Evidence Based Library and Information Practice

Understanding EBLIP at an Organizational Level: An Initial Maturity Model

Clare Thorpe et Alisa Howlett

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Résumé de l'article

Objective - Existing research around evidence based practice in the LIS (library and information science) professional context over the past two decades has captured the experience of individual practitioners, rather than the organization as a whole. Current models of evidence based library and information practice (EBLIP) relate to, and apply predominantly to, individuals or specific scenarios. Yet despite a growing demand from institutional and library leaders for evidence to demonstrate why investments in libraries should continue, little is known about how an organization can enhance its maturity in evidence based practice. This paper addresses this gap by seeking to understand what an evidence based university library looks like and answering the questions: how does a university library leader know the library's service and practice is evidence based? How can a university library measure and progress its maturity in evidence based practice?

Methods - Sixteen semi-structured interviews were conducted with library professionals employed at Australian and New Zealand university libraries. Transcripts were analyzed using thematic analysis techniques. The interviews, combined with a literature review and environmental scan of evidence based practices in university libraries, informed the development of a draft capability maturity model as a framework for developing evidence based practice in university libraries.

Results - The model identifies and describes characteristics at five different levels of evidence based practice maturity from least mature (Ad hoc/Sporadic) to most mature (Transforming). Three dimensions of experience help to define the characteristics at each level of maturity and provide a framework to understand how a university library might develop its organizational capacity in evidence based library and information practice.

Conclusion - Library leaders and practitioners will benefit from the model as they seek to identify and build upon their evidence based practice maturity, enabling more robust decision-making, a deeper understanding of their clients and demonstration of value and impact to their stakeholders.

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Research Article

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Abstract

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Conclusion - Library leaders and practitioners will benefit from the model as they seek to identify and build upon their evidence based practice maturity, enabling more robust decision-making, a deeper understanding of their clients and demonstration of value and impact to their stakeholders.

Introduction

Over the past two decades, an understanding about evidence based practice in the LIS (library and information science) professional context has been informed by research focused on the experience of individual practitioners, rather than the organization as a whole (Koufogiannakis, 2013). Current models of evidence based library and information practice (EBLIP) relate to, and apply predominantly to, individuals or processes. With growing demand from institutional and library leaders for evidence to demonstrate why investments in libraries should continue (Baker & Allden, 2017; Council of Australian University Librarians, 2016), developing the skills of individuals may be inadequate. This paper addresses that gap by proposing a model for EBLIP maturity in university libraries.

A qualitative approach was taken to establish an initial understanding of what evidence based practice looks like at a whole-of-library level. Overarching themes in the data, together with existing EBLIP literature have informed the development of a capability maturity model, which can be used as a framework for

evaluating and progressing evidence based practice in university libraries. This paper describes the study approach, the resulting themes and proposed model. Limitations, as well as future research opportunities, are also noted. By extending the existing understanding of EBLIP from an individual to an organizational level, this study addresses a need to tackle organizational factors related to cultivating evidence based practice in library and information science.

Literature Review

Library and information science professionals across a range of sectors have adopted EBLIP as a way of working or *being* because they are driven by curiosity, aspire to do better, feel a professional responsibility, and want to keep up-to-date (Booth, 2002; Eldredge, 2000; Partridge, Edwards & Thorpe, 2010; Gillespie, 2014). Understanding how LIS professionals, including library leaders, experience evidence based practice has been the focus of a number of EBLIP studies, providing insight into the various factors that influence the ways in which evidence is conceived, encountered, and used to improve service delivery and decision making

(Gillespie, Miller, Partridge, Bruce & Howlett, 2017; Koufogiannakis, 2012; Luo, 2018; Partridge et al., 2010). However, existing evidence based practice models which focus on individual practitioners or processes potentially create a false impression that evidence based practice is an ad hoc process or the responsibility of only a handful of individuals dotted across the organization (Howlett & Thorpe, 2018). The existing understanding of evidence based practice in the LIS profession therefore needs to be broadened in order to achieve its aims.

