Vol 43, No. 2 (2026): October 2026 | DOI: https://doi.org/10.15294/jpp.v43i2.62995

Jurnal Penelitian Pendidikan

http://journal.unnes.ac.id/journals/JPP
© Universitas Negeri Semarang. This is an open-access article under the CC Attribution 4.0 International License.

# Total Quality Management in Higher Education Learning: A Qualitative Study of Student Competency Development at the University of Darussalam Gontor

Fatimah Ilma Darojat*, Latifah Dhiahana, Dewi Ratih, Syarifah, Alwi Yusron

*Universitas Darussalam Gontor, Ponorogo, Indonesia*

*Corresponding Author: fatimahhilma27@gmail.com

**Abstract**

This research seeks to investigate the application of Total Quality Management in the learning process in higher education and its role in developing student competencies at the University of Darussalam Gontor. A qualitative descriptive research design was utilized to examine how TQM principles were implemented and experienced by students during the learning process. Data were collected through semi-structured interviews, observations, and documentation involving students, lecturers, and an academic manager. Data analysis involved data condensation, coding, categorization, thematization, and interpretation. Source and technique triangulation were used to strengthen the credibility of the findings. Three main themes emerged: total involvement, competency development, and quality culture. Students' involvement in discussion, observation, presentation, cooperation, and feedback provided opportunities to develop critical thinking, communication, collaboration, and problem-solving skills. Evaluation, feedback, recognition, and reflection also supported the development of a quality-oriented learning culture. Because the study employed a qualitative descriptive design, the findings explain how learning practices facilitate competency development rather than statistically measuring changes in competency.

**Keywords:** *higher education; qualitative study; quality culture; student involvement; total quality management*

## INTRODUCTION

Increasingly, educational institutions are expected to ensure not only the quality of academic services but also the development of graduates who possess the knowledge, skills, and competencies required in complex professional and social environments. Quality in higher education therefore extends beyond institutional accreditation and administration to include the quality of educational processes and the competencies developed by students. Total Quality Management (TQM) offers a holistic approach to quality management because it emphasizes continuous improvement, stakeholder involvement, process orientation, and organizational commitment to quality. Recent studies indicate that TQM remains relevant to higher education because quality improvement requires attention to institutional management, academic processes, and systematic evaluation (Aljuwaiber, 2022; Ali & Shastri, 2021).

Research on TQM in higher education has examined quality models, organizational barriers, stakeholder orientation, accreditation, and mechanisms for quality improvement (Ali & Shastri, 2021; Ali et al., 2022). Other studies have emphasized managerial commitment, organizational participation, process improvement, and alignment between institutional objectives and educational services (Idan, 2023; Ramadhani, 2024). These studies demonstrate that TQM can provide a framework for improving institutional quality. However, the learning process remains an important domain in which quality principles are experienced directly by students through participation, communication, collaboration, problem solving, feedback, and reflection.

Student competency development is particularly important because higher education institutions are expected to prepare students for future professional and social environments. Competencies such as critical thinking, communication, collaboration, problem solving, and the application of knowledge in real-world contexts have become important dimensions of educational quality. From a TQM perspective, these competencies can be supported when students participate actively in learning processes that emphasize teamwork, feedback, problem solving, evaluation, and continuous improvement. Marpaung et al. (2023) demonstrate the potential for connecting TQM with competency-based approaches, although much of the existing literature remains focused on institutional systems and model development.

Despite the growing body of research on TQM in higher education, previous studies have predominantly examined TQM from institutional and managerial perspectives, including quality assurance systems, accreditation, organizational barriers, management models, and institutional performance (Ali & Shastri, 2021; Ali et al., 2022; Andrade-Girón et al., 2023). Comparatively less attention has been given to how TQM principles are enacted in everyday learning processes and how these practices relate to student competency development. Existing studies have discussed competency-based approaches and TQM models, but limited empirical evidence explains how students experience TQM-oriented learning through participation, discussion, presentation, collaboration, feedback, and evaluation (Marpaung et al., 2023).

