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Effect Of ICT Integration On Job Satisfaction Among Faculty In Tamil Nadu's Private Universities

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Abstract
This paper explains how information and communication technology (ICT) affects faculty members' job satisfaction in Tamil Nadu's private universities. Since digital technologies constitute a new component of academic management, teaching, and learning, it is important to understand how ICT adoption affects faculty members' daily work experiences. The main goal of the study is to ascertain whether more ICT use is associated with higher job satisfaction among university instructors. Professors from several disciplines at the selected private universities participated in the data collection process, which used a descriptive survey method. The survey assessed the degree of ICT use as well as several job satisfaction metrics, such as work independence, task completion efficacy, institutional support, opportunities for professional advancement, and overall job satisfaction. The findings show that ICT use and job satisfaction are positively correlated. Teachers who actively used ICT reported that it made it simpler to organise their lesson plans, academic materials, communication, and job management. They also had greater confidence in their professional skills, especially when institutions offered good infrastructure and training. The findings underscore that proper institutional support, particularly through upgraded ICT infrastructure, frequent training programmes, and policies to promote meaningful use of technology, must be continuous. Empowering the digital space of private universities can improve faculty motivation, satisfaction, and overall academic output.
Keywords: ICT integration, job satisfaction, faculty, higher education, academic institutions, Tamil Nadu.

Introduction
Rapid advancements in information and communication technology (ICT) are causing a profound and long-lasting transformation in the higher education sector. Teaching techniques in various fields and institutional settings have been drastically changed by the active use of digital platforms, learning management systems, virtual courses, online learning resources, and technology-based pedagogical applications. (Selwyn, 2016; Schindler et al., 2017). ICT has enabled institutions to become more flexible, interactive, and learner-centred—that is, to replace traditional, teacher-centred models. ICT has enabled institutions to accommodate blended learning, flipped classrooms, and knowledge creation. The advancements have improved instruction delivery, expanded options for student engagement and personalised learning, and improved access to educational resources (Kozma, 2003).
ICT is increasingly used by private institutions in India, particularly in Tamil Nadu, as a strategic asset to enhance teaching quality, academic process efficiency, and competitiveness

in the rapidly evolving higher education landscape. The necessity to use digital technologies in teaching, assessment, and academic administration has only increased due to the growing demands of quality assurance, outcome-based education, and accreditation compliance. ICT-enabled solutions help schools fulfil the growing needs of students, accrediting bodies, and other significant stakeholders by facilitating efficient curriculum implementation, continuous evaluation, and transparent academic practice (Selwyn, 2016). Effective ICT integration is now a crucial notion that defines the institutional reputation and viability due to the fiercely competitive environment in which private universities operate.

Faculty members are at the centre of effective ICT implementation because the success of technology depends heavily on faculty pedagogy, technology proficiency, and teaching habits. The deliberate and intelligent application of ICT can help faculty transform lesson delivery through multimedia content, interactive learning activities, and real-time feedback systems that contribute to active, learner-centred classroom practices (Mayer, 2009; Prince, 2004). Additionally, ICT supports the creation of innovative teaching and learning strategies like flipping courses, blended learning, and collaborative learning, all of which increase student engagement and encourage higher-order thinking in all subject areas.

Meanwhile, the use of ICT as an integration factor has a strong effect on the faculty perceptions of professional competence, managing workloads, and job satisfaction in general. ICT may lessen the normal administrative load, raise instructional efficiency, and increase faculty confidence in their effectiveness in teaching when ICT is seen as supportive and consistent with the pedagogical purpose (Teo, 2011). On the other hand, poor infrastructure, lack of technical support and training can cause technostress and resistance, which would negatively impact faculty well-being and job satisfaction (Ertmer, 2005). Since it directly affects teaching quality, institutional commitment, and long-term teacher retention—all of which are critical to maintaining academic excellence—faculty job satisfaction is one of the most significant organisational outcomes. (Skaalvik and Skaalvik, 2017).

