

The Effect of Early Childhood Education Service Quality on Parent Loyalty with Parent Satisfaction as a Mediator Variable at X Early Childhood Education Services Foundation at Semarang City

Siti Mardiaty Yuni Eka Wulandari¹, Tri Suminar², Siti Nuzulia³

^{1,2,3}Postgraduate in Early Childhood Education, Semarang State University, Central Java, Indonesia

Corresponding Author: Siti Mardiaty Yuni Eka Wulandari

DOI: <https://doi.org/10.52403/ijrr.20241225>

ABSTRACT

This study aimed to determine the effect of early childhood education service quality on parental loyalty with parental satisfaction as a mediator variable. This was quantitative research. The population in this study were all parents who sent their children to X early childhood education services at Foundation, Semarang City. The sampling technique in this study was purposive sampling. The research sample was selected based on the criteria, namely parents who have sent their children to early childhood education institution X and parents who have passed one school year at the institution. The sample in this study totalled 50 people. The data analysis technique in this study used the Jamovi application. The results showed that the quality of early childhood education services affected parental satisfaction; parental satisfaction affected parental loyalty; the quality of early childhood education services affected parental loyalty; and the quality of early childhood education services affected parental loyalty with parental satisfaction as a mediator variable.

Keywords: Early Childhood Education Service Quality, Parent Satisfaction, Parent Loyalty

INTRODUCTION

Education is a process of humanizing humans (Pristiwanti, 2022). Education also means an effort to stimulate and guide to produce abilities in students, including at the early childhood education level. Early childhood education is considered important as an early stage in stimulating and developing children's potential (Saputra A., 2018). The growth and development process can be supported by including children in educational institutions. Early childhood education institutions function to provide stimulation of knowledge, and understanding to improve growth and development. A competent educational institution will be able to carry out and fulfill the needs of the education process (Supriadi, 2021). The needs themselves can be assessed in terms of parents' or children's needs. However, every early childhood education institution must have quality services, which means providing professional educators who have good teaching skills and master the competencies in conducting learning in early childhood education (Sya'i et al., 2021).

Early childhood education is said to be of quality if it provides the best service to children and parents to create an institution that is always innovative and creative in learning (Oktaviani & Dimiyati, 2021). If an early childhood education institution

provides good, maximum, appropriate, and friendly service quality. Education consumers will also respond positively. In early childhood education institutions, of course, the response is more visible from the parents' point of view. It is said that this is because the education consumers are still in the early childhood category. This is considered not yet able to be maximized in responding to whether or not the education received is appropriate.

An institution that provides good service to consumers will be able to improve the positive image of the institution. The quality of early childhood education services includes facilities and infrastructure, and the ability of the institution to provide services to consumers properly and quickly. Of course, the quality can also be seen from the results of education provided to students. If the above is present in early childhood education institutions, then parental satisfaction will be achieved (Hesti & Ricky, 2021). Satisfaction is a person's feeling of pleasure or disappointment that arises after obtaining services (Kotler, 2004). In addition, according to Gerson (2001: 3) satisfaction is the opinion of consumers regarding the extent to which expectations have been met by the product or service provided. Based on this description, it can be concluded that satisfaction is a consumer's feeling of the suitability of the educational services provided. Of course, this point of view will be much more conveyed by parents.

The satisfaction obtained by parents with the quality of service provided will also affect consumer loyalty. The better the parents' satisfaction, the more consumer loyalty to the institution increases (Hapsari et.al., 2017). Consumer loyalty is the loyalty of parents to continue to choose the early

childhood education institution and recommend to others to use the same product or service (Kotler, 2007). Consumer loyalty can encourage the development of the institution and provide ideas or suggestions to improve the quality of services provided.

METHODS

This study used a quantitative method with a survey design. The survey research design in this study collected data related to the effect of the quality of early childhood education services on parental loyalty with parental satisfaction as a mediator variable in the early childhood education services of the X Foundation in Semarang City. The data source in this study was carried out by purposive side, namely based on parents who have sent their children to early childhood education institution X and have passed one school year at the institution. The sample in this study amounted to 50 parents. In the questionnaire, the researcher gave five alternative answers, namely very satisfied, satisfied, neutral, dissatisfied, and very dissatisfied. The questionnaire was filled out by parents who had certain criteria and attended the early childhood education institution of the X Foundation in Semarang City. Data processing and analysis techniques using the Jamovi application.

