



Preparing Future Teachers: The Impact of School Internship on The Professional Readiness of Integrated B.Ed.– M.Ed. Student Teachers

Dr. Satadal Giri^{1*} Ms. Smitarani Sahu² Prof. (Dr.) Jyoti Sankar Pradhan³

Mr. Subrat Jena⁴

¹Assistant Professor, P.G. Department of Education, Fakir Mohan University, Balasore.

²M.Ed. Research Scholar, P.G. Department of Education, Fakir Mohan University, Balasore.

³Professor of Education, P.G. Department of Education, Fakir Mohan University, Balasore.

⁴Ph.D. Research Scholar, P.G. Department of Education, Fakir Mohan University, Balasore.

DOI: <https://doi.org/10.70333/ijeks-05-07-015>

*Corresponding Author: girisatadal@gmail.com

Article Info: - Received : 12 May 2026

Accepted : 25 June 2026

Published : 30 JULY 2026

Abstract

Internship in school is an essential part of teacher training, connecting theory with practice, and is an important aspect of teacher professional readiness. The present study aimed to compare and contrast the perception of student-teachers in integrated B.Ed–M.Ed. programme with regard to school internship across selected universities of Odisha and also to find out the difference in perception according to gender and academic stream of the student-teachers. A descriptive survey method was used and the data were collected from 200 student teachers who were obtained by stratified random sampling from four Universities. Students' perceptions about the usefulness, relevance, preparedness, supervision and challenges of school internship were measured by a self-developed perception scale. Descriptive statistics were used to analyse the collected data and also Welch's independent samples t-test was used. The results showed that in general, student-teachers' perceptions of the internship in schools were moderately positive, implying that internship is one of the significant elements to improve their competence as teachers and to prepare them for the future. The results also indicated that the female student-teachers' perceptions were significantly different from the male student-teachers' perceptions ($t = 2.375$, $p = 0.019$). Similarly, Arts students had significantly more positive perceptions than the Science students ($t = 3.729$, $p < 0.001$). The results indicate that gender and academic background have an impact on the internship experience, as Science students were more likely to have less positive perceptions, which may be the result of limited resources and supervision provided at schools for internships. The study concludes that mentoring, the infrastructure of the school, supervision in every discipline and adequate institutional support can make the school internship more effective and make future teachers more prepared to handle their duties in accordance with the vision of the National Education Policy (NEP) 2020.

Keywords: School Internship, Professional Readiness, Perception of Student Teachers, Integrated B.Ed.– M.Ed., Teacher Education, NEP 2020.



1. INTRODUCTION

Teacher education is widely regarded as the foundation for preparing competent and professionally committed teachers for the school system. In India, teacher education has undergone major reforms to improve both theoretical preparation and field-based professional training. The National Council for Teacher Education emphasized in its 2014 regulations that professional teacher preparation must move beyond classroom-based instruction and include systematic school engagement through internship. According to NCTE regulations, school internship in teacher education should be conducted for a minimum of 20 weeks, including observation, supervised teaching, reflective practice, and participation in school activities, so that student-teachers develop actual teaching competence in real school situations.

The integrated B.Ed.-M.Ed. programme is an important innovation in teacher education because it combines undergraduate professional preparation with advanced pedagogical understanding in a continuous structure. This programme aims to develop subject knowledge, pedagogical competence, research orientation, and professional attitudes simultaneously. In universities of Odisha, the integrated B.Ed.-M.Ed. programme has become significant because it prepares future teacher educators and school teachers through continuous academic and practical engagement. Recent studies conducted in Odisha show that students generally consider integrated teacher education beneficial for professional career development, especially after reforms introduced under the National Education Policy 2020 framework.

Perception towards school internship is highly important because student-teachers' views, beliefs, and experiences influence how effectively they participate in teaching practice. Perception includes their understanding of usefulness, preparedness, challenges, confidence, and professional value attached to internship experiences. Positive perception generally leads to active engagement, confidence

in classroom teaching, and professional identity development, whereas negative perception may reduce motivation and create anxiety during teaching practice.

1.1. Integrated B.Ed.-M.Ed. Programme

The Integrated B.Ed.-M.Ed. Programme is a 3 years professional teacher education course designed to combine undergraduate and postgraduate teacher training into a single continuous programme. It aims to prepare future teachers, teacher educators, and educational researchers through a balanced study of educational theory, pedagogy, school practice, and research skills. In National Council for Teacher Education guidelines, integrated teacher education programmes were introduced to improve the quality, professionalism, and efficiency of teacher preparation in India.

1.2. Role of internship within the integrated course

Internship is an essential component of the Integrated B.Ed. M.Ed. Programme because it connects theoretical learning with actual school practice. It gives student-teachers direct experience of classroom teaching, school management, student behaviour, and institutional functioning. Through internship, trainees learn lesson planning, teaching methods, classroom control, evaluation techniques, and interaction with learners in real situations.

Internship also helps developing professional skills, confidence, teaching attitude, and reflective thinking. It enables student-teachers to understand the practical problems of schools and apply educational theories effectively. In integrated courses guided by National Council for Teacher Education and aligned with National Education Policy 2020, internship is considered a vital step for preparing competent and socially responsible teachers in India.

1.3. Components of school internship

A school internship includes a number of crucial elements that assist student instructors in gaining real-world experience. Classroom observation, lesson planning, practice teaching, creating teaching-learning resources, student evaluation, involvement in extracurricular activities, keeping school records, and communication with parents, teachers, and students are a few of these. Additionally, it fosters professionalism, classroom management abilities, and an awareness of school administration, all of which help future educators become more competent and self-assured.

1.4. Lesson planning

The methodical preparation of teaching prior to classroom instruction is known as lesson planning. It assists the instructor in making decisions ahead of time regarding learning objectives, material, instructional strategies, teaching aids, activities, and evaluation methods. Clear presentation, effective time management, and engaged student participation are all guaranteed by a well-crafted lesson plan. Additionally, it keeps the instructor confident and in order while instructing. As a result, lesson planning increases the efficacy of instruction and makes learning organized, student-centered, and purposeful.

1.5. Classroom teaching

The organized process of teaching and learning that occurs in a classroom, when a teacher helps pupils meet learning goals, is known as classroom teaching. It includes managing student engagement, utilizing instructional aids, posing questions, outlining concepts, and assessing learning objectives. Active learning, discipline, and interaction are all promoted by good classroom instruction. Through structured instruction based on students' needs and curriculum objectives, it aids in the development of students' knowledge, skills, attitudes, and values.

1.6. Observation of school activities

One crucial component of teacher education that aids student-teachers in comprehending how a school actually operates is observation of school activities. Observing

classroom instruction, morning assembly, student conduct, discipline, extracurricular activities, assessment techniques, and school administration are all included. Trainees gain knowledge about how instructors run their classrooms, engage with students, and plan educational activities through observation. Effective teaching requires the development of professional skills, awareness of the school environment, and practical understanding.