Regardless of how EBLIP is experienced as an individual phenomenon (Thorpe, Partridge & Edwards, 2008), the variation of individual experiences is highly influenced by the workplace. In a study that sought to understand how university librarians use evidence in their decision-making, Koufogiannakis (2015) identified five determinants, each "largely tied to the environment or context" (pp. 102-103). Each of the five elements (organizational dynamics, time, personal outlook, education and training and information needs) can be an enabler or obstacle to using evidence in professional practice (Koufogiannakis, 2015). However, Koufogiannakis (2015) found that organizational dynamics and the workplace context were the largest obstacle faced by LIS practitioners in applying evidence based practice principles and processes. Hiller, Kyrillidou, and Self (2008) identified that the adoption of evidence based practices in libraries occurred where the organizational infrastructure and culture was more receptive and supportive of the acquisition, analysis, presentation, and use of evidence. Library leadership and a customer-centered organizational culture were two of the enablers that supported the development of evidence based practices in libraries (Hiller et al., 2008). Urquhart (2018) stressed that implementing a culture of assessment, or evidence based practice, requires all library staff, not just managers, to appreciate the importance of the qualitative and quantitative evidence that they gather and to understand how such evidence can help

demonstrate the value of library services. Gillespie, Partridge, Bruce, and Howlett (2016) found that a shared organizational approach to evidence based practice, whether intentionally sought or not, guided and developed library services and collections, helped to build relationships with its clients, and ensured that services aligned with clients' needs through an attitude and culture of continuous improvement.

Aligned with the internal driver to build a collaborative, evidence based library culture, is the external demand from university leadership for evidence based arguments to demonstrate why investments in university libraries should continue (Baker & Allden, 2017; Council of Australian University Librarians, 2016). Library directors have been found to use a variety of evidence sources to demonstrate the library's value within strategic planning activities (Lembinen, 2018; Newton Miller, 2018). Harland, Stewart, and Bruce (2017) reported that university library directors stressed the necessity of evidence in increasingly complex decision-making processes and in using evidence based value measurements to articulate the library's contribution to their university. The value of the library is increasingly judged by its demonstrated ability to help students learn and researchers research (Madsen & Hurst, 2018). The Council of Australian University Librarians identified an aspirational long-term goal to nurture a culture of evidence based thinking and communication across university libraries in Australia (Owen, Peasley & Paton, 2017). If being evidence based provides both intrinsic benefits to the library's organizational culture and extrinsic benefits in demonstrating the library's value to the university, then EBLIP adoption cannot be left up to individual practitioners. Library leaders need to be able to evaluate the evidence based practice within their library to address both the internal and external drivers.

Looking more broadly at the literature on library assessment (a term often used synonymously with EBLIP), many libraries have adopted tools,

such as balanced scorecards, values scorecards, performance indicator frameworks, benchmarking, frameworks, and typologies, to demonstrate their value and impact and to assess cultural change (Urquhart, 2018). Madsen and Hurst (2018) proposed a Library Assessment Success Model that places the library as an organization within the eco-system of higher education. Their model focused on how well the library aligns with the strategic goals of the parent entity and rated a library's performance along an eight-point scale (Madsen & Hurst, 2018). Maturity models have emerged in the information science literature and have been used as tools for internal and/or external benchmarking, identifying future improvement and providing guidelines for organizational development and growth (Lasrado, Andersen, & Vatrapu, 2015). Maturity models provide a framework for organization-wide action, implementation, and evaluation (Nelson, Clarke, Stoodley, & Creagh, 2015). Maturity models facilitate the organization's ability to actively and continuously identify its own priorities and quality standards, and to enact systems that support continuous improvement (Marshall, 2010). At their simplest, maturity models describe a path from initial state to highest state of maturity in an organization's culture and capabilities, usually focused on a specific set of competencies (Wademan, Spuches, & Doughty, 2007). Capability maturity models commonly have five levels and show a continuum of improvements around a particular competency (Nelson et al., 2015). Two recently published maturity models correlate to EBLIP, specifically the use of evidence and assessment processes. Wilson's Quality Maturity Model (2015) provided a framework for assessing and progressing libraries on a journey towards a ubiquitous culture of quality across five levels of maturity (*Initial, Repeatable, Defined, Managed, Continuous*) and included approaches and tools that are also applied in evidence based practice. The Library Assessment Capability Maturity Model proposed by Hart and Amos (2018) can be used as a benchmarking or self-review tool to measure a library's effectiveness in completing

library assessment activities. This model adopted a similar five level scale of maturity, replacing *Continuous* with *Optimised* at its most mature stage (Hart & Amos, 2018). While these existing models relate to aspects of evidence based practice, neither directly addresses the question of how a library can grow and mature EBLIP as a specific organizational competency within libraries.