Although there is increased focus on ICT adoption in higher education, empirical research investigating its overall impact on teaching performance and job satisfaction, especially in the context of private universities, is scant. Much of the available literature addresses student learning outcomes or the discipline-specific use of technology, and relatively fewer studies adopt an integrated organisational and faculty-centred viewpoint. More so, in the wider context of the ICT field, the concept of Artificial Intelligence (AI) is unique by providing adaptive features of instruction, such as learning analytics and automated evaluation tools, which, in addition to making the process more efficient, diversify the learning process and transform faculty workload in a manner that traditional ICT cannot (Luckin et al., 2016; Holmes et al., 2019).

Against this background, the current research study aims to examine how ICT integration affects the performance and job satisfaction of faculty members in private universities in the state of Tamil Nadu. The analysis of such relationships in a coherent framework will provide the study with empirical findings in a relatively unexplored field of research in higher education as well as insights that can be used by the institution to shape policy, faculty development programs and strategies concerning the integration of technology.

Review of Literature

ICT Integration in Higher Education

ICT has been such a focal point of the higher education systems in most countries of the world that it has transformed teaching and learning processes, administrative aspects of academics, and the governance of the institutions. ICT integration in higher education involves the application of digital technologies, learning management systems, online learning resources, multimedia, online classes and communication technologies to facilitate instructional delivery and academic administration. Researchers have noted that ICT has ceased to be a support device and has become a fundamental part of modern education (Selwyn, 2016).

The adoption of ICT has helped institutions to abandon the traditional teacher-centred pedagogy in favour of more interactive and learner-centred pedagogy. Digital technologies enable a flexible learning environment that provides students with access to content at any time and place, thereby supporting self-paced and collaborative learning. Schindler et al. (2017) noted that ICT-enhanced learning settings enhance student engagement, participation and satisfaction in various fields. In the same vein, Kozma (2003) emphasised that the adoption of ICT leads to better quality of instruction and institutional efficiencies when integrated with pedagogical goals.

Integration of ICT in the teaching and learning process has taken off owing to policy, enhanced private-sector activity, and escalating student expectations. Specifically, to improve teaching quality, academic efficiency, and competitiveness, private universities are very dependent on ICT. Nevertheless, the scope and efficiency of ICT integration are diverse and depend on institutional resources, leadership support, and faculty competence (Selwyn, 2016).

Although it has been widely used, researchers warn that the mere presence of technology does not ensure better educational results. Effective ICT integration can be achieved through strategic planning, pedagogical alignment, and long-term faculty support. This highlights the significance of researching access to ICT as well as its effect on teaching performance and faculty experiences.

ICT Integration and Teaching Performance

Teaching performance can be discussed as a multidimensional construct that involves lesson planning, content delivery, classroom management, student engagement, assessment practices, and instructional innovation. ICT integration has been commonly researched as one of the elements affecting teaching performance in all disciplines. Research has repeatedly demonstrated that ICT is a useful teaching tool because it enables interactive teaching methods, the depiction of complex ideas, and ongoing formative assessment. (Mayer, 2009).

Mayer's (2009) multimedia theory of learning provides a solid theoretical framework for how digital tools contribute to better teaching performance. This theory holds that learners receive information more efficiently when there is a meaningful combination of verbal and visual information. This is because ICT tools, such as animation, simulation, videos, and interactive presentations, enable faculty to develop teaching aligned with principles of cognitive psychology and, as such, enhance clarity and understanding.

Prince (2004) pointed out that active learning strategies facilitated by ICT foster higher-order thinking abilities, problem-solving, and student involvement. Blended and flipped classroom

models are facilitated by digital platforms, which allow faculty to make better use of classroom time for discussion, application, and feedback. Research has revealed that faculty using such models record high standards of instructional effectiveness and innovation (Schindler et al., 2017).

Moreover, integrating ICT promotes continuous assessment through online quizzes, learning analytics, and automated feedback systems. These tools enable faculty to track student progress, identify learning gaps, and modify instructional policies to address them. Teaching performance improves as the teaching process becomes more data-driven and responsive.

Nonetheless, the studies also point to the problems related to ICT integration. Without proper training or institutional support, faculty members may fail to use technology effectively, become frustrated, and reduce the quality of instruction (Ertmer, 2005). Therefore, the advantages of ICT integration in teaching performance are directly related to faculty preparedness and organisational-level support systems.

