Enhancing Expert Interviews: Insights from Information Systems and Digital Transformation Research

Tobias Hassmann
Munich Business School
Munich, Germany   *tobias.hassmann@munich-business-school.de*

Markus Westner
OTH Regensburg
Regensburg, Germany   *markus.westner@oth-regensburg.de*

Abstract

Expert interviews, a commonly employed qualitative data collection procedure in information systems (IS) research, lack consistent conceptualization. This paper aims to address this gap by providing a conceptual framework and comprehensive guidelines for a rigorous implementation of expert interviews, supported by real-world examples. After a systematic selection of method-relevant literature, a thematic analysis of twenty-eight articles, books, and book chapters is conducted to elicit the distinctive characteristics and rigorous conduct of expert interviews. Validation is provided by analyzing nineteen studies published in important IS outlets that use expert interviews. A particular focus is on a subset of five studies that cover digital transformation topics. The analysis reveals expert interviews' flexibility as data collection procedure and shows the wide range of application opportunities for IS researchers. Lastly, we discuss theoretical and practical implications of our findings to enhance the rigor, systematic use, and relevance of expert interviews in IS research.

Keywords: expert interviews, research methodology, qualitative IS research, digital transformation.

1.   Introduction

Applying a sound research design, taking the appropriate methodological choices, and employing corresponding data collection procedures is the core of any research endeavor [10], [12], [19], [25], [48]. Further developing the utilization and comprehension of research methods and associated data collection procedures within the research community, which serves as both consumers and producers of research, is a relevant topic [19], [25]. Our paper seeks to enhance the understanding of a particular qualitative data collection procedure among information systems (IS) students and researchers, particularly regarding its applicability and challenges within the context of digital transformation (DT): *expert interviews* [5, 6], [28], [33], [37], [59]. To ensure rigor as well as valid, reliable, and generalizable outcomes, a data collection procedure must confirm with a sound research strategy and follow a clearly defined research methodology. In the context of expert interviews, this entails employing them as sole data collection procedure within a mono-method (MOM) research design, combining them with supplementary qualitative methods in a multi-method qualitative approach (MMQ), or mixing them with quantitative methods in a mixed-methods approach (MM) [10], [12], [19], [48]. Also, epistemological and theoretical underpinnings need to clearly map and inform the data collection procedure [12], [48]. While expert interviews allow to efficiently collect data [24], [37], [60], they still lack a consistent conceptualization and their methodological as well as epistemological status remains debated [13], [31], [33], [36], [44]. There is even skepticism regarding their existence due to their multifaceted

nature and emphasis placed on the '*expert*' through whom all the relevant information that is sought is conveyed [5], [31]. And yet, despite these challenges, expert interviews enjoy widespread popularity in IS research – in-line with a growing adoption of qualitative research methodologies in top IS research [35]. Emerged in the 1990s in social sciences [5], [13], [24], [37], [59], [60], expert interviews are employed in a wide range of studies investigating diverse IS-related phenomena. Highly cited IS studies employ expert interviews to investigate various areas: examples include exploring the effect of DT for business model management in small- and medium-sized companies [21], managing organizations' presence on social media [2], or analyzing the legal and technical ramifications of contract conditions in blockchain applications [17]. These examples suggest that expert interviews are utilized in IS research to explore both emerging and established IS phenomena and provide input for theory development [11], [16], [34], [49], [56]. Considering that expert interviews originated in other disciplines [5], [13], [28], [59], questions arise about their effective transfer and application to IS-research that focuses on technology and organizational dynamics [19]. Hence, this paper's research questions fall into two buckets: first, we provide theoretical foundations and practical guidelines for conducting expert interviews rigorously, focusing on the generation of valid and reliable outcomes irrespective of the discipline (RQ1, RQ2). Second, we augment these insights by analyzing the implementation of expert interviews in studies published in leading IS outlets that address real-world scenarios such as DT [11], [16], [21], [27], [34], assessing the use and implementation of expert interviews in IS research (RQ3, RQ4). Our four research questions are:

RQ1: What are the distinct characteristics of an expert interview?
RQ2: What are good practices for a rigorous expert interview procedure?
RQ3: How are expert interviews used in studies published in top IS research outlets?
RQ4: How are expert interviews implemented in studies published in top IS research outlets examining topics of DT?

