Structural relationships among student teachers’ roles-strategies in promoting autonomous language learning

Nur Idayanto Pancoro Setyo Putro¹*, Yeni Fitri¹, Heri Retnawati¹, and Yasir Alsamiri²

¹English Language Education Department, Faculty of Languages and Arts, Universitas Negeri Yogyakarta, Colombo Street No 1, Yogyakarta, Indonesia.
²Department of Special Education, Faculty of Education, University of Hail, 70, Baqaa - Hail, Saudi Arabia

ABSTRACT
Evidence suggests that autonomous language learning has been one of the primary areas of interest in the field of English Language Teaching due to its fundamental roles in empowering students in taking the responsibility for their learning both in and out of the classroom. This study set out to investigate the structural relationships among the dimensions of English student teacher perception towards their roles and strategies in promoting autonomous language learning and professional autonomy. A total of 357 student teachers of English from Indonesia participated in this study. Eligibility criteria required the participants to have taken courses on English Language Teaching Methodology to ensure their understanding about the concepts of autonomous language learning and their future roles and strategies in fostering and promoting autonomous language learning. Structural Equation Modelling (SEM) with MPlus 7.2 was used to test the models proposed in this study. The findings showed that the dimensions of student teacher roles and strategies in promoting autonomous language learning and professional autonomy were weakly to moderately related to one another, suggesting how teacher education institutions need to provide sufficient trainings on the concept and practice of autonomous language learning. Several noteworthy findings are summarized and discussed thoroughly in the discussion section.

Keywords: Autonomous language learning; professional autonomy; roles; strategies; student teachers

INTRODUCTION
Evidence suggests that autonomous language learning (ALL), has received a considerable critical attention from researchers in the field of English Language Teaching (ELT) (Benson & Voller, 2014a; Borg & Alshumaimeri, 2019; Ceylan, 2015). Most of the research emphasize the prominent roles of ALL in enhancing the quality of language learning (e.g., Dema & Sinwongsuwat, 2020; Cira & López, 2020; Nugroho & Atmojo, 2020), encouraging learners to grab learning opportunities both in and out of the classroom (e.g., Cira & López, 2020; Putra, 2021), nurturing learners’ independence and responsibility, and promoting lifelong learners (e.g., Borg & Alshumaimeri, 2019; Ghazali, 2020; Lock et al., 2021; Moore, 2020). In the same vein, numerous previous studies have attempted to explain how learners autonomy in English language learning developed the learners ability to learn the language independently and act responsibly (Kumaravadivelu, 2008; Rubic & Matijević, 2019; Ryan & Deci, 2000) and how

* Corresponding Author
Email: nur_hidayanto@uny.ac.id
autonomous language learning enables the learners to develop effective strategies for individual learning, change and improve those strategies over time as the language learning progress (Alonazi, 2017; Benson & Voller, 2014a). Other studies highlight how autonomy in language learning plays a key role in EFL contexts where language learning mainly takes place in the classroom and learners do not have sufficient opportunities to practice the target language outside their classroom (Lengkanawati, 2017; Mynard, 2019). Moreover, autonomy in language learning is also believed to improve learners self-reliance which will in turn give positive implications to the learners in everyday life (Barnard, 2016). This implies that the learners’ autonomy in learning a language may also lead them to transform themselves to be independent in learning and life (Benson & Voller, 2014a).

Despite the importance of autonomous language learning in encouraging the language learners to be responsible and independent throughout their learning, the whole processes may not be effective without teachers’ roles and strategies (Benson & Voller, 2014a; Nguyen & Gu, 2013). This denotes the significant roles of teachers in promoting autonomous language learning (Mynard, 2019), especially in identifying how and to what extent autonomy helps their learners to become better language learners and finding strategies to provide such appropriate learning activities which enable the students to develop and enforce their learning to achieve autonomous learners.

