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Impacts of religious secondary schools in Hong Kong on student attitudes towards school life

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ABSTRACT

Research shows that religious schools foster academic achievements among middle and high schoolers. However, research into student attitudes towards the quality of school life in religious schools remains scarce. This study utilised a questionnaire to assess the relationship between a school's religious affiliation and students' religious affect, life satisfaction, personality, age, gender, and attitudes towards school. A sample of 4,468 secondary students (mean age: 14.1 years) was surveyed in Hong Kong. School life was measured by the six aspects: general school character, experience, worship, stewardship, relationships, and religious character. One-way MANOVA analyses revealed that school religious affiliations and personality factors have distinct effects on their attitudes towards school life. The importance of considering individual and contextual factors in understanding and strategies to enhance students' positive attitudes towards school life is discussed.

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Introduction

Studies have shown that religious schools foster academic achievements among middle and high school students (Jeynes 2005). Students who have a positive perception of their school life exhibit higher levels of classroom engagement, academic achievement, school satisfaction, and motivation to learn. They also tend to have fewer disciplinary issues (Lai et al. 2015; Moè et al. 2009; Nayir 2016; Verešová and Maláa 2016). Respecting student voices has a significant impact on the quality of educational reforms, school culture, and their learning and agency (Mitra 2018). German teachers improved their practices by focusing on positive student feedback. Enhancing students' educational experience requires prioritising self-evaluation for better school life quality (Gaertner 2014).

In Hong Kong, schools must conduct a self-evaluation exercise that involves gathering feedback from stakeholders, including staff, students, and parents, to assess the school's

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performance at the end of each academic year (Education Bureau 2022). Nearly half of all primary and secondary schools in Hong Kong, regardless of private and government, are religiously affiliated (primarily Christian) (Jackson 2015). Past research has found significant differences in students between religious and non-religious schools, such as academic achievement (e.g. Jeynes 2012) and faith (Ariza, Magaña, and García 2020) of students. Empirical studies unravelled the difference in students' attitudes towards school between religious schools and those without religious character (e.g. Francis, Lankshear, and Eccles 2022). However, there is no differentiation in school self-evaluation tools and processes for religious and non-religious schools. To address this research gap, this study pioneered exploring differences in students' attitudes towards school among different religious schools in Hong Kong.

Theoretical perspectives

The present study is grounded on Lankshear, Francis, and Eccles (2021) revised model of the Student Voice Scale and Şeker's (2011) three-factor model of attitude towards school formation to identify the salient aspects of the school in which students assess the quality of their school life and investigate factors influencing students' attitudes towards these aspects of school. Lankshear, Francis, and Eccles (2021) revised model of the Student Voice Scale is the revised version of Lankshear, Francis, and Eccles (2017) original model to assess students' attitudes towards the distinctiveness of the school ethos and school worship, which is composed of school ethos, school experience, school teachers, relationships in school, school environment, and school worship, in Anglican schools in Wales. In line with the church-related inspection for school development in church schools, regarding school qualities reflecting characterised religious practice and distinctive ethos, the aspect of school ethos has been further divided into general school character and religious school character. Likewise, the aspect of the school environment has been further divided into the stewardship of creation and stewardship of the school environment. As such, school ethos in church schools could be adequately reflected. Sound psychometric properties of the eight-factor model of Lankshear, Francis, and Eccles (2021). Student Voice Scale has been confirmed. The scale varies with personal factors of age and gender and religious factors of worship attendance and personal prayer (e.g. Lankshear, Francis, and Eccles 2021). In order to examine whether there is a cross-cultural difference between Western and Chinese religious schools, this Hong Kong study employed the Student Voice Scale (Lankshear, Francis, and Eccles 2021) to assess factors influencing students' attitudes towards eight aspects of school life.

Besides emphasising the importance of positive attitudes towards school, we also utilised Şeker's (2011) three-factor model to evaluate the factors that affect students' attitudes towards school. Based on this model, students' perception of their school life is influenced by personal factors (a sense of belonging and personality), in-school factors (classroom atmosphere and peer relationships), and non-school factors (family involvement and parental SES). Hence, the present study examined how students' attitudes towards school varied based on personal factors (age, gender, grade, personality, religious affiliation, religious affect, and life satisfaction), in-school factors (school religious affiliation), and out-of-school factors (parental church attendance).