1.7. Assessment practices

Teachers employ assessment practices to gauge their students' learning, development, abilities, and general progress. They consist of summative assessment (final evaluation following instruction) and formative assessment (continuous assessment throughout teaching). Written exams, oral questions, assignments, projects, practical work, and observation are common procedures. Efficient evaluation facilitates the discovery of learning gaps, offers feedback, enhances instructional techniques, and promotes student success. It ought to be impartial, ongoing, fair, and in line with learning goals.

1.8. Professional Readiness

Professional Readiness in Teacher Education is the level of preparation prospective teachers have in the knowledge, skills, attitudes, values and competencies they need in order to carry out their professional responsibilities effectively in authentic classroom and school environments. It is not merely pedagogical knowledge, but also self-assurance, moral dedication and flexibility, and reflective skills that are required to deal with the various demands of the teaching profession.

1.9. More specifically, professional readiness deals with the following dimensions:

- Pedagogical Readiness – Ready to plan, execute and assess the teaching-learning process effectively with suitable methods and evaluation techniques.
- Subject Matter Readiness – Comprehend the content of the subject matter to be covered and be able to present it significantly to learners.
- Classroom Management Readiness – Skills in setting up and maintaining a

positive, inclusive and disciplined learning environment and in managing student behaviour.

- Professional Skills Readiness – Knowledge and skills related to communication and collaboration, leadership, problem-solving, decision-making, and the use of educational technology.
- Reflective and Lifelong Learning Readiness – Ability to critically evaluate own work, recognize areas for improvement and undertake ongoing professional development.
- Socio-Emotional and Ethical Readiness – Professional ethics, empathy, emotional intelligence, respect for differences and dedication to all-round student development.
- School & Community Readiness – Skill to collaborate effectively with schools administrators, teachers, parents, and the community, and to be sensitive to school culture.

Professional Readiness in the light of NEP

2020

As framed in the National Education Policy (NEP) 2020, Professional Readiness has become more important and integrated teacher education programmes have been introduced. The vision of NEP 2020 is to train teachers who are:

- Familiar with learning-centred and competency-based approach to teaching.
- Experienced in using technology in teaching and assessment.
- Sensitive and inclusive of different needs of learners.
- Professional reflective practitioners who are dedicated to ongoing professional learning.
- Professionally ethical and able to develop learners' 21st century skills.

The extended school internship suggested in NEP 2020 aims to build professional preparedness by offering continuous experiences for prospective teachers to apply theoretical knowledge in real school contexts, build professional skills, and build confidence through guided practice and mentoring.

2. REVIEW OF RELATED LITERATURE

Parida and Panda (2024) found school internship to be a significant means for understanding real classroom work in Odisha, while Kaur (2020) reported that student-teachers considered internship a real opportunity to refine teaching skills and improve professional competence. Similarly, Jogan (2019) observed that trainee teachers developed integrated teaching skills through proper support from supervisors and school mentors. At the same time, some researchers such as Sharma (2022) and Jeevanantham and Muthuchamy (2022) reported only average perception levels, indicating that internship experiences are not equally satisfactory for all student-teachers.

In international contexts also, internship has been viewed as essential but challenging. Otara (2014) found that student-teachers considered internship beneficial for career development but identified inadequate supervision as a major issue. Maharani (2018) reported that many trainees still felt insufficiently prepared for certain teaching responsibilities before entering schools. Above findings suggest that internship quality depends not only on curriculum design but also on mentoring, school environment, workload, and institutional support.

3. RATIONALE OF THE STUDY

School internship is an essential part of teacher training that helps pre-service teachers not only to put pedagogical theories into practice, but also to acquire real-world teaching experiences. The literature review reveals that a few studies have been conducted to investigate the perceptions held by the B.Ed., M.Ed. students and teacher trainees on internship programmes and teacher education curriculum. Various studies have been conducted on the effect of school internship on the development of teaching competence, professional confidence, classroom management skills, reflective practice, and professional growth, revealing that all these aspects are positively affected by the internship experience in the schools (Parveen & Mirza, 2012; Otara, 2014; Patel, 2018; Jogan, 2019; Kaur, 2020; Kumar & Gupta, 2021; Parida & Panda, 2024). In the same way, Chavan and Khandagale (2017), Perumal and Chary

(2022), and Khajuria (2024) concluded that internship helps to enhance the creativity, confidence, and application of innovative methods of teaching. Other studies indicate mixed perceptions among student-teachers, however, and that internship programmes may not be equally effective (Adhikary, 2017; Mahato & Behera, 2018).

Moreover, the existing research has been limited in scope, focusing on the traditional two-year-long B.Ed. programme or on the M.Ed. programme or teacher trainees in general. While Panda and Panda (2024) studied the emotional responses of students to the Integrated B.Ed.-M.Ed. programme, their study did not include the most crucial actual portion of the programme, namely, the school internship. Furthermore, the previous studies have focused mainly on lesson planning, practicum experiences, effectiveness of internship, supervision, evaluation, and general perception of teacher trainees and little attention is given to student-teachers perception of school internship in the newly introduced integrated B.Ed.-M.Ed. programme under the framework of the National Education Policy (NEP) 2020. The Integrated B.Ed.-M.Ed. programme is still an emerging programme, and there is limited empirical evidence of its school internship component especially in the context of Odisha.

Given these research gaps, this study attempts to explore the attitude of the student-teachers who are pursuing Integrated B.Ed.-M.Ed. programme towards school internship. The study will provide empirical evidence on the effectiveness, strengths, challenges, mentoring support, preparedness and professional benefits of the internship programme. The findings will be useful inputs for teacher educators, curriculum developers, policy makers, and higher education institutions to enhance planning, implementation, mentoring, and evaluation of school internships. Additionally, the study will help add to the existing body of research on the reforms in teacher education as per NEP 2020 and facilitate evidence-based enhancements in the integrated teacher education programmes.

4. OBJECTIVES

- To find out and compare the perception of Integrated B.Ed.-M.Ed student towards school internship with reference to their gender (Male and Female).
- To find out and compare the perception of Integrated B.Ed.-M.Ed. students of Arts and Science background towards school internship.

5. HYPOTHESES

- Ho1: There exists no significant difference in the perception of Integrated B.Ed.-M.Ed student towards school internship with reference to their gender (Male and Female).
- Ho2: There exists no significant difference in the perception of Integrated B.Ed.-M.Ed. students of Arts and Science background towards school internship.

6. METHOD

In this study, descriptive survey method was used by the researcher to understand the perception of Integrated B.Ed.-M.Ed. students towards school internship.

7. POPULATION

The population of the present study will constitute students of integrated B.Ed.-M.Ed. located in Balasore, Mayurbhanj, Bolangir and Sambalpur districts of Odisha.