RESULT

A. Descriptive Statistic Analysis

Descriptive statistics were used to describe the data in the study. In this study, there were three variables, namely the quality of early childhood education services, parent satisfaction, and parent loyalty. Descriptive statistical analysis in this study using the Jamovi application. The results are as follows:

Table 1. Results of Descriptive Statistic Analysis

Descriptives					
	N	Missing	Mean	Median	SD
Early Childhood Education Service Quality					
Tangible	50	0	78.58	76.00	8.839
Reliability	50	0	37.78	36.00	3.760

Responsiveness	50	0	46.14	45.00	4.887
Assurance	50	0	37.58	36.00	4.491
Empathy	50	0	20.72	20.00	2.295
Parent Satisfaction					
Conformity to expectations	50	0	16.58	16.00	2.021
Easy of obtaining	50	0	20.14	20.00	2.424
Willingness to recommend	50	0	16.46	16.00	1.961
Parent Loyalty					
Make repeat purchases	50	0	13.72	14.00	1.126
Buying between product or service lines	50	0	19.44	21.00	3.654
Refer to others	50	0	8.38	8.00	0.901
Shows immunity to the pull of competitors	50	0	12.86	13.00	1.195

Based on the results of the descriptive analysis above, the variable quality of early childhood education services that obtained the highest mean value was the tangible indicator of 78.58. The indicator that obtained the lowest mean value was empathy at 20.72. In the parent satisfaction variable, the indicator that obtained the highest mean value was the ease of obtaining at 20.14. The indicator that

obtained the lowest mean value was the willingness to recommend at 16.46. Meanwhile, in the parent loyalty variable, the highest mean value is buying between product or service lines at 19.44. The indicator that obtained the lowest mean was referring to others worth 8.38.

B. Assumption Test

1. Normality Test

Table 2. Results of Normality Test

	Early Childhood Education Service Quality	Parent Satisfaction	Parent Loyalty
N	50	50	50
Missing	0	0	0
Mean	230	85.4	55.8
Median	230	84.0	56.0
Standard deviation	21.4	8.24	3.05
Minimum	189	70	49
Maximum	270	103	63
Shapiro-Wilk W	0.966	0.963	0.975
Shapiro-Wilk p	0.158	0.123	0.364

The normality test results showed the Shapiro-Wilk ρ value on the early childhood education service quality variable obtained a value of 0.158. The parent satisfaction variable obtained a Shapiro-Wilk ρ value of 0.123. Meanwhile, on the parent loyalty variable, the Shapiro-Wilk ρ value was

0.364. Based on the output table, the Shapiro-Wilk ρ value < 0.05 , so it can be concluded that all variables were normally distributed.

2. Linearity Test

Table 3. Results of Linearity Test

Model Coefficients – Parent Loyalty				
Predictor	Estimate	SE	t	P
Intercept	157.509	41.480	3.80	$< .001$
Early Childhood Education Service Quality	0.1165	0.0186	6.25	$< .001$
Parent Satisfaction	0.0898	0.0245	3.66	$< .001$

Based on the results of the linearity test above, the intercept value obtained a value

of $\rho < 0.001$, indicating that service quality parent satisfaction on parent loyalty were

very significant. Service quality on parental loyalty obtained a value of $\rho < 0.001$, indicating that the quality of early childhood education services was very significant in influencing parental loyalty. Meanwhile, parent satisfaction on consumer loyalty obtained a value of $\rho < 0.001$, indicating that parent satisfaction greatly influenced parent loyalty. Based on the results of the above explanation, it can be concluded that the quality of early childhood education services and parental satisfaction were significant predictors of parental loyalty. This means that the better the quality of early childhood education services and the higher the parent's satisfaction, the higher the parents' loyalty.

3. Autocorrelation Test

Table 4. Results of Autocorrelation Test

Durbin-Watson Test for Autocorrelation		
Autocorrelation	DW Statistic	p
-0.102	2.16	0.554

Based on the results of the autocorrelation test above, the autocorrelation value obtained a value of -0.102, a statistical Durbin-Watson (DW) value of 2.16, and an ρ value of $0.554 > 0.05$. This means that overall from these results there were no autocorrelation symptoms in this model.