The paper is organized as follows: first, we describe our methodological approach for RQ1 and RQ2, which includes a systematic review of method-related literature and its thematic analysis. Section 3.1 addresses RQ1 by describing the distinct characteristics of expert interviews. Section 3.2 covers RQ2 by presenting good practices for conducting expert interviews. Both sections treat expert interviews in a discipline-agnostic manner. Section 4.1 describes the selection of relevant IS studies employing expert interviews, and Section 4.2 evaluates these studies to address RQ3 on evaluating the use of expert interviews in IS. Section 4.3 analyzes five IS studies on DT-related topics to tackle RQ4. The paper concludes by summarizing the main findings, limitations, and potential future research directions.

2. Methodology

To address RQ1 and RQ2 on the unique features of expert interviews, we conducted a systematic review of recent literature following the PRISMA guidelines [39]. To ensure an interdisciplinary and comprehensive approach, we used a two-fold literature research process (see Figure 1): first, we identified method-related literature on expert interviews across all academic disciplines. Second, we conducted a systematic backward reference search on studies that employ expert interviews and that are published in leading IS-specific journals.

For the first step, we used Scopus and Web of Science (WoS). We defined four inclusion criteria (IC): we only considered articles, textbooks and book chapters, or conference papers (IC1) that are written in English or German (IC2), are peer-reviewed (IC3), and published after 2002 (IC4). In February 2024, we searched for '*expert* interview* method**', which yielded 27,549 results in Scopus and 24,100 in WoS. An initial scan showed that the results primarily contained studies applying expert interviews. Hence, we refined the query by applying the broad search term '*expert* AND interview**' to the title and adding additional inclusion criteria on both the author-provided keywords and abstracts to match on '*expert**

interview*', or 'interview* expert*', or 'method*', or 'qualitative'. We performed the search both on Scopus and WoS and deduplicated the results so that 198 results remained for an in-depth screening of titles and abstracts. To select relevant sources regarding the research questions, we defined one exclusion criterion, which was to discard results utilizing expert interviews as data collection procedure for their research purpose. Finally, we chose twenty-one sources and employed back-and forward-search [61] – while also applying all in- and exclusion criteria –, which resulted in identifying three additional results.

For comprehensiveness and including relevant results for the IS discipline, we executed a second step, which was a systematic backward search approach [61]. We used the website litbasket.io [4] and applied one of its predefined filters referred to as *51 top ranked IS journals* to perform a search on Scopus using the broad search terms '*expert* AND interview**'. For this intermediate step, no additional inclusion or exclusion criteria were applied so that we obtained 404 results. We then applied backward search on these results by looking up all cited references from the retrieved 404 articles. This step yielded 22,145 references. To restrict the results to relevant references on expert interviews, we filtered the results with the expression '*expert* AND interview**', or '*expert* interview**', or '*interview* expert**', or '*expert*interview*' and restricted the results to sources that were published after 2002. The titles and abstracts of the 536 results retrieved in that filtering step were then carefully screened by applying the one EC from above. As a result, six book chapters and one textbook were retrieved.