Aims

As an organization, libraries need to build robust capabilities and strategic approaches in evidence based practice to respond to a constantly changing environment and the demands and needs of stakeholders. This task cannot be left to individual practitioners. Responsibility for implementing and developing evidence based practice capability needs to be shared and everyone has a role (Hallam & Partridge, 2006). In order for EBLIP to achieve its aims, this study broadens the existing understanding and perspective from individuals to whole library organizations.

What an evidence based library looks like is currently unknown. The aim of this study was to answer the question: How does a university library leader know that their library's service and practice is evidence based? With a capability maturity model identified as our desired outcome, the authors sought to develop a framework that would help university library leaders measure and progress their organization's maturity in evidence based practice.

Methods

A qualitative approach with semi-structured interviews was used to explore the research question and develop a detailed, initial understanding of evidence based practice at the whole-of-library level (Creswell, 2012). Sixteen semi-structured interviews were conducted with library staff across Australia and New Zealand. Participant recruitment used a combined

convenience and purposive sampling approach. Two criteria were considered when recruiting participants – they must be employed in a role at librarian (professional) level or above in a university library; and be available during the six-week data collection period. Participants did not need to have a leadership role within their organization. Full ethics clearance was obtained from the University of Southern Queensland Ethics Committee.

As active members of the Australian university library community, the researchers drew upon their own networks to recruit participants. The researchers aimed to capture EBLIP experiences and perspectives from a range of library roles and functions to bring together a holistic, day-to-day understanding of what EBLIP looks like across a whole library organization. This was considered important in order to answer the research question and for university library leaders to understand EBLIP maturity and how EBLIP is integrated (or not integrated) in ways of working.

Fourteen women and two men were interviewed. Most participants were employed at Australian universities with one person working at a New Zealand institution. Participants were employed as:

- Liaison/Subject/Outreach Librarians (5)
- Team Leaders/Managers (5)
- Associate Directors/Deputy University Librarians (4)
- Directors/University Librarians (2)

Interviewees reflected on their own experiences with evidence based practice and the level of evidence based practice maturity demonstrated by their library. Interviewees were also asked to describe the characteristics of an evidence based library. Appendix A provides a list of sample interview questions that guided discussion.

Interviews recordings were transcribed verbatim and analyzed using a thematic approach (Braun & Clarke, 2006). Given that this study approached new ground in examining EBLIP from a whole-of-library perspective, the iterative approach described by Braun and Clarke (2006) offered the opportunity for the researchers to immerse in, and actively engage with, the data, relate the data to existing EBLIP research, and to develop an interpretation of the data through the six-step coding process. The analysis provided a rich description of the data about what evidence based practice might look like at a whole-of-library level. Refining the codes enabled the identification of overarching themes that ultimately became the elements of the maturity model.

Results

Variation of EBP Experience

Variation in participant experiences and observations of evidence based practice within their libraries, as well as personal conceptions of evidence, evidence based practice, and what an evidence based library might look like, appeared along a spectrum. This spectrum captured varying extents to which participants' libraries engaged, what evidence sources were valued (or not) and used, who is involved, and the methods and circumstances in which evidence is applied to practice and service delivery. How evidence and evidence based practice is conceptualized, the presence (or absence) of drivers for the evidence based practice process and evidence collection, and the circumstances in which evidence is applied to practice and service delivery contributed to the variation within the model. Interviewee's experiences of evidence based practice were influenced by the extent to which the whole library was involved or engaged in the approach. Personal conceptions of what an evidence based library might look like also were on a continuum. Variation and influences found in the interview data form the basis of the maturity model.
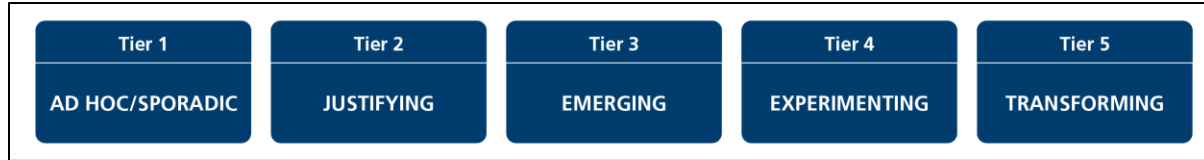
Figure 1
The EBLIP Capability Maturity Model.