4. Multicollinearity Test

Table 5. Results of Multicollinearity Test

Collinearity Statistics		
	VIF	Tolerance
Early Childhood Education Service Quality	1.03	0.974
Parent Satisfaction	1.03	0.974

Based on the multicollinearity test results above, it was found that all VIF values were less than 10 and the tolerance value was more than 0.10, indicating that there was no multicollinearity.

C. Hypothesis Test

Hypothesis testing in this study was used to determine whether the independent variable affected the dependent variable through the mediator variable. To test the hypothesis in this study using mediator analysis in the Jamovi application. The results of the research data analysis using the Jamovi application are as follows:

Table 6. The Effect of Early Childhood Education Service Quality on Parent Loyalty with Parent Satisfaction as a Mediator Variable

Indirect and Total Effects								
Type	Effect	Estimate	SE	95% C.I. (a)		β	Z	P
				Lower	Upper			
Indirect	Parent Loyalty \Rightarrow Parent Satisfaction \Rightarrow Early Childhood Education Service Quality	1.479	0.433	0.631	2.33	0.283	3.42	< .001
Component	Parent Loyalty \Rightarrow Parent Satisfaction	0.817	0.193	0.438	1.20	0.513	4.23	< .001
	Parent Satisfaction \Rightarrow Early Childhood Education Service Quality	1.810	0.311	1.200	2.42	0.552	5.82	< .001
Direct	Parent Loyalty \Rightarrow Early Childhood Education Service Quality	2.000	0.496	1.029	2.97	0.383	4.04	< .001
Total	Parent Loyalty \Rightarrow Early Childhood Education Service Quality	3.479	0.556	2.389	4.57	0.666	6.25	< .001

The statistical picture of results above is as follows:

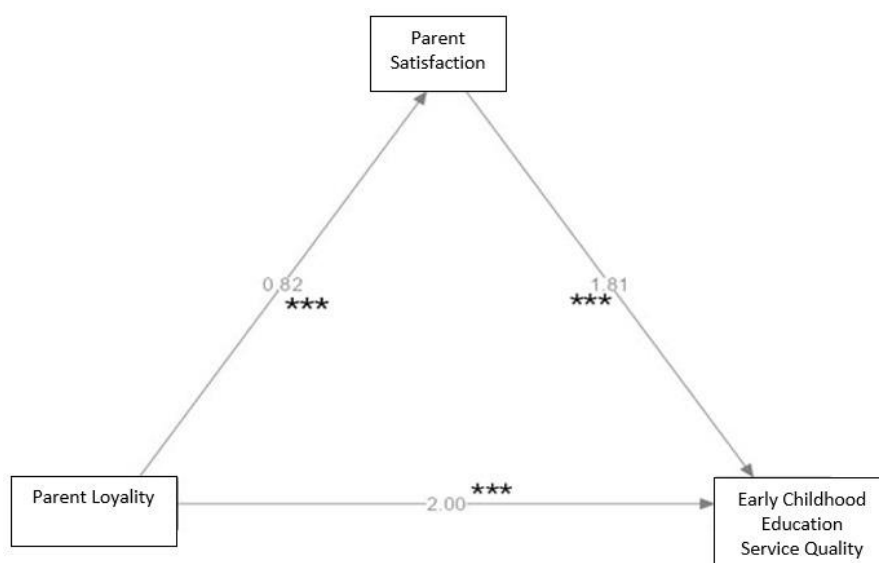


Figure 1. Statistical Picture of Hypothesis Test Results

Based on the table above, it can be concluded that:

1. Effect of Early Childhood Education Service Quality on Parent Satisfaction
Based on these results, the estimate or coefficient value of 1.810 was between 1.200 (Lower) - 2.42 (Upper). The z value in this test was 5.82. As for the ρ value <0.001 . Based on these results, it can be concluded that the quality of early childhood education services had a positive and significant effect on parental satisfaction.
2. The Effect of Parent Satisfaction on Parent Loyalty
Based on these results, the estimate or coefficient value of 0.817 was between 0.438 (Lower) - 1.20 (Upper). The z value in this test was 4.23. As for the ρ value <0.001 . Based on these results, it can be concluded that parental satisfaction had a positive and significant effect on parental loyalty.
3. The Effect of Early Childhood Education Service Quality on Parent Loyalty
Based on these results, the estimate or coefficient value of 2.000 was between 1.029 (Lower) - 2.97 (Upper). The z value in this test was 4.04. As for the ρ

value <0.001 . Based on these results, it can be concluded that the quality of early childhood education services had a positive and significant effect on parental loyalty.