Finally, a sanity-check on AIS eLibrary was performed, using the search terms '*expert* interview* method**' for title and '*"expert* interview*" OR "interview* expert*" OR "method*" OR "qualitative"*' applied on title and abstract which did not return any additional results. The retrieved results were merged and deduplicated, so that sixteen articles, nine book chapters, one conference paper, and two textbooks – in total, twenty-eight sources – remained for thematic analysis.
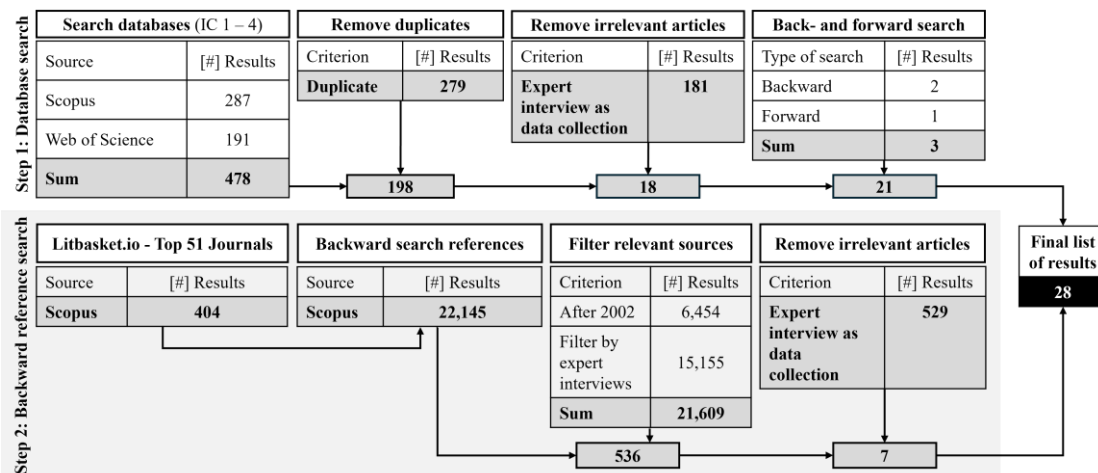

Fig. 1. Two-step process to find expert interview method-related literature.

For the thematic analysis, we applied a six-phased inductive approach to answer RQ1 and RQ2 [9]: first, we got acquainted with the twenty-eight sources and then applied descriptive codes to groups of information. Third, we combined the codes into overarching schemes, representing key stages and characteristics of expert interviews. Fourth, we reviewed those to ensure their coherency and consistency. Next, we refined the names for the identified stages and characteristics, which allowed us, in the final sixth step, to summarize the findings in a succinct manner for reporting [9].

3. Findings

3.1. Distinct characteristics of expert interviews

Through our inductive thematic analysis, we identified a set of distinct characteristics of expert interviews. First, three different types of expert interviews are described most

frequently in the analyzed literature: (1) *exploratory* (E-EI), (2) *systematizing* (S-EI), and (3) *theory-generating* (TG-EI) expert interviews (see Table 1). The common expert interview types are inherently related to specific epistemological stances and theory development approaches [12], [48] – though are flexible to be used in MOM, MMQ, or MM research designs [10], [12], [48]. Also, different variations of the same expert interview type are conducted in the same study [34], [49].

E-EI aim to explore a new, poorly defined field to gain first access or to generate basic hypotheses [15], [33]. They show an affinity towards interpretivist epistemology, particularly when used within MOM or MMQ research approaches [6, 7], [10], [12], [48]. Although, E-EIs are also used in MM studies with a pragmatist stance, for example, when being leveraged to generate input for subsequent quantitative analyses [54]. Conducted in an unstructured fashion with open-ended questions [28], E-EI help researchers gain insights into the potential ramifications of a new domain [7], [15], [30]. S-EI focus on extracting exclusive knowledge on a specific topic with the goal to systematically obtain and structure expert knowledge, which is not accessible for the researcher [7], [30], [33]. They serve different purposes: documenting knowledge or understanding broader social and environmental contexts in which experts operate with the expert as guide [30], [32], [59]. S-EI aim to make the interviews comparable among each other and hence require a structured approach [13], [30], [33]. TG-EI involve analyzing and reconstructing the subjective, implicit knowledge of experts to generate new theoretical frameworks [7]. By synthesizing expert perspectives, novel theories and conceptual frameworks are created with the goal to advance scholarly understanding [7], [30], [59]. Table 1 lists additional variants of the three common types: *guided*, *reconstructive*, *problem-centric*, *transformative*, *intersubjective* expert interviews, and *validating conversations*, each of which were mentioned in the analyzed literature once and show parallels to the three common types or a mixture of the common types.

Table 1. Expert interview types (EI) with targeted expert knowledge and corresponding format.

