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Omnichannel Strategy and Student Word of Mouth in Higher Education

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ABSTRACT

In the era of digital transformation, Higher Education Institutions (HEIs) face increasing pressure to modernize their service delivery to meet evolving student expectations. While Omnichannel Integration (OCI) has revolutionized customer experiences in retail and banking, its application within the educational sector remains underexplored. **This systematic literature review** aims to bridge this gap by examining the impact of OCI on Student Engagement and Word-of-Mouth (WoM). **Adhering to the PRISMA** guidelines, a rigorous screening process was conducted across multiple academic databases, resulting in the analysis of 74 eligible studies published between 2014 and 2024. **The thematic analysis** identifies four core dimensions of OCI Channel Service Configuration, Content Consistency, Quality Assurance, and Process Consistency. The findings reveal a significant distinction between commercial and educational contexts in HEIs, the integration of physical and digital touchpoints is not merely a logistical upgrade but a strategic necessity for relationship building. Crucially, the review establishes that OCI does not automatically generate advocacy. Instead, Student Engagement acts as a vital mediating variable, meaning that seamless integration fosters deeper engagement, which subsequently drives positive WoM. **This study contributes** to the literature by synthesizing fragmented evidence into a cohesive framework, offering university administrators practical strategies to enhance student retention and institutional reputation through consistent cross-channel experiences.

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1. INTRODUCTION

Digital transformation has fundamentally reshaped service interactions through the deployment of integrated information system architectures, enabling seamless data exchange across physical and digital touchpoints. In the context of Omnichannel Integration (OCI), this transformation relies on interoperable system design, real-time data integration pipelines, and IT governance mechanisms that synchronize Learning Management Systems (LMS), student information systems, and institutional digital platforms [1, 2]. In this dynamic environment, OCI has emerged not only as a strategic marketing concept but also as a technology-driven organizational capability, requiring robust system architecture, interoperable data integration, and IT governance

frameworks to enable seamless, consistent, and secure cross-channel interactions across physical and digital platforms.

Unlike multi-channel approaches that operate in silos, OCI creates a unified ecosystem where data and services flow freely, allowing users to switch between touchpoints without interruption. While the efficacy of OCI is well-documented in the retail and banking sectors, Higher Education Institutions (HEIs) are now facing similar pressures to modernize their service delivery through robust digital system architectures, interoperable data integration frameworks, and effective IT governance mechanisms that enable seamless cross-channel interactions [3, 4]. As Generation Z enters the academic landscape, a cohort of "digital natives" accustomed to instant and seamless connectivity, expectations for university services have shifted dramatically. Students now view their educational experience through a consumer lens, expecting the same level of responsiveness and integration they encounter in commercial sectors.

However, a significant gap remains between expectation and reality. Despite substantial investments in LMS and digital infrastructure, many universities struggle to achieve true channel integration, often resulting in fragmented student experiences [5]. This operational gap is particularly critical given the intensifying competition and financial instability faced by private higher education institutions globally [6]. Failure to integrate these channels effectively can lead to decreased student engagement and negative advocacy. Although OCI has been extensively examined in retail and banking contexts, its theoretical grounding within higher education remains underdeveloped [7].

In particular, the relational mechanisms explaining how OCI dimensions generate student engagement and advocacy behaviors are rarely theorized. To address this gap, this study adopts Social Exchange Theory (SET), conceptualizing OCI dimensions as institutional investments that reduce interactional costs and generate reciprocal engagement responses from students. Unlike prior studies that directly transfer retail-based omnichannel frameworks, this review recontextualizes OCI for HEIs by (1) redefining integration dimensions around academic–administrative ecosystems, (2) positioning Student Engagement as a relational mediator rather than an outcome, and (3) embedding these relationships within Social Exchange Theory to explain student advocacy behavior. This constitutes a theoretical and contextual extension of omnichannel literature into the digital education domain [8, 9].

As a result, there is limited theoretical synthesis explaining how OCI creates value for students and why such value may translate into engagement and advocacy behaviors in educational settings. This systematic literature review aims to address these gaps by analyzing the implementation of OCI through the lens of SET, which suggests that high quality interactions (integration) lead to reciprocal positive behaviors (engagement and advocacy) [10, 11]. Consequently, this study addresses three specific research questions:

- How are the technologically enabled dimensions of OCI including channel configuration, content consistency, assurance quality, and process consistency operationalized in higher education information systems?
- To what extent does Student Engagement mediate the relationship between OCI implementation and positive Word-of-Mouth (WoM) outcomes?
- How does the Social Exchange Theory explain the underlying psychological mechanisms governing these relationships?

