excellent platform to facilitate other engagements to disseminate and exploit the research to practice via digital, live (master classes, platform, workshop), print, radio, and television to promote one's expertise and the benefits of the research. Finally, various print opportunities via the local institutions' and accelerator programs' print deliverables, such as newsletters and press releases, can help to extend reach.

Researcher-to-practice experience examples illustrating print dissemination. Fisher (2020b) advocates for business school professors to write practitioner-focused articles and the value of outlets such as *Business Horizons*, of which he served as editor for several years. He argued that regarding relevance to primary stakeholders, scholarship should focus on things that make a difference and improve teaching (Fisher, 2020a). In this piece, he offers strategies for both individual institutions to embrace this perspective, including a section on one's curriculum vitae, sharing articles with students and colleagues, having recognition and rewards for such articles, creating conference tracks for such contributions, and sharing faculty-practitioner-focused articles with key internal and external stakeholders (Fisher, 2020a). Further, he explains how his journal bridges the scholar-practitioner gap by focusing on scholarly, grounded articles that have immediate and obvious practical applications and submissions that tackle issues, challenges, and/or opportunities about which business managers care (Fisher, 2020b).

Alexander Osterwalder, Ph.D., and Yves Pigneur, Ph.D., translated Alex's doctoral research on business models into the global best-seller 'Business Model Generation' (Figure 6a) in 2011. This publication became a cornerstone in academic and non-academic programs, enhancing the uptake of the business model canvas as a standard tool for building and testing business models by entrepreneurs and corporate innovators.

Interestingly, Tal and Gruber's efforts led to their book *Where to Play*, which became a critical dissemination vehicle. Tal recalled that dissemination was a gradual process that started with the navigator and then the book. In the meantime, they ensured their content was openly available via Creative Commons to maximize broad access, reach, use, and impact.

Publishing expert opinion pieces – based on published academic articles – in outlets such as *The Conversation* is another way to disseminate research and is growing in popularity among academics. *The Conversation* is 'an independent source of news and views from the academic and research community, delivered directly to the public' (*The Conversation*, 2022). For example, Grant Alexander Wilson, Ph.D., regularly publishes 800-word research translation articles to disseminate peer-reviewed management research to businesspeople, managers, and executives. Similarly, academics such as Elmar Kutsch, Ph.D., and Neil Turner, Ph.D., Cranfield School of Management, have published a range of short pieces in practitioner magazines to distill some of their journal pieces on project management to a broader audience.

Platform. The second strategy for dissemination involves a platform strategy, as in live presentations. The first area can affect highly engaged efforts, including on-campus workshops, local accelerators, local conferences, and national presentations. One can also leverage speaking, workshops, or startup conference opportunities at local, national, and international levels. Such conferences present an excellent opportunity to share the underlying rationale, research methods, and preliminary findings via live presentations, workshops, roundtables, or posters.

Researcher-to-practice experience examples illustrating platform dissemination. The platform efforts can emerge in parallel or after the initial print effort. Tal highlighted that rolling out of her and Gruber's book was their massive open online course. She recalled that that was a strategic choice that weighed trade-offs to ensure credible knowledge dissemination versus trying to monetize all their efforts. This course led to greater attention to the research and its output as the navigator. Additionally, this entrepreneur and Gruber gave conference talks, developed academic classes and courses, and conducted

workshops for practitioners. These efforts, Tal recalled, involved a gradual process over time and matured with stakeholder input and feedback. This pracademician added that the work continued after the tool or book arrived. This pracademician noted that availability would lead to something other than the tool's use and engagement, as she and Gruger intended. Instead, Tal added that the job had just begun and was as important and challenging as developing these other pieces. Such leads to greater attention to helping 'scale' interest in the research output, the navigator. So, Tal and Gruber's conference presentations and courses extended the reach, message, credibility, and brand around the tool created from her research.

Stephanie Hussels, Ph.D., described how the Bettany Center runs the Business Growth Response program, an online series of webinars to support SMEs and help them with thought leadership during the 2020–21 COVID-19 lockdown. Faculty facilitated 40 events – webinars and workshops – with academics and practitioners who shared their knowledge and insights from research and their applications to practice. In total, 3000 people attended or viewed the online seminar recordings afterward.