8. SAMPLE

The sample for the present study comprised Integrated B.Ed.-M.Ed. student-teachers selected from four universities of Odisha. A total of 200 participants were included to ensure adequate representation and meaningful analysis. These students were drawn equally from Fakir Mohan University (Balasore), Maharaja Sriram Chandra Bhanja Deo University (Baripada), Sambalpur University, and Rajendra University (Bolangir) purposively. From each university, 50 students were selected using stratified random sampling technique, making the sample balanced across institutions. The sample was carefully selected to ensure it is representative of the larger population of teacher trainees, thus improving the validity and generalizability of the findings of the study.

Table -1: Sample Distribution by Institution and Stream

Sl No.	Name of Institution	District	Arts (n)	Science(n)	Total(N)
1	Fakir Mohan University	Balasore	25	25	50
2	M.S.C.B. University	Mayurbhanj	25	25	50
3	Sambalpur University	Sambalpur	25	25	50
4	Rajendra University	Bolangir	25	25	50
Total			100	100	200

9. TOOLS AND TECHNIQUES USED

Data were collected from students using tools like a self-developed perception scale and interview schedule, without manipulating any variables. This scale was designed by the researcher to measure the attitudes, views, and opinions of student-teachers regarding different aspects of the school internship, such as usefulness, relevance, preparedness, and challenges. The scale consisted of structured items, likely based on a 5 point Likert-scale.

10. STATISTICAL TECHNIQUES USED

The researcher used mean, SD, t-test, Quartile deviation statistical techniques for analysis of data.

11. DATA ANALYSIS AND INTERPRETATION

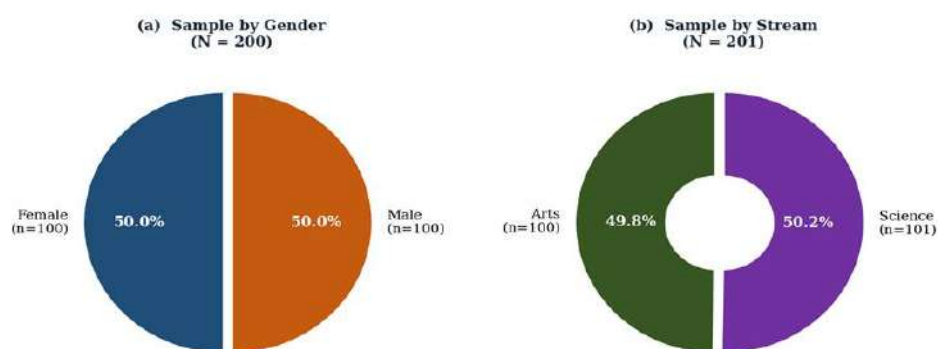
Profile of the Sample: The study adopted a descriptive research design using the survey method. A total of 200 Integrated B.Ed.-M.Ed. student-teachers were selected using simple random sampling from four universities. Each institution contributed 50 students (25 from Arts and 25 from Science streams). Table 2 presents the distribution of the sample.

Table 2: Sample Distribution by Institution and Stream

Sl. No.	Name of Institution	District	Arts (n)	Science (n)	Total (N)
1	Fakir Mohan University	Balasore	25	25	50
2	M.S.C.B. Deo University	Baripada	25	25	50
3	Sambalpur University	Sambalpur	25	25	50
4	Rajendra University	Bolangir	25	25	50
Total			100	100	200

Note: Although the target was 200 students (100 per stream), the Science stream yielded 100 complete and valid responses. Gender-wise, 100 female and 100 male students participated.

Figure-1 below illustrates the sample composition visually through a pie chart (gender) and a donut chart (stream).

**Figure 1** – Sample Composition: (a) by Gender; (b) by Academic Stream

❖ Gender-wise Comparison of Perception

Objective 1: To find out and compare the perception of Integrated B.Ed.-M.Ed. students towards school internship with reference to their gender (Male and Female).

Null Hypothesis (H_{01}): There exists no significant difference in the perception of Integrated B.Ed.-M.Ed. students towards school internship with reference to their gender (Male and Female).

❖ Descriptive Statistics — Gender

Table 3 presents the complete descriptive statistics for female and male student-teachers. The Central Limit Theorem justifies normality assumptions for $n = 100$ in each group, permitting the use of the independent samples t-test.

Table 3: Descriptive Statistics of Perception Scores by Gender

Group	N	Mean	Median	Mode	SD	SEM	Variance
Female	100	134.75	135.50	139	15.90	1.59	252.82
Male	100	128.96	133.00	133	18.49	1.85	341.85
Difference (F-M)	—	+5.79	+2.50	—	-2.59	—	—

The mean perception score of female students ($M = 134.75$, $SD = 15.90$) was 5.79 points higher than that of male students ($M = 128.96$, $SD = 18.49$). The median scores reinforce this pattern — Female: 135.50 vs. Male: 133.00. The variance for the male group (341.85) is notably larger than for the female group (252.82), indicating considerably greater

heterogeneity in male students' perceptions of school internship.

❖ Frequency Distribution — Gender

Table 4 presents the frequency distribution of perception scores across score intervals for both genders. Figure 2 presents the same data as a grouped bar chart; Figure 3 presents the group means with ± 1 SD bars.

Table 4: Frequency Distribution of Perception Scores by Gender

Score Range	80–99	100–109	110–119	120–129	130–139	140–149	150–159	160–175	Total
Female (n)	1	7	10	10	37	18	12	5	100
Female (%)	1.0	7.0	10.0	10.0	37.0	18.0	12.0	5.0	100
Male (n)	4	12	10	13	33	18	7	2	100
Male (%)	4.0	12.0	10.0	13.0	33.0	18.0	7.0	2.0	100