Dimension / Type ~related	Epistemology and theory development	Expert knowledge	Prevalent format	Sampling	Source
Common types					
Exploratory (E)	Access new field for exploration to generate basic hypotheses	technical	explicit	snowball, convenience	[7], [13], [15], [28], [30], [33], [36], [59]
Systematizing (S)	Extract exclusive knowledge on a broad topic for theory development	technical, process, context	implicit, explicit	purposeful, selective	[7], [13], [30], [32], [33], [59]
Theory-generating (TG)	Generate new theoretical frameworks via subjective expert knowledge	interpretative, explanatory	implicit	purposeful	[7], [13], [30], [33], [59]
Other types *(i.e., variants or mixture of common types, marked with "~")*					
Guided ~S-EI	Systematically generate empirical facts on a phenomenon by using multiple sources	context, organizational	implicit, explicit	*not advised*	[28]
Reconstructive ~E-EI	Reconstruct individual, subjective perspective of an expert on actions or decisions	interpretative, experience	implicit	*not advised*	[15]
Transformative ~S-EI, TG-EI	Transfer organizational knowledge beyond an organization	context, '*transgressive*'	explicit	purposeful	[15]
Problem-centric ~TG-EI	Use de- and inductive reasoning to refine a problem	interpretative, explanatory, process, technical	implicit, explicit	probabilistic	[13]
Intersubjective ~S-EI, TG-EI	Identify common realities within a selected organization, triangulation	functional	explicit	very selective	[15]
Validating conversation ~n/a	Hold a conversation after research to validate plausibility of findings	mainly interpretative	implicit	*not applicable*	[28]

Another distinct characteristic of an expert interview is defining who qualifies as expert and what knowledge is sought, which determines the sampling approach [5], [13],

[28], [59]. The expert status is solely ascribed by the researcher and hence a subjective assessment [28], [30], [57]. Moreover, each expert interview type addresses distinct types of expert knowledge: practical or theoretical knowledge. Practical expert knowledge denotes the ability to excel in a representative task for that specific context, for instance, in surgery or management decision making [62]. Theoretical expert knowledge can be differentiated further into *what* it is that is known and *how* the knowledge is coded [28], [59]. The "what it is that is known" is multifaceted and intertwined, with clear delineations missing. *Technical* knowledge encompasses systematic and factual knowledge, providing experts with distinct advantages within their respective fields [5]. *Experience* knowledge describes individual expertise, whereas *interpretative* knowledge is impacted by the personal biography and networks [15], allowing experts to interpret situations [28]. *Organizational* knowledge is about knowing institutional or general organizational rules [15], [28] – abstracted and applied to broader contexts, it is also referred to as *process* knowledge [59]. Contrarily, *functional* knowledge describes intra-organizational knowledge [28]. *Context* knowledge denotes expert knowledge about greater societal ramifications [15], [28]. Furthermore, *explanatory* knowledge is considered the expert's ability to provide explanations, meanings, and interpretations on a specific matter [5], [59]. Regarding "how the knowledge is coded", two distinct coding formats can be differentiated: it is either implicit or tacit so that only experts know it, or it is explicit and hence codified, for instance, as an organizational routine, a strategy paper, or a situation assessment [28]. *Context*, *functional*, and *technical* knowledge have an affinity towards codification, while *interpretative*, *experience*, *organizational*, *explanatory*, and *process* knowledge tend to be implicit [28], [59].

3.2.   Good practices for a rigorous expert interview procedure

Through our thematic analysis, we identified four distinct stages of a rigorous expert interview procedure. Each stage covers different steps that pose unique challenges. The first stage is defining the research design and objective, which informs the selection of the appropriate expert interview type. The second step is to prepare and execute the interview. Data analysis and reporting findings conclude the expert interview procedure. Ethical conduct matters throughout the entire expert interview process (see Figure 2).
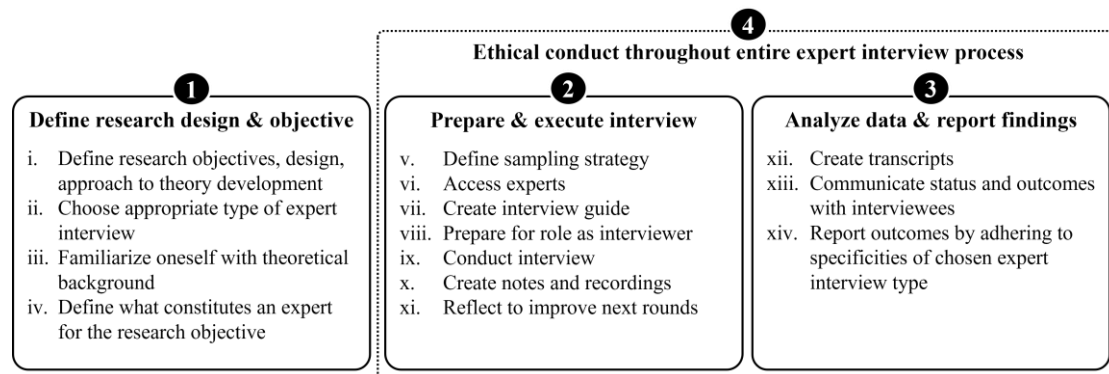
4 — Ethical conduct throughout entire expert interview process