4. The Effect of Early Childhood Education Service Quality on Parent Loyalty with Parent Satisfaction as a Mediator Variable

Based on these results, the estimate or coefficient value of 1.479 was between 0.631 (Lower) - 2.33 (Upper). This value showed that at the 95% confidence interval, parental satisfaction has a mediator effect. The z value in this test was 3.42. As for the ρ value <0.001 . Based on these results, it can be concluded that there was a positive and significant influence between the quality of early childhood education services on parental loyalty through parental satisfaction.

DISCUSSION

A. The Effect of Early Childhood Education Service Quality on Parent Satisfaction

Based on these results, the estimate or coefficient value of 1.810 was between 1.200 (Lower) - 2.42 (Upper). The z value

obtained was 5.82. As for the p-value <0.001 . Based on these results, it can be concluded that the quality of early childhood education services had a positive and very significant effect on parental satisfaction.

These results were relevant to research conducted by Novia et al., (2024) showed that there is a positive effect of service quality on customer satisfaction. It is also in line with the opinion (Nanincova, 2019) that service quality is one of the important factors in influencing customer satisfaction. If consumers are given responsive, effective, and friendly service, then consumers will feel valued and satisfied with the service or product provided. Service quality is closely related to customer satisfaction. Service quality can provide special encouragement for customers to use the product or service provided and can foster customer satisfaction (Martono et al., 2021). Service quality can also encourage customers to establish a good relationship with the service or product provider.

In the field of education, parental satisfaction is something that must be considered in improving the quality of the institution's services. Parental satisfaction is an aspect that must be known by educational service providers. It is intended that the institution knows the extent of the performance provided by the institution to improve service quality, and can produce good parental satisfaction. Based on the explanation above, it can be concluded that the better the quality of service provided to parents, the better the parents' satisfaction.

B. The Effect of Parent Satisfaction on Parent Loyalty

Based on the test results above, the estimate or coefficient value of 0.817 was between 0.438 (Lower) - 1.20 (Upper). The z value in this test was 4.23. As for the ρ value <0.001 . Based on these results, it can be concluded that parental satisfaction had a

positive and very significant effect on parental loyalty.

These results were relevant to research conducted by (Sari et al., 2020) that satisfaction influences consumer loyalty. In addition, according to the opinion (Putra, 2021), consumer satisfaction is one of the reasons for making another purchase of the same product or service. If consumers are satisfied, they will tend to tell others about their experience in using the product or service. Consumer loyalty has a close relationship with customer satisfaction. The more customer satisfaction is fulfilled with their expectations, it will cause consumers to become loyal and use the same services from the institution.

In the field of education, parent satisfaction is something that must be considered in improving the quality of institutional services. Parent satisfaction is an aspect that must be known by educational service providers. It is intended that the institution knows the extent of the performance provided by the institution to improve service quality, and is able to generate good parental satisfaction. Based on the explanation above, it can be concluded that the better the quality of service provided to parents, the better the parents' satisfaction.

C. The Effect of Early Childhood Education Service Quality on Parent Loyalty

Based on the test results above, the estimate or coefficient value of 2.000 was between 1.029 (Lower) - 2.97 (Upper). The z value in this test was 4.04. As for the ρ value <0.001 . Based on these results, it can be concluded that the quality of early childhood education services had a positive and significant effect on parental loyalty.

This was relevant to the opinion of Maisaroh & Nurhidayati, (2021) that service quality is one of the factors that cause consumer loyalty. Service quality can have an impact on consumers, especially loyalty. If a company can provide good service quality, consumers will also be satisfied and

loyal to the company's products and services. In addition, (Khairatu et al., 2015) state that service quality has a positive influence on consumer loyalty. The higher the service quality, the higher the customer loyalty. In addition, good service quality will change the customer's perspective on the service provider to be good too. It will certainly make consumers interested in buying the goods or services offered because they feel valued and given good service.

In the field of education, the quality of services provided such as decent building conditions, sufficient and comfortable classrooms, the availability of employees to help consumers when they need information, providing good service, resolving various complaints appropriately, and understanding the needs of parents and students. The quality of service provided in a good and responsive manner will certainly make parents want to reuse the same service in the future. Based on the explanation above, it can be concluded that the better the quality of service provided, the better the parents' loyalty to the institution.