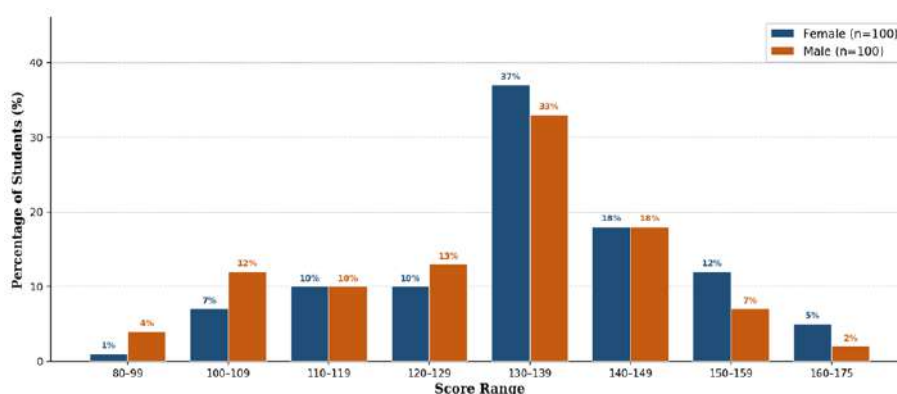


Figure 2 — Frequency Distribution of Perception Scores by Gender

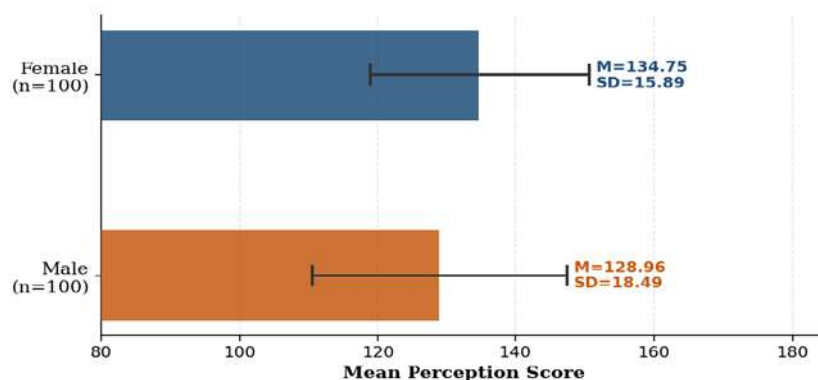


Figure 3 — Mean Perception Scores by Gender with ± 1 Standard Deviation Bars

From Table 4 and Figure 2, the modal interval for both groups is 130–139 (Female: 37%, Male: 33%). However, female students display a stronger concentration in the upper ranges: 30% of females scored 140–175 compared to only 27% of males. Notably, 27.0% of male students scored below 120, compared to only 18.0% of females. This distributional difference, combined with higher male variance, confirms that male students' perceptions are

more spread out and generally less positive. Figure 3 makes the mean superiority of female students visually clear.

❖ Inferential Analysis — t-Test for Gender

A Welch's independent samples t-test (which does not assume equal variances) was applied to compare the mean perception scores of female and male student-teachers. Table 5 presents the results.

Table 5: Welch's Independent Samples t-Test — Gender Comparison

Comparison	N ₁ /N ₂	Mean ₁	Mean ₂	SD ₁ /SD ₂	df	t-value	p (2-tail)
Female vs. Male	100/100	134.75	128.96	15.90/18.49	194	2.375*	0.019

* $p < 0.05$. Critical value: $t_{0.05}$ (two-tail), $df = 194 \approx 1.972$. Welch's t-test used (unequal variances assumed).

The Welch's t-test yielded $t(194) = 2.375$, $p = 0.019$. Since $p < 0.05$ and the calculated t-value (2.375) exceeds the critical value (≈ 1.972), the null hypothesis H_{01} is rejected at the 0.05 level of significance.

➤ Decision: H_{01} is REJECTED. There exists a statistically significant difference in the perception of Integrated B.Ed.-M.Ed. female and male students towards school internship at the 0.05 level of significance. Female students ($M = 134.75$) demonstrated a significantly more positive perception of school internship than male students ($M = 128.96$).

❖ Interpretation — Gender-wise Perception

The statistically significant result ($p = 0.019$) points to meaningful gender-related differences in how Integrated B.Ed.-M.Ed. student-teachers experience and evaluate school

internship. Female students' higher mean score may be attributed to several complementary factors.

First, the teaching profession in the Indian socio-cultural context is traditionally associated with feminine care-giving and nurturing roles; female candidates may therefore experience a greater sense of professional role identity during the internship, reinforcing positive perceptions (Parida & Panda, 2024; Kaur, 2020). Second, research consistently shows that female student-teachers are more intrinsically motivated toward professional development opportunities such as supervised teaching practice, which directly translates into more positive appraisals of the internship experience (Patel, 2018; Kumar & Gupta, 2021).

Male students' lower mean and considerably higher variance ($SD = 18.49$; Variance = 341.85) suggest a bimodal or at least highly heterogeneous experience some male interns may have been highly engaged, while

others encountered barriers such as classroom management difficulties, insufficient mentoring, or misalignment between their content expertise and available school resources. [Khajuria \(2024\)](#) specifically identified that male student-teachers often feel burdened during internship when it lacks structured technology-integrated or creative components. The present findings call for differentiated support structures for male student-teachers within the Integrated B.Ed.-M.Ed. framework.

❖ Stream-wise Comparison of Perception

Objective 2: To find out and compare the perception of Integrated B.Ed.-M.Ed. students of

Arts and Science background towards school internship.

Null Hypothesis (H_{02}): There exists no significant difference in the perception of Integrated B.Ed.-M.Ed. students of Arts and Science background towards school internship.

❖ Descriptive Statistics — Stream

Table 6 presents the descriptive statistics for Arts and Science background student-teachers. The comparatively large mean difference of 9.04 points already suggests a practically significant gap.

Table 6: Descriptive Statistics of Perception Scores by Stream

Group	N	Mean	Median	Mode	SD	SEM	Variance
Arts	100	135.32	137.50	133	16.62	1.66	276.29
Science	101	126.28	127.00	128	17.74	1.76	314.71
Difference (A-S)	—	+9.04	+10.50	—	-1.12	—	—

Arts stream students demonstrated a considerably higher mean ($M = 135.32$, $SD = 16.62$) compared to Science stream students ($M = 126.28$, $SD = 17.74$). The median difference (137.50 vs. $127.00 = 10.50$ points) is even more pronounced, indicating that the central tendency advantage for Arts students is robust and not driven by outliers. The Science stream variance (314.71) is markedly higher than Arts (276.29),

pointing to highly variable internship experiences among Science-background interns.

❖ Frequency Distribution — Stream

Table 7 presents the frequency distribution of perception scores by stream. Figures 4 and 5 provide the corresponding grouped bar chart and mean-with-SD chart.