1 — Define research design & objective

i.   Define research objectives, design, approach to theory development
ii. Choose appropriate type of expert interview
iii. Familiarize oneself with theoretical background
iv. Define what constitutes an expert for the research objective

2 — Prepare & execute interview

v.   Define sampling strategy
vi.   Access experts
vii. Create interview guide
viii. Prepare for role as interviewer
ix.   Conduct interview
x.   Create notes and recordings
xi.   Reflect to improve next rounds

3 — Analyze data & report findings

xii. Create transcripts
xiii. Communicate status and outcomes with interviewees
xiv. Report outcomes by adhering to specificities of chosen expert interview type

Fig. 2. The four key stages identified for a rigorous expert interview procedure.

Define research design and objective. We recommend that researchers first evaluate whether expert interviews are suitable for their research objective and design [15], [28], and provide justification for their use [28]. Researchers must also clarify which type of expert interview aligns (step ii) with the research objective [5], [7] to ensure and enhance the validity and relevance of the findings [13], [15], [28], [30], [59]. Choosing an appropriate expert interview type allows for structuring the expert interview procedure [15], [43], [57], [59], [62]: researchers need to be aware that each expert interview type seeks different types of expert knowledge. For instance, EI focus on extracting technical, explicit knowledge and putting it in context [59]. This means, researchers should pay attention to acquire specific knowledge related to technical applications, information, or

data within a particular field to collect insights for practical applications and problem-solving [13], [59]. S-EI aims for technical, process, and context knowledge [59], while TG-EI focus on purposefully delving into the interpretative and explanatory – hence: implicit – knowledge [30]. Researchers must also ensure that expert interviews align with the chosen research design, that is, applying either a MOM, MMQ, or MM approach [10], [12], [42], [49], [55]. The expert interviews can serve diverse functions within the selected design, as we show in our analysis of IS research studies in Section 4.

Prior knowledge on the topic of inquiry – which can be gained, for example, by familiarizing oneself with relevant academic literature [57], publicly available documents [3], or via personal contacts [45] – is key (step iii) to build an intuition what expert knowledge is targeted and identify potential expert interviewees [3], [28], [44], [59]. This helps for step iv, which is to clarify who qualifies as expert by determining what the sought expert knowledge is [7], [15], [28], [57], [59]. Appropriate experts are individuals who possess specialized knowledge that goes beyond common-sense understanding not readily accessible to others [13], [28], [30], [57]. Social representativeness, too, is an expert trait [45], [59] – though it is not intrinsically linked to a professional role or organizational hierarchy [33]. For organizational research, researchers should select individuals who possess institutionalized authority that allows them to construct organizational reality and influence actions in broad contexts [28], [36], [40]. Additional expert attributes are competence, experience, and education in trans-disciplinary and heterogeneous areas requiring cross-discipline collaboration [13], [15], [36], [62].

Prepare and execute interview. After determining who qualifies as expert, the sampling approach is defined (step v). A diverse set of experts facilitates the generalizability of findings [3], [15], [41]. This can be accomplished by drawing experts from different echelons to avoid positional-biased knowledge and gain different perspectives [44], [60]. The validity of the outcomes is ensured by paying attention to the quality of the experts [14]. Also, the sampling approach must be aligned with the chosen expert interview type. As per table 2, each expert interview type has an affinity towards different sampling approaches. After having identified the experts, researchers encounter the challenge of accessing (step vi) and persuading them to participate in the research project [3], [43], [45], [57]. Good practices are to leverage affiliations with institutions or professional associations, conferences, personal networks, or expert directories [45], [57], [59]. Searching experts via online platforms, such as LinkedIn, allows for quick expert identification [45], [59]. Researchers should also be aware that political organizations or industry sectors such as financial institutions are reluctant to share expert information [45], [55]. Upon completion of the sampling process, researchers are advised to examine the characteristics of experts who declined to participate, as they may possess unique insights compared to those who accepted. A high non-response rate is a matter of concern, as it can impact the findings' generalizability [3].