In addition to its technological and relational implications, the implementation of OCI in Higher HEIs is closely aligned with the United Nations Sustainable Development Goals (SDGs). Specifically, this study contributes to SDG 4 (Quality Education) by emphasizing the role of integrated digital and physical learning ecosystems in enhancing accessibility, service quality, and inclusive student experiences. Seamless omnichannel systems support equitable access to academic and administrative services, ensuring that students can engage effectively regardless of time, location, or interaction channel.

Furthermore, the strategic integration of institutional information systems supports SDG 9 (Industry, Innovation, and Infrastructure) by promoting resilient digital infrastructure, interoperable information systems, and innovation-driven service delivery within HEIs. By leveraging robust system architectures and data integration pipelines, universities can enhance operational efficiency and institutional sustainability. Finally, by fostering stronger student engagement and encouraging positive Word-of-Mouth (WoM), OCI indirectly advances SDG 17 (Partnerships for the Goals) through strengthened relationships between institutions, students,

and broader stakeholder networks. Thus, OCI is positioned not only as a strategic service capability but also as a mechanism that supports sustainable and inclusive development in higher education.

2. RESEARCH METHODOLOGY

2.1. Literature Search Strategy

This systematic review strictly adhered to the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) 2020 guidelines [12]. A comprehensive literature search was conducted in April 2025 across five primary academic databases: Scopus, Web of Science (WoS), EBSCO Business Source Complete, ScienceDirect, and Google Scholar. The search was limited to peer-reviewed journal articles published between January 2014 and December 2024. This cutoff date ensures a complete dataset for the final year, eliminating potential indexing lags [13]. Substantively, this decade-long timeframe was selected to capture the critical evolution of omnichannel strategies from their retail origins to their emerging adoption in the service and education sectors, coinciding with the acceleration of digital transformation in higher education. Finally, the search was restricted to articles written in English to ensure terminological consistency and comparability across studies.

The search strategy employed a Boolean logic string combining keywords related to the independent variable (Omnichannel), mediating/dependent variables (Engagement and WOM), and the research context (Higher Education). To capture all relevant variations, the following search string was utilized: (omnichannel OR omni-channel OR channel integration) AND (customer engagement OR student engagement) AND (electronic word of mouth OR e-WOM OR WOM) AND (higher education OR university OR tertiary education).

2.2. Selection Criteria

To ensure that only relevant and high-quality research was included, the study selection process followed the PICOS framework (Population, Intervention, Comparator, Outcomes, and Study Design) as recommended. This framework provides a structured approach to identifying studies that align with the research objectives. The Population focuses on customers in service-intensive industries (retail, banking, tourism) and specifically students in higher education settings, reflecting a broad context of service evolution. The Intervention examines the implementation of OCI, while the Comparator involves traditional single-channel or multi-channel approaches, allowing for a comparative evaluation of service model effectiveness. The Outcomes of interest encompass Customer/Student Engagement, WOM, satisfaction, and loyalty as key success indicators [14, 15]. Finally, regarding Study Design, the review accepts empirical studies (quantitative, qualitative, and mixed methods) that present analyzable primary data. To further refine the selection, inclusion and exclusion criteria were established as detailed in Table 1.

Table 1. Inclusion and Exclusion Criteria

Criterion	Inclusion Criteria	Exclusion Criteria
Publication Type	Peer-reviewed journal articles	Conference proceedings, book chapters, editorials, reviews, or white papers
Time frame	Published between January 2014 and December 2024	Published before 2014 or after 2024
Language	English	Non-English languages
Context	Service industries (Retail, Banking) and Higher Education	Manufacturing, pure logistics, or non-service contexts
Topic Focus	Explicitly discusses channel integration, omnichannel strategies, and engagement/WOM	Focuses solely on single-channel (e.g., only e-learning or only physical classroom) without integration aspects
Methodology	Empirical studies (Quantitative, Qualitative, Mixed-Methods)	Conceptual papers, theoretical discussions without data, or opinion pieces

2.3. Data Extraction

To ensure data integrity and consistency, a standardized data extraction protocol was developed using Microsoft Excel, adhering to the guidelines. For each selected study, data were extracted into two main categories: bibliometric profile (author details, year of publication, geographic context) and substantive content (research methodology, sample characteristics, key variables, statistical methods, and specific findings regarding OCI dimensions and outcomes).

