

## Filling the Gap: Improving the Social and Emotional Competencies of Pre-Service Teachers

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### Abstract

Although research carried out over the last few decades into Social and Emotional Learning (SEL) has shown the benefits this can have for the well-being and success of both children and teachers, alike, little work has been done with regard to teacher training. The present study explores the impact of a training program focusing on SEL, implemented in a pre-service teacher curriculum. Through an experiential and collaborative methodology, this compulsory subject aims to develop students' emotional competencies (self-esteem, empathy, affect), as well as their social competencies (assertiveness, communicative competencies). It was conducted a quasi-experimental study with 250 students who completed several well-known scales in pre-test, post-test assessment and control groups. After controlling for personality traits, findings point to significant effects in favor of the experimental group, who increased self-esteem, empathy and confidence when speaking in public, while fear of public speaking, and negative affect was seen to decrease significantly.

*Keywords:* higher education, pre-service teachers, quasi-experimental, social and emotional learning.

### Resumen

Aunque la investigación realizada sobre el Aprendizaje Socio Emocional (SEL, en inglés), ha demostrado beneficios para el bienestar personal y el éxito, poco se ha investigado al respecto en la formación del profesorado. Es objeto de este artículo presentar el impacto de un programa de entrenamiento en SEL, implementado en el currículo de Magisterio. Con una metodología experiencial y colaborativa, se pretende desarrollar las competencias emocionales (autoestima, empatía, afectividad), así como las competencias sociales (asertividad, competencias comunicativas). Se ha utilizado una investigación de diseño cuasi-experimental con una muestra de 250 estudiantes, grupo control y medidas pre y post-test mediante diversos instrumentos validados. Tras controlar los rasgos de personalidad, los resultados en el grupo experimental informan de un aumento significativo en las variables de autoestima, empatía y confianza para hablar ante público, así como de una disminución significativa del miedo en la comunicación ante público y de las emociones negativas experimentadas.

*Palabras clave:* educación superior, profesorado en formación, cuasi-experimental, aprendizaje social y emocional.

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## Introduction

The twentieth century witnessed growing interest in the study of Social and Emotional Competencies (SEC), as learning to be and to live together (Delors, 1996) and their influence on learning and social adjustment. More recently, various professionals in the education system have concurred on the importance of understanding and managing both, one's own feelings as well as the ones from the others, in everyday life, and in engaging in effective educational processes. Extensive developmental research indicates that effective mastery of SEC is associated with greater well-being and better school performance whereas the failure to achieve competence in these areas can lead to a variety of personal, social, and academic difficulties (Eisemberg, Damon, & Lerner, 2006). In order to get these benefits, teachers should acquire SEC to be able to conduct Social and Emotional Learning (SEL) programs.

Thus, researchers posit the need to promote SEL, not only for children but also for teachers themselves (Greenberg et al., 2003; Mansfield, Beltman, Broadley, & Weatherby-Fell, 2016). Moreover, the U.K. Department of Education and Skills carried out a study called the Every Teacher Matters Report (Bassett, Haldenby, Tanner, & Trehwitt, 2010), which concludes by recommending specific development of SEC, not only in schools but also in teacher training institutions, based on the idea that a competence which has not been acquired cannot be taught, since quality teaching is not possible without teacher welfare. Taking all of this into account, we designed a new subject into the curricula of both Kindergarten and Elementary Education Degrees for promoting basic student's competencies, focused on SEC for future teachers.

Recent meta-analysis conducted on SEL training programs with children (Durlak, Weissberg, Dymnicki, Taylor, & Schellinger, 2011) showed that SEL participants, compared to controls, demonstrated a significant improvement in SEC. However, only few experiences, and validation studies associated, were found for training teachers on SEL. One study conducted by Byron (2001) reported effectiveness with in-service novice teachers, showing emotional competencies increased after training by a seminar. Two experiences with pre-service teachers, showed significant results increasing personal competencies and well-being. First, training students on corporal-mind techniques (Yoga, Mindfulness, Taichi) during 16 group-sessions of 30 minutes, decreased anxiety and stress (Gallego, Aguilar-Parra, Cangas, Rosado, & Langer, 2016) compared with control group; the second study is a 40-hours optative subject, which uses dramatization techniques for training SEC; author showed through qualitative analysis an increase on their student's motivation to use SEC on future as teachers and a better perception of their emotional awareness, expression and regulation (Núñez-Cubero, 2008).