The present study

Consistent with the aforementioned objectives, this study has three research questions (RQs) as follows:

RQ1. What factors contribute to religious and non-religious students' perceived quality of life?

RQ2. Does a school's religious affiliation impact students' attitudes towards the school?

RQ3. Do demographic factors influence students' attitudes towards school?

Method

Procedure

This study surveyed 4,468 secondary school students (aged 12 to 18) selected through a convenience sampling from 10 religious schools in Hong Kong. All students enrolled in these schools were invited to participate and were administered an integrated questionnaire that comprised validated scales to assess their attitudes towards school life, personality, well-being, and religious affect. Demographic variables such as personal and school religious affiliations, age, sex, religious practices, and attendance to religious places were also included. The study design adhered to established academic protocols and ethical standards and aimed to contribute to the body of research on adolescent development and religiosity. Prior to data collection, informed consent was obtained from both school principals and students. The research principles, including anonymity and voluntary participation, were thoroughly explained to the students. Additionally, the research ethics of the study was approved by the Ethics Research Committee of The Chinese University of Hong Kong. With the focus on students' attitudes towards school life, it was specified as the outcome variable.

Participants

The overall sample consisted of 51% male and 49% female. The mean age of the participants was 14 years, with a standard deviation of 1.5 years. The distribution of school religious affiliation among the students was Protestant Christianity (42%), Buddhism (13%), Taoism (24%), and Catholicism (21%) respectively. Moreover, the distribution of personal religious affiliation was Catholicism (9.9%), Anglican (3.2%), Baptist (5.0%), Pentecostal (2.2%), Christian and Missionary Alliance (7.9%), Islam (1.5%), Taoism (0.5%), Buddhism (7.7%), others (0.1%), and no religious affiliation (62.0%). The composition of the participants could be considered heterogeneous coming from schools with diverse religious backgrounds, types, and bandings and across geographical locations in Hong Kong.

Instruments

Students were required to rate the statements of each of the following scales on a 5-point scale (1 = strongly disagree; 5 = strongly agree). All scales were valid and reliable in the present investigation.

Quality of school life scale (QSLs)

Quality of School Life Scale was utilised to assess students' perceptions of the quality of school life in their schools. It is a 42-item scale that evaluates students' views on six different aspects of school life: general school character, experience of school, school worship, stewardship of creation and relationships in school, teachers and staff, and religious school character. The scale was adapted from Lankshear Student Voice Scales Revised (Lankshear, Francis, and Eccles 2021). The present CFA results confirmed good psychometric properties of the QSLs (see [Results](#) section).

Personality indices

An 18-item Junior Personality Scale (JPS) (Francis, Lankshear, and Wilkinson 2023) was used to examine students' personality in three dimensions: toughmindedness, anxiety, and extraversion. The three dimensions model of personality is grounded in Eysenck's work in distinguishing between the three dimensions of extraversion, neuroticism, and psychoticism (Eysenck, Eysenck, and Barrett 1985; Eysenck and Eysenck 1975). Past research has shown good psychometric properties of the JPS (Francis, Lankshear, and Wilkinson 2023). The present CFA results confirmed its factorial validity ($\chi^2(df) = 1290.9(132)$, $p < .001$, NNFI = .95, CFI = .96, RMSEA = .066, SRMR = .053). The composite reliability of all subscales ranged from .82 to .86. Composite reliability was chosen for all scales for two main reasons: it provides a more accurate estimate of scale reliability compared to Cronbach's alpha, and it does not rely on the strict tau-equivalence assumption of scale items (Peterson and Kim 2013).