One way to help the teachers empower themselves to foster autonomous learning is by making them totally aware of the value of their roles in promoting learners’ autonomy. They are more likely to respond positively to the promotion and implementation of autonomous learning in their classroom if they recognize the vitality of their roles (Benson & Voller, 2014a). In the same vein, Little (1995) stressed that teachers will not be able to promote students autonomy until the teachers begin with themselves by reflecting on their own beliefs, practices, experiences, and expectation of the teaching and learning. In other words, to effectively facilitate and promote an autonomous learning atmosphere, teachers need to adjust themselves into different roles in their teaching practice and find strategies to promote autonomous learning. They need to possess the ability to raise their students’ awareness to identify their learning goals and objectives, as well as to determine learning resources which help them to achieve those goals. Thus, scholars also have made a great contribution on expanding the teachers’ roles in promoting ALL (Benson & Voller, 2014a; Little, 1995). Moreover, Benson and Voller (2014a) voiced that to be able to promote autonomous language learning climate, the teachers should turn into a facilitator, counselor, and resource. It is in accordance with Juan and Yajie (2018) who argue that autonomous learning can be best achieved when teachers act as facilitator, counselor, and resource.

Teachers as facilitators signify the roles of EFL teachers in providing technical supports to their students by assisting them to prepare and take their independent learning such as specifying their needs, setting their goals, choosing resources, evaluating themselves, and help them to acquire both knowledge and skills needed. Besides, being a facilitator, teachers need to hand over psycho-social supports by transforming themselves to be supportive, help their learners to conquer challenges, and boost their awareness of the significance of independent learning (Benson & Voller, 2014b; Palfreyman & Benson, 2019; Yu, 2020). Teachers as a counselor focuses on their roles in providing students a one-to-one interaction to assist their students to be more self-directed which will later help their students realize that they can be independent learners (Mynard, 2019). When teachers play the role as counselor, they need to offer advice toward their students’ learning and help them achieve an efficient learning (Benson & Voller, 2014a, 2014b). By encouraging them to become more self-monitoring, this function can be realized, as well as providing feedback and supporting them towards the aims of their learning. As a resource, teachers are assumed as a source of information and knowledge (Benson & Voller, 2014a, 2014b). Here, teachers need to enhance the learning environment by creating an autonomous learning atmosphere in order to be able to promote learner autonomy. Finally, they need to encourage their students to become more aware of a diverse learning resources and strategies.

In addition to the understanding of their roles in promoting autonomous learning, teachers also need to find strategies to encourage and stimulate learners to take greater control of any aspects of their learning (Benson & Voller, 2014b; Kumaravadivelu, 2008; Nguyen & Gu, 2013; Oxford, 2016). Among these strategies are student teachers perception of strategies in promoting autonomous language learning in the classroom which include (1) providing resource-based approaches to promote learners’ independent involvement with learning materials and resources (Hermagustiana & Anggriyani, 2020; Nguyen & Gu, 2013; Senad et al., 2021), (2) preparing technology-based approaches to make the students independently interact with various educational technologies to support their learning (Benson, 2005; Lan, 2020), (3) equipping students with classroom-based approach which demand them to control over their planning and assessment of classroom learning (Raya & Vieira, 2015), and (4) administering curriculum-based approaches which extend the idea of learners control the curriculum.
To promote professional autonomy, that is, the professional independence of educators in making autonomous decisions about what they teach to students and how they teach it (Dilek & Atlas, 2022; Lubis, 2018), the following strategies are employed: (1) offering learner-based approaches which focus on the direct production of behavioral and psychological changes which help them to be able to control over their learning (Hsieh & Hsieh, 2019; Wang, 2011), and (2) applying teacher-based approach which indicates their roles in the practice of fostering students’ autonomy (Shi & Han, 2019).