The extent in which this need to train teachers in emotional skills is covered by the teaching curricula offered by institutions in Europe were researched by López-Goñi and Goñi (2012) founding emotional skills at a low position within the group of teaching skills. Authors call for more attention to teacher's emotional skills, as they are the foundation for healthy and long-lasting professional development.

## What is social and emotional learning?

We use the broadly accepted definition developed by the Collaborative for Academic, Social and Emotional Learning (CASEL, 2005) of SEL as the process of promoting the development of five interrelated competencies (SEC). Thus, a socially and emotionally competent teacher will display high levels of:

**Self-awareness (SEC1):** accurately assessing one's feelings, interests, values, and strengths; maintaining a well-grounded sense of self-confidence. Teacher's self-efficacy and self-esteem has a positive influence of diminishing teacher stress (Reilly, Dhingra, & Boduszek, 2014) as well as increasing job satisfaction. Oral Communication is one of the principal resources in teaching, and university students frequently show 'communicative apprehension' (fear, anxiety in communication) with important consequences over their achievement, and well-being (Horwitz, 2002).

**Self-management (SEC2):** regulating one's emotions to handle stress, impulse controlling, and persevering in overcoming obstacles; setting and monitoring progress toward personal and academic goals; expressing emotions appropriate. Regulating emotions competence influence teacher's frequency of positive and negative daily affect, what is inversely related with burnout levels (Brackett, Palomera, Mojsa-Kaja, Reyes, & Salovey, 2010), and predicts positive teaching climate and students well-being (Sutton & Harper, 2009). Increase frequency of positive emotions and decrease negative ones is expected as an indirect effect of emotion regulation training in the SEL program.

**Social awareness (SEC3):** being able to take the perspective of others and empathize; recognizing and appreciating individual and group similarities and differences. Sinclair and Fraser (2002) found an improvement in the classroom environment of teachers who had participated in training with a component aimed at enhancing empathy. In the same line, Barr (2011) observed that teachers' perspective-taking was positively associated with their positive perceptions of student-peer relations, school norms and educational opportunities.

**Relationship skills (SEC4):** establishing and maintaining healthy and rewarding relationships based on cooperation; resisting inappropriate social pressure; preventing, and resolving interpersonal conflict. Ee and Chang (2010) proposed that assertiveness training would be useful for pre-service teachers to enable them to advocate for themselves, work effectively with administrators, colleagues and parents and ask for the support and assistance they need on the job.

**Responsible decision-making (SEC5):** making decisions based on consideration of ethical standards, safety concerns, appropriate social norms, respect for others, and likely consequences of various actions.

Because of the findings exposed above, the teacher's SEL program presented focus on development of SEC 1 to 4 (since SEC 5 is already trained through different teacher curricula subjects).

## SEL program design

The main objective of the new university subject is to provide SEL training following the SAFE (progressive sequenced, using active methodology, focused on specific competencies and explicitly trained) success criteria emerged from meta-analysis research conducted in schools (Durlak et al., 2011) as well as

recommendations from cited literature concerning effective SEL methodology with adult groups (Kornacki & Caruso, 2007): start with group cohesion dynamics, use personal experiences to work on it, self-assessment and feedback. In this sense, the program is designed to be progressive and to cover from basic emotional competencies to social ones, with specific time and products associated to each, in addition to active and cooperative methodology.