Other channels are readily available, too. For example, Neil Turner, Ph.D., engaged in interviews with the United Kingdom's Association for Project Management's official podcast about his work on organizational learning. It is relatively straightforward to promote academic work through practitioner channels if there is a valuable message that you wish to convey.

Digital. The digital strategy should be a core element for disseminating results and applications. York (2018) emphasizes that this effort should involve a customer-centric website to showcase one's work, research direction, and tools. Papers, innovation, business models, slides, videos, exercises, tools, and materials from workshops and accelerator programs can provide good working content. A critical practice will be regularly posting content relative to the research project and relevant topics. Such direction would focus on a weekly blog, which may emerge as written copy, video, or mixed media. Posting relevant, dynamic content via blogs (written, video), keyword strategies, and cross-linking will enhance the site's organic search engine optimization (SEO) ranking.

Driving traffic to the site will be critical. The researcher can place the site's URL or a QR code on digital or print materials (e.g., workshop flyers and business cards). The platform may draw on elements from outside expert sites to build cross-linking relationships. One can investigate various digital sites relevant to the research to identify opportunities to post and share work from the researcher's primary website.

In getting academics to rethink and change their practices to enhance practitioner and public perceptions of the business scholar profession and the research conducted, McCarthy and Bogers (2023) advocate using social media as a boundary-spanning technology. Such can help bridge the research-practice gap by facilitating open dissemination, access, and assessment mainstream (McCarthy & Bogers, 2023). According to McCarthy and Bogers (2023), there are two distinct types of research: academic and mainstream. These academics offer a process model that overlays five core research activities (networking, framing, investigating, disseminating, and assessing) with four social media-enabled open academic approaches (connector, observer, promoter, and influencer) and don'ts.

These academics highlight that the Social Science Research Network (SSRN) provides an excellent example in the academic space (McCarthy & Bogers, 2023). Also, an updated profile on academic sites (e.g. Academia.edu, Google Scholar, and Research Gate) could enhance this research's visibility for published works and future research efforts. Such work will allow us to guide collaborators through the funnel to take action and build an ongoing relationship.

Complementing work on academic sites is found on general social sites. One can push out content to personal LinkedIn, X [previously Twitter], YouTube, and Sprout Video accounts to draw more attention and traffic to this core site. The use of these social sites will complement and amplify the website. Creating a YouTube or Sprout channel can extend one's reach and serve as another significant digital hosting mechanism (plus a tracking mechanism) for one's research outputs, applications, and related education and training programs. Also, cross-linking and collaboration with one's local institution, accelerators, and other relevant national programs can extend reach and SEO organic rankings via associated blogs, citations on others' websites, or social media postings (e.g., LinkedIn, X).

Researcher-to-practice experience examples illustrating digital dissemination. Nancy Bocken, Ph.D., offers two websites that cleanly present her and her team's circular economy and sustainability resources. It ties in her publications for open-access reference, along with tools and a gateway to the offerings of

the CircularX initiative with several of her students and postdocs. This second portal focuses on circular business model efforts in the sustainability space and leverages her team's research via a broader mix of resources, including academic outputs, tools, workshop materials, cases, news, and events for stakeholders and practice applications.

Tal and Gruber's website follows their MOOC via edX. It provides free access to the navigator and various support aids, such as slides and other tools available on an open-access basis. However, it requires those interested or wanting to use the materials to sign up or activate as non-paying customers (just beneficiaries) via their website. This effort leads to a mailing list of 15,000 over time. Such an audience leads to sharing further updates, tools, and programs (e.g., courses, webinars) to broaden the reach and enhance their relationship with the practitioner audience. Tal emphasizes that the digital piece was part of the dissemination process that leads to engaging, creating awareness, and developing relationships with individuals in their target market.

Finally, Osterwalder utilizes his digital presence as a centerpiece of a thriving publishing and education business. It exists as a point for gaining free tools and other inbound resources. Such parts aid the visitor in learning more about Strategyzer's other publications and educational offerings. Like Tal, the Strategyzer website engages interested stakeholders and ties them in with signup, leading to a mailing list exceeding Gruber and Tal's. Such inbound efforts lead to an outbound program with monthly 'drip emails' about various other opportunities to engage with Strategyzer, such that it becomes a well-regarded source.