D. The Effect of Early Childhood Education Service Quality on Parent Loyalty with Parent Satisfaction as a Mediator Variable

Based on the test results above, the estimate or coefficient value of 1.48 was between 0.631 (Lower) - 2.33 (Upper). This value showed that at the 95% confidence interval, parental satisfaction had a mediator effect. The z value in this test was 3.42. As for the p value <0.001 . Based on these results, it can be concluded that parental satisfaction provides a mediator effect. This means that there is a positive and significant influence between the quality of early childhood education services on parental loyalty through parental satisfaction.

Service quality is something that is used to determine the goods or services provided. The quality of service in the form of interactions provided by employees to

consumers includes physical evidence of services or products, reliability, responsiveness, assurance, and empathy (Anggarawati, 2021). If the quality of service provided to consumers is good, it will create satisfaction.

Satisfaction is a comparison between the expectations that consumers want and the services that have been felt. Satisfaction is an important element in providing good and maximum service. Consumers will feel satisfied if the services provided by an institution match or exceed their expectations (Gultom et al., 2020). However, if consumers are not satisfied, certainly, the service is not good and ineffective. If consumers are satisfied with a service provided, it has a positive impact on the institution. The satisfaction that is formed will certainly encourage the formation of loyalty.

Loyalty is the tendency of customers to buy or reuse products and services from an institution (Marisa et al., 2022). In addition, loyal consumers also praise, are positive, and refer to others regarding the service providers that have been used (Mutmainah, 2017). Consumer loyalty is a priority due to expectations and services provided properly. Institutions must be able to understand various things that are considered important by consumers to create satisfaction and have an impact on loyalty.

In the field of education, good service quality from an institution is the expectation of parents. If the quality of service provided is following the expectations of parents, then satisfaction will be realized. This will have a positive impact on the formation of parental loyalty. It can be concluded that service quality indirectly influences parental loyalty through parental satisfaction. This shows that loyalty can be done by increasing parental satisfaction. Parental satisfaction can be formed by providing good quality early childhood education services.

CONCLUSION

1. The quality of early childhood education services affects parental satisfaction. This means that the better the quality of services provided, the better the parents' satisfaction.
2. Parental satisfaction affects parental loyalty. This means that parents' satisfaction with a service can impact loyalty. Loyalty is shown by continuing to use services at the same institution with different levels or sending different children to the same institution.
3. The quality of early childhood education services affects parental loyalty. This means that the better the quality of services provided, the better parents' loyalty will be in using a product or service from the institution.
4. The quality of early childhood education services affects parental loyalty with parental satisfaction as a moderating variable. This means that satisfaction indirectly influences service quality with parental loyalty. To achieve loyalty, it can be done by increasing parents' satisfaction. Parents' satisfaction can be formed by providing good service quality.

Declaration by Authors

Acknowledgement: None

Source of Funding: None

Conflict of Interest: The authors declare no conflict of interest.