Life satisfaction scale

We adopted an 8-item Life Satisfaction Scale to assess students' satisfaction with their life, friends, living place and the world (e.g. I have good friends). This scale was adapted from the Junior Spiritual Health Scale (Francis, Lankshear, and Eccles 2021). The present CFA results supported a one-factor model of the scale ($SB\chi^2(df) = 382.6(19)$, $p < .001$, NNFI = .94, CFI = .96, RMSEA = .094, SRMR = .042). The composite reliability of the scale was .92.

Religious affect scale

We utilised a 12-item Religious Affect Scale to examine students' affective responses to the Divine. This scale was adapted from the Francis Scale of Attitude towards Christianity (Francis, Lankshear, and Eccles 2017). The present CFA results supported a one-factor model of the scale ($SB\chi^2(df) = 780.0(54)$, $p < .001$, NNFI = .97, CFI = .98, RMSEA = .080, SRMR = .022). The composite reliability of the scale was .98.

Data analysis

After data cleaning, 4,468 valid survey responses were concluded and used for developing and validating the Quality of School Life Scale (QSLS) factor structure. To validate the factor structure of the QSLS, we first adopted exploratory factor analysis (EFA) to explore salient factors of school life and then confirmatory factor analysis (CFA) to confirm the factor structure of the Scale. With reference to international practice in scale development and validation (e.g. Dávila-Villavicencio et al. 2024), and to prevent the overfitting problem caused by using the same sample for conducting EFA and CFA (Fokkema and Greiff 2017), we randomly divided the total sample into two subsamples for EFA and CFA. The first subsample comprised 2,228 students (50.7% male and 49.3% female) with a mean age of 14.1 years ($SD = 1.46$). Similarly, the second subsample comprised 2,240 students (51.9% male and 48.1% female) with a mean age of 14.1 years ($SD = 1.47$). After testing the scales and identifying salient factors of school life, the whole dataset was fully utilised to perform group differences in perception of the quality of school life.

To explore the factor structure of QSLS, Exploratory Factor Analysis (EFA) with the aid of SPSS 28.0 was performed on data from the first subsample. Subsequently, the factor model of QSLS derived from EFA was tested by applying CFA to data from the second subsample with the aid of Lisrel 8.54. The overall model fit was evaluated based on a non-normed fit index (NNFI): $\geq .95$ = satisfactory fit; comparative fit index (CFI): $\geq .95$ = satisfactory fit (Schumacker and Lomax 2004), root-mean-square error of approximation (RMSEA): $< .05$ = a close fit, $.05-.08$ = a fair fit, $.08-.10$ = a mediocre fit and $> .10$ = a poor fit (MacCallum, Browne, and Sugawara 1996), and standardised root-mean-square residual (SRMR): $< .08$ = a good fit (Hu and Bentler 1999). Finally, we conducted a one-way MANOVA to analyse group differences in students' perception of their school life quality using the entire dataset.

Results

Psychometric properties of QSLS

Subsample 1: exploring the factor structure of the QSLS

EFA was conducted to explore the factor structure of QSLS. Results of the principal axis factoring revealed a 6-factor structure of the QSLS. The factors had eigenvalues between 1.10 and 19.35, greater than the 1.0 cut-off value. Inspection of factor loadings indicated that seven items had a loading of less than .40 (Stevens 2002). These seven items were removed, and EFA was re-run for the remaining 35 items. The solution explained 76.55% of the total scale variance. All items ended up loading on the corresponding factors.

The study identified six factors influencing attitudes towards school: 1. General school character, such as providing a good learning place and fairness of school rules (7 items); 2. School experience, such as peer relationships and sense of belonging in class (5 items); 3. School worship and a sense of respect and admiration for the divine (4 items); 4. Stewardship of creation and relationships in school (9 items); 5. Teachers and staff in caring for students and the school (4 items); 6. Religious school character and the importance of religious affiliation, beliefs, scriptures and customs in the school (6 items).

Subsample 2: confirming the six-factor structure of the QSLs

The 6-factor structure of the QSLs was affirmed using CFA. Results of CFA revealed that the 6-factor solution provided a good fit to the data ($\chi^2 = 5474.7$, $df = 545$, $NNFI = .98$, $CFI = .98$, $RMSEA = .067$, and $SRMR = .059$). Inspection of factor loadings revealed that standardised factor loadings ranged from .64 to .95 ($p < .05$) (see Table 1). Additionally, all subscales were deemed reliable, with all composite reliability values greater than .70. All of the factors were positively correlated ($p < .05$).