The course took place during the second term of the first year as a compulsory subject and lasts ten weeks with two sessions of two hours training each (40 hours total). Training was conducted in usual university classes of around 50-60 people. The first two weeks, students were organized in small groups by randomization with the objective to deep study in a specific SEC of the program (called 'expert group' of each SEC); at the same time, group cohesion dynamics took place along teacher presentation of SEL framework. After this, every two weeks, teacher introduced a new SEC framework (following this order: self-esteem; emotional regulation; empathy; assertiveness and social skills) and proposed individual and group practices (e.g. role-playing, case studies, video analysis, self-reports, group dynamics), with the help of student's expert groups, who delivers complementary theory knowledge and manages in the classroom an applied work they have designed (under teacher's supervision), in order to practice the competence with their classmates. They got feedback on audiovisual recordings and received a score in relation to several exit criteria: group coordination, communication skills, quality of contents exposed, and creativity in the practice design. Also, students became involved with assessment through self and hetero-reports, using a rubric related with attitudes and commitment with expert group activities. Extra-scholar activities were also recommended for learning generalization. Teacher acts as a coach: guiding the process of understanding the theory as well as the expert group activities; tutoring the experiential activities; facilitating cohesion and a climate of confidence in the classroom, as well as trying to be a model.

### **Objective and context of this study**

The present study is based on the implementation of a specific subject for SEL integrated into the compulsory curriculum of pre-service teachers. Yet, was this training effective? Did it bring about any changes in students' competencies? The objective is to explore the impact of the training program on pre-service teachers' SEC. The hypotheses derived from the literature are:

Hypothesis 1: Students who are trained with the SEL program will increase their self-esteem (SEC1), empathy (SEC3), positive affect (SEC2), assertiveness (SEC4), and confidence and assurance as speakers (SEC1) while the control group will not.

Hypothesis 2: Students who are trained with the SEL program will experience a decrease in their negative affect (SEC2) and fear of speaking in public (SEC1) while the control group will not.

Hypothesis 3: These results will be significant when personality traits are controlled for.

## Method

### Research design and participants

This is a quasi-experimental design with an experimental ( $n = 192$ ) and a control group ( $n = 58$ ) as well as pre-post-test measures. The sample was intentional, counting with all the students of the public Faculty of Education where the SEL program described above is implemented. The control group was obtained from two different public Faculties of Education with similar socio-cultural context, size and basic curriculum. A total sample of 250 first year undergraduate university students (82.8% women) of Kindergarten ( $n = 129$ ) and Elementary Education ( $n = 121$ ) Degrees with a mean age of 20.81 years old ( $SD = 3.22$ ) participated in the study, which is a representative profile of the pre-service teacher population. At Time 1, the sample consisted of 381 students, meaning that 65.62% of the students participated in both measures (Time 1 and Time 2), composing the final sample. In the training group, called here the experimental group, 80.7% were females, and the mean age was 20.97 years old ( $SD = 3.39$ ); in the control group, females accounted for 89.7% and the mean age was 20.28 years old ( $SD = 2.55$ ). There were no significant differences between the two groups in terms of age [ $t(248) = 1.44, p = .15$ ] and gender [ $\chi^2(1, 250) = 2.49, p = .11$ ].

### Instruments

Several tools were selected to assess the main specific SEC taught.

#### Self-esteem

Students' rating of self-esteem was measured using Spanish adaptation for university students by Martín-Albo, Núñez, Navarro and Grijalvo (2007) of the Rosenberg Self-Esteem Scale (RSES, Rosenberg, 1965). This scale consists of 10 items (e.g. "I am able to do things as well as most other people") rated on a 4-point Likert scale (1 = "strongly agree"; 4 = "strongly disagree").

#### Empathy

Students self-reported their empathy through the Spanish adaptation of the Interpersonal Reactivity Index (IRI, Pérez-Albéniz, De Paúl, Etxebarria, Montes, & Torres, 2003) using a 5-point Likert scale (1="It does not describe me well"; 5= "It describes me very well"). The 28 items comprise four subscales, each corresponding to one of the four different dimensions of *empathy*: 7 questions to measure perspective-taking (PT: "I believe there are two sides to every question and try to look at them both"); another 7 questions for *fantasy* (F: "I really get involved with the feelings of the characters in a novel"); 8 questions measuring *empathic concern* (EC: "I would describe myself as a pretty soft-hearted person"); and 6 questions dealing with *personal distress* (PD: "I tend to lose control during emergencies").