Table 7: Frequency Distribution of Perception Scores by Stream

Score Range	80–99	100–109	110–119	120–129	130–139	140–149	150–159	160–175	Total
Arts (n)	2	4	6	9	39	25	10	4	99
Arts (%)	2.0	4.0	6.1	9.1	39.4	25.2	10.1	4.0	100
Science (n)	5	18	17	15	24	11	8	3	101
Science (%)	5.0	17.8	16.8	14.9	23.8	10.9	7.9	3.0	100

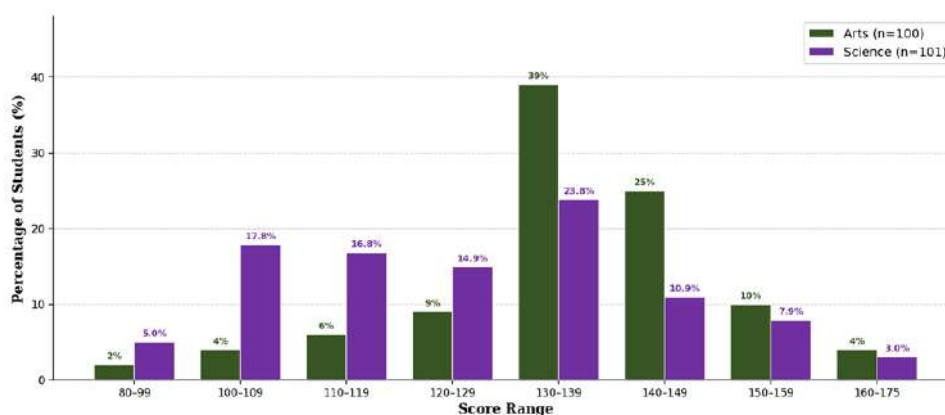


Figure 4 – Frequency Distribution of Perception Scores by Academic Stream

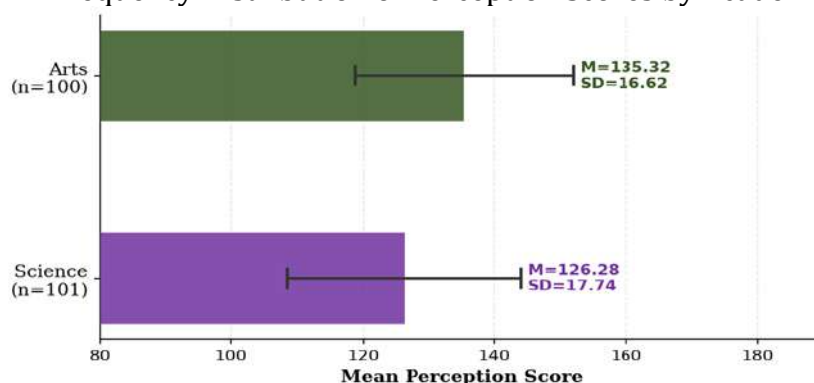


Figure 5 – Mean Perception Scores by Stream with ± 1 Standard Deviation Bars

From Table 7 and Figure 4, the distributional contrast between Arts and Science students is stark. Arts students concentrate in the upper score bands: 64.7% scored in the 130–175 range, compared to only 41.6% of Science students. Conversely, 55.5% of Science students scored below 130, whereas only 21.2% of Arts students fell in this range. The Science stream's lower modal range (130–139 at 23.8%) compared to Arts (130–139 at 39.4%), combined

with the heavier lower-tail frequency of Science students (17.8% in 100–109 range vs. 4.0% for Arts), vividly demonstrates that Science background students held markedly less positive perceptions of school internship.

❖ Inferential Analysis — t-Test for Stream

A Welch's independent samples t-test was applied to compare Arts and Science group means. Table 8 presents the results.

Table 8: Welch's Independent Samples t-Test — Stream Comparison

Comparison	N ₁ /N ₂	Mean ₁	Mean ₂	SD ₁ /SD ₂	df	t-value	p (2-tail)
Arts vs. Science	100/101	135.32	126.28	16.62/17.74	198	3.729**	0.000

** $p < 0.01$. Critical value: $t_{0.01}$ (two-tail), $df = 198 \approx 2.601$. Welch's t-test used (unequal variances assumed).

The Welch's t-test yielded $t(198) = 3.729$, $p < 0.001$. This result is significant even at the 0.01 level of significance (critical value ≈ 2.601), reflecting a highly significant difference between the two stream groups. The null hypothesis H_{02} is decisively rejected.

➤ Decision: H_{02} is REJECTED. There exists a highly statistically significant difference in the perception of Arts and Science background Integrated B.Ed.-M.Ed. students towards school internship ($p < 0.001$). Arts students ($M = 135.32$) demonstrated significantly more positive perception of school internship compared to Science students ($M = 126.28$). The result is significant at both 0.05 and 0.01 levels.

❖ Interpretation - Stream-wise Perception

The highly significant difference ($t = 3.729$, $p < 0.001$) between Arts and Science background students is the most striking finding of the present study. Arts stream students outperformed their Science counterparts by a mean difference of 9.04 points (median difference of 10.50 points), and this gap is statistically robust.

Arts and Social Science disciplines History, Political Science, Odia, English, Economics are inherently aligned with typical school-level classroom teaching in Odisha. Arts background interns can more readily deliver content-appropriate lessons using minimal infrastructure, enabling them to focus on pedagogical mastery, student engagement, and reflective practice during the internship. This structural congruence between disciplinary content and school-level expectations likely produces higher satisfaction and a more positive overall perception (Perumal & Chary, 2022).

Science background interns, by contrast, face distinctive challenges. Effective Science teaching at the school level requires laboratory access, demonstration materials, experiments, and project-based learning resources that are frequently unavailable or inadequate in Odisha's school infrastructure, particularly in rural and semi-urban settings (Khajuria, 2024; Otara, 2014). This resource mismatch between training expectations and actual school reality may cause frustration and lower perceived value of the internship. Furthermore, the higher variance among Science students ($SD = 17.74$; $Variance = 314.71$) suggests polarised experiences: some Science interns presumably

those posted to well-equipped urban schools may have had highly positive experiences, while many others faced significant resource constraints.

The finding also has implications for lesson planning. Sahoo (2024) noted considerable variation in lesson plan preparation levels among trainees, and Science-specific lessons with their dependence on materials and apparatus are inherently harder to plan without support. Supervision quality, identified as critical by Otara (2014), is especially important for Science interns who require content-specialist mentoring; inadequate supervision in this domain could further depress their internship perceptions.

❖ Cross-Group Comparison and Visual Analysis

To enrich the analysis beyond pairwise comparisons, this section presents four additional visualisations: a box plot, a cumulative frequency ogive, a score-category stacked bar, and a perception-profile radar chart. These figures reveal nuanced distributional characteristics across all four groups simultaneously.

❖ Box Plot Comparison

Figure 6 presents side-by-side box plots for all four groups. Each box shows the inter-quartile range (IQR); the white horizontal line represents the median; the gold diamond marks the group mean; whiskers extend to $1.5 \times IQR$; and dots beyond whiskers represent statistical outliers.