Table 1. Factor loadings, reliability and inter-factor correlations of the QSLs using the second subsample ($N = 2,240$).

Items	Standardized estimates of factor loadings					
	GSC	ES	SW	SCRS	TS	RSC
My school is a really good school.	.84					
My school is a really caring school.	.89					
My school is a really friendly school.	.90					
My school is a really peaceful school.	.83					
My school is a really safe place.	.79					
In my school, the rules are fair.	.73					
In my school, each student is treated fairly.	.72					
In my school, students are proud of their own classes.		.69				
In my school, my classmates and I treasure our friendship.		.78				
In my school, I can be myself.		.73				
In my school, we treasure each other.		.86				
In my school, I know people care for me.		.79				
In assemblies, I enjoy visits from clergy or religious leaders.			.64			
In assemblies, listening to the Bible/Quran/Buddhist Texts is very important to me.			.93			
In assemblies, prayer/chanting/meditation is very important to me.			.94			
In assemblies, I enjoy the songs/Buddhist music we sing.			.77			
My school teaches me to care for the other people.				.87		
My school teaches me to respect wonderful things/incidents.				.83		
My school teaches me to care for the world around us.				.86		
My school teaches me to take care of plants.				.83		
My school teaches me to take care of animals.				.81		
My school teaches me to respect other people.				.84		
My school teaches me to respect living things.				.86		
My school teaches me not to waste things.				.83		
My school teaches me to respect other people's things.				.85		
My school teachers and staff care a lot for all the students.					.89	
My school teachers and staff care a lot for each other.					.90	
My school teachers and staff care a lot for the world around us.					.89	
My school teachers and staff care a lot for the school.					.85	
Worship/retreat/Buddhist worship activities are very important to my school.						.82
Prayer/chanting/meditation are very important to my school.						.93
Jesus/Mary/Allah/Buddha/Divine are very important to my school.						.94
Worship hall/prayer room/religious room are very important to my school.						.91
Bible/Quran/Buddhist scriptures are very important to my school.						.95
Religious festivals are very important to my school.						.79
Composite reliability.	.93	.88	.90	.96	.93	.96

Note. GSC = general school character, ES = experience of school, SW = school worship, SCRS = stewardship of creation and relationships in school, TS = teachers and the staff, RSC = religious school character.

All standardised factor loadings and factor correlation coefficients are significant at .05 level.

Differences in students' attitudes toward school

Table 2 indicates that students' attitudes towards their school differ depending on their school's religious affiliation. A one-way MANOVA analysis showed that Catholic school students were more positive towards their school than Protestant Christian and Taoist school students. Specifically, Catholic school students reported higher satisfaction ratings on their general school character, school experience, and teachers and staff factors. It should be noted that there was no noticeable difference in how students viewed their schools when comparing those who attended Catholic and Buddhist schools. It is also important to mention that while the differences in perception between Catholic and Taoist students and students of other religions were moderate, the differences in perception between students of different faiths were generally small.

Table 3 reveals that female students had more positive attitudes towards their schools than male students regarding school worship, stewardship of creation, relationships in school, and religious school character. However, the effect sizes of these differences are small. Additionally, the study shows that students aged 12 and below had more positive attitudes towards their schools in all six aspects than their adolescent peers. In this case, the effect sizes range from small to medium.

Additionally, the results indicated that junior secondary students expressed a more positive attitude towards their schools than senior counterparts in general school character, school worship, stewardship of creation and relationships in school, and teachers and the staff. As with the previous findings, the effect sizes associated with these differences were small. Likewise, students born in mainland China held more favourable attitudes towards their schools than their counterparts who are born in other South Asia countries in aspects of general school character, school worship, stewardship of creation and relationships in school, and teachers and the staff. Effect sizes were medium. Furthermore, students with higher levels of religious affect, extraversion and life satisfaction and lower levels of toughmindedness held more positive attitudes towards their schools in all six aspects. The effect sizes were small to medium, except for life satisfaction, which had a large effect size.