Considering the crucial needs of teachers’ roles and strategies in promoting autonomous language learning, numerous previous studies have attempted to inquire into teachers’ roles and strategies in promoting autonomous language learning (Almusharraf, 2018; Alonazi, 2017; Ja, 2017; Lai et al., 2016; Nguyen & Gu, 2013). The majority of these studies explored the teachers and students’ beliefs and practice of learner autonomy (Borg & Alshumaimeri, 2019; Hermagustiana & Anggriyani, 2020; Lengkanawati, 2017), the significance of increasing the teachers’ knowledge and awareness of the different roles they must play to promote ALL (Lai et al., 2016), the need to play multiple roles and strategies in order to promote autonomous learning (Nguyen & Gu, 2013), the needs to possess adequate knowledge about the concept of autonomous learning and appropriate strategies to encourage students to learn independently (Alonazi, 2017; Ja, 2017; Juan & Yajie, 2018; Nguyen & Gu, 2013), and efforts to promote teachers roles and strategies in fostering autonomy to their students (Baru et al., 2020; Lengkanawati, 2017; Melvina & Suherdi, 2019).

Despite the many studies conducted to reveal the roles of teachers in promoting autonomous language learning, far too little attention has been paid on how EFL student teachers’ perception towards their roles in promoting autonomous language learning is related to their strategies in promoting autonomous language learning and professional autonomy. This study therefore is set out to investigate the structural relationships among the dimensions of student teachers of English perception towards their roles and strategies in promoting autonomous language learning. In the present study, structural relationship is defined as the relationships among the set of latent variables investigated in this study, which are estimated from observed indicator variables in which the relations among the latent variables are free of the influence of measurement errors (Wang & Wang, 2019). It is hoped that this research will contribute to a deeper understanding of English student teachers’ understanding and readiness to deal with their future responsibility and roles and strategies to promote ALL in their teaching practices as they should be prepared to know what roles they need to play toward the promotion and implementation of ALL.

METHOD
Respondents
A total of 357 student teachers of English from Indonesia participated in this quantitative study. Eligibility criteria required individuals to have taken courses on English language teaching methodology to ensure their understanding about the concepts of ALL and their future roles and strategies in fostering and promoting ALL. The respondents were recruited using random sampling to allow every student who met the criteria participated in this study. The sample of this study comprised 75.95% female and 25.05% male students. The sample had a substantially larger number of females than the Indonesian national average for the undergraduate student population (48% males and 52% females) (DIKTI, 2022). As this research employed structural equation modelling as the technique of data analysis, the minimum number of recommended sample size is met, i.e. 300 participants (Wang & Wang, 2019).

Instruments
This study involved the distribution of two kinds of questionnaires: (1) questionnaire on the student teachers’ perception of their roles in promoting autonomous language learning consisting of three dimensions (i.e. facilitator, counselor, and resource) and (2) questionnaire on student teachers’ perception of strategies in promoting autonomous language learning involving two dimensions (i.e. strategies in promoting autonomous language learning in the classroom and strategies in promoting professional autonomy). The first questionnaire consisted of 15 items which was adapted from the survey developed by Alonazi (2017). The second questionnaire was adapted from the survey developed by Chang (2007). This questionnaire consisted of 23 items. Limited adaptation on the wordings of the items was made to fit with the context of the present study. A 4-point scale was used for the respondents to indicate the extent to which they agreed or disagreed with each statement; i.e. (1) Strongly Disagree, (2) Disagree, (3) Agree, and (4) Strongly Agree. The two instruments were initially checked for their content validity and readability prior to the data collection.

An online invitation to participate in the study together with personal information consent form was sent via emails. Volunteer participants completed an online survey through Google form.

Data Analysis
Several hypothesized models were proposed and tested through Structural Equation Modelling (SEM) to examine the structural relationships among the
dimensions of EFL student teachers’ roles and strategies in promoting autonomous language learning constructs proposed by Benson and Voller (2014b) in this study. The models were built by considering (a) the theories of teachers’ roles and strategies in promoting autonomous language learning dimensions proposed by Benson and Voller (2014b) and (b) the empirical evidence of the standardised correlations of the variables shown in the study. Table 1 shows the detail of the models tested in this study.