The EBLIP Capability Maturity Model

Through the model, the researchers propose five levels or tiers of maturity from Tier 1 (least mature) to Tier 5 (most mature). The five tiers are: *Ad Hoc/Sporadic, Justifying, Emerging, Experimenting, Transforming*. Each tier is associated with awareness structures that involve different interpretations of the internal and external working environments, how evidence based approaches are planned and implemented, and how the category of experience perceives the role of evidence in decision-making. All libraries in the interview sample contributed data on collections, staffing, expenditures, library services, and library and university characteristics to the annual benchmarking activity facilitated by the Council of Australian University Librarians (CAUL, 2018). Therefore, as all the libraries were engaged in some form of evidence based practice, Tier 0 (inactive state) was excluded from the model as not relevant to Australian and New Zealand university libraries.

Tier 1: Ad hoc/Sporadic

Evidence based practice activities are undertaken as part of the traditional collecting role of the library – in this case, collecting data. However, EBLIP processes do not move much beyond collecting statistics as the main source of evidence. There is little or no critical analysis, reflection or communication. EBLIP considered not relevant by staff or leadership. Evidence may be overruled or sidelined by opinion during decision-making.

Interview 10: "When I first came on board a lot of decisions were just made on people's personal opinion, and that still happens to quite an extent, actually."

Tier 2: Justifying

Evidence based practice activities are used to justify actions taken and to demonstrate busyness across the organization. EBLIP processes are focused on collecting data or statistics with little consideration of alternative sources of evidence. There is a dependence on systems generated data to build a local data repository. EBLIP is acknowledged but only in the context of collecting statistics for reporting against metrics or to justify decisions already made.

Interview 13: "I hear a lot of that justifying or 'The evidence is telling us this, but that's because blah, blah and blah'. So then we don't have to do anything about it, because we can sort of justify it."

Tier 3: Emerging

Evidence based practice is beginning to be applied; however, its application is limited to specific activities, such as projects. Evidence is gathered, assessed, and applied to instigate a change or within the context of a project. The evidence collected may have limited future application due to the project outcomes focus of the EBLIP process.

Interview 7: "Every project, you've got to make sure that you have a sense of what is happening and possible solutions and how things have been applied and how you might apply them."

Tier 4: Experimenting

Evidence based practice seen as a desirable and attainable organizational goal. Evidence informs decision making across a range of activities and functions. Evidence is gathered to inform strategic planning activities or to improve the library's services. Staff are supported in developing their skills in evidence based practice and are encouraged to experiment with a range of approaches and methodologies.

Interview 4: "That would mean taking kind of a pause and really thinking about what you were trying to solve, and thinking about the question or purpose of what you're trying to do, and then what kind of evidence you could find. I feel like I use that process for most things because it makes me feel more confident to actually make a change or do something."

Tier 5: Transforming

Evidence based practice is underpins the day-to-day activity of the library. EBLIP is ubiquitously adopted as a way of working. Evidence is gathered with a clear purpose that aligns with the university's strategic goals. The library works together to develop an evidence base that is verified, trustworthy, contextualized, fit for purpose, available, and ready for use. Evidence generates sophisticated insights that are used to communicate with influence. Staff and leadership demonstrate an EBLIP mindset. Evidence based practice empowers and transforms the library across all activities, enabling an agile, responsive, and creative organization.

Interview 11: "I see it in terms of the library conducting itself, and being managed, and being driven forward, on the basis of evidence based practice. Something approximating a kind of an ethos of the way people practice things and the way the library is managed."