The next step (vii) is to prepare the interview guide with the questions, which is facilitated by prior knowledge about the domain of inquiry [3], [28]. The guide should avoid ambiguous terms and academic language and thoughtfully order the questions to guide the conversation flow [3], [59]. Typical interview mechanisms are *structured interviews* with a predetermined script, *unstructured* and *semi-structured* interviews with no or partially prepared scripts [42]. Researchers should use the appropriate mechanism based on the chosen interview type: E-EI have an affinity to unstructured interviews with open-ended questions, while S-EI opt for semi-structured formats featuring straightforward questions [7], [33]. TG-EI usually utilize unstructured or semi-structured methods, employing indirect questioning to interpret implicit knowledge and extract experts' perspectives and conceptions on a specific topic [7], [15], [36], [59]. Despite the clear mapping, some flexibility should be allowed, particularly, when novel, unintended topics or themes emerge during the interview [15]. Lastly, the interview guide also needs to consider the interview format – personal, via phone, or video [28], [55], [60]. Online expert meetings have become popular, providing additional benefits such as unintrusive recording capabilities or auto-transcriptions [28] but are suboptimal for observing expert behavior or non-verbal hints [43], [60].

Prior to the interviews (step viii), researchers should prepare by practicing their role as interviewer by conducting a dry run [3], [59]. Having prior knowledge on the topic and the *how* of the inquiry will allow researchers to master difficult situations [7]. The interview process commences with scheduling a time and selecting an appropriate location or medium for the interview. Time scarcity of experts poses scheduling challenges [15]. Researchers should also clarify upfront in which language the conversation is held as additional intricacies arise if participants are not fluent in the used language or translators are required [33]. Upon commencement, the interviewer introduces the study's purpose, confirms informed consent, and builds rapport with the expert [59]. One challenge of expert interviews is managing power imbalances. Experts can exhibit *paternalism* due to their position or knowledge [3], [30], [50], [57] or are reluctant to share implicit knowledge if they perceive the interviewer as less competent [28]. Additional challenges are when experts start expressing feelings (*catharsis* effect), are unwilling to share knowledge (*iceberg* effect), take on the interviewer's role (*feedback* effect), or use the interview to demonstrate their knowledge (*profile* effect) [30]. Accurate documentation of the discussion (step x) is critical and contributes to better management of critical situations in subsequent interview rounds (step xi) [59, 60].

Analyze data and report findings. After completing the interview, data analysis should be applied timely [3], starting with reading, organizing, and coding the recorded and transcribed data (step xii) [59]. IS studies employing expert interviews (see Section 4) prefer the works published by Saldaña [47], Miles et al. [38], Glaser and Strauss [23], and Gioia et al. [22] for coding and iterative inductive analysis (step xiii). During data analysis, researchers should be wary of bias, particularly, expansiveness – where the expert inflates or downplays their status – and attractiveness bias – where the researcher overrates the input of experts due to their status or influence [3], [43]. Ensuring high inter-expert consensus serves as mitigation strategy for these situations [14].

Ethical conduct. Ethical requirements arise during all stages [10], [28], [43], [52], [55]. For sampling [36], [60] and during interviewing researchers must ensure that informed consent is collected, and participants are reminded of their right to withdraw from the project at any time without providing reasons [28], [57]. Further ethical requirements are ensuring anonymity [28] and confidentiality during as well as after the interview [13], [28], [55], [59]. Upon interview completion, standard ethical procedures are sharing the final transcripts for review (step xiv) and accurately reporting the participants' contributions in the final report (step xv) [10], [52], [57].