Table 1 Hypothesized Models Tested in the Present Study

| Model | Dimensions tested | Tested relationships |
|-------|-------------------|----------------------|
| Model A | Student teachers’ roles in promoting autonomous language learning | Among the dimensions of student teachers’ roles in promoting autonomous language learning |
| Model B | Student teachers’ roles and strategies in promoting autonomous language learning | Among the dimensions of student teachers’ roles and strategies in promoting autonomous language learning |
| Model C | Student teachers’ roles and strategies in promoting autonomous language learning and professional autonomy | Among the dimensions of student teachers’ roles and strategies in promoting autonomous language learning and professional autonomy |

The SEM analysis was run with Mplus version 7.2 (Muthén, 2019). The model evaluative criteria employed to examine the SEM models comprise comparative fit index (CFI), Tucker-Lewis index (TLI), root mean square error of approximation (RMSEA), standardized root mean square residual (SRMR), and a ratio between chi-square (df) and chi-square (x²). CFI and TLI values greater than .90 indicate acceptable and good fit model. The values of RMSEA and SRMR under 0.08 indicate the model can be accepted and it fits the proposed model. Since the chi-square’s is considered to be sensitive to sample size which may lead to rejection of the null hypothesis of a good fit, chi-square is rarely used as a reason to reject a model (Wang & Wang, 2019). Instead, the rule of thumb for chi square statistic, i.e. a ratio of 1/3 or less between df and chi-square (x²) suggesting that the model is acceptable, is used in this study (Putro & Lee, 2017; Wang & Wang, 2019).

FINDINGS

The descriptive statistics of the factor scores from the Confirmatory Factor Analysis (CFA) are presented in Table 2. It includes information regarding the minimum and maximum values of factor scores, standard deviations, skewness, and kurtosis. The standardised factor scores with the mean being set at 0 were used in this study since this type of factor score is believed to be the best method when the original scales have different range of possible scores (Field, 2018).

Table 2 Descriptive Statistics of the Factor Scores (N = 357)

| Factor | Minimum | Maximum | Standard deviation | Skewness | Kurtosis |
|--------|---------|---------|--------------------|----------|----------|
| Staf   | -1.02   | .50     | .30524             | .093     | -1.054   |
| Stac   | -.85    | .46     | .32920             | -.190    | -1.293   |
| Star   | -.62    | .53     | .34608             | .163     | -1.081   |
| Stsi   | -.66    | .47     | .33263             | .183     | -1.243   |
| Stso   | -.66    | .47     | .31038             | -.008    | -1.339   |

Similarly, there were relatively more student teachers who reported their possession of roles in promoting autonomous language learning as a counsellor than those who reported otherwise. The
data in Table 2 also illustrates that “Strategies in promoting professional autonomy” has the largest negative value of kurtosis (-1.339). Thus, the distribution of scores in Strategies in promoting professional autonomy is slightly more dispersed than the normal distribution, with a few more extreme scores at the low end of the distribution.

The Correlation Among the Student Teachers’ Roles and Strategies in Promoting Autonomous Language Learning

Table 3 presents the correlation matrix from the five factors. A closer look at the correlation among the five factors shows that there are strong correlations between the student teachers roles in promoting autonomy in EFL learning and their strategies in promoting autonomy in EFL learning, e.g. between student teachers’ roles in promoting autonomous language learning as facilitator and their strategies in promoting autonomous language learning as counsellor and their strategies in promoting professional autonomy (r = .801). These strong correlations indicate that teachers roles in promoting their students autonomy in language learning are linked to their strategies in promoting their students ALL and professional autonomy. Therefore, considering the theories of teachers’ roles and strategies in promoting autonomous language learning dimensions proposed by Benson and Voller (2014a) and the empirical evidence of the standardised correlations of the variables shown in the previous runs of analysis in the study, subsequent analysis, i.e. structural equation modelling with MPlus 7.4 were performed to investigate how the five factors may link to one another.