### **Positive and negative affect**

The Positive and Negative Affect Schedule (PANAS) Spanish adaptation measures the *positive and negative affect* of participants through 10 items each (Sandín et al., 1999). Participants were asked to indicate to what extent they generally experience positive and negative emotions on a 5-point Likert scale (1 = “Very slightly or not at all”; 5 = “Extremely”).

### **Assertiveness**

Students self-reported *hetero-assertiveness* answering 15 items (e.g. “I get angry when I see the ignorance of some people”) from the ADCA-1 (García-Pérez, & Magaz Lago, 2011) on a 4-point Likert scale of frequency (1 = “Never or hardly ever”; 4 = “Always or almost always”).

### **Social communicative anxiety and confidence**

These variables were measured with the abbreviated Spanish version (Méndez, Inglés, & Hidalgo, 1999) of the Personal Report of Confidence as Speaker (PRCS). Participants responded to 12 items using a 6-point Likert scale (1= “Strongly disagree”; 6= “Strongly agree”). This version has two sub-dimensions with 6 items each: *assurance when speaking in public* (CS: “I feel relaxed when giving a speech”) and *fear of speaking in public* (FS: “I am tense and nervous while participating in a group discussion”). Confidence when speaking in public was computed with the 12 items.

### **Personality**

Participants completed the abbreviated Spanish version called NEO Five-Factor Inventory (NEO-FFI; McCrae, & Costa, 2004); consisting of 12 items using a 5-point Likert scale ranging from 1 (“Strongly disagree”) to 5 (“Strongly agree”) for each dimension: *neuroticism, extraversion, openness, agreeableness and, conscientiousness*.

### **Procedure**

Participating students were surveyed at the start and at the end of the second term. At the beginning of the course, they filled out an informed consent form to participate voluntarily and to allow their data to be used in research and for teaching purposes. They were given access with an anonymous code to an online platform to fill out the instruments individually. They completed them with the attendance of the researcher in a computer room at university for an hour. The instruments were administrated following the same order as presented in the section above.

### **Statistical analysis**

A classical study conducted by Davis, Stankov and Roberts (1998) advised how self-report measures of SEC show salient loadings on well-established personality traits, so in this study they will be controlled. Three reliability indexes were calculated

for each variable: Cronbach's alpha using SPSS and, Average Variance Extracted (AVE) and Composite reliability (CR) using AMOS (Table 1). Cronbach's alpha and CR are considered acceptable with values upper 0.70 and AVE with values equal or higher 0.5, although this last minimum is too conservative and is usually accepted scales with lower AVE (Fornell, & Larcker, 1981). A mean student composite score was calculated for each measure and subscale at each time point. Analyses were conducted using IBM SPSS 19.0 statistic program. Firstly, the descriptors of all the variables used in the study were calculated (Table 1). Secondly, through exclude cases listwise selection, GLM repeated measures were conducted in each variable controlling the personality factors as covariates (Table 2). The assumptions of normality, linearity, homogeneity of variances and reliable measurement of covariates were previously checked.

## Results

### Descriptives

Table 1 shows the pre and post-test adjusted means and standard errors for all the variables in the two types of study group: experimental and control.