Given the heterogeneity of the included studies (quantitative, qualitative, and mixed methods), the Mixed Methods Appraisal Tool (MMAT) version 2018 was employed for quality assessment. The MMAT allows for the concomitant appraisal of diverse study designs within a single review framework [16]. Studies exhibiting varying degrees of methodological rigor were included to minimize publication bias and provide a comprehensive view of the literature. However, findings from studies with lower quality scores were interpreted with caution and noted in the synthesis to ensure the robustness of the final conclusions. This approach ensures a balanced evaluation of the data, accounting for the differences in study design while maintaining a high standard of evidence [17].

2.4. PRISMA Selection Process

Before presenting the PRISMA diagram, it is essential to outline the process of study selection, which was carried out using a systematic approach to ensure transparency and reproducibility. The PRISMA diagram below illustrates the flow of records from initial identification through database searches, followed by screening, eligibility assessments, and final inclusion for data extraction. As shown in Figure 1, the diagram details the number of records at each stage of the process, highlighting the steps taken to refine and select studies for review.

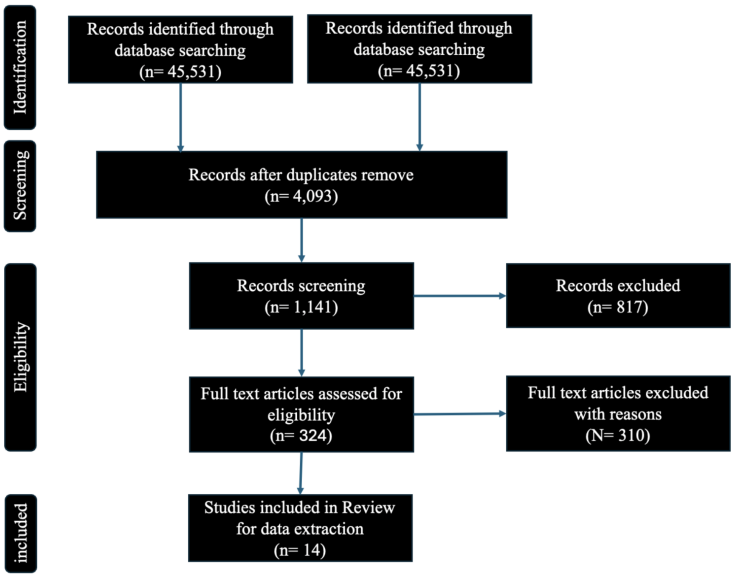

Figure 1. PRISMA Diagram

The systematic literature review process commenced with the identification phase, yielding a total of 45,531 records from the initial database search. Following the removal of duplicates, 4,093 unique records remained. Subsequently, automation tools were applied to filter records based on document type, language, and publication year, resulting in 1,141 records eligible for manual screening. In this screening phase, titles and abstracts were evaluated, leading to the exclusion of 817 records that did not meet the preliminary criteria [18, 19]. The remaining 324 records proceeded to the eligibility assessment phase, where full-text articles were thoroughly retrieved and examined. Of the 324 full-text articles assessed, 310 were excluded for the following explicit reasons:

- Absence of omnichannel integration constructs (n=142).
- Exclusive focus on single-channel e-learning systems (n=96).

- Lack of engagement or WOM outcomes (n=52).
- Conceptual or opinion-based designs without empirical evidence (n=20).

Consequently, 14 studies satisfied all inclusion criteria and were selected for the final data extraction and synthesis. This rigorous selection process ensures transparency and guarantees that only high-quality, relevant evidence supports the review's findings [20].