Staf: Roles in promoting autonomous language learning as facilitator; Stac: Roles in promoting autonomous language learning as counselor; Star: Roles in promoting autonomous language learning as resource; Stsi: Strategies in promoting autonomous language learning; Stso: Strategies in promoting professional autonomy.

Table 3
The Correlation Matrix

|       | staff | stac | star | stsi | stso |
|-------|-------|------|------|------|------|
| staf  | 1.000 |      |      |      |      |
| stac  | .719  | 1.000|      |      |      |
| star  | .777  | .815 | 1.000|      |      |
| stsi  | .805  | .767 | .769 | 1.000|      |
| stso  | .615  | .801 | .752 | .820 | 1.000|

Structural Relationships Among the Student Teachers Roles and Strategies in Promoting Autonomy

The investigation of whether and how the three factors within EFL student teachers’ roles in promoting ALL and the two factors within their strategies in promoting autonomy are related to each other was conducted through structural equation modelling (SEM). The models were built with regard to the previous studies showing how roles and strategies of promoting autonomous learning are related (Alonazi, 2017; Benson & Voller, 2014b; Juan & Yajie, 2018).

Structural Relationships Among Student Teachers’ Roles in Promoting Autonomy

The first model tested in this study (see Figure 1) was constructed to examine the relationships among the student teachers’ roles in promoting autonomy in language learning. This model reflects four propositions: (a) teachers’ roles in promoting autonomous language learning as facilitator is positively linked to their roles in promoting autonomous language learning as counselor; (b) teachers’ roles in promoting autonomous language learning as facilitator is moderately related to their roles in promoting autonomous language learning as resource and (c) teachers’ roles in promoting autonomous language learning as counsellor facilitates their roles in promoting autonomous language learning as resource (Alonazi, 2017; Benson & Voller, 2014b; Juan & Yajie, 2018).

Staf: Roles in promoting autonomous language learning as facilitator; Stac: Roles in promoting autonomous language learning as counselor; Star: Roles in promoting autonomous language learning as resource.

Of the many tested models with these three constructs, Model A was determined the best presentation of the data. The model yielded good fit indices ($\chi^2 = 166.58$, df = 101, $\chi^2$/df = 1.64, RMSEA = .04, SRMR = .04, CFI = .96, and TLI = .95).

Table 4 provides the standardised parameter estimates and standard errors.

Table 4
Standardised coefficients, standard errors, estimated standard errors, and p-value for Model A

| Path          | Estimate | S.E. | Est./S.E. | Sig. |
|---------------|----------|------|-----------|------|
| Staf to Stac  | .72      | .06  | 12.99     | .00  |
| Staf to Star  | .38      | .08  | 4.72      | .00  |
| Stac to Star  | .54      | .07  | 7.41      | .00  |

Model A shows that student teachers’ “roles in promoting autonomous language learning as facilitator” were significantly associated with their “roles in promoting autonomous language learning as counselor” ($\beta = .72$, p < .01) and “roles in
promoting autonomous language learning as counselor” was also significantly linked to “roles in promoting autonomous language learning as resource” (β = .54, p < .01).

Figure 1
Model A

Structural Relationships Among Student Teachers’ Roles in Promoting Autonomy and Strategies in Promoting Autonomous Learning

The second model, i.e. Model B (see Figure 2) was constructed to examine the relationships among the student teachers’ roles and strategies in promoting autonomy dimensions. This model was built to reflect the literature suggesting that teachers roles in promoting autonomous language learning are positively linked to their strategies in promoting autonomous language learning (Alonazi, 2017; Benson & Voller, 2014b; Juan & Yajie, 2018).