This study addresses this gap by examining TQM at the micro level of teaching and learning rather than focusing solely on institutional quality management. The novelty of this study lies in explaining how TQM principles are manifested through students' everyday learning activities and how these activities facilitate the development of critical thinking, communication, collaboration, and problem-solving competencies. The University of Darussalam Gontor provides a relevant context because its learning environment integrates academic activities with collaborative and value-based educational practices. Therefore, this study aims to investigate the implementation of TQM in higher education learning at the University of Darussalam Gontor and to examine how TQM-oriented learning practices facilitate student competency development. Specifically, the study focuses on student involvement, competency development, feedback, evaluation, and continuous improvement within the learning process.

## METHOD

This research utilized a qualitative descriptive methodology to investigate the application of Total Quality Management (TQM) in higher education learning and its role in developing student competencies at the University of Darussalam Gontor. The qualitative descriptive approach was selected because it enables researchers to describe a phenomenon based on participants' experiences and the context in which the phenomenon occurs (Doyle et al., 2020; Kim et al., 2017). The research was conducted at the University of Darussalam Gontor. Participants were selected using purposive sampling because they were directly involved in the learning activities examined in the study. Primary data were obtained from students, lecturers, and an academic manager, while secondary data consisted of academic documents, learning resources, activity records, photographs, videos, presentations, and related documentation. Purposive sampling was used to ensure that participants had relevant experiences in relation to the research objectives.

Data were collected through semi-structured interviews, observations, and documentation. Interviews with selected students, lecturers, and an academic manager explored experiences and perceptions of TQM-oriented learning and its relationship with student competency development. Observations focused on learning events, student participation, academic discussion, presentation, collaboration, and evaluation. Documentation was used to complement the interview and observation data. The use of multiple techniques allowed the researchers to compare evidence across sources and strengthen the interpretation of the phenomenon (Creswell & Poth, 2018).

**Table 1.** Research Participants

| Participant Code | Category | Role in TQM Learning | Data Collection |
|---|---|---|---|
| STU-01 | Student | Participant in TQM-oriented learning activities | Interview, Observation |
| STU-02 | Student | Participant in TQM-oriented learning activities | Interview, Observation |
| STU-03 | Student | Participant in discussion, observation, and presentation activities | Interview, Observation |
| STU-04 | Student | Participant in collaborative learning activities | Interview, Observation |
| LEC-01 | Lecturer | Lecturer responsible for TQM-related learning | Interview, Observation, Documentation |
| LEC-02 | Lecturer | Lecturer involved in learning evaluation | Interview, Observation, Documentation |
| MGR-01 | Academic Manager | Academic/program management related to quality improvement | Interview, Documentation |

Data analysis was conducted interactively through data condensation, data display, and conclusion drawing/verification, complemented by thematic coding. Interview transcripts, observation notes, and documents were reviewed repeatedly to identify meaningful units of information. The data were coded and grouped into categories related to TQM-oriented learning practices and student competencies. Related categories were then developed into broader themes, including total involvement, competency development, and quality culture. Interpretations were continuously compared with the empirical evidence to ensure that the findings remained grounded in participant accounts, observations, and documentary evidence (Miles et al., 2020; Braun & Clarke, 2021). Trustworthiness was established through source and technique triangulation by comparing information obtained from students, lecturers, and the academic manager and by examining the consistency of interview, observation, and documentary evidence. The researchers also repeatedly examined coded data and compared emerging interpretations with the original data to minimize unsupported conclusions. Ethical principles were maintained by obtaining participants' informed consent, protecting participants' identities, and using the collected data solely for research purposes.