Students with lower anxiety levels held more positive attitudes towards the general school character and school experience but less favourable attitudes towards the school

Table 2. Differences in attitudes towards school by schools with different religious affiliation.

Reference group (I)	Comparison groups (J)	General school character	Experience of school	School worship	Stewardship of creation and relationships in school	Teachers and the staff	Religious school character
Christian school	Taoist school	.07	.07	.31* (.29)	-.05	.05	.69* (.64)
	Buddhist school	-.12* (.14)	-.02	.07	-.07	-.02	-.03
	Catholic school	-.17* (.21)	-.10* (.13)	.04	-.10* (.14)	-.09* (.11)	-.11
Taoist school	Buddhist school	-.19* (.21)	-.09	-.24* (.24)	-.02	-.07	-.72* (.67)
	Catholic school	-.24* (.27)	-.17* (.20)	-.27* (.27)	-.05	-.14* (.16)	-.80* (.75)
Buddhist school	Catholic school	-.05	-.08	-.02	-.03	-.07	-.08

Note. The numbers in the table show the mean difference in school attitudes between the reference group and the comparison group. (reference group minus comparison group). Effect size (in terms of Cohen's d) of only significant difference in attitudes ($p < .05$) is shown inside the brackets.

**Table 3.** Differences in attitudes towards school among students with different personal and parental factors, apart from personal religious faith.

Variables	Reference group	Comparison group	General school character	Experience of school	School worship	Stewardship of creation and relationships in school	Teachers and the staff	Religious school character
Sex	Female	Male	.04	.03	.15* (.16)	.10* (.12)	.05	.29* (.27)
Age	13 to 17	12 and below	-.28* (.35)	-.12* (.16)	-.31* (.31)	-.23* (.31)	-.27* (.32)	-.26* (.24)
		18 and above	.16	.35* (.38)	.21	.36	.28	.11
Grade	Junior (F1 to F3)	Senior (F4 to F6)	.08* (.10)	-.01	.11* (.10)	.12* (.17)	.06* (.07)	.07
Birthplace	China	South Asia	.69* (.74)	.36* (.40)	-.11	.60* (.65)	.42* (.41)	-.22
Religious affect (RA)	High Level of RA	Low level of RA (below the mean)	.29* (.36)	.29* (.35)	1.21* (1.5)	.29* (.38)	.37* (.42)	.93* (.88)
Toughminded	(above the mean)							
	High Level of TOU	Low level of TOU	-.24* (.30)	-.17* (.21)	-.08* (.08)	-.26* (.36)	-.25* (.29)	-.16* (.15)
Anxiety	(above the mean)	(below the mean)						
	High Level of ANX	Low level of ANX	-.14* (.17)	-.18* (.22)	-.03	.00	-.04	.08* (.06)
Extraversion	(above the mean)	(below the mean)						
	High Level of EXT	Low level of EXT	.26* (.32)	.46* (.60)	.29* (.29)	.32* (.43)	.36* (.43)	.22* (.20)
Life satisfaction	(above the mean)	(below the mean)						
	High Level of LS	Low level of LS (below the mean)	.75* (1.0)	.84* (1.2)	.53* (.56)	.67* (.97)	.76* (.96)	.42* (.39)
Attendance to religious place	Yes	No	.03	.04	.28* (.27)	.07* (.09)	.06* (.07)	.26* (.23)
Attendance to young people's meeting	Yes	No	.02	.02	.30* (.30)	.04	.06* (.07)	.20* (.18)
Pray when you are on your own	Yes	No	.06* (.07)	.07* (.09)	.45* (.45)	.10* (.13)	.11* (.14)	.37* (.34)
Mother's attendance to religious place	Yes	No	-.02	-.03	.30* (.29)	.00	-.01	.24* (.22)
Father's attendance to religious place	Yes	No	.00	-.01	.28* (.29)	.02	.02	.24* (.23)

Note. The numbers in the table show the mean difference in school attitudes between the reference group and the comparison group. (reference group minus comparison group).