Figure 2
Model B

Staf: Roles in promoting autonomous language learning as facilitator; Stac: Roles in promoting autonomous language learning as counselor; Star: Roles in promoting autonomous language learning as resource; Stsi: Strategies in promoting autonomous language learning

Model B is an extension of Model A with some additional paths going from the dimensions of teachers’ roles in promoting autonomous learning to that of teachers’ strategies in promoting autonomous learning. After testing several options, the final model was chosen in which student teachers’ “roles in promoting autonomous language learning as facilitator” were significantly linked to their “roles in promoting autonomous language learning as counselor” (β = .72, p < .01), “roles in promoting autonomous language learning as resource” (β = .38, p < .01) and “strategies in promoting autonomous language learning” (β = .40, p < .01). The student teachers’ “roles in promoting autonomous language learning as counselor” were also significantly related to their “roles in promoting autonomous language learning as resource” (β = .55, p < .01) and “strategies in promoting autonomous language learning” (β = .24, p < .01). Finally, student teachers “roles in promoting autonomous language learning as resource” is positively connected to “strategies in promoting autonomous language learning”.
language learning” (β = .29, p < .01), his model yielded good fit (χ² = 355.06, df = 244, χ²/df = 1.4, RMSEA = .04, SRMR = .04, CFI = .95, and TLI = .94). The standardized parameter estimates and standard errors of the pathways included in this model are presented in Table 5.

### Table 5
**Standardised coefficients, standard errors, estimated standard errors, and p-value for Model B**

| Path        | Estimate | S.E. | Est./S.E. | Sig. |
|-------------|----------|------|-----------|------|
| Staf to Stac| .72      | .06  | 13.11     | .00  |
| Staf to Star| .38      | .08  | 4.65      | .00  |
| Stac to Star| .55      | .07  | 7.42      | .00  |
| Star to Stso| .29      | .13  | 2.34      | .02  |
| Stac to Stsi| .24      | .11  | 2.21      | .03  |
| Staf to Stsi| .40      | .09  | 4.37      | .00  |

### Structural Relationships Among Student Teachers’ Roles in Promoting Autonomy and Strategies in Promoting Autonomous Learning and Professional Autonomy

The last model in this study, i.e., Model C is an extension of Model B with some additional paths going from the dimensions of teachers’ roles in promoting autonomous learning to that of teachers’ strategies in promoting professional autonomy. The model was constructed to reflect the propositions that teachers’ roles in promoting autonomous language learning facilitate their strategies in promoting professional autonomy. Model C presented in Figure 3 yielded good fit (χ² = 646.22, df = 395, χ²/df = 1.64, RMSEA = .04, SRMR = .05, CFI = .93, and TLI = .92). The standardised path coefficients among the five dimensions were all significant, ranging from β = .24 to β = .72, with the highest path coefficient from student teachers “roles in promoting autonomous language learning as facilitator” was significantly linked to their “roles in promoting autonomous language learning as counselor” (β = .72, p < .01), “roles in promoting autonomous language learning as resource” (β = .38, p < .01) and “strategies in promoting professional language learning” (β = .40, p < .01). Other pathways were identified as moderate to weak relationships. Student teachers’ “roles in promoting autonomous language learning as counselor” were significantly related to their “roles in promoting autonomous language learning as resource” (β = .54, p < .01), “strategies in promoting autonomous language learning” (β = .24, p < .01), and strategies in promoting professional autonomy” (β = .44, p < .01). “Roles in promoting autonomous language learning as resource” were significantly connected to “strategies in promoting autonomous language learning” (β = .29, p < .01).

Staf: Roles in promoting autonomous language learning as facilitator; Stac: Roles in promoting autonomous language learning as counselor; Star: Roles in promoting autonomous language learning as resource; Stsi: Strategies in promoting autonomous language learning; Stso: Strategies in promoting professional autonomy.

The model that showed the best fit to the data is presented in Figure 3. In fact, it is an extension of Model B with additional paths going from the dimensions of student teachers’ roles in promoting autonomous learning to that of teachers’ strategies in promoting professional autonomy, and from that of student teachers’ strategies in promoting autonomous learning to that of teachers’ strategies in promoting professional autonomy.