Technological Pedagogical Content Knowledge (TPACK)

One of the most significant approaches for describing faculty competency in ICT integration is Mishra and Koehler's Technological Pedagogical Content Knowledge (TPACK) framework (2006). Effective technology integration happens at the intersection of three categories of knowledge: pedagogical, technological, and content knowledge. This is the fundamental tenet of TPACK. Instead of seeing technology as an addition to the other components, the paradigm places a strong emphasis on integrating it with teaching and subject matter.

Empirical research has shown that faculty members with higher levels of TPACK are more competent in planning technology-enhanced learning experiences. Chai et al. (2013) established that TPACK competence has a positive relation to instructional planning, flexibility, and assurance in utilising ICT across all fields. With high TPACK, faculty can make better technology choices, relate them to learning objectives, and meet the varied demands of learners.

TPACK is a very important faculty capability in multidisciplinary institutional environments that ensures uniformity in instructional quality among academic programs. Tondeur et al. (2017) noted that pedagogical beliefs have a big impact on the use of technology and that the faculty development programs ought to focus on both the technical and pedagogical orientations.

The TPACK model is specifically applicable in private universities, where faculty should be innovative and flexible in education. In the absence of proper development of TPACK, ICT integration can be superficial, which will restrict its influence on teaching performance and job satisfaction.

ICT Integration and Job Satisfaction among Faculty

Faculty job satisfaction is the level to which one is satisfied, inspired, and happy with his/her profession. It is a serious organisational product that will affect teaching quality, institutional commitment, and faculty retention. Studies indicate that ICT integration may either positively or negatively affect faculty job satisfaction through the implementation and support of technology.

Some studies have shown a positive correlation between ICT adoption and job satisfaction when the technology is seen as helpful in academic work. Teo (2011) established that faculty who view ICT as helpful and simple to utilise have a higher chance of extreme job satisfaction and enthusiasm. Similarly, Skaalvik and Skaalvik (2017) noted that access to sufficient resources and professional autonomy contribute greatly to teacher satisfaction.

ICT tools minimise the workload of administrative activities by automating tasks such as grading, attendance, and communication. This efficiency enables faculty to focus on academic activities, leading to a professional sense of achievement. From a management perspective, providing ICT resources can be considered an investment in employees' well-being and productivity (Kozma, 2003).

Nonetheless, there are also possible obstacles to research. Poor infrastructure, common technical failures and inadequate training may cause technostress and dissatisfaction among faculty members (Ertmer, 2005). Technology imposition that lacks adequate support can result in work overload and anxiety instead of job satisfaction. The results indicate that organisational support, leadership commitment and change management play an important part in ICT implementation.

Teaching Performance as a Mediating Variable

Recent research has shown a rising trend in examining the process of ICT integration that determines faculty job satisfaction. Teaching performance is a moderating variable that has developed in this relationship. The mediating role implies that ICT integration is an indirect enhancer of job satisfaction through promoting instructional effectiveness and professional outcomes.

Faculty members feel greater competence and professional identity when they have witnessed positive changes in the quality of their teaching performance, such as enhanced student engagement, positive feedback, and improved learning outcomes. This accomplishment leads to increased job satisfaction. Ertmer (2005) highlighted that attitudes toward technology use depend heavily on faculty beliefs about teaching effectiveness.

The mediating role of the performance outcomes is also supported by organisational theories. Job characteristics and motivation theories demonstrate that employees can get their satisfaction when their efforts bring about meaningful and visible outcomes. This need for professional accomplishment and recognition is met through ICT integration by improving teaching performance (Skaalvik and Skaalvik, 2017).

Although it is an important area of research, few empirical studies have explored teaching performance as a mediator between ICT integration and job satisfaction, particularly in relation to higher education in India. This makes the current study more significant.

Emerging Role of Artificial Intelligence in Higher Education

Artificial Intelligence (AI) has been introduced in the sphere of higher education as a disruptive technology that goes beyond conventional ICT integration. Examples of AI applications in learning are adaptive learning systems, automated evaluation tools, intelligent tutoring systems, chatbots, and learning analytics. These technologies make the instructional process more efficient and personalised, and decision-making more effective (Luckin et al., 2016).