Table 1

*Pre and Post-test Statistics and Reliability of all Variables*

Variables	Pre-test			Post-test		
	Experimental adjM(SD)	Control adjM(SD)	Reliability $\alpha$ CRAVE	Experimental adjM(SD)	Control adjM(SD)	Reliability $\alpha$ CRAVE(%)
<i>Self-Esteem</i>	2.92 (0.03)	2.96 (0.05)	.87 .88 43.10%	3.08 (0.03)	2.97(0.05)	.89 .89 45.49
<i>Perspective-Taking</i>	3.47 (0.04)	3.44 (0.08)	.75 .75 32.51%	3.57 (0.04)	3.48 (0.07)	.74 .76 32.10
<i>Fantasy</i>	3.39 (0.05)	3.08 (0.09)	.78 .79 36.83%	3.47 (0.06)	2.95 (0.11)	.86 .87 49.70
<i>Empathic concern</i>	4.03 (0.03)	4.09 (0.06)	.63 .61 20.73%	3.96 (0.04)	3.89 (0.07)	.71 .71 25.64
<i>Personal distress</i>	2.83 (0.05)	2.68 (0.09)	.76 .76 35.63%	2.83 (0.05)	2.72 (0.08)	.78 .78 39.48
<i>Confidence as sp.</i>	3.32 (0.07)	3.38 (0.13)	.94 .95 61.28%	3.64 (0.07)	3.47 (0.13)	.94 .95 63.25
<i>Fear sp.</i>	3.58 (0.08)	3.19 (0.14)	.89 .89 57.72%	3.22 (0.08)	3.13 (0.14)	.89 .89 57.93
<i>Assurance sp.</i>	3.21 (0.08)	2.96 (0.14)	.92 .92 64.85%	3.51 (0.08)	3.06 (0.14)	.93 .93 68.56
<i>Positive affect</i>	3.47 (0.04)	3.47 (0.07)	.79 .79 28.12%	3.45 (0.04)	3.38 (0.07)	.77 .79 29.44
<i>Negative affect</i>	2.46 (0.04)	2.44 (0.08)	.79 .80 29.02%	2.36 (0.05)	2.63 (0.05)	.85 .86 37.50
<i>Assertiveness</i>	2.47 (0.03)	2.49 (0.05)	.79 .79 19.90%	2.52 (0.03)	2.45 (0.06)	.85 .85 27.59
Covariables						
<i>Neuroticism</i>	3.00 (0.68)	2.84 (0.69)	.85 .85 34.05%	2.89 (0.70)	2.81 (0.68)	.88 .87 37.28
<i>Extraversion</i>	3.74 (0.58)	3.91 (0.55)	.85 .84 31.48%	3.77 (0.64)	3.81 (0.65)	.89 .88 38.48
<i>Openness</i>	3.33 (0.58)	3.35 (0.65)	.80 .79 25.88%	3.34 (0.61)	3.19 (0.60)	.81 .81 27.60
<i>Agreeableness</i>	3.65 (0.46)	3.77 (0.40)	.64 .69 16.76%	3.68 (0.46)	3.72 (0.45)	.69 .71 17.88
<i>Conscientiousness</i>	3.52 (0.53)	3.51 (0.57)	.80 .82 29.80%	3.56 (0.49)	3.49 (0.58)	.81 .81 27.27

### GLM repeated measures for experimental and control groups with personality as a co-variable

Significant and/or marginal results for *self-esteem*, *empathy* (in fantasy and empathic concern factors), *confidence as a speaker* (especially in fear of speaking in public), *affect* (negative affect) and *assertiveness* and non-significant results for two

factors of *empathy* (perspective-taking and personal distress) and *positive affect* were found in the GLM repeated measures (see within and between-subject tests results in Table 2). The effect size in each analysis was small ( $< .06$ ; Cohen, 1988) except for the between-subject test of *fantasy* where it can be considered moderate.

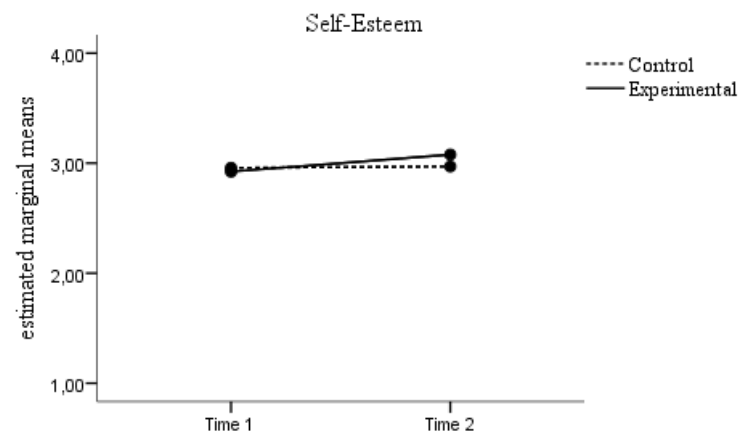
Table 2

*General Linear Models of Repeated Measures with Personality Traits as Covariates*