Figure 3

*Model C*
Surprisingly, although “roles in promoting autonomous language learning as facilitator” are related to “strategies in promoting autonomous language learning” (β = .40, p < .01), this dimension is not significantly related to “strategies in promoting professional autonomy”. Finally, the path from “strategies in promoting autonomous language learning” was also significantly related to “strategies in promoting professional autonomy” (β = .61, p < .01). The standardized parameter estimates and standard errors of the pathways included in this model are presented in Table 6.

**Table 6**

| Path          | Estimate | S.E. | Est./S.E. | Sig. |
|---------------|----------|------|-----------|------|
| Staf to Stac  | .72      | .06  | 13.11     | .00  |
| Staf to Star  | .38      | .08  | 4.69      | .00  |
| Stac to Star  | .54      | .07  | 7.40      | .00  |
| Star to Stsi  | .29      | .12  | 2.37      | .02  |
| Stac to Stsi  | .24      | .11  | 2.20      | .03  |
| Staf to Stsi  | .40      | .09  | 4.41      | .00  |
| Star to Stso  | .29      | .13  | 2.18      | .03  |
| Stac to Stso  | .59      | .12  | 4.79      | .00  |
| Stsi to Stso  | .61      | .12  | 5.21      | .00  |

**DISCUSSION**

This study set out to examine the relationships among student teachers’ roles in promoting autonomous language learning, strategies in promoting autonomous language learning and strategies in promoting professional autonomy. The relationships among the student teachers’ roles in promoting autonomous language learning dimensions were examined first. Subsequently, the relationships among the student teachers’ roles in promoting autonomous language learning dimensions and student teachers’ strategies in promoting autonomous language learning were examined. Then, the final model was tested by adding the dimension of student teachers’ strategies in promoting professional autonomy. Several noteworthy findings are summarized and discussed in this section.

First, the dimensions of teachers’ roles in promoting autonomous learning, i.e. facilitator, counselor and resources were weakly to strongly related to one another. The weak correlation signifies that as the pre-service teachers’ perception on their roles as facilitator increases, their perception on their roles as resource also slightly increases (and vice versa), while the strong correlation signifies that as the pre-service teachers’ perception on their roles as facilitator considerably increases, their perception on their roles as counselor also substantially increases (and vice versa). This finding supports the previous research that teachers’ roles in promoting autonomous language learning comprised of three types, namely facilitator, counsellor, and resource (Alonazi, 2017; Shi & Han, 2019; Tran & Duong, 2020; Yasmin et al., 2017) and that the promotion of learner autonomy relies greatly on the teachers’ awareness of these crucial roles (Alonazi, 2017; Basri, 2020; Tran & Duong, 2020). Therefore, since the English student teachers are the ones who will interact regularly with the students in their future teaching, they are expected to develop the ability to stimulate their students’ autonomy in learning which will then in turn promote themselves to possess self-determination motivation (Duchatelet & Donche, 2019; Gillison et al., 2019; Ryan & Deci, 2000; Syafryadin et al., 2022; Yu, 2020). Thus, this result corroborates the findings of a great deal of the previous work in the sense that English student teachers need to understand and nurture their significant roles and support their students’ processes of decision making and stimulate their interest in learning by being a facilitator, care for their students’ needs by being a counselor, and become a resource who provides knowledge, references, and additional materials for their students’ learning (Raya & Vieira, 2015; Nguyen & Gu, 2013; Senad et al., 2021). By doing so, they can produce a positive autonomous learning atmosphere which encourages their students to be autonomous language learners. Student teachers who are willing to adopt autonomy-supportive teaching style are expected to possess the ability to promote and foster their students to be autonomous language learners and predict higher self-determined motivation in their students (Duchatelet & Donche, 2019; Gillison et al., 2019; Ryan & Deci, 2000; Yu, 2020). Consistent with the literature, this research found that English teachers will need to facilitate their students’ learning, which will in turn stimulate their intrinsic motivation, higher perceived competence, and higher academic achievement (Duchatelet & Donche, 2019; Gillison et al., 2019; Ryan & Deci, 2000; Tran & Duong, 2020). On the contrary, student teachers who cannot adjust themselves to possess and use their roles in promoting autonomous language learning will not bring beneficial changes in their students. They may even shape extrinsic motivation and negative emotions toward learning, particularly in learning English (Boonma & Swatevacharkul, 2020; Ryan & Deci, 2000).