REFERENCES

1. Anggarawati, I. R. (2021). Pengaruh Kualitas Produk, Kualitas Pelayanan dan Kepuasan Pelanggan terhadap Loyalitas Pelanggan PDAM Tirta Marta Yogyakarta. *Jurnal Indonesia Sosial Sains*, 2(1), 1-11.
2. Gerson, Richard, F. (2001). *Mengukur Kepuasan Pelanggan*. Jakarta: PPM.
3. Gultom, D. K., Arif, M., Fahmi, M. (2020). Determinasi Kepuasan Pelanggan terhadap Loyalitas Pelanggan melalui Kepercayaan. *MANEGGGIO: Jurnal Ilmu Magister Manajemen*, 3(2), 171-180.
4. Hapsari, R., Clemes, M.D., & Dean, D. (2017). The Impact of Service Quality, Customer Engagement and Selected Marketing Constucts on Airline Passenger Loyalty. *International Journal of Quality and Service Sciences*, 9(1), 21-40.
5. Hesti, U., Ricky, H. (2021). Pengaruh Kualitas Layanan Pendidikan Lembaga PAUD Terhadap Tingkat Kepuasan Orang Tua Murid. *SERASI: Jurnal Sekretari & Administrasi*, 9, (2).
6. Khaihatu, T. S., Daengs, A., & Indrianto, A. L. (2015). *Manajemen Komplain*. Yogyakarta: Andi Offset.
7. Kotler, Philip dan Armstrong, Garry. (2004). *Dasar-dasar Pemasaran. (Alih Bahasa: Alexander Sindoro)*. Jakarta: Prenhallindo.
8. Kotler, Philip dan KL Keller. (2007). *Manajemen Pemasaran: Edisi Bahasa Indonesia, Edisi 12, Jilis 1*. Jakarta: PT Indeks.
9. Marisa, M., Yolanda, Y., & Lusya, V. (2022). Pengaruh Kualitas Pelayanan dan Kepercayaan Terhadap Kepuasan Serta Dampaknya Terhadap Loyalitas Orang Tua (Study kasus pada SDIT AL Muhajirin Jakarta). *Jurnal Manajemen FE-UB*, 10(1), 23-47.
10. Martono, M., Arwin, A., Yuliana, Y., Lisa, L., & Hutabarat, F. A. M. (2021). Analisis Pengaruh Kualitas Pelayanan Terhadap Kepuasan Pelanggan Studi Kasus pada Pengangkutan TS Medan. *Seminar Nasional Sains Dan Teknologi Informasi (SENSASI)*, 3(1), 411-415.
11. Mutmainnah, M. (2017). Pengaruh Kualitas Layanan Dan Citra Perusahaan Terhadap Kepuasan Dan Loyalitas Nasabah. *Jurnal Manajemen Dan Pemasaran Jasa*, 10(2), 201-216.
12. Nanincova, N. (2019). Pengaruh Kualitas Layanan Terhadap Kepuasan Pelanggan Noach Cafe dan Bistro. *AGORA*, Vol.7, No.2.
13. Novia, M. A., Semmaila, B., & Imaduddin, I. (2024). Pengaruh kualitas Layanan Dan Kualitas Produk Terhadap Kepuasan Pelanggan. *Tata Kelola*, 11(2), 111-122.
14. Oktaviani, D.A., Dimiyati. (2021). Penerapan PAUD Holistik Integratif pada Masa PandemiCovid 19. *Jurnal Obsesi: Jurnal Pendidikan Anak Usia Dini*, 5(2), 1870-1882.
15. Pristiwanti, D., Badariah, B., Hidayat, S., & Dewi, R. S. (2022). Pengertian

- Pendidikan. *Jurnal Pendidikan Dan Konseling (JPDK)*, 4(6), 7911-7915.
16. Putra, I. K. A. M., I Gusti, A.W., Putu, H.S. (2021) Pengaruh Kualitas Pelayanan terhadap Loyalitas Pelanggan melalui Kepuasan Pelanggan sebagai Variabel Mediasi pada CV. Jaya Utama Teknik di Kabupaten Badung. *Jurnal Manajemen, Kewirausahaan dan Pariwisata*, 1 (4), 1279-1291.
 17. Saputra, A. (2018). Pendidikan anak pada usia dini. *At-Ta'dib: Jurnal Ilmiah Prodi Pendidikan Agama Islam*, 192-209.
 18. Supriadi, O. (2021). Peran Kepala PAUD dalam Penyelenggaraan Pendidikan Sebelum dan Saat Terjadi Pandemi Covid-19. *Jurnal Obsesi: Jurnal Pendidikan Anak Usia Dini*. Vol. 5, No. 1.
 19. Sya'i, S., Rizka, M. A., & Gunawan, I. M. (2021). Studi Korelasi Antara Pendidikan dan Pelatihan (Diklat) Tutor PAUD dengan Peningkatan Kompetensi Mengajar. *Jurnal Paedagogy*, 8(3), 351-356.
 20. Sari, T.N., Muhammad, N.P. (2020). Dapatkah Kepemimpinan Kepala Sekolah, Motivasi Guru dan Kualitas Pelayanan Pendidikan Mempengaruhi Kepuasan Orang Tua Siswa. *Jurnal EduTech*. Vol. 6, No. 1.

How to cite this article: Siti Mardiaty Yuni Eka Wulandari, Tri Suminar, Siti Nuzulia. The effect of early childhood education service quality on parent loyalty with parent satisfaction as a mediator variable at X early childhood education services foundation at Semarang City. *International Journal of Research and Review*. 2024; 11(12): 209-217. DOI: <https://doi.org/10.52403/ijrr.20241225>