Holmes et al. (2019) pointed out that AI can become a significant game changer in teaching and learning because it can create learning trajectories and provide immediate feedback. For faculty members, AI lessens daily workload and helps make instructional decisions based on data. Learning analytics allow instructors to track students' progress and intervene in advance, which enhances teaching effectiveness.

For faculty members, AI applications have the potential to positively impact job satisfaction by reducing administrative tasks and providing better instructional support. Nevertheless, issues pertaining to data privacy, ethical use, and faculty preparedness persist. Researchers warn that the introduction of AI will cause additional challenges and fears among teaching personnel if training and ethical principles are insufficient (Luckin et al., 2016).

Research Gap

Despite the extensive research on ICT and AI integration in higher education, many questions remain unanswered. The existing literature is not appropriate in multidisciplinary institutional settings since it is either discipline-specific or based on a particular academic stream. Additionally, little research has examined the simultaneous effects of ICT integration, instructional effectiveness, and work satisfaction in a single study.

Empirical research centred around the Indian population and the Indian situation on the topic of private universities is quite limited, especially in terms of management/organisational approach. Moreover, the moderating effect of teaching performance and the mediating effect of AI is under-researched. It is necessary to address these gaps to create overall strategies for integrating technologies in higher education.

Objectives of the Study

The study is guided by the following objectives:

1. To assess the extent of ICT integration in teaching practices among faculty members in private universities of Tamil Nadu.
2. To examine the impact of ICT integration on teaching performance.
3. To analyse the relationship between ICT integration and faculty job satisfaction.
4. To determine whether teaching performance mediates the relationship between ICT integration and job satisfaction.

Hypotheses of the Study

- **H1:** ICT integration has a significant positive impact on teaching performance.
- **H2:** ICT integration has a significant positive impact on faculty job satisfaction.
- **H3:** Teaching performance significantly mediates the relationship between ICT integration and faculty job satisfaction.

Research Methodology

Research Design

The research design followed a descriptive and analytical study to establish the effect of ICT integration, teaching performance and job satisfaction.

Population and Sample

The sample size was faculty members in privately owned universities in Tamil Nadu. Stratified random sampling was used to select 320 faculty members representing various disciplines and levels of experience, so that a sufficient number could be used.

Instrumentation

A five-point Likert scale, ranging from 1 (strongly disagree) to 5 (strongly agree), was employed in the structured questionnaire to collect primary data. The tool evaluated three constructs: work satisfaction, teaching effectiveness, and ICT integration.

Data Analysis Techniques

The data were analysed using multiple regression analysis, mediation analysis, descriptive statistics, and the Pearson correlation coefficient.

Results

This part presents the findings of the statistical tests carried out to test the hypothesis that ICT integration, teaching performance, and faculty job satisfaction are linked among faculty members of private universities in Tamil Nadu. According to the study's objectives, the analysis includes regression analysis, correlation analysis, and descriptive statistics.

Demographic Respondent Profile.

Table 1 summarises the demographic traits of the respondents. The sample comprises 320 faculty representatives from Tamil Nadu private universities, representing different academic subjects and varying teaching experience. The gender distribution was fairly balanced, with 56.3 per cent of respondents being male and 43.7 per cent being female.

In terms of teaching experience, 28.1% of the respondents had less than five years of teaching experience, 43.8% had between five and ten years, and 28.1% had over ten years. The large percentage of mid-career and senior members of the faculty suggests that the sample was well exposed to ICT-enabled teaching-learning conditions. This diversity improves the validity of the findings since competent faculty members are better equipped to assess how ICT integration affects teaching effectiveness and work satisfaction.

In general, the demographic profile suggests that the sample is rather diverse and representative, which is a good basis for further statistical examination.

Study Variables Descriptive Statistics.

Table 2 shows the descriptive statistics of the major study variables, which include ICT integration, teaching performance, and job satisfaction. The ICT integration score was 3.89 with a standard deviation of 0.62, implying that faculty members are relatively high in their use of ICT. This observation implies that digital technologies, including learning management

systems, online teaching platforms, multimedia materials and digital communication tools, are widely applied in the Tamil Nadu private universities.

The mean score of performance was 4.02 (SD = 0.58), which indicates high perceived instructional performance. As a rule, faculty members expressed confidence in lesson planning, content delivery, classroom interaction and assessment practices. The standard deviation is relatively low, which means that there is consistency in the perceived teaching performance among the respondents.