Effect size (in terms of Cohen's d) of only significant difference in attitudes ($p < .05$) is shown inside the brackets.

religious character. The effect sizes were small. Additionally, students who did not attend religious places, young people's meetings without praying, and whose parents did not attend religious places held less favourable attitudes towards school worship and the school religious character. The effect sizes were also small.

Discussion

This study investigated students' perceptions regarding the quality of their school life in religious schools in Hong Kong. The research specifically explored how personal and school religious affiliation and the students' demographic characteristics influence these perceptions. Previous research studies that have examined the impact of personal and school religious affiliation on students' attitudes towards school have focused on a limited number of religions. However, this study advances in this area by considering a more comprehensive range of religious affiliations.

The first research question, *what factors contribute to religious and non-religious students' perceived quality of life*, was answered by conducting CFA to assess the six-factor model of the QSLS in religious schools in Hong Kong. The results confirmed the validity of the six-factor model, which includes general school character, school experience, school worship, stewardship of creation and relationships in school, teachers and staff, and religious school character.

Notably, the results of this study are consistent with the revised model of the Student Voice Scale proposed by Lankshear, Francis, and Eccles (2021), which emphasises the significance of examining the distinctiveness of school ethos and school worship in UK church schools. Particularly, the findings suggest that religious school character, school worship, and stewardship of creation and relationships in school are critical aspects that students consider when evaluating the quality of school life.

Our findings provide empirical evidence for the significance of religious and spiritual dimensions in shaping school climate and student well-being in religious educational settings. Gaining a comprehensive understanding of students' perceptions of school and ethos leads to effective school reforms and improvement in Hong Kong's school-based management. As such, the assessment of religious school character should be included in school self-evaluation. That said, the conceptual model of the Quality of School Life Scale (QSLS) differs from the revised model of the Student Voice Scale by Lankshear, Francis, and Eccles (2021), which fails to differentiate between stewardship of creation and relationship in schools as separate factors. It may reflect the characteristics of Chinese culture that prioritises harmony among people and cherishes interpersonal relationships, which are vital values for Hong Kong society. Despite students demonstrating care and respect for each other and value for the environment, the crucial aspect of stewardship, which refers to the responsible management and protection of the school's environment, has not been explicitly identified as a distinct component in the six-factor model of QSLS. Perhaps this may be attributed to the fact that many average schools in Hong Kong are small, surrounded by high-rise buildings, and lack purpose-built open areas for extracurricular activities. Hence, students do not consider taking pride in their school environment as imperative. Future studies on Asian communities may wish to delve deeper

into this aspect to determine the generalisability and applicability of the six-factor model of QSLS to students in religious schools.

In answering the second research question, *does a school's religious affiliation impact students' attitudes toward the school*, the present study revealed that school religious affiliation plays a significant role in shaping students' perceptions of the quality of school life, only to a varied extent. The study showed that students at Catholic schools had a higher overall rating of general school character, experience in schools, teachers and the staff, and religious school character than their counterparts from Protestant Christian and Taoist schools. One possible reason is that Catholic schools in Hong Kong have implemented three significant measures since 2018 to strengthen the implementation of religious education. These measures include specialised teaching in religious education, teacher professionalism in religious education, and introducing a post of Religious Education Coordinator (Chan 2019). As pointed out by Arnold, Woessmann, and Zierow (2022), Religious Education helps improve the religiosity of students, which in turn enhances students' perceptions of their quality of life by participating in various religious practices such as praying (Lankshear, Francis, and Eccles 2018). Therefore, reforming religious education in all Catholic schools in Hong Kong may promote students' attitudes towards school life by enhancing their religious affect. Besides, it has been observed that Buddhist school students tend to have a more positive outlook towards the general character of their school, school worship, and religious school character than their counterparts in Taoist schools. Notably, Buddhism and Taoism are East Asian philosophical and religious belief systems. The reason for this difference in attitude could be the higher emphasis on religious education in Buddhist schools. In a nutshell, school religious affiliation seems to be a significant factor affecting students' perceptions of their school.