4. Expert interviews in IS research

4.1. Methodology and selection of relevant IS studies

To validate the use of expert interviews in IS research, we analyzed IS studies that were published after 2013 within the AIS Senior Scholar's List of Premier Journals and that employ expert interviews. We performed a search in February 2024, searching Scopus with the search term '*expert* AND interview**'. This search yielded twenty-two results. Next, we carefully read the titles and abstracts to identify the studies employing expert interviews – if they did not, we excluded them. This step resulted in nineteen articles for the analysis, which we carefully read and coded. The thematic analysis for all studies followed a six-step procedure [9]: after familiarizing ourselves with the studies, we created codes to groups of information and emerging themes, which we reviewed for consistency. We also found that a subset of five studies cover topics of DT, which we then examined further in more depth (see Figure 3). All findings are presented below.

AIS Senior Scholar's List of Premier Journals		Remove irrelevant articles		Remove articles not related to DT	
Source	[#] Results	Criteria	[#] Results	Criteria	[#] Results
Scopus	**22**	**Study does not use expert interview**	**3**	**Study does not cover topic of DT**	**14**
			19		5

Fig. 3. Search strategy to identify IS studies employing expert interviews published in important IS outlets.

4.2.   Utilization of expert interviews in important IS outlets

We observed a range of research themes, reflecting the diverse and broad landscape of contemporary IS research with its multifaceted challenges. In total, we identified eight distinct research themes: *DT* is the most frequent topic, exemplified by studies analyzing the impact of DT in the financial industry [11], [16], [27], on organizational structures and roles [34], and opportunities to leverage business processes to manage DT [21]. Further research areas are *IT adoption* [1], [8], [49], [58], *business process management* (BPM) [20], [54], *emerging technologies* [17], [26], *collaboration and knowledge* [51], [56], *online media management* [2], [46], *sustainability* [29], and *business model development* [18].

Although all studies analyzed used expert interviews, there were significant variations in the number of experts interviewed – ranging from three to fifty, with an average of eighteen per study. Additional differences were observed in the methodological approaches and the role of expert interviews in the research design. Eight studies use expert interviews as the primary data collection procedure, supplemented by literature reviews (LRs) either for initial understanding or to validate findings from the LR [11], [16–18], [21], [34], [49], [56]. Hence, the distinction between MOM and MMQ research designs is fluent. These eight studies also show significant variations regarding which type of expert interview is employed, how they methodologically fit into the research design, and how they are practically implemented. For example, two studies employ E-EIs, interweaving insights from an LR and experts to present the synthesized findings in a narrative fashion [16, 17]. Two studies use S-EIs and leverage them to complement findings from a preceding LR [18], [49], or conduct the interviews in multiple rounds whereby each round complements and amends previous findings, also changing the expert interview's purpose from an exploratory to a systematizing focus [56]. Further, we identified six studies leveraging expert interviews in MM approaches [2], [27], [46], [51], [54], [58]. Two studies use a convergent, [27], [58] and four studies a sequential research design, whereby the expert interviews either follow the quantitative data collection techniques to complement the findings [2], [46], or provide initial input for subsequent quantitative analysis [51], [54]. Finally, the five studies using Design Science Research or Action Design Research approaches, all employ expert interviews in a similar manner: they leverage them to generate insights for developing an artifact and to evaluate the effectiveness of the artifact [1], [20], [26], [29], with one study using them for the problem definition stage [18].

4.3.   Implementation of expert interviews in IS research on DT

We illuminate the utilization of expert interviews within the context of DT by contrasting five studies explicitly addressing DT-related topics [11], [16], [21], [27], [34]. Table 2 summarizes the outcomes and evaluates the rigor of implementing the four stages of an expert interview procedure outlined in Section 3. The level of rigor is assessed as *not advised*, *minimal*, *partial*, *much*, or *extensive*, determined by the comprehensiveness of the descriptions provided.