Discussion

The proposed maturity model progresses existing EBLIP understanding by acknowledging this variation of experience, as well as putting workplace-related influences within the context of being evidence based as an organization. The EBLIP Capability Maturity Model is the product of information from empirical and theoretical literature integrated with information from the semi-structured interviews. From the interview transcripts and existing EBLIP research, the differences between maturity at each tier emerged through the lens of three dimensions that identified how evidence based practice manifests in a university library setting. These dimensions have their foundations in existing EBLIP models. The dimensions are *Process, Engagement, and Evidence*.

Process

Interviewees described the varying extents to which an evidence based practice process was applied within their libraries, whether this be not at all, on a one-off or semi-regular basis, or integrated into day-to-day ways of working. A process may be reactive or proactive, meaning that the purpose of gathering and applying evidence may or may not be thought about from the onset. Interview data also revealed where the focus of an evidence based practice process might be at different maturity stages. For example, some participants described collection methods in detail. Others focused on the process associated with making evidence usable or presenting it in a communicable format. Experiences of, and exposure to, evidence based practice within their libraries indicated

Table 1
Process Dimension - EBLIP Capability Maturity Model

Process	Tier 1: Ad hoc/ Sporadic	Tier 2: Justifying	Tier 3: Emerging	Tier 4: Experimenting	Tier 5: Transforming
Articulate	The need for evidence is not defined.	Evidence is collected to justify actions taken or to "show-off" the library's activities.	Needs are defined within the context of a project or specific activity; or to instigate a change.	EBLIP is used to identify gaps or problems in service delivery.	Proactive approaches are taken to understand and articulate problems/needs.
Assemble	Evidence may be collected due to tradition or to satisfy external demands.	Reliant on quantitative data available from library systems.	Evidence is collected for a specific task from local or research sources.	Evidence is collected to support service improvement.	Evidence is collected with clear strategic or operational purpose.
Assess	If evidence is collected, it is not evaluated.	Evidence is manipulated to fit the required context and used to justify actions taken or not taken.	Evidence is assessed against its relevance and applicability to the local situation.	Evidence is assessed against the articulated need.	Sophisticated, contextual insights are drawn from evidence.
Apply/Agree	Evidence is not used for decision-making or strategic planning.	Evidence has a limited role in informing decision making.	Evidence informs decisions for specific projects/activities.	Evidence is considered when making decisions and determining the strategic direction.	Evidence underpins how the library operates and determines its strategic direction.
Adapt	Evidence is left unused. It does not inform decisions made.	Evidence is used to justify the action (or lack of action) taken.	Evidence gathered has limited future application or repeatability.	Starting to apply an iterative approach and to develop a local evidence base.	Continuous cycle of improvement. EBLIP enables agility, creativity, and responsiveness.
Communicate	Evidence is not used to communicate impact or value.	Raw/descriptive data is reported to demonstrate activity rather than value or impact.	Focus is on communicating outcomes from projects.	Focus is on communicating evidence to influence decision-making.	Evidence is used to demonstrate value and impact.

Table 2
Engagement Dimension - EBLIP Capability Maturity Model

Engagement	Tier 1: Ad Hoc/ Sporadic	Tier 2: Justifying	Tier 3: Emerging	Tier 4: Experimenting	Tier 5: Transforming
Shared Understanding	EBLIP is seen as unrealistic or unattainable. It is not an organizational priority.	EBLIP is synonymous with data collection, to demonstrate the "busyness" of the library.	EBLIP is applied when implementing changes or projects.	EBLIP is seen as a desirable goal to support service improvement and strategic planning cycles.	EBLIP is applied as a mindset that underpins the day-to-day activity of the library.
Responsibility	No one/only as required or directed.	Individuals who are responsible for data collection.	EBLIP is seen as an additional task to be completed by project managers and teams.	Sits with or is led by a dedicated staff member or team who have an EBLIP focus or role.	Shared across all staff and teams. "Everybody would have it as part of their role."
Role of leaders	Leaders do not see the benefit of EBLIP. It is experienced as "not relevant".	Leaders are reactive to the environment, as required by stakeholders. EBLIP is experienced as "a weapon".	Leaders require evidence to support project work and change proposals. EBLIP is experienced as "learning from research".	Leaders require evidence to support decision-making and service improvements. EBLIP is experienced as "service improvement."	Leaders reinforce a culture of EBLIP. It is experienced as "a way of being".
Staff development	Not seen as a staff development priority.	Staff development priorities limited to data literacy.	Staff development as required to achieve project outcomes.	Focus on using evidence and developing research skills. Staff are encouraged to experiment with different research methods.	Staff are supported to develop a deep understanding of EBLIP as it applies to their role.