Step 4 – exploitation

The engagement step involves exploiting the knowledge gained from the research with a practical emphasis. Such efforts include multiple tactical approaches.

Creative and practical workshops. The most natural is to embed one's work and its applications within workshops. Such efforts enhance the content and the contributions of one's research and scholarly writings. The first area engages local efforts and on-campus programs. These include business school credit classes, workshops, and accelerator programs. Such classes could also apply to other schools (e.g. engineering, extension, medicine, pharmacy, and oceanography) or as part of cross-campus efforts. Such activities can help to share this research's findings and utilize application-based tools and digital content. These workshops can serve as sources for further exploration and research. Such efforts can involve testing the developed theory, evaluating various tools, action research projects, or pursuing new research questions.

Furthermore, these topics could become popular topics for presentations and workshops at regional and national conferences, such as Babson, California Entrepreneurship Educators Conference, Startup San Diego, and the Innovation-CORPS™ [I-CORPS™] National program. These activities can lead to further collaborations and new research opportunities.

Pragmatic tools. Another enduring translational effort involves tools. Ideally, one creates multiple instruments to support in-class and workshop teaching exercises and applies critical, pragmatic learning to those in practice. The research can lead to multiple exercises and worksheets/tools for content applications.

Examples of researcher-to-practice experience illustrating tool dissemination. Osterwalder offers diverse tools, from his original research on business models to his multiple books. His company Strategyzer offers not only the business model and value proposition canvases but 30 other tools for practice and academic use as free downloads for those who sign up with a free account. Bocken provides multiple tools for sustainability and circular business model experimentation on NancyBocken.com and CircularX websites. Gruber and Tal provide supportive tools and resources via their wheretoplay.co website.

Engaging publications and case studies. Combining base theory, practical translation, tools to use, checklists, and cases can lead to a publication (book or workbook) that guides participants in using what they have learned from their research.

Furthermore, practitioner publications could help further exploit the research work. Notable practitioner journal examples include *Business Horizons*, *Harvard Business Review*, and *Sloan Management Review*.

Such pieces can help translate the underlying theory for practitioners, share case examples and stories, and use relevant tools.

Case studies can provide a real-world practical extension of peer review and practitioner publication. Emerging from empirical research with single or multiple ventures can lead to teaching cases to complement the peer review work for classes and workshops. Such cases can engage specific skills and examine applications within particular domains (e.g., software, deep tech, health tech, manufacturing). They can also utilize tools embedded in a case narrative.

Researcher-to-practice experience examples illustrating publications and case studies.

Dissemination. John M. York, Pharm.D., MBA, faculty at the University of California, San Diego (UCSD) and doctoral candidate at Cranfield School of Management, has been prolific in building and publishing case studies and literature reviews. Such outputs have emerged from his research and consulting efforts in entrepreneurship and the biopharmaceutical spaces. Notable is his CVS case study involving Amazon's acquisition of PillPack (York et al., 2021), a 2022 Emerald Literary award-winning publication that he uses in his teaching of Indian pharmaceutical executives at Ahmedabad University and with pharmaceutical industry postdocs at Rutgers University. Also, his work with Bioneedle Drug Development, a Netherlands startup, has led to two cases in *The Journal of Commercial Biotechnology* (Mingey et al., 2022; York, Pradhan, et al., 2022). He has shared this work at Pharma R&D 2022 and used it in his teaching at Ahmedabad, Rutgers, and UCSD. Further, multiple of his publications on lean startup, customer discovery and interviewing, business models, and innovation have served as required course readings for his Innovation CORPS™ workshops at UCSD and his EMBA classes at Ahmedabad. Finally, his work with Tal and Gruber's market opportunity navigator with the South Korean biomedical startup, MyoTechSci, led to another *The Journal of Commercial Biotechnology* case he employs as part of his teaching efforts.