3. RESULTS AND DISCUSSION

3.1. Conceptual Foundations of Multi-channel Integration

OCI represents a significant evolution from antecedent channel strategies, ranging from simple "click-and-mortar" models to cross-channel approaches. Conceptualize OCI as the "synergetic management of the available channels and customer touchpoints" to optimize customer experience and performance. Unlike its predecessors, OCI fosters a seamless ecosystem where customers can transition between channels without losing context or encountering friction. Theoretically, OCI is grounded in Service-Dominant Logic (S-D Logic), which emphasizes the co-creation of value through continuous interactions across multiple service touchpoints [21].

Uniquely, in Higher Education, OCI entails the comprehensive integration of academic and administrative services, bridging LMS, student portals, mobile applications, and physical campus environments. In retail, OCI prioritizes real-time inventory visibility, unified customer profiles, and consistent pricing strategies. In the banking sector, implementation emphasizes secure data access, personalized financial insights, and integrated transaction histories [22, 23]. Similarly, tourism applications focus on itinerary management across digital and physical touchpoints. Uniquely, in Higher Education, OCI entails the comprehensive integration of academic and administrative services, bridging LMS, student portals, mobile applications, and physical campus environments to support a holistic student lifecycle [24].

3.2. Dimensions of Omnichannel Integration

The systematic review identifies four key dimensions that constitute effective OCI. These dimensions form the structural basis for creating a seamless user experience [25].

3.2.1. Channel Service Configuration

Channel Service Configuration refers to the strategic alignment and integration of multiple service channels, enabling customers to select their optimal point of interaction without losing context [26, 27]. This dimension encompasses channel breadth (the variety of available channels), channel transparency (clear communication regarding channel capabilities), and channel suitability (alignment with user preferences). In the context of higher education, effective configuration allows students to initiate inquiries in a virtual environment and seamlessly transition to face-to-face academic advising without the need to repeat information.

The literature underscores that the quality of channel configuration significantly impacts operational efficiency. Highlighting this impact, reports that organizations with well-integrated channel configurations achieve a customer retention rate of 89%, compared to only 33% for those relying on fragmented approaches [28]. However, the complexity of achieving such a configuration presents substantial implementation challenges, particularly in resource-constrained settings like public universities [29].

3.2.2. Content Consistency

Content Consistency ensures that information disseminated across all channels is uniform, current, and relevant, thereby reducing customer confusion and fostering trust [30, 31]. This dimension addresses information consistency (accurate and coordinated messaging) and transaction data integration (unified customer data across touchpoints). In the educational sector, content consistency is critical; it ensures that academic program details, administrative procedures, and policy guidelines remain identical whether accessed via websites, mobile apps, social media, or in-person consultations [32].

Empirical studies consistently demonstrate that content discrepancies significantly erode trust [33, 34]. observed that 78% of consumers abandon a purchase intention upon discovering inconsistent product information across channels [35, 36]. Similarly, in higher education, prospective students report heightened skepticism toward institutions that present contradictory information across their digital and physical touchpoints [37].

3.2.3. Assurance Quality

Assurance Quality encompasses the mechanisms designed to guarantee consistent service reliability, data security, and delivery standards across all channels. This dimension comprises three critical components: privacy protection (safeguarding personal information), security measures (technical and physical protection protocols), and restoration of accessible services (responsive complaint handling systems). For universities, Assurance Quality entails protecting sensitive student data, ensuring secure access to academic records, and providing consistent responses to inquiries regardless of the chosen channel [38].

Security concerns act as a significant barrier to channel adoption. Established that perceived data security risks reduced omnichannel adoption intentions by 43% among potential users. Higher education institutions face amplified challenges in this domain due to increasingly stringent global data protection regulations and the evolving landscape of cybersecurity threats.

3.2.4. Process Consistency

Process Consistency guarantees that service protocols, workflows, and experiential elements remain uniform across all interaction channels. This dimension includes system consistency (uniform technical functionality) and image consistency (coordinated visual identity and branding elements). In an academic context, process consistency implies that enrollment procedures, grade delivery protocols, and administrative workflows function identically, whether executed through a mobile app, a web portal, or a face-to-face administrative office [39].

Empirical research demonstrates that process inconsistencies significantly escalate customer effort and frustration. Found that customers facing inconsistent cross-channel processes required 37% more effort to complete a transaction and were 4.2 times more likely to abandon their interactions. Consequently, universities exhibiting inconsistent academic and administrative processes report lower student satisfaction scores and higher dropout rates [40].