Table 3
Evidence Dimension - EBLIP Capability Maturity Model

Evidence	Tier 1: Ad Hoc/ Sporadic	Tier 2: Justifying	Tier 3: Emerging	Tier 4: Experimenting	Tier 5: Transforming
Sources	May occasionally recognize or acknowledge the value of local or research evidence.	Reliant on evidence (data) that is already accessible or routinely collected/system generated. Local evidence is valued.	Considers best practice or benchmarking with local data to support a specific project or need, using a mix of research and local evidence.	Evidence from a range of sources is valued as a way to identify gaps and opportunities.	Evidence is sourced with critical intent from a range of valid sources. Evidence is verified, trustworthy, contextualized, fit for purpose, and ready for use.
Purpose	Opinion is valued more than evidence in decision-making.	Performance metrics focus. Systems-generated data builds a database of statistics that is used infrequently in decision-making.	Project/activity based focus. Evidence has a limited purpose, to inform decisions within the context of a project or activity.	Service improvement focus. Evidence informs decision making across a range of activities and functions.	Holistic focus on building and maintaining an evidence base for the library. Evidence empowers the library to make decisions across all activities and functions.

capability limitations to varying degrees in assessing and applying evidence to particular needs or practice questions. How the EBLIP process manifests correlated with the cyclical EBLIP model, sometimes referred to as the 5As model, that Koufogiannakis and Brettle (2016) proposed. A sixth element of Communication was also included within the Process dimension.

Engagement

This element involves how the library as a whole engages with evidence based practice; promotes, prioritizes and enables evidence based practice approaches and capability. Rather than focusing on organizational culture as a label for this element, *Engagement* more accurately described participants' experiences of how widely dispersed and focused their libraries were in using evidence based practice approaches. Engaging in evidence based practice included the extent to which library staff were supported to develop their capabilities and skills; whether leaders explicitly prioritized evidence based practice as a way of working, and whether there was a shared understanding of how evidence based practice approaches were used to improve services and practice. Some participants also commented on whose responsibility it was to drive engagement in evidence based practice. How leaders understand and sponsor EBLIP as way of working closely aligned with the five categories of experience identified by Partridge, Edwards, and Thorpe (2010).

Evidence

Participants shared which evidence sources were used within their library to make decisions and improve practice - the types of evidence involved in a library's process, how evidence is identified and perceived, and an awareness of the limitations of evidence to different situations and contexts. Though closely linked to *Process*, this element describes an awareness of, and capability to identify, gather, and apply appropriate evidence to practice and service

delivery. At the more mature end of the spectrum, a small number of participants were able to demonstrate an understanding of the limitations of applying and using different types of evidence. The types of evidence identified by participants indicated those most valued in making decisions within their libraries. The maturity model does not aim to prescribe a hierarchy of evidence, or to suggest higher levels of maturity use one source over another. Rather, interview data indicated that an awareness and ability to use different types and combinations of evidence is of higher maturity. The variety of evidence sources (local, research, professional knowledge) that were identified from the interviews draws on Koufogiannakis' research (2011).

Limitations and Future Research

The maturity model presented in this paper addresses a gap in the current understanding of evidence based library and information practice by broadening the perspective from individual practitioners to whole library organizations. In doing this, the scope of this study was refined to focus on university libraries, particularly in Australia and New Zealand. Therefore, this maturity model may not be representative of evidence-base practice in other types of libraries such as public, school, or special libraries. It is anticipated that engagement with evidence-based practice is likely to differ between sectors, such as health and medical and academic libraries. Further study in other library contexts and countries would help validate and strengthen the maturity model and its application to a range of library and information organizational contexts.