## RESULTS AND DISCUSSION

### Total Involvement as a Foundation of TQM-Oriented Learning

The findings indicate that TQM-oriented learning at the University of Darussalam Gontor positions students as active participants rather than passive recipients of learning content. Students were involved in academic discussions, observations, presentations, and collaborative activities. Interview and observation data showed that students were required to express ideas, respond to questions, exchange information with peers, and contribute to group tasks. The observation data were consistent with these accounts. OBS-01 recorded students' active participation in discussion and presentation activities. Students discussed assigned topics, presented their findings, responded to questions, and worked with peers. Documentary evidence from DOC-01 and DOC-02 also recorded participation in seminar and presentation activities. The convergence of interview, observation, and documentary evidence suggests that TQM-oriented learning was implemented through a learning environment emphasizing participation and shared responsibility. This form of participation reflects the stakeholder involvement and process orientation emphasized in TQM. In the learning context, students function not only as recipients of educational services but also as participants who contribute to the quality of the learning process. This interpretation is consistent with Borgia and Khan (2022), who identify stakeholder involvement and continuous improvement as important dimensions of TQM implementation in higher education. The finding also supports Stenalt and Lassesen (2022), who found that student agency can contribute to learning when students are provided with opportunities to participate and take responsibility for their learning. The present study extends this perspective by connecting student agency specifically with TQM implementation at the classroom level. Thus, student involvement is not only an instructional strategy but also a practical manifestation of quality-oriented learning.

**TQM-Oriented Learning and Student Competency Development**

The second main finding is that TQM-oriented learning provided opportunities for the development of critical thinking, academic communication, collaboration, and problem-solving skills. Evidence from interviews and observations showed that students participated in presenting findings, answering questions, solving problems, and cooperating with peers. These activities required students to analyze information, formulate arguments, communicate ideas, respond to feedback, and develop solutions to academic tasks. The relationship between learning activities and competencies can be understood through four patterns. Presentation activities provided opportunities for academic communication. Question-and-answer sessions required students to clarify arguments and respond to alternative viewpoints, supporting critical thinking. Collaborative assignments required students to coordinate tasks and exchange ideas, supporting collaboration. Problem-oriented academic tasks required students to identify issues and develop possible solutions, supporting problem-solving skills.

These findings are consistent with Tuononen et al. (2022), who emphasize that generic skills in higher education develop through learning environments that provide opportunities for students to practice those skills rather than merely learn their definitions. Active participation is also connected with student agency. Stenalt and Lassesen (2022) show that student agency can facilitate learning when students have opportunities to engage in and contribute to their learning processes. The finding also corresponds with Aljuwaiber (2022), who reported an association between interactive approaches to teaching TQM and students' attitudes toward TQM and quality in real-world contexts. The present study extends this discussion by showing that observation, presentation, discussion, and teamwork can connect TQM concepts with students' academic practices and competency development. However, the findings should not be interpreted as evidence of a statistically significant increase in student competencies. The qualitative descriptive design does not quantify changes in competency. Instead, the study explains how particular learning practices create opportunities and conditions that facilitate competency development. This distinction is important for maintaining methodological consistency between the research design and the claims made from the findings.

**Quality Culture through Feedback, Evaluation, and Continuous Improvement**

Observation data supported the interview findings. OBS-04 showed that presentations were followed by discussion, questions, and feedback. This process allowed students to respond to comments and clarify their arguments. Documentary evidence in DOC-03 recorded recognition of student achievement through the Best Student Presenter activity. These forms of evaluation and recognition made academic quality visible within the learning environment. From a TQM perspective, feedback and evaluation function as mechanisms for continuous improvement. Feedback provides information about the difference between current performance and expected performance, while evaluation helps students recognize areas that require improvement. The process therefore moves beyond task completion toward reflection and refinement of academic work. This finding is consistent with Borgia and Khan (2022), who identify continuous improvement as an important component of TQM implementation in higher education. It also corresponds with Evans and Zhu (2023), whose work emphasizes the role of assessment engagement and feedback in shaping learning processes. The present study extends this discussion by showing how feedback and evaluation operate as classroom-level mechanisms through which TQM principles become visible in students' everyday learning experiences. Recognition of student achievement, such as the Best Student Presenter activity, should not be understood merely as an award mechanism. Within a TQM perspective, recognition becomes meaningful when it is connected with understandable quality standards, evaluation, feedback, reflection, and opportunities for improvement. In this way, recognition can reinforce students' awareness of quality expectations while maintaining the broader orientation toward continuous improvement. The findings therefore suggest that quality culture can be cultivated through everyday learning practices. Rather than treating quality assurance as an administrative activity separate from teaching and learning, TQM can connect evaluation, feedback, student participation, and continuous improvement within the learning process. This is particularly relevant to the University of Darussalam Gontor because the learning environment provides opportunities for academic activities to function simultaneously as learning experiences and mechanisms for quality development.