Regarding the third research question, *do demographic factors influence students' attitudes toward school*, the findings of this study indicated that female students, younger and lower-grade students and students who attend worship services have more favourable attitudes towards school. These findings are consistent with previous studies by Francis, Lankshear, and Eccles (2022) and Lankshear, Francis, and Eccles (2021). Female students possess more positive attitudes towards religious aspects of their schools than their male counterparts. This is likely due to their higher religious affect, which makes them see their school in a more favourable light, especially with regard to religious aspects such as school worship, stewardship for the creation, and religious school characters (Francis 1992; Francis, Lankshear, and Wilkinson 2023; Lankshear, Francis, and Eccles 2018). Additionally, females tend to be more religious and more likely to embrace caring roles, identities, and values associated with religions (Schnabel 2018). In the same vein, younger and lower-grade students also tend to have higher religious affect than their older counterparts (Francis, Lankshear, and Wilkinson 2023; Lankshear, Francis, and Eccles 2018). On the other hand, older students (aged 13 to 17) may face a rebellious period during puberty, which may lead to disciplinary problems in class and a less favourable perception of school quality (Lai et al. 2015). Finally, students who attended worship services also tended to have more positive attitudes towards their religions, thus rendering a more positive perception of their school (Francis, Lankshear, and Wilkinson 2023; Lankshear, Francis, and Eccles 2018).

Students with high levels of religious affect, extraversion, and life satisfaction tend to score higher on all scales of the QSLS. Conversely, students with lower levels of toughmindedness also tend to score higher on the QSLS. These findings are consistent with previous studies conducted by Arslan and Akkas (2014), Lankshear, Francis, and Eccles (2017), and Village,

Francis, and Brockett (2011). According to Francis, Lankshear, and Wilkinson (2023), students with high levels of extraversion and low levels of toughmindedness are more likely to have positive attitudes towards their religion, which in turn positively affects their attitudes towards school. Piedmont (2005) notes that religious norms, beliefs, and attendance of religious services in schools can also play a role. Furthermore, Ash and Huebner (1998) state that the perceived quality of a student's school life is closely related to their life satisfaction. Therefore, the quality of a student's school experience can contribute to the unique variance in formulating their global life satisfaction. In summary, personal factors are significant in shaping student attitudes towards school.

Last, this study revealed a positive relationship between parents' attendance at religious places and their children's attitudes towards school worship and religious school character. These findings are consistent with previous research by Fawcett, Francis, and McKenna (2021), which indicated that when father and mother attend church, it positively impacts the religious beliefs of young Canadian Baptists, resulting in a more positive attitude towards school life. This is because parental religious values and beliefs are directly transmitted to their children through religious role modelling, echoing the previous study's notion (Francis 1993). Apart from the in-school factors, such as school religious affiliation and personal factors, like religious affect and personality, students' perceived quality of school life varies with an out-school factor, such as their parents' religious practices.

Limitations

There are limitations to this study that need to be acknowledged. First, all of the assessments made relied on self-reported data. There may be a standard method variance bias, which could inflate the correlations among the studied factors. Future research could gather data from various sources, such as teacher ratings on student attitudes towards school (e.g. Darom and Rich 1988). Second, it is uncertain whether there is a correlation between the dimensions of the personality scale (toughmindedness, anxiety and extraversion) and self-assigned religious affiliation. Such research gaps should be filled in future investigations. Last, the study solely included secondary students in Hong Kong, which may limit the generalisability of the findings to students from other regions. It is recommended that samples be recruited from Asian communities.

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Author contributions

Celeste Yuet Mui Yuen contributed to the conceptualisation and methodology of the study. K.H. Leung contributed to the overall statistical analysis with the assistance of Leslie J. Francis. Celeste Yuet Mui Yuen drafted the paper with the assistance of K.H. Leung. Stephen Lee contributed to data collection. All authors read and edited the manuscript and approved the submitted version. Celeste Yuet Mui Yuen formulated the project and obtained financial support from the Chinese University of Hong Kong.

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