3.3. Omnichannel Integration and Student Engagement

Customer Engagement (adapted as Student Engagement in the educational context) represents the intensity of an individual's participation and connection with an organization, manifesting through distinct cognitive, emotional, and behavioral dimensions. The literature demonstrates that effective OCI significantly amplifies engagement through several mechanisms. observed that seamless omnichannel interactions foster a "flow experience," which in turn strengthens engagement, a finding originally established in fresh food retail but highly applicable to service sectors. Provide empirical evidence that the quality of channel integration directly correlates with increased engagement levels.

This relationship is particularly pronounced among digital natives. Generation Z, a cohort that now dominates the higher education landscape and has grown up in a ubiquitous digital environment, exhibits significantly higher engagement when organizations deliver seamless cross-channel experiences [41, 42]. Their innate expectation for fluid interaction across physical and digital touchpoints makes OCI implementation not merely an option but an essential prerequisite for sustaining engagement.

However, the path from integration to engagement is not linear. Research identifies critical moderating factors, such as individual differences in technology readiness, digital literacy, and channel preferences, which significantly influence the magnitude of OCI's impact on engagement [43]. Furthermore, psychological constructs specifically perceived risk, privacy concerns, and trust act as mediating mechanisms that determine whether channel integration successfully translates into positive engagement outcomes.

3.4. Student Engagement and Electronic Word-of-Mouth

Electronic e-WOM represents informal communications directed at consumers through internet-based technology related to the usage or characteristics of particular goods and services, significantly influencing purchasing decisions and brand perception. The literature consistently demonstrates that engagement positively influences e-WOM through various pathways. Observed that highly engaged customers are 67% more likely to share positive experiences online. Indicated that brand engagement increases social media sharing behaviors by 58%.

The underlying mechanisms of this relationship involve emotional investment and psychological ownership. Engaged individuals develop a stronger emotional connection with the brand, feeling personally invested in its success. This connection motivates voluntary advocacy behaviors, including e-WOM. In the educational context, engaged students transform into brand advocates, sharing positive experiences about their

institution across social networks. Social media platforms (such as Instagram, TikTok, and WhatsApp) have dramatically amplified the impact and reach of e-WOM. Crucially, user-generated content on these platforms carries higher credibility than traditional marketing communications, with 84% of consumers trusting peer recommendations over corporate advertisements [44].

3.5. Higher Education Institutions in the Omnichannel Era

The application of OCI in HEIs addresses unique challenges and complexities that differ from commercial contexts. Unlike retailers, universities must integrate diverse service functions, ranging from admissions, academic advising, and course enrollment to financial services and student life activities. This complexity is exacerbated by strict accreditation standards, which demand the consistent delivery of educational quality regardless of the interaction channel. Private universities, particularly in Indonesia, face intensified pressure to implement effective OCI strategies. Amidst a declining student population, with a recorded decrease of 8,000 students in 2024 compared to 2023 and escalating competition from state institutions, private HEIs must differentiate themselves through superior student experiences. However, this challenge creates a strategic opportunity: the demographic advantage of Generation Z students, who exhibit high digital adoption and expect seamless experiences, provides a receptive audience for institutions that successfully execute OCI strategies [45].

Despite the potential benefits, implementation hurdles remain significant. Common barriers include organizational silos, legacy systems, faculty resistance to digital transformation, and budgetary constraints. Successful implementation typically commences with core student-facing processes, such as admissions and enrollment, before expanding to more complex academic functions [46]. Institutions that achieve effective integration report substantial outcomes, including increased student retention, amplified positive word-of-mouth, and improved competitive positioning [47].

3.6. Theoretical Integration: Social Exchange Theory and Omnichannel Integration

This review identifies SET as a robust theoretical lens for elucidating the implementation and outcomes of OCI in higher education. SET posits that relationships evolve through the exchange of reciprocal rewards and costs, wherein individuals evaluate interactions based on perceived net value. In the context of OCI, the seamless integration of channels is not merely a technical feature but a strategic resource that students perceive as a ”reward,” motivating ongoing interaction [48].