**Table 2.** Qualitative Coding Framework of TQM-Oriented Learning and Student Competency Development

| Main Theme | Category | Initial Code | Data Indicator |
|---|---|---|---|
| Total Involvement | Student Participation | Active Participation | Discussion and classroom engagement |
| Total Involvement | Collaboration | Collaborative Learning | Group discussion and teamwork |
| Competency Development | Communication | Academic Communication | Presentation and question-answer sessions |
| Competency Development | Critical Thinking | Analysis and Argumentation | Analysis of information and formulation of arguments |
| Competency Development | Problem Solving | Solution Development | Responding to academic problems |
| Quality Culture | Feedback | Feedback | Responses to lecturer and peer feedback |
| Quality Culture | Evaluation | Performance Evaluation | Assessment of academic performance |
| Quality Culture | Continuous Improvement | Revision and Reflection | Revision and reflection after evaluation |

### Theoretical and Practical Implications

Taken together, the three findings indicate that TQM-oriented learning operates through an interconnected process. Student involvement creates opportunities for competency development, while feedback and evaluation support continuous improvement. This extends the conventional understanding of TQM in higher education, which frequently emphasizes institutional management, quality assurance, accreditation, and organizational processes (Borgia & Khan, 2022; Taroreh et al., 2022). The present study suggests that TQM principles can also be examined at the micro level of learning, where quality is experienced through student participation and academic practice. The practical implication is that higher education institutions seeking to implement TQM should not limit quality improvement to administrative systems. Learning design should also provide structured opportunities for student participation, collaborative problem solving, academic presentation, feedback, and reflection. Such practices can make quality management visible in students' everyday academic experiences. In this sense, TQM-oriented learning can function as a bridge between institutional quality management and student competency development.

## CONCLUSION

This study found that Total Quality Management at the University of Darussalam Gontor is manifested in learning practices that emphasize student involvement, collaboration, academic communication, feedback, evaluation, and continuous improvement. Students participated actively in discussions, observations, presentations, and collaborative activities, indicating that TQM principles can be applied not only at the institutional level but also within everyday teaching and learning processes. The findings further indicate that TQM-oriented learning provides opportunities for the development of critical thinking, communication, collaboration, and problem-solving competencies. These competencies were facilitated through activities requiring students to analyze information, communicate ideas, respond to questions, work collaboratively, and solve academic problems. Feedback, evaluation, and recognition also contributed to the emergence of a quality-oriented learning culture by providing opportunities for reflection and improvement. The study does not claim a statistically measured increase in student competencies because it employed a qualitative descriptive design. Instead, the findings explain how TQM-oriented learning practices create a context that supports competency development. The study therefore contributes to the discussion of TQM in higher education by demonstrating its relevance at the micro level of teaching and learning. Future research can use longitudinal or mixed-method designs to examine changes in student competencies over time.

## DECLARATION OF GENERATIVE AI

The authors declare that no generative AI or AI-assisted technologies were used in the writing process of this manuscript.

## CONFLICTING INTEREST STATEMENT

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

## FUNDING INFORMATION STATEMENT

This research did not receive any specific grant from funding agencies in the public, commercial, or not-for-profit sectors.

## REFERENCES

Ali, K. A. M., Shastri, R. K., & Bolar, K. (2022). A Literature Review on Total Quality Management (Models, Frameworks, and Tools and Techniques) in Higher Education. *The TQM Journal, 34*(5), 1298–1319.

Aljuwaiber, A. (2022). Changing Attitudes Through Interactive Learning: The Impact of Teaching Total Quality Management on Students' Everyday Lives. *Journal of Education for Business, 97*(6), 365–375.