'Real world' client consulting. A natural extension of the research work involves consulting. However, management scholars differ in opinion as to the value of consulting. This paper's author argue that consulting is necessary for continued learning and credibility. After all, it would seem unacceptable if theorists with no practical medical experience taught university medical doctorate programs. Just as independent consulting can enhance research, so too can team consulting. Teams can learn so much from a workshop and benefit from a direct consultative relationship to work through leadership, team, and process issues to embed the business experimentation practices and apply them to strategic decision-making efforts. Such projects could lead to further case studies for research, such as single-case, multi-case, or part of an action research effort.

Pick-up of efforts by thought leaders. The final area for exploitation is to have this work and its application tools picked up by various national or international thought leaders as part of their works. Such efforts could involve thought leaders citing one's work in their websites, talks, social media posts, or articles.

Researcher-to-practice experience examples illustrating pick-up dissemination. Tal facilitates academic and practitioner workshops via wheretoplay.co. She notes that these programs emerge from the research. She adds how it is important to get out with social media and conferences to create visibility with the target audience and thought leaders in one's area, get picked up by thought leaders such as Steve Blank and Rita McGrath, Ph.D., and published in other peer review papers such as Gruber's *Entrepreneurship Theory and Practice* paper (Shepherd & Gruber, 2021).

Similarly, Osterwalder leverages his research and his book with Pigneur through Strategyzer, which facilitates practitioner and corporate workshops on how to use the business model canvas best. On his website and blog, he routinely gets other thought leaders to extend his work, including Steve Blank.

Another example involves the efforts of Bocken and Baldassarre. With multiple papers in the *Journal of Cleaner Production*, these leading sustainability scholars facilitate stakeholder workshops on circular business model experimentation and sustainability. Osterwalder has conducted diverse master classes and training programs over the past decade. Such programs include in-person, online, live virtual, and enterprise training efforts.

Wilson and York (2023) recently published a practitioner-focused paper based on a decade of research and practice in biotechnology. It overviewed the most researched strategic orientations – including

entrepreneurial, learning, failure learning, and market orientation – and provided real-world examples of how these research philosophies reduce risk and enhance performance. Further, the paper offered multiple practice and policy recommendations to aid the translational effort. Among his other works, York's CVS pharmacy case has gained a strong following on LinkedIn with thousands of views. Tal and Gruber have amplified York's casework involving MyoTechSci and Bioneedle with the market opportunity navigator in the *Journal of Commercial Biotechnology* to an audience of over 20,000 viewers from Where to Play. Furthermore, Art Boni, Ph.D., Editor Emeritus of *The Journal of Commercial Biotechnology*, and colleagues (2022) recently cited York's lean startup papers and business experimentation in MTech in a recently accepted work on biopharma innovation in the European Medical Society's journal, *Medical Research Archives*.

Step 5 – assessment

According to the UK's Research Excellence Framework (2014), when evaluating the impact on practitioners, the elements of reach and significance should be considered. The idea of reach considers multiple stakeholders (e.g., individuals, teams, communities, and organizations) who may exist in the local, national, or international environment (Research Excellence Framework, 2014). The element of significance brings in a different dimension, including changes in curricula, practices, and public policy (Research Excellence Framework, 2014).

The impact assessment for this research will examine these two important parts (Figure 2): documentation and evaluation (both quantitative and qualitative).

Stakeholder engagement needs documentation and analysis (qualitatively and/or quantitatively). Multiple approaches can be employed for documentation to track stakeholder contacts and engagement. Table 1 provides a summary of various strategies. Such can allow for different approaches to engaging, documenting, tracking, and analyzing contacts either quantitatively or qualitatively.

For analysis, diverse strategies (Table 2) allow for the collection and examination of quantitative and qualitative data. Notable quantitative metrics involve reach and frequency (REF, 2021). The qualitative analysis offers a different yet complementary perspective on impact, particularly around significance (REF, 2021).

Researcher-to-practice experience examples illustrating assessment. According to Tal, measuring impact can be a challenge. She indicated that assessment can be tricky and that one needs to consider many questions when setting out one's engagement efforts. She noted that they followed Ries' (2011) lean startup approach of build-measure-learn. Tal raised multiple considerations that she and Gruber employed. How does one define success? What objectives to set? What measures should one use and of value to determine? Are they books sold, course attendance, or web metrics? Are these numbers just good, or are they great? What thresholds and benchmarks determine whether the effort is progressing well? Has one considered using the lean startup's build-measure-learn approach to impact assessment?