The mediating role of Student Engagement between OCI and WOM aligns precisely with SET’s emphasis on relationship development. When students receive consistent, secure, and unified services across channels, they perceive a higher value (reward) relative to the effort required (cost) to navigate university systems. The evaluation of these beneficial exchanges triggers norms of reciprocity, obliging students to ”repay” the institution through deeper engagement and, ultimately, voluntary advocacy behaviors such as positive WOM [49]. This dynamic is particularly salient among Generation Z students, who prioritize transparency, immediacy, and authenticity in their organizational interactions. Within the SET framework, each OCI dimension functions as a distinct value proposition that alters the cost-benefit analysis of student interactions:

- Content Consistency minimizes cognitive costs and uncertainty. By ensuring information uniformity across channels, institutions eliminate the cognitive dissonance students face when encountering contradictory messages, thereby building trust [50].
- Process Consistency reduces behavioral costs and procedural friction. It ensures that students do not need to relearn workflows when switching channels, making the interaction experience efficient and predictable.
- Assurance Quality mitigates the perceived cost of risk by providing guarantees of data safety and service reliability, which are critical for building trust in digital ecosystems.
- Channel Service configuration offers a psychological reward in the form of autonomy and choice, empowering students to select their optimal point of interaction without losing context.

3.7. Managerial Implications and Marketing Strategies for Higher Education Institutions

The realization of effective OCI requires institutions to first establish a robust operational foundation that bridges the gap between IT management and academic administration. Ideally, the implementation should

begin with a unified system architecture where the Academic Information System (SIAKAD) functions as the digital backbone, supported by Single Sign-On (SSO) capabilities. Institutionalization ensures interoperability between LMS, financial platforms, and library services, guaranteeing data consistency across all touchpoints. However, technological integration alone is insufficient without a centralized content governance framework. To support brand consistency, collaboration between IT, Marketing, and Academic departments is essential to maintain a ”single source of truth.” This cross-functional governance ensures that promotional messages on social media align perfectly with the information provided by academic staff, thereby eliminating discrepancies that often confuse prospective students.

From a marketing and recruitment perspective, the focus must shift towards orchestrating a seamless student journey and adapting to demographic preferences. Marketers are advised to map the entire lifecycle from prospect to alumnus to identify and repair critical transition points where integration failures often occur, such as the disconnect between a social media inquiry and an official registration portal. Furthermore, given that Generation Z prioritizes immediacy and accessibility, recruitment strategies must adopt a mobile-first philosophy. An intuitive, visually driven mobile interface for both academic portals and marketing channels is a strategic prerequisite to engaging digital-native students who expect an ”all-in-one” experience on their devices.

Ultimately, institutions should leverage the outcome of OCI highly engaged students as a strategic marketing asset. By transforming students into micro-influencers or brand advocates, universities can generate credible, organic promotion that resonates more effectively than traditional advertising. Marketers should actively monitor engagement metrics, such as sentiment analysis and sharing behaviors, to identify these advocates. By empowering engaged students to share their authentic experiences, institutions can amplify positive WOM, thereby enhancing institutional reputation and strengthening competitive positioning in an increasingly crowded higher education marketplace.

3.8. Research Limitations and Future Directions

Despite the comprehensive analysis presented, this systematic review highlights several limitations that delineate critical avenues for future inquiry. First, a significant gap exists regarding contextual specificity. The majority of OCI frameworks currently applied in higher education are adapted directly from commercial sectors (retail/banking) without sufficient validation for the educational environment [51]. Future research should prioritize the development and validation of OCI measurement scales specifically designed for higher education, capable of accommodating unique variables such as pedagogical dynamics, academic complexity, and accreditation standards [52].

Second, the literature currently lacks depth regarding demographic and generational heterogeneity. Research examining how distinct student cohorts, such as traditional Generation Z students versus mature, non-traditional learners, respond to OCI implementation remains limited [53]. Future studies should employ comparative analyses to understand cross-generational channel preferences, ensuring that integration strategies cater to diverse user groups effectively. Third, the issue of resource constraints is frequently overlooked. While large institutions may easily adopt sophisticated OCI systems, private universities with financial and technical limitations face distinct challenges. Consequently, future scholars are encouraged to explore ”frugal innovation” or phased implementation models that offer cost-effective OCI pathways for resource-constrained institutions [54].