The challenges of developing an instrument to measure maturity in organizations include:

- How to measure the distance between maturity levels
- What is the scale of measurement
- How to calculate the overall maturity (Lasrado et al., 2015).

At this stage of the research, the authors have yet to address these questions. Validation of the maturity model is required. Lasrado, Andersen, and Vatrapu (2015) noted that validation is usually undertaken following the publication of a maturity model. It is the authors' intent to continue developing and validating the proposed model. Implementation practices that can be repeated, measured, and continuously improved to create organizational change in EBLIP maturity are also yet to be developed (Wademan et al., 2007). The authors intend to further develop the EBLIP Capability Maturity Model to include a self-assessment matrix to help university library leaders measure their organization's maturity status. Resources, case studies, and recommended implementation and institutionalization practices for how to grow a library's EBLIP maturity are also planned.

Conclusion

As university libraries face increased scrutiny of their role and value to the institution, responsibility for evidence based practice and approaches to service delivery and communication lies with the whole library organization, not just individual practitioners. Additionally, individual practitioners need organizational supports to enable evidence based practice and related capabilities. The EBLIP Capability Maturity Model developed from this research responds to this challenge and promotes the importance of building evidence based practice capabilities at a broader, organizational scale. This is key to the ongoing sustainability of EBLIP, and the library itself, as it responds to its environment.

Variation of experience, as originally found by Partridge, Edwards, and Thorpe (2010), appear to still ring true to evidence based practice experiences at an organizational level, and therefore validates a capability maturity model as an appropriate framework for library leaders to evaluate evidence based practice within their libraries. This study also addresses what Koufogiannakis (2015) found to be the largest

obstacle to evidence based practice in academic libraries – the workplace context – and builds upon existing research and literature about the influencing factors and responsibilities that are involved in building a culture of evidence based practice (Hallam & Partridge, 2006; Howlett, 2018). Koufogiannakis' (2012) five determinants of evidence use in academic libraries exist within this model, though elevated to an organizational level.

A culture of evidence based practice within an organizational or workplace context requires a shared approach and requires all library staff (Hallam & Partridge, 2006; Urquhart, 2018). Library leadership in evidence based practice is also essential to achieving its aims. By taking EBLIP a step forward in broadening the existing understanding and its models from the individual to organizational level, the maturity model developed from this research brings to light and captures how might a library leader know and measure the extent to which the library's service and practice is evidence based. The model provides a framework by which library leaders can determine how mature their library is, or needs to be, and to identify characteristics of maturity for individuals, teams, and organizations to aspire to.

Library leaders and practitioners will benefit from the model as they seek to identify and build upon their evidence based practice maturity, enabling more robust decision-making, a deeper understanding of their clients, and demonstration of value and impact to their stakeholders. Future development and validation of the model will be undertaken to create tools which will provide practical application of the EBLIP Capability Maturity Model so that libraries can grow and mature EBLIP as a specific organizational competency to the benefit of clients, staff, and stakeholders.

the lands of the Jagera, Yuggera and Ugarapul peoples of the Springfield region, Queensland, Australia.

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Appendix A
Sample interview questions

1. Can you tell me about any challenges you or the library have faced in making decisions about the library's services? Can you identify any evidence that might have helped resolve the challenge?

2. Does the library regularly produce or revise a strategic plan, its goals and objectives? If so, can you tell how the library does this? If not, can you tell me why?

3. Can you tell me about any processes or evidence that is collected and analysed to evaluate:
   - The library's services and programs?
   - The collections?
   - The achievement of the library's goals and objectives?

4. Are there any routine or regular processes in place to collect evidence related to the library's services and programs? If so, can you describe them?

5. Are there any routine or regular processes in place to analyse and report on the library's services and programs? If so, can you describe them? (e.g. reporting schedule)

6. How does the library communicate its performance, value and impact to its stakeholders? Do you think this is an area where the library could improve?

7. What does evidence based practice mean:
   - to you?
   - to the library?

8. What is 'evidence'?

9. What potential benefits do you think evidence based practice has, or can have, to your library?

10. How confident do you feel the library can, or is operating in an evidence based way? How do you think the library can improve in being evidence based?