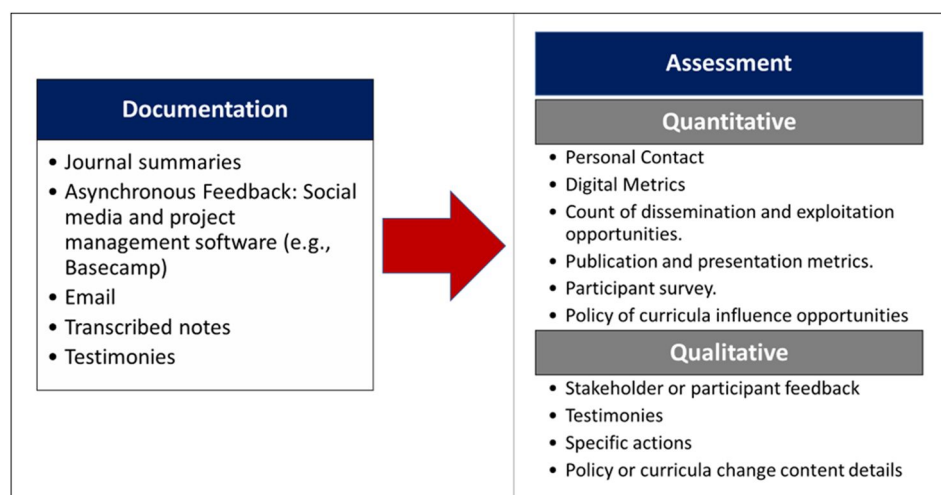


Figure 2. High-level summary of documentation and assessment strategies, where the former can integrate with the latter.

Table 1. Documentation strategies and examples.

Documentation activity	Purpose	Description and examples
Journal Summaries	Track contacts, discussion content, and engagements.	Simple versions include a digital diary in Word or OneNote. A more sophisticated can be a Qualtrics or Survey Monkey survey to include quantitative and qualitative fields to allow for data extraction and analysis.
Asynchronous Opportunities	Capture digital engagement.	Use personal, educational/ research websites and blogs to drive engagement with response fields. Can tie a content push to various social sites. The approach can capture digital metrics. Cloud-based project management software (e.g. Basecamp) for sharing content and capturing asynchronous feedback.
Email	Track contacts, discussion content, and engagements. Maintain a chronology.	Set up specific folders on Outlook based on the advisory board and secondary stakeholders. This approach is trackable and provides a chronology. The researcher can send a synopsis to each stakeholder to memorialize key points and actions after the engagement. The researcher can also analyze content qualitatively using software such as NVIVO.
Transcribed Meeting Notes	Capture detailed content.	The Zoom platform has a live streaming connection to Otter.ai, which can provide a transcript and store it within a designated stakeholder folder. One can transcribe digital recordings of in-person interactions via Otter.ai. One will need consent for any recorded contact.
Testimonies	Capture solicited feedback.	Quick synopsis of solicited feedback via survey, email, Basecamp posting, or recorded summary on Screencast-o-Matic for later transcription via Otter.ai.

Table 2. Example quantitative and qualitative strategies to track impact.