Second, Model B shows that student teachers roles in promoting autonomous language learning as facilitator, counselor and resource are weakly to moderately related to their strategies in promoting autonomous learning. These findings may have something to do with the fact that student teachers understanding and awareness of their significant roles in promoting autonomous language learning may lead to their strategies in promoting...
autonomous language learning. These findings were consistent with the previous studies by Vázquez (2018) and Nasri et al. (2017) which confirmed the urgent need of trainings on the teachers roles and strategies in promoting autonomous language learning during the teacher education for both preservice and in-service teachers (e.g., Teachers Professional Program a.k.a. PPG) to ensure the engagement of autonomous language learning in their teaching practice. In other words, to possess the ability to promote learner autonomy in their future teaching, the student teachers should be trained to get a better understanding of their roles and strategies in providing chances for their students to be responsible for their own learning. This may help them realize the urgency that they need to recognize their roles in encouraging autonomous language learning and prepare an atmosphere in which their students can experience autonomous learning (Little, 1995).

To do so, English student teachers need to nurture the sense in engaging a number of strategies to support students to develop their autonomy in language learning (Alonazi, 2017; Boonma & Swatevacharkul, 2020; Reinders & Benson, 2017). These strategies involved helping the students to identify their strengths and weaknesses, helping the students to set up their own learning goals, helping the students to decide what to learn outside of the classroom, helping the students to evaluate their own learning and progress, helping the students to stimulate their own interest in learning English, helping the students to become more self-directed in their learning, and giving the students chances to offer opinions during learning processes.

Third, the current study also revealed significant paths from the roles in promoting autonomous language learning as counselor and strategies in promoting autonomous language learning to strategies in promoting professional autonomy. This finding indicates that English student teachers roles and strategies in promoting autonomous language learning will in turn lead them to possess and develop professional autonomy in their life. These results corroborate the findings of a great deal of the previous work in the importance of strategies that can be used by student teachers to gain professional autonomous teachers in their future practice (Ceylan, 2015; Humphreys & Wyatt, 2014; Ravandpour, 2019). A possible explanation for this result is that student teachers need to understand and develop some strategies to promote their own professional autonomy in the future. Among these strategies are identifying their own strengths and weaknesses in teaching (Ceylan, 2015; Humphreys & Wyatt, 2014; Mynard, 2019), setting up their own teaching and learning goal (Pardo & Téllez, 2009), deciding what to learn outside of the classroom (Mynard, 2019; Nugroho & Atmojo, 2020; Reinders & Benson, 2017), evaluating their own teaching and learning progress, stimulating their own interest in teaching and learning English, learning from colleagues at the school and those outside the school, and becoming self-directed in improving their teaching (Humphreys & Wyatt, 2014). These strategies are among other strategies that the student teachers can develop and use to encourage a career as a successful autonomy-supportive teacher in the future.

CONCLUSION

The objective of the current study was to examine the structural relationships among the dimensions of English student teachers’ perception towards their roles and strategies in promoting autonomous language learning and professional autonomy. Structural Equation Modelling revealed that the dimensions were weakly to moderately associated to one another. This study has raised important questions about the need for sufficient trainings provided to the student teachers of English in relation to their understanding and practice of autonomous language learning and professional autonomy. Therefore, teacher training institutions need to provide the student teachers with autonomy-oriented trainings in term of theories, strategies, and practices, which will in turn help them to apply what they learn at schools. Also, the present study denoted that the student teachers are expected to recognize that they need to prepare these strategies to facilitate them in the process of promoting autonomous language learning in their classroom context in the future.

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