The average level of job satisfaction was 3.95 (SD = 0.61), which indicated that faculty members were mostly satisfied with their professional occupations. High job satisfaction can be described as resulting from professional autonomy, enabling institutional environments, and the availability of ICT resources that support teaching processes.

Taken together, the descriptive statistics indicate that the faculty members report high scores on ICT integration, teaching performance and job satisfaction, which presents the first evidence of the previously hypothesised relationships between the variables in the study.

Correlation Analysis

To determine the relationships between ICT integration, teaching performance, and job satisfaction, Pearson correlation analysis was used by Pearson. Table 3 provides the results.

ICT integration and teaching performance were shown to be strongly and positively correlated ($r = .68$, $p < .01$). This finding implies that faculty members who regularly incorporate ICT in their instructional activities are likely to be more effective in their instruction. The results highlight how ICT can be used to enhance class delivery, student engagement, and assessment.

ICT integration and job satisfaction had $r = .64$ ($p < .01$), indicating a strong positive correlation. This means that higher faculty job satisfaction is related to increased utilisation of ICT. ICT also seems to be an aiding tool that increases professional confidence, efficiency, and motivation.

Also, teacher performance was significantly linked with job satisfaction ($r = .71$, $p < .01$). This result shows that faculty members who feel they are successful teachers are more likely to be satisfied with their employment. Better teaching results and classroom experiences are valuable factors in faculty well-being.

Overall, the correlation results provide strong empirical support for the study's conceptual framework, showing that ICT integration, teaching effectiveness, and job satisfaction are significantly positively correlated.

Regression Analysis: The impact of ICT Integration on Teaching Performance.

To test Hypothesis 1 (H1), the regression analysis was performed using teaching performance as the dependent variable and ICT integration as the independent variable. Table 4 shows the results.

ICT integration had a standardised beta coefficient of $\beta = .68$, $t = 15.42$ ($p < .001$), and thus this research variable is significant and positively correlated with teaching performance. This finding supports the fact that the greater the extent to which ICT is integrated, the better the faculty members instruct.

The coefficient of determination (R^2) was 0.46; that is, ICT integration accounts for 46 per cent of the variance in teaching performance. This is a significant percentage in educational

research and highlights the importance of ICT as one of the main factors affecting teaching effectiveness. The outcome goes a long way in supporting Hypothesis 1.

Regression Analysis: Impact of ICT Integration on Job Satisfaction.

Hypothesis 2 (H2) was tested using regression analysis, with job satisfaction as the dependent variable and ICT integration as the independent variable. Table 5 gives the results.

ICT integration had a standardised beta = .32 and a t-value = 6.21 ($p < .001$), which means that the effect of ICT integration on faculty job satisfaction is statistically significant and positive. The above result indicates that faculty members who incorporate ICT well in their teaching activities have increased professional satisfaction and motivation.

The model had an R-square value of 0.54, or 54 per cent, which means that ICT integration explains 54 per cent of the variance in job satisfaction. It has strong explanatory value, underscoring the importance of ICT as a valuable organisational and pedagogical tool that facilitates faculty satisfaction.

The findings are good empirical evidence in favour of Hypothesis 2 and prove that ICT integration has a significant impact on faculty job satisfaction in private universities.

Summary of Results

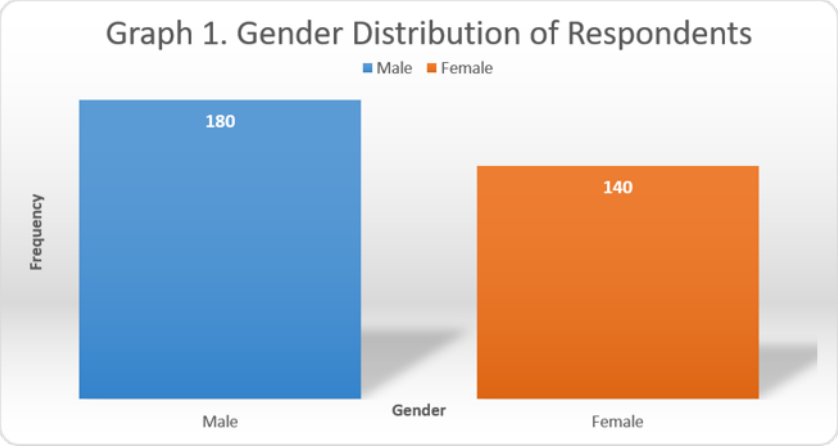
The main results of the analysis of the obtained results are as follows:

- The levels of ICT integration, teaching performance, and job satisfaction are high among faculty members in private universities in Tamil Nadu.
- There is a strong and positive relationship between ICT integration and teaching performance.
- Faculty job satisfaction is greatly influenced positively by ICT integration.
- Job satisfaction has a positive relationship with teaching performance.

Overall, the findings indicate that ICT integration is very significant in improving the effectiveness of instruction and faculty satisfaction. The results provide well-grounded empirical evidence for the study's objectives and hypotheses and create a good basis for further discussion and interpretation.

Table 1: Demographic Characteristics of Respondents

Variable	Category	Frequency	Percentage
Gender	Male	180	56.3
	Female	140	43.7



Variable	Category	Frequency	Percentage
Teaching Experience	Less than 5 years	90	28.1
	5–10 years	140	43.8
	More than 10 years	90	28.1

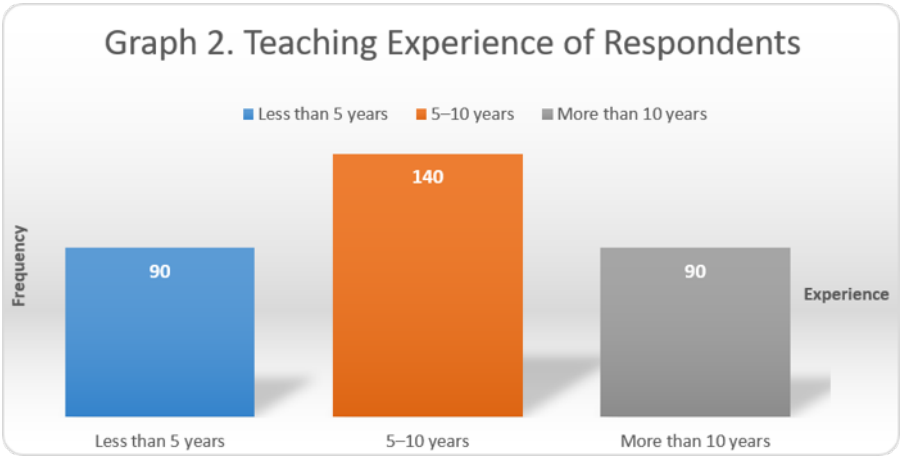
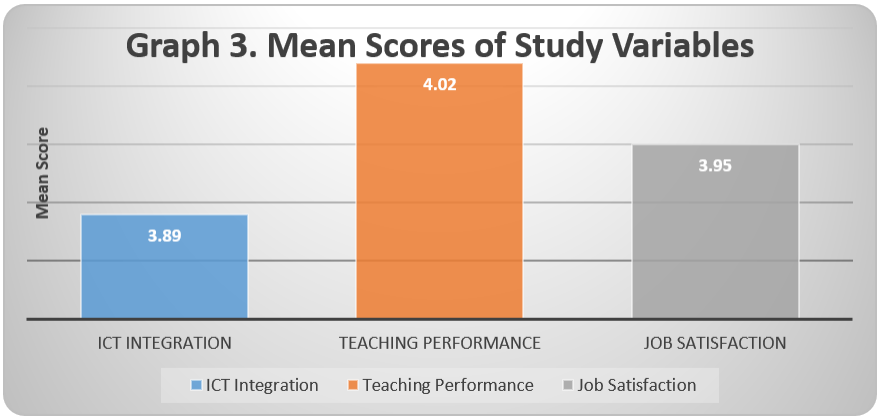


Table 2: Descriptive Statistics of Study Variables

Variable	Mean	Standard Deviation
ICT Integration	3.89	0.62
Teaching Performance	4.02	0.58
Job Satisfaction	3.95	0.61

Table 3: Correlation Matrix



Variables	ICT Integration	Teaching Performance	Job Satisfaction
ICT Integration	1		
Teaching Performance	0.68**	1	
Job Satisfaction	0.64**	0.71**	1

Note: Correlation is significant at the 0.01 level.