Strategy	Purpose	Description and examples
Quantitative		
Personal Contact	Evaluate reach, engagement, frequency, and depth.	Tracking live, email, and virtual contacts in a diary and database. Assess contributions, testimonies, and recommendations over time.
Digital metrics	Evaluate reach, engagement, frequency, and depth.	The website is central due to various metrics- hits, clickthroughs, time on page, downloads, information requests, and newsletter signups. One can track sourcing, views, reactions, and recommendations with LinkedIn or Twitter.
Dissemination and exploitation	Track the number of opportunities, types, frequency, and reach.	Capture manually via a database or digitally via the website and social channels.
Publication metrics	Capture the number of publications, reach, engagements, citations, and journal level.	Research Gate, Academia.edu, and Google Scholar are three portals that can help track this information for relevant publications. One can put publications on social channels such as LinkedIn or Twitter to track metrics such as views, comments, and reactions. Also, track non-peer review publications.
Presentation metrics	Capture the number of publications, reach, engagements, and journal level. The number of presentations, reach, and engagements.	Manually track meetings presented at audience size as well as follow-up contacts. Include QR codes or bitly URLs to track requests for presentation copies. Can post these presentations on a service such as YouTube, Vimeo, or Sprout Video, to track login metrics and capture those interested and time on the presentation.
Participant survey	Assess engagement, feedback on content, plans, dissemination or exploitation activities, or insight from targeted groups.	Capture closed-ended data, including continuous and discrete types such as ratings and rankings. It can include a digital presence, exist on SurveyMonkey or Qualtrics, utilize a URL or a QR code on the website or social channels, or emerge from email f.
Specific actions	The extent of specific actions	Types, frequency, stakeholder, or participant.
Qualitative		
Stakeholder or Participant Feedback	Gain perspectives. Assess the level of thought leadership and the types of comments left.	Multiple approaches, including 1) individual meeting data captured by Otter.ai or meeting notes within the digital journal, 2) open-ended qualitative surveys, or 3) comments left on the website or a particular social media posting. T
Testimonies	Gain insight and feedback on the type of testimony.	Such can include solicited and unsolicited testimonies from stakeholders, teams, and consulting clients. These can include individual contact sessions, emails, social media comments on posts or profiles, and website feedback. One can track these to see if the work resonates with stakeholders and thought leaders at different levels.
Specific actions	Gain insight and feedback on the type of action taken.	Notes on specific actions teams, stakeholders, consultation clients, students, and other participants concerning first-look feedback, dissemination and exploitation of ideas, opportunities, and responses or comments.

Tal observes that it is not all about numbers. She asked what about qualitative? This author elaborated that it is also about the feedback and type of response obtained. She and Gruber set these parameters upfront to gain a more holistic feel for the response and any issues to consider. Tal added that they should complement the quantitative metrics obtained. This researcher-turned-author added that it is important to consider the type of pick-up and that amplification is crucial. She queried whether they aid

in dissemination and credibility, such as the Steve Blank example of him picking up her and Gruber's market opportunity navigator for his website.

Concerning research articles, 'impact', defined as journals ranked on the Australian Business Dean's List (ABDC) as well as academic citations and impact factor, need to be balanced with the journal's readership, article's number of downloads and overall value (e.g., academic and practice). Some impactful research articles, like Slater and Narver's (1994) *Business Horizons* paper, emerged as a highly influential based on contributions to both theory and practice. However, based on the journal's ABDC list ranking, other papers of less scholarly and applied value were deemed more 'impactful' by academic institutions.

Step 6 – refresh and expand

A logical final step in the process may involve using the engagement and learning from the activities undertaken to refresh, update, and expand the research base. Ideally, this effort could emerge as a virtuous loop whereby research drives engagement. Such a step offers new opportunities for investigations with interested and committed organizations, providing findings for later dissemination.

This effort offers multiple advantages. It will likely be of interest and benefit to the entities involved, potentially creating a self-reinforcing loop of further engagement. It benefits the researchers who can achieve this dynamic. This approach offers research access and a method to aid further publication and ensure that teaching and seminars remain 'fresh'. This step may be of more importance to full-time academics. If the researcher can utilize this effort, he/she can engage a valuable source of research data and create an ongoing stream of scholarly and practitioner outputs.

Researcher-to-practice experience examples illustrating refresh and expand. Maylor and Turner (2017) and Maylor et al. (2013) at Cranfield School of Management conducted significant work to understand project complexity and associated managerial responses. These scholars initiated this work as a single study. They expanded this research over the years into a range of other contexts, giving not only a number of interesting cases but also a novel three-by-three framework. This effort led to new methodical approaches for data categorization and analysis applicable to researchers, as well as a valuable problem-solving and reflection tool for practitioners. It is, therefore, important to be aware of how research can open up other unexpected avenues over time. Such opportunities are rarely possible to predict these in advance. However, it is vital to be open to the possibilities and take on board feedback from all stakeholders as to how one can expand, refine, and apply ideas that can add value.