Three studies show a fluent research design between MOM and MMQ (abbreviated *MOM(Q)*) [11], [21], [34], one study employs an MMQ [16], and another one a sequential MM [27] approach. A commonality among the studies is the use of LRs to either prepare or augment the expert interviews and to justify the sampling approach. Overall, it is remarkable that all studies except for one [34] describe only minimally or partially the expert interview's procedure and its function within the research design [11], [16], [21], [27]. A significant difference is the number of experts interviewed per study – varying between five and twenty-eight, with one study not giving the exact number [21]. Differences are also observed regarding the applied interview mechanisms: while most studies employ semi-structured interviews, the specific mechanisms and approaches within these interviews differ, including the use of appreciative interviews [16], explorative elements [11], and guided, validating conversations [27]. Finally, Table 2 also illustrates the flexible application of expert interviews in DT research across diverse topics and industries. Their implementation and function within a research design serve

different purposes: expert interviews are used for theory generation [11], [34], topical exploration [16], systematizing and structuring information [21], and validating findings from quantitative data collection [27].

Table 2. Use of expert interviews (EI) in five selected studies from top IS outlets covering topics of DT.

Source / Area	[11]	[16]	[21]	[27]	[34]
Study's topic	Provide tools to analyze high frequency trading from different perspectives	Understand information and communications technology's role in financialization	Develop recommendations to leverage BPM to cope with challenges of DT	Identify interdependencies between factors of DT on UK financial sector	Explore Chief Information Officers (CIO), Chief Digital Officers (CDO) relationship
#1 Define research design and objective	*Partial* • MOM(Q), using document review (practitioner, governmental), LR. • Inductive theory-building	*Partial* • MMQ, using LR. • Confirm and find supporting evidence for developed models from extensive LR	*Partial* • MOM(Q), LR to develop conceptual framework for DT, and use of extant BPM theories. • Validate theoretical artifacts in organizational contexts.	*Minimal* • Sequential MM: initial LR, closing quantitative analysis. • Validate findings from LR and quantitative analysis	*Much* to *extensive* • MOM(Q) using LR. • Interviewed individuals, and CIO/CDO couples. • Inductive theory-building
#2 Prepare and execute interview	*Partial* • Semi-structured with explorative elements • Purposefully sampled 23 financial industry practitioners.	*Minimal* to *partial* • Appreciative, open-ended • Convenience and purposeful sampling of 38 financial industry experts and C-level executives.	*Minimal* to *partial* • Semi-structured • Purposefully sampled, *non-advised* number of practitioners with experience in BPM and DT from selected companies	*Minimal* • Interview mechanism not advised. • Convenience sampling, five practitioners with more than eight years experience.	*Extensive* • Semi-structured • 22 CIOs, CDOs from companies challenged by DT induced impacts.
#3 Analyze data and report findings	*Extensive* Following Gioia-based reporting	*Partial* Incorporated in report to underscore findings from LR	*Much* Incorporated in text, also as quotations, to underline assertions	*Extensive* Quantitative analysis backed by narrative summary with quotations	*Extensive* Closely following Gioia-based reporting
Type of EI based on #1, #2, #3	**TG-EI**	**E-EI**	**S-EI**	**Guided, validating conversation**	**TG-EI**

5. Conclusion

This paper aims to enhance the understanding and use of expert interviews as a qualitative data collection procedure in IS research [10], [12], [48], [53]. Its contributions are threefold: first, it provides a conceptual framework for rigorously implementing expert interviews, tailored to the IS discipline. Such conceptualization is relevant: as shown in Section 4, expert interview procedures, particularly, preparing and conducting the interviews, are described, or implemented with partial or minimal rigor. Second, IS researchers are equipped with practical guidelines to design, conduct, and evaluate expert interviews systematically and rigorously [25]. Additionally, the paper highlights the diverse applications of expert interviews in top IS outlets, demonstrating their flexibility in IS and DT research on real-world scenarios.

The paper's two main limitations are: first, the sample of nineteen IS studies, including five on DT topics, may not fully represent the entire field. Future research should expand the scope to include more studies for critical review to bolster the reliability of the results as they relate to IS and DT. Second, the paper does not address challenges of expert interviews in rapidly evolving domains, where expert insights can quickly become outdated. Future research could explore the nature of expertise in such novel fields.

In conclusion, enhancing the rigor of expert interviews in IS research involves clarifying their role in the research design, describing expert characteristics for sampling, and crafting concise interview guides tailored to the chosen expert interview type, while also addressing distinctive challenges such as power imbalances. Despite this need for refinement, expert interviews offer flexibility across various research topics and

methodological research choices, making them a promising and rewarding option for IS research projects.

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