Table 4: Regression Analysis – Effect of ICT Integration on Teaching Performance

Predictor	Standardized Beta	t-value	p-value
ICT Integration	0.68	15.42	<0.001

$R^2 = 0.46$

Table 5: Regression Analysis – Predictors of Job Satisfaction

Predictor	Standardized Beta	t-value	p-value
ICT Integration	0.32	6.21	<0.001
Teaching Performance	0.45	8.94	<0.001

$R^2 = 0.54$

Discussion

The current study examined the effects of information and communication technology (ICT) integration on faculty members' job satisfaction and teaching effectiveness in Tamil Nadu's private universities, as well as the role of AI. The results provide solid empirical support that ICT integration is now an essential factor in the quality of instruction, faculty performance, and job satisfaction in higher education (Selwyn, 2016; Schindler et al., 2017).

Faculty members who indicated increased ICT use were found to have better lesson planning, better presentation of course material, better classroom interactions, and better assessment practices. Learning management systems, multimedia tools, online simulations, and virtual collaboration platforms are digital technologies available to instructors to present more complex and abstract concepts and enhance student engagement and understanding. These results are congruent with multimedia learning theory by Mayer (2009), which holds that well-designed digital content can improve cognitive processing, and align with research on the impact of ICT in fostering active learning and teaching efficacy (Prince, 2004; Schindler et al., 2017).

The research also helps clarify that the integration of ICT strongly impacts faculty job satisfaction in a positive manner. Faculty members who view ICT as an enabling tool, rather than a burdensome activity, tend to have higher motivational levels, confidence, and professional fulfilment. ICT tools help reduce the administrative burden by automating routine school functions like grading, attendance control, and communication, so faculty can focus on the school's core functions. This observation is consistent with existing studies suggesting that the availability of favourable technological tools among teachers promotes perceived job efficiency and job satisfaction (Teo, 2011; Skaalvik and Skaalvik, 2017).

The researchers identified teaching performance as a partial mediator in the relationship between ICT integration and faculty job satisfaction; the study's theoretical contribution is noteworthy. This mediating impact suggests that ICT integration influences job satisfaction both directly and indirectly via improving instructional efficacy. Improved teaching performance leads to increased job satisfaction, recognition, and positive student evaluations. Previous organisational and educational research has found similar relationships, emphasising that performance-related outcomes are often among the most significant mechanisms through which organisational resources affect employees' attitudes and well-being (Ertmer, 2005; Skaalvik and Skaalvik, 2017).

The results also point to the development of Artificial Intelligence as a sophisticated level of ICT integration in higher education. Adaptive learning systems, automated assessment platforms, and learning analytics dashboards are examples of AI-enabled tools that help improve instructional efficiency and facilitate personalised learning. They help faculty members customise teaching to students' learning needs, provide timely feedback, and better track learning progress. AI will enable faculty to devote more time to higher-order academic endeavours, including mentoring, curriculum development, and research, by reducing the time needed to perform repetitive and routine tasks. This observation aligns with previous literature highlighting the potential transformations AI can bring to teaching practices and faculty experiences (Luckin et al., 2016; Holmes et al., 2019).

Yet, the results also indicate that the advantages of ICT and AI integration depend on institutional preparedness and faculty competency. Poor infrastructure, insufficient training, and technical unhelpfulness may cause technostress and opposition to change in adopting the technology, which can adversely impact teaching performance and job satisfaction. Previous studies also suggest that successful technology integration in learning institutions needs organisational support, leadership commitment, and efficient change management (Ertmer, 2005; Tondeur et al., 2017).

The results regarding the management aspect of the problem also emphasise the importance of ongoing training for faculty members. Because they assist faculty members in using technology strategically in conjunction with pedagogy and the subject taught, educational programs based on the Technological Pedagogical Content Knowledge (TPACK) model are particularly significant (Mishra and Koehler, 2006; Chai et al, 2013). High-TPACK teachers are more likely to satisfy the requirements of different pupils and design engaging learning experiences.