This effort included a widely-used complexity assessment tool. It then extended to the contexts of supply chains (Turner et al., 2018), software development (Baxter & Turner, 2023), manufacturing ecosystems (Boehme et al., 2021, 2024) and new product development (Cecchi et al., 2022). It is a major principle within a new textbook update (Maylor & Turner, 2022). It is the foundation for master's-level and executive-education courses, as well as multiple ongoing doctoral research investigations. This material used in executive education teaching also won an EFMD Global 'Excellence in Practice' award. The continued engagement with various sectors and industries offers further opportunities to extend the research, which feeds into teaching and practitioner material. By disseminating research findings widely, one can increase the chances that others can come back with further opportunities not previously considered. In terms of creating a longer-term impact, this dynamic is, of course, a positive outcome, and it is highly satisfying for the research team.

Limitations and future research

This work's objective was to describe a six-step process model. This effort involved characterizing elements within each step and providing illustrative examples of how researchers utilize such elements in translating their works to practice in management and entrepreneurship. This work represents the first step to developing a clearly defined framework.

The approach of drawing on examples in a purposeful sampling manner (Stratton, 2024) from diverse sources of examples of researchers and practitioners who translated doctoral works into practice to address this study's above-described objective. This effort drew on peer and gray literature thought leader interviews, as well as personal experiences and networks to draw population, cases, and experiences representative of the intended target, individuals involved with academic work who translate such efforts into practice ends.

However, the subjective approach to purposeful sampling offers the potential to lend biases. This effort engaged several measures to address such potential biases. The first involved diverse data sources to ensure a broad perspective. The second involved triangulating data sources to cross-verify information. The third was transparency around selection for choosing examples. Also notable might be the selected examples that highlight the pros of such an approach but not the cons, nor did it examine the implications to academic practice or test whether the process worked (or not). While such considerations are noteworthy, such elements were not the intent of this initial descriptive work. Further, the lack of a more formal case structure approach and detailed analysis does limit conclusions and theory development.

Accordingly, future research should explore this phenomenon, which is relevant to research in order to practice transactions in a more systematic approach to provide empirical data. Such work could engage in more structured case study investigation using standard methods (Eisenhardt, 1989, 2021; Langley & Stensaker, 2012; Yin, 2009) to provide a structured empirical basis. Such an effort could address the research question of how researchers translate their efforts into practice. Additionally, other works could gather further data from surveys involving management researchers (and practitioners) to address research questions around what they are doing (or not), steps taken, pros/cons, facilitators/barriers, and strengths/limitations of such efforts. Additional work can explore whether cases exist that fit the model completely to demonstrate the viability of the model and identify where, why, and how around exemptions. Such efforts can build on this initial work and refine a path for management researchers to provide a practical translation of academic works.

Conclusion

Management researchers should work to move their outputs beyond academic contributions to knowledge development. Rather, researchers should make efforts to translate such works into practice. This paper describes ways for researchers to put into practice the lessons learned from scholarly research via a six-step process. It does this by showing how to work together at different stages of the research process, such as development, getting access to data sources, taking a first look at the data, sharing, exploitation, and assessment. It proposes a pragmatic six-step model for researchers to engage, translate, and embed their work within the practice setting. Such a path of work aligns with evidence-based management practices (Briner et al., 2009), including critical reflection, stakeholder experience and need exploration, practice-related data collection, and the evaluation of study evidence in creating new knowledge for academia and practice. This work provides multiple examples to illustrate how scholars and practitioners who have translated their doctoral research have engaged such steps within their 'real world' practices. It extends prior contributions to the ongoing dialogue around the translation of research to practice. From this point, this work addresses questions relative to the elements that comprise each step and the evidence through practical examples to support each piece and the overall construct. Finally, while some limitations do exist with this initial descriptive paper, it sets the stage for further empirical work to refine the model for others to help bridge the academic-practitioner divide that exists between researchers and managers and to enhance the translation of novel management research efforts to practice.

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No potential conflict of interest was reported by the author(s).

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Statement

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