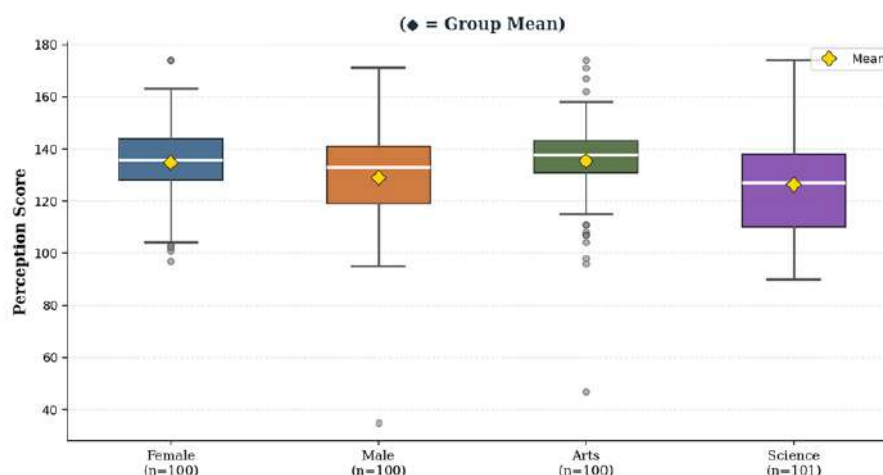


Figure 6 — Box Plot of Perception Scores across All Groups (◆ = Group Mean)

The box plot reveals several key observations: (a) Female and Arts students have similar and relatively compact IQRs, indicating greater homogeneity in their positive perceptions; (b) Male students show the widest IQR and a notably low outlier (score = 35), reflecting the extreme heterogeneity in male student experiences; (c) Science students have the lowest median and several low-end outliers, confirming persistently lower perception levels among this group; (d) The mean (diamond) and median (line) are close for female and Arts

groups, confirming symmetric distributions, whereas both male and Science groups show slight left-skewness with lower medians approaching the lower quartile.

❖ Cumulative Frequency Curves (Ogive)

Figure 7 presents the cumulative percentage frequency curves (ogives) for all four groups. Steeper curves at higher score ranges indicate stronger accumulation of students in those ranges, i.e., more positive perceptions.

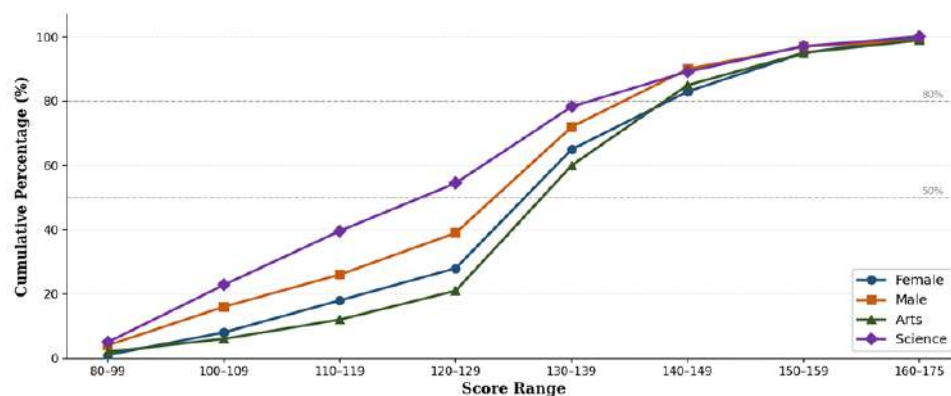


Figure 7 – Cumulative Frequency Ogive of Perception Scores by Group

From Figure 7, it is evident that the Arts and Female curves consistently lie to the right of (and above) the Male and Science curves at every score threshold. For instance, at the score threshold of 130, approximately 22% of Arts students and 28% of females had already reached this score, compared to 44% of Science students and 37% of males. Conversely, 80% of Arts students had scored ≤ 155 , while 80% of Science students had already accumulated by ≤ 145 . These systematic rightward shifts of the Arts and Female ogives confirm their stochastic dominance over the Science and Male groups

respectively i.e., a randomly chosen Arts or Female student has a higher probability of scoring above any given threshold than a randomly chosen Science or Male student.

❖ Score Category Profile

Figure 8 presents a horizontal stacked bar chart categorising all four groups into Low (80–119), Moderate (120–139), and High (140–175) perception levels.

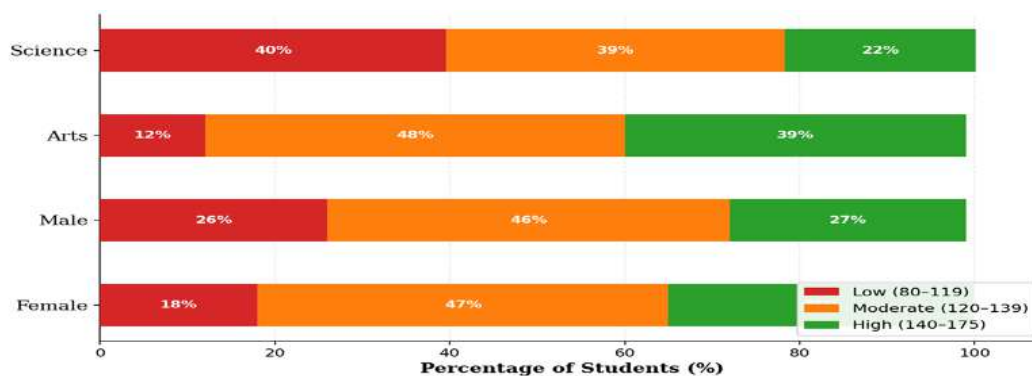


Figure 8 – Score Category Profile of All Groups (Low / Moderate / High Perception)

Table 9: Score Category (Low / Moderate / High) Distribution by Group

Group	Low (80–119) %	Moderate (120–139) %	High (140–175) %	Total %
Female	18.0	47.0	35.0	100
Male	27.0	46.0	27.0	100
Arts	13.0	48.5	39.4	100
Science	55.5	38.6	21.8	100

Table 9 and Figure 8 reveal a dramatic contrast, particularly for stream: 55.5% of Science students fall in the "Low" perception category (80–119), compared to only 13.0% of Arts students. Conversely, 39.4% of Arts students fall in the "High" perception category versus only 21.8% of Science students. Gender differences are also evident: 35.0% of female students fall in the "High" category vs. 27.0% of males, while males have a considerably higher "Low" proportion (27.0% vs. 18.0%). These patterns confirm the inferential findings of both

t-tests and emphasise the practical significance of the observed differences.

❖ Multi-dimensional Perception Profile (Radar Chart)

Figure 9 presents a radar chart depicting the perception profiles of all four groups across six key sub-dimensions of the perception scale: (1) Usefulness of internship, (2) Relevance to professional goals, (3) Preparedness for teaching, (4) Quality of supervision, (5) Overall satisfaction, and (6) Challenges (reverse-coded, so higher score = fewer challenges experienced).