Fourth, from a methodological perspective, the predominance of cross-sectional designs restricts the ability to capture the long-term effects of OCI. Since the student journey spans several years, longitudinal studies are urgently needed to understand how the impact of OCI on engagement and WOM evolves from enrollment to graduation [55]. Finally, existing studies tend to overemphasize positive outcomes, neglecting the potential ”dark side” of digitalization. Future research must critically examine negative externalities, such as digital burnout, ”technostress,” and digital exclusion among users with lower technological literacy, as well as the paradox between personalization and privacy concerns.

4. MANAGERIAL IMPLICATIONS

This systematic literature review synthesizes the fragmented body of knowledge regarding OCI within the higher education sector, offering a comprehensive framework for understanding its impact on student advocacy and sustainable educational development. The analysis of 74 eligible studies establishes that OCI in

universities is constructed upon four fundamental dimensions: Channel Service Configuration, Content Consistency, Assurance Quality, and Process Consistency. Collectively, these dimensions function not merely as technical attributes but as strategic value propositions that determine the quality, accessibility, and inclusiveness of the student experience in a digital-first era, thereby supporting the objectives of Sustainable Development Goal (SDG) 4: Quality Education.

Theoretical integration through Social Exchange Theory (SET) confirms that seamless channel integration significantly alters the cost–benefit analysis of student interactions. By reducing cognitive friction, minimizing procedural barriers, and mitigating security risks through assurance quality, OCI acts as an institutional "reward" that enhances perceived value and trust. Crucially, this review demonstrates that OCI does not generate positive Word-of-Mouth (WoM) in isolation. Instead, Student Engagement serves as the vital mediating variable; integrated omnichannel environments foster deeper engagement, which subsequently translates into voluntary advocacy behaviors. This relational mechanism reinforces long-term institutional reputation and stakeholder trust, aligning with SDG 17: Partnerships for the Goals through strengthened student–institution relationships and network-based advocacy.

For Higher HEIs, particularly those facing intensified competition and the evolving expectations of Generation Z, the transition toward an omnichannel model represents not only a strategic necessity but also a sustainable innovation pathway. The development of interoperable digital infrastructures, unified information systems, and consistent cross-channel processes reflects the principles of SDG 9: Industry, Innovation, and Infrastructure, positioning universities as resilient and innovation-driven institutions. Moving forward, HEIs must dismantle organizational silos, harmonize academic and administrative touchpoints, and leverage engaged students as authentic brand advocates. Ultimately, the successful implementation of OCI requires a paradigm shift from managing channels independently to orchestrating a unified, student-centric ecosystem that supports educational quality, institutional sustainability, and long-term societal impact.

5. CONCLUSION

This systematic literature review synthesizes the fragmented body of knowledge regarding OCI within the higher education sector, offering a comprehensive framework for understanding its impact on student advocacy. The analysis of 74 eligible studies establishes that OCI in universities is constructed upon four fundamental dimensions: Channel Service Configuration, Content Consistency, Assurance Quality, and Process Consistency. Collectively, these dimensions function not merely as technical attributes but as strategic value propositions that determine the quality of the student experience in a digital-first era.

Theoretical integration through SET confirms that seamless channel integration significantly alters the cost-benefit analysis of student interactions. By reducing cognitive friction, minimizing procedural barriers, and mitigating security risks (Assurance Quality), OCI acts as a "reward" mechanism. Crucially, the review demonstrates that OCI does not generate positive WOM in isolation. Instead, Student Engagement serves as the vital mediating variable; integration fosters deep engagement, which subsequently translates into voluntary advocacy.

For Higher Education Institutions, particularly those facing intensified competition and the unique demands of Generation Z, the transition to an omnichannel model is no longer optional but a strategic imperative. Moving forward, universities must dismantle organizational silos, harmonize academic and administrative touchpoints, and leverage engaged students as authentic brand advocates. Ultimately, the successful implementation of OCI requires a paradigm shift from managing channels independently to orchestrating a unified, student-centric ecosystem that fosters long-term loyalty and institutional reputation.

6. DECLARATIONS

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6.2. Author Contributions

Conceptualization: CS and AE; Methodology: BU; Software: CS and BU; Validation: AE and BU; Formal Analysis: CS and BU; Investigation: BU; Resources: CS; Data Curation: AE; Writing Original Draft Preparation: NR and AE; Writing Review and Editing: BU and CS; Visualization: AE. All authors, CS, BU, AE and NR, have read and agreed to the published version of the manuscript.

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