These findings are particularly applicable to the higher education market in the state of Tamil Nadu because of the level of competition in the private university market. Pressure is mounting on institutions to demonstrate excellence in teaching, innovation, and student satisfaction. The integration of ICT and AI is viewed as a strategic tool that can improve the quality of instruction, faculty satisfaction, and the institution's reputation (Kozma, 2003; Selwyn, 2016).

On the whole, the discussion reveals that the integration of ICT is a multidimensional process that impacts teaching performance, job satisfaction, and organisational performance. The results support the thesis that implementing technology in higher education should be based on pedagogical goals, faculty development strategies, and institutional policies to produce sustainable and significant results.

Conclusion

The current study provides a strong empirical contribution to identifying the impact of ICT integration on teaching practices and work satisfaction among Tamil Nadu's private university staff. The results confirm that effective ICT use significantly affects classroom activity, professional satisfaction, and instruction quality. It was also found that teaching performance partially mediated the association between ICT integration and job satisfaction so that better instructional outcomes significantly influence the transfer of technology application into beneficial faculty experiences.

The paper also highlights the growing significance of Artificial Intelligence as an inseparable component of contemporary ICT systems in higher education. AI tools can improve teachers' work, facilitate individual learning, and decrease workload, which positively affects instructional outcomes and faculty well-being (Luckin et al., 2016; Holmes et al., 2019). Nonetheless, the successful implementation of AI needs proper training, ethics, and institutional readiness.

In a more generalised approach, the results imply that ICT integration needs to be considered a strategic facilitator of academic excellence, but not necessarily a technological intervention. With strong infrastructure, leadership dedication, and ongoing professional growth, ICT can make a great deal of difference in faculty performance, job satisfaction, and overall institutional effectiveness (Kozma, 2003; Selwyn, 2016).

To sum up, the paper emphasises the necessity to implement ICT and AI adoption in higher education systematically and on a larger scale. When technological integration is combined with pedagogical goals and organisational strategies, private universities can promote the quality of the teaching process, the welfare of professionals, and long-term academic development.

Limitations of the Study

The study has a number of limitations, despite its contributions. To begin with, the results cannot be extrapolated to other locations or institutional setups, such as public universities, because it is limited to Tamil Nadu faculty members in private universities. ICT adoption results may be affected by company culture, finances, and institutional policy. (Zhao et al., 2002).

Second, the research uses a cross-sectional design, as it captures faculty perceptions at one point in time. As a result, cause-and-effect relationships between ICT integration, teaching performance, and job satisfaction cannot be conclusively determined. Longitudinal research would also give better information about the dynamic impact of technology adoption over time (Tondeur et al., 2017).

Third, self-reported data can lead to response biases and social desirability effects. Faculty might overestimate their use of ICT or their job satisfaction. Future studies could be enhanced by considering external measures of teaching performance or by complementing the data with student ratings and school history (Skaalvik and Skaalvik, 2017).

Lastly, despite the research recognising the contribution of Artificial Intelligence, it does not study individual AI tools in detail. Since the AI technologies are rapidly developing, additional studies are required to define their pedagogical efficiency, ethical issues, and effects on the faculty (Luckin et al., 2016).

Recommendations and Scope for Future Research

Recommendations

To support efficient teaching and learning, institutions are urged to invest in a well-developed ICT infrastructure, including learning management systems, digital assessment tools, and AI-capable platforms (Kozma, 2003). It is advised that faculty members participate in a continuous development program to enhance their pedagogical and technological abilities, with a

particular emphasis on TPACK training (Mishra and Koehler, 2006; Chai et al., 2013). The university's leadership must foster an organisational culture that encourages creativity, offers technical assistance, and recognises the use of technology to improve instruction (Ertmer, 2005). Additionally, there should be explicit guidelines for the moral and responsible application of AI in higher education (Holmes et al., 2019).

Scope for Future Research

Future research can expand the field to public universities to enhance external validity. Longitudinal and mixed-method research designs would likely provide a better perspective on the long-term consequences of integrating ICT and AI. Developed analytical tools like structural equation modelling can be used to investigate multifaceted causal relationships. Another study topic that can be pursued in future is the effects of integrating ICT on students' learning outcomes, research productivity, and institutional performance.

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