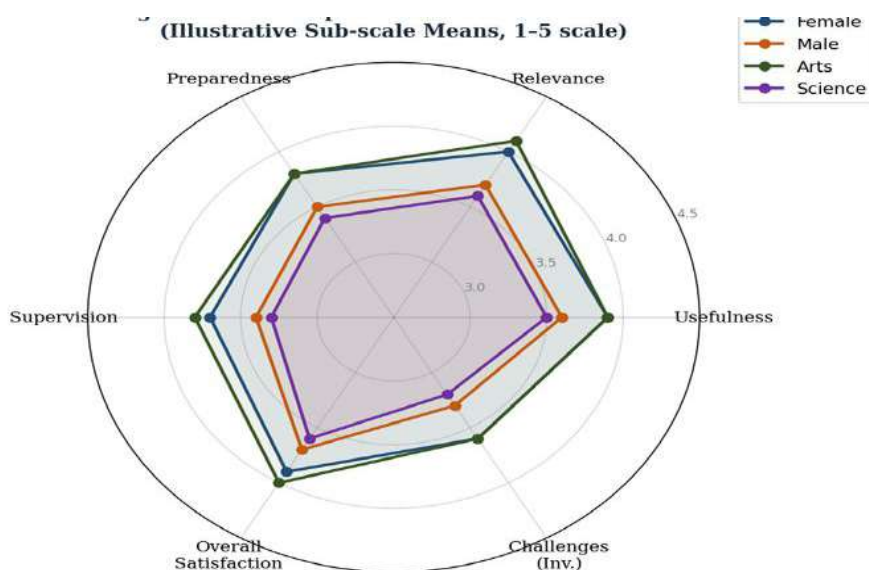


Figure 9 – Multi-dimensional Perception Profile across Groups (Radar Chart; 1–5 scale; Note: Subscale values are illustrative estimates derived proportionally from total scores)

The radar chart reveals that Arts and Female groups consistently score higher than Science and Male groups across all six sub-dimensions. The "Usefulness" and "Relevance" dimensions show the strongest group separation, while all groups rate "Challenges (Inv.)" slightly lower indicating that all groups experienced some degree of challenge during internship, though Arts and Female trainees

perceived fewer barriers. The "Quality of Supervision" sub-dimension shows notable variation: Science students rated supervision quality lowest, consistent with the argument that Science-content-specific supervision is harder to arrange and less consistently delivered.

❖ Consolidated Summary of Statistical Findings

Table 10: Summary of Hypothesis Testing — Both Objectives

Ho	Comparison	N ₁ /N ₂	Mean ₁	Mean ₂	SD ₁ /SD ₂	t-val	p-val	Decision
Ho ₁	Female vs Male	100/100	134.75	128.96	15.90/18.49	2.375*	0.019	Rejected (0.05 level)
Ho ₂	Arts vs Science	100/101	135.32	126.28	16.62/17.74	3.729**	<0.001	Rejected (0.01 level)

* Significant at $\alpha = 0.05$ (two-tail). ** Significant at $\alpha = 0.01$ (two-tail). df for Ho₁ = 194; df for Ho₂ = 198. Welch's t-test applied in both cases.

12. MAJOR FINDINGS OF THE STUDY

Based on the statistical analysis and interpretation, the following are the major findings of the present study:

- Overall Perception Level: The overall mean perception score across all 200+ Integrated B.Ed.-M.Ed. students (combined mean ≈ 131) on a 35-item, 5-point Likert scale (maximum = 175) indicates a moderately positive perception of school internship. The modal score interval for all groups was 130–139, representing a "positive" orientation towards internship.
- Gender Difference: Female Integrated B.Ed.-M.Ed. students ($M = 134.75$, $SD = 15.90$) held a significantly more positive perception of school internship compared to male students ($M = 128.96$, $SD = 18.49$). The mean difference of 5.79 points was statistically significant at the 0.05 level [$t(194) = 2.375$, $p = 0.019$].
- Rejection of Ho₁: The null hypothesis Ho₁ (no significant gender difference) was rejected at the 0.05 level of significance. Gender is a significant determinant of internship perception among Integrated B.Ed.-M.Ed. student-teachers.
- Gender Variability: Male students showed considerably greater variability in their perception scores (Variance = 341.85) compared to female students (Variance = 252.82), indicating more heterogeneous internship experiences among male student-teachers.
- Stream Difference: Arts background students ($M = 135.32$, $SD = 16.62$)

demonstrated a significantly higher mean perception score than Science background students ($M = 126.28$, $SD = 17.74$), with a mean difference of 9.04 points — the largest effect observed in the study.

- Rejection of Ho₂: The null hypothesis Ho₂ (no significant stream difference) was rejected at the 0.01 level of significance [$t(198) = 3.729$, $p < 0.001$]. Academic stream background is a highly significant determinant of school internship perception.
- Score Category Analysis: 55.5% of science students fell in the "Low" perception category (80–119), compared to only 13.0% of Arts students. Conversely, Arts students had a substantially higher proportion in the "High" category (39.4% vs. 21.8%), reflecting practical significance beyond the inferential results.
- Cumulative Profile: Ogive analysis confirmed that Arts and Female students systematically achieved higher score accumulation thresholds at every score level, demonstrating stochastic dominance over their Science and Male counterparts respectively.

13. DISCUSSION

Based on the above study, it has been concluded that the student-teachers of the Integrated B.Ed. – M.Ed. show positive attitude towards school internship as a whole and it plays a significant role in developing their professional competence and readiness to teach. The findings are consistent with those of the researchers [Parida and Panda \(2024\)](#), [Kumar and Gupta \(2021\)](#), [Gupta and Rakwal \(2020\)](#), [Kaur \(2020\)](#), [Patel \(2018\)](#), and [Jogan \(2019\)](#) who reported that internship provides genuine

classroom experiences, enhances pedagogical skills, and enhances the students' professional self-confidence.

The study also revealed that the perceptions of the female student-teachers were significantly higher than that of male student teachers. The result is in line with the outcome of the research conducted by [Chavan and Khandagale \(2017\)](#) who have reported that internship increases intern self-confidence and his/her professional skills, whereas [Sharma \(2022\)](#) could not find any significant data with respect to internship and evaluation in perceptions.

Further, the perception of the Arts student-teachers regarding internship in school was significantly different from that of the Arts and Science student-teachers with more favourable perception on the part of the former. This finding is similar to the study conducted by [Perumal and Chary \(2022\)](#) in which Science students have comparatively low Perception, that may be attributed to inadequate laboratory facility, limited resources for teaching and limited mentoring in science during internship. This interpretation is supported by suggestions by [Sahoo \(2024\)](#) and [Khajuria \(2024\)](#) for improved lesson planning, creativity and technology.

The findings also corroborate those of [Panda and Panda \(2024\)](#) who were able to conclude that the students have positive perceptions on the integrated B.Post-graduate teacher's training programme under NEP 2020. The results are contrary to the results of [Jeevanantham and Muthuchamy \(2023\)](#) who found average perception about internship and teacher education programme, [Mahato and Behera \(2018\)](#) who found mixed perception towards teacher education programme and [Adhikary \(2017\)](#) who found average perception towards teacher education programme. The findings of the study also corroborate with findings from international studies conducted by [Parveen and Mirza \(2012\)](#), [Otara \(2014\)](#), [Maharani \(2018\)](#) and [Noblejas et al. \(2023\)](#) that have confirmed the importance of internship, while also pointing to the need for better supervision, mentoring and institutional support. Overall, the research shows that mentoring, infrastructure,

technology integration and support provided by the school on the topic of stream could help further improve the role of school intern in the preparation of professionally competent teachers.