Andrade-Girón, D. C., Marín-Rodriguez, W. J., Zúñiga-Rojas, M., Susanibar-Ramirez, E. T., & Calvo-Rivera, I. P. (2023). Quality Management System for Higher Education: A Systematic Review. *Data and Metadata, 2*, 100.

Borgia, M. S., & Khan, M. A. (2022). Total Quality Management Implementation in Higher Education Settings: A Systematic Review. *Journal of Economic and Administrative Sciences, 38*(4), 621–640.

Braun, V., & Clarke, V. (2021). One Size Fits All? What Counts as Quality Practice in (Reflexive) Thematic Analysis? *Qualitative Research in Psychology, 18*(3), 328–352.

Cho, H. J., Wang, C., Bonem, E. M., & Levesque-Bristol, C. (2022). How Can We Support Students' Learning Experiences in Higher Education? Campus-Wide Course Transformation Program Systematic Review and Meta-Analysis. *Innovative Higher Education, 47*(2), 223–252.

Creswell, J. W., & Poth, C. N. (2018). *Qualitative Inquiry and Research Design: Choosing Among Five Approaches* (4th ed.). SAGE Publications.

Doyle, L., McCabe, C., Keogh, B., Brady, A., & McCann, M. (2020). An Overview of the Qualitative Descriptive Design Within Nursing Research. *Journal of Research in Nursing, 25*(5), 443–455.

Evans, X., & Zhu, X. (2023). The Development and Validation of the Assessment Engagement Scale. *BMC Psychology, 11*, Article 124.

Hendrian, H., & Suparno. (2024). Analisis Total Quality Management (TQM) dalam Manajemen Pendidikan Tinggi terhadap Peningkatan Mutu Pendidikan Indonesia. *Indo-MathEdu Intellectuals Journal, 5*(2), 2146–2161.

Idan, M. F. (2023). Procedural Applications of Total Quality Management in University Education in Light of the COVID-19 Pandemic. *Bulletin of the National Research Centre, 47*, Article 118.

Kim, H., Sefcik, J. S., & Bradway, C. (2017). Characteristics of Qualitative Descriptive Studies: A Systematic Review. *Research in Nursing & Health, 40*(1), 23–42.

Mahmud, A., Yanto, H., & Mulyono, S. E. (2023). Student Involvement as a Competency Catalyst: Uncovering the Influence of Infrastructure Management and Teaching Quality. *JUMPA: Jurnal Manajemen Pendidikan, 5*(1), 1–12.

Marpaung, S. F., Zainuddin, Yusnadi, & Nasrun. (2023). Development of Total Quality Management Model Integrated with Soft Skills Based on Competency-Based Training in Increasing the Interest and Competence. *Journal of Education and Practice, 14*(22), 45–54.

Miles, M. B., Huberman, A. M., & Saldaña, J. (2020). *Qualitative Data Analysis: A Methods Sourcebook* (4th ed.). SAGE Publications.

Ramadhani, H. (2024). Penerapan Total Quality Management dalam Peningkatan Mutu Pendidikan Tinggi. *Jurnal Cakrawala Bahari, 7*(1), 66–73.

Stenalt, M. H., & Lassesen, B. (2022). Does Student Agency Benefit Student Learning? A Systematic Review of Higher Education Research. *Assessment & Evaluation in Higher Education, 47*(5).

Taroreh, S. R. A., Saerang, D. P. E., Maramis, J., Worang, F. G., & Wenas, R. S. (2022). Implementation of Total Quality Management in Higher Education Institutions: A Literature Review. *Jurnal EMBA: Jurnal Riset Ekonomi, Manajemen, Bisnis dan Akuntansi, 10*(2), 789–799.

Tuononen, T., Hyytinen, H., Kleemola, K., Hailikari, T., Männikkö, I., & Toom, A. (2022). Systematic Review of Learning Generic Skills in Higher Education—Enhancing and Impeding Factors. *Frontiers in Education, 7*, Article 885917.