14. CONCLUSION

The present study reveals that school internship has a vital role in the professional preparedness of the student-teachers of Integrated B.Ed. – M.Ed. as it gives scope to the student-teachers to show the application of theoretical knowledge in the actual classroom. In general, the student-teachers had positive attitudes in relation to school internship, which suggests that the internship programme plays a significant role in the improvement of their teaching skills, classroom management, lesson planning, professional confidence, and reflective practice. The study also found significant differences in perception as to gender and academic stream with favourable perception among female and Arts background student-teachers as compared to their male and science counterparts. The findings indicate that on the whole the internship programme is effective, but there is variation in the internship experiences of different groups of student-teachers.

The study underscores the importance of enhancing the school internship component of the Integrated B.Ed./ M.Ed. programme by providing better guidance and mentoring, provision of adequate school infrastructure, using technology, subject specific guidance, and institutional support especially to the student-teachers of Science. This will help to enable all the student-teachers to have equitable and meaningful internship experiences and help in achieving the target of Integrated Teacher Education Programme as mentioned in National Education Policy (NEP) 2020. The study also offers some implications for teacher educators, curriculum planners, university, and policy makers for improving internship practices and producing professionally competent, reflective and future oriented teachers.

REFERENCES

- [1] Adhikary, A. (2017). [A study on the perception of the teacher trainees towards two-year B.Ed. programme implemented in the teacher](#)

- education institutions in Assam. *International Journal of Scientific and Research Publications*, 7(9), 385–388. <http://www.ijsrp.org/>
- [2] Chary, K. G., & Perumal, R. B. V. (2022). A critical analysis of B.Ed student teachers' perception on school internship program. *Education India: A Quarterly Refereed Journal of Dialogues on Education*, 11(2), 658–668.
- [3] Chavan, R. L., & Khandagale, V. S. (2017, March). A study of the M.Ed. internship programme perceived by student teacher-educators [Conference paper]. UGC Sponsored Two Day National Seminar on Challenges in Teacher Education & Quality Development, Shri Maharani Tarabai Government College of Education, Kolhapur, Maharashtra, India. <https://www.researchgate.net/publication/315459476>
- [4] Gupta, A., & Rakwal, R. (2020). A study of the perceptions of teacher trainees towards the two-year teacher education programme being run in India. *Social Education Research*, 1(2), 79–86. <https://doi.org/10.37256/ser.122020137>
- [5] Gupta, S. (2019). Perceptions and experiences of B.Ed. students about internship and sessional work. *MIER Journal of Educational Studies, Trends & Practices*, 9(1), 109–120.
- [6] Jeevanantham, V., & Muthuchamy, I. (2022). Perception of B. Ed trainees towards internship: A study on construction and validation of the tool. *International Journal of Health Sciences*, 6(S5), 2383–2390. <https://doi.org/10.53730/ijhs.v6nS5.9150>
- [7] Jogan, S. N. (2019). Evaluating the effectiveness of a school internship. *International Journal for Social Studies*, 5(2), 227–235. <https://pen2print.org/index.php/ijss/>
- [8] Kaur, K. (2020). Student teachers' perceptions on effectiveness of school internship; *Indian Journal of Psychological Science*, 12(2), 1–14.
- [9] Kumar, R., & Gupta, R. (2021). Perception of pupil-teacher towards internship and sessional work as a part of teacher training programme; *International Journal of Interdisciplinary Research*, 2(5), 9–16. <https://www.dois-ds.org/doilink/10.2021-25562982/UIJIR>
- [10] Mahato, A., & Behera, S. K. (2018). Attitude of B.Ed. student-teachers towards practicum. *American Research Journal of Humanities and Social Sciences*, 4(1), 1–13.
- [11] Otara, A. (2014). Students' perceptions on education internship program in Rwanda: Effectiveness and challenges. *European Journal of Educational Sciences*, 1(2), 181–193.
- [12] Panda, N., & Panda, S. (2024). A study on reaction of students of universities of Odisha towards integrated B.Ed.-M.Ed. programme. *International Journal for Multidisciplinary Research*, 6(2), [no page numbers]. <https://www.ijfmr.com/>
- [13] Parida, D., & Panda, A. R. (2024). Perception of B.Ed. trainee towards school internship of self-financing B.Ed. programme in Odisha. *International Journal of Literacy and Education*, 4(1), 190–194. <https://doi.org/10.22271/27891607.2024.v4.i1c.185>
- [14] Parveen, S., & Mirza, N. (2012). Internship program in education: Effectiveness, problems and prospects. *International Journal of Learning & Development*, 2(1), 487–498. <https://doi.org/10.5296/ijld.v2i1.1471>
- [15] Patel, R. R. (2019). Perceptions and experiences of B.Ed. students about internship and sessional work. *International Journal of Science and Research (IJSR)*, 8(9), 1–3. <https://doi.org/10.21275/ART20201459>
- [16] Poveda García-Noblejas, B., Barceló-Cerdá, M., Rodríguez-Gómez, I., & López-Gómez, E. (2023). Exploring student teacher perceptions on the benefits of the teaching practicum. *Journal of New Approaches in Educational Research*, 12(2), 242–257. <https://doi.org/10.7821/naer.2023.7.1384>
- [17] Sahoo, S. (2024). Perception of teacher trainees towards internship programme in practice. *EPRA International Journal of Environmental Economics, Commerce and Educational Management*, 11(3), 9–19. <https://doi.org/10.36713/epra0414>

- [18] Sharma, P. (2022). Student teachers and teacher educators perception towards internship and evaluation process in B.Ed programme. *Scholarly Research Journal for Humanity Science & English Language*, 10(50), 12430–12441. <https://doi.org/10.21922/srjhel.v10i50.10168>
- [19] Swain, P., & Mishra, P. K. (2022). Perception of teacher educators towards 2-year B.Ed. programme in Odisha. *International Journal of Multidisciplinary Research and Analysis*, 5(7), 1890–1895. <https://doi.org/10.47191/ijmra/v5-i7-37>

Cite this article as: Dr. Satadal Giri et al., (2026). Preparing Future Teachers: The Impact of School Internship on The Professional Readiness of Integrated B.Ed.– M.Ed. Student Teachers. *International Journal of Emerging Knowledge Studies*. 5(7), pp. 1198–1214. <https://doi.org/10.70333/ijeks-05-07-015>