	Within-Subject Test				Between-Subject Test			
	<i>df</i>	<i>F</i>	$\eta^2$	<i>Power</i>	<i>df</i>	<i>F</i>	$\eta^2$	<i>Power</i>
Self-Esteem	1,229	5.97 <sup>a</sup>	.03	.68	1,229	0.53	.00	.11
Perspective-Taking	1,193	0.76	.00	.14	1,193	0.57	.00	.12
Fantasy	1,193	5.02 <sup>a</sup>	.03	.61	1,193	15.40 <sup>c</sup>	.07	.97
Empathic concern	1,193	4.05 <sup>a</sup>	.02	.52	1,193	0.03	.00	.05
Personal distress	1,193	0.27	.00	.08	1,193	2.18	.01	.31
Confidence as speaker	1,242	5.01 <sup>a</sup>	.02	.61	1,242	0.15	.00	.07
Fear sp. in public	1,242	4.40 <sup>a</sup>	.02	.55	1,242	2.71 <sup>d</sup>	.01	.37
Assurance sp. in public	1,242	2.53	.01	.35	1,242	5.63 <sup>a</sup>	.02	.66
Positive affect	1,192	0.70	.00	.13	1,192	0.28	.00	.08
Negative affect	1,192	6.68 <sup>a</sup>	.03	.73	1,192	2.72 <sup>d</sup>	.01	.38
Assertiveness	1,242	2.58 <sup>d</sup>	.01	.36	1,242	0.27	.00	.08

<sup>a</sup> $p < .05$  <sup>b</sup> $p < .01$  <sup>c</sup> $p < .001$  <sup>d</sup> $p = .10$ .

It was obtained significant differences for the interaction between the experimental conditions and assessment times in *self-esteem*,  $F(1, 229) = 5.97$ ;  $p < .05$ ;  $\eta^2 = .03$ ;  $power = .68$ . Bonferroni test showed pre and post test differences in experimental group,  $t(178) = -0.15$ ;  $p < .01$ , and marginal differences at Time 2 between experimental and control groups,  $t(234) = 2.97$ ;  $p = .08$  (Figure 1).



In the Model the covariables are assessment in the following values: Neuroticism1 = 2,9743, Extraversion1 = 3,7739, Openness1 = 3,3355, Agreeableness1 = 3,6779, Conscientiousness1 = 3,5246

Figure 1. Results for self-esteem in control and experimental groups.



Empathy showed significant differences only for *fantasy* and *empathic concern* (Figure 2). Regarding *fantasy*, it was significant the interaction between the experimental conditions and assessment times,  $F(1,193) = 5.02$ ;  $p < .05$ ;  $\eta^2 = .03$ ;  $power = .61$ . Following Bonferroni test, differences were significant at Time 1,  $t(198) = -0.31$ ;  $p < .01$ , and at Time 2,  $t(198) = -0.52$ ;  $p < .001$ , between both conditions, and were also obtained pre and post test marginal differences for the experimental group,  $t(151) = -0.08$ ;  $p = .07$ .

As regards *empathic concern*, it was also significant the interaction between the experimental conditions and the assessment times,  $F(1,193) = 4.05$ ;  $p < .05$ ;  $\eta^2 = .02$ ;  $power = .52$ . The Bonferroni test throw pre and post test significant differences only for control group,  $t(47) = 0.21$ ;  $p < .01$ , since differences for experimental group were marginal,  $t(151) = 0.06$ ;  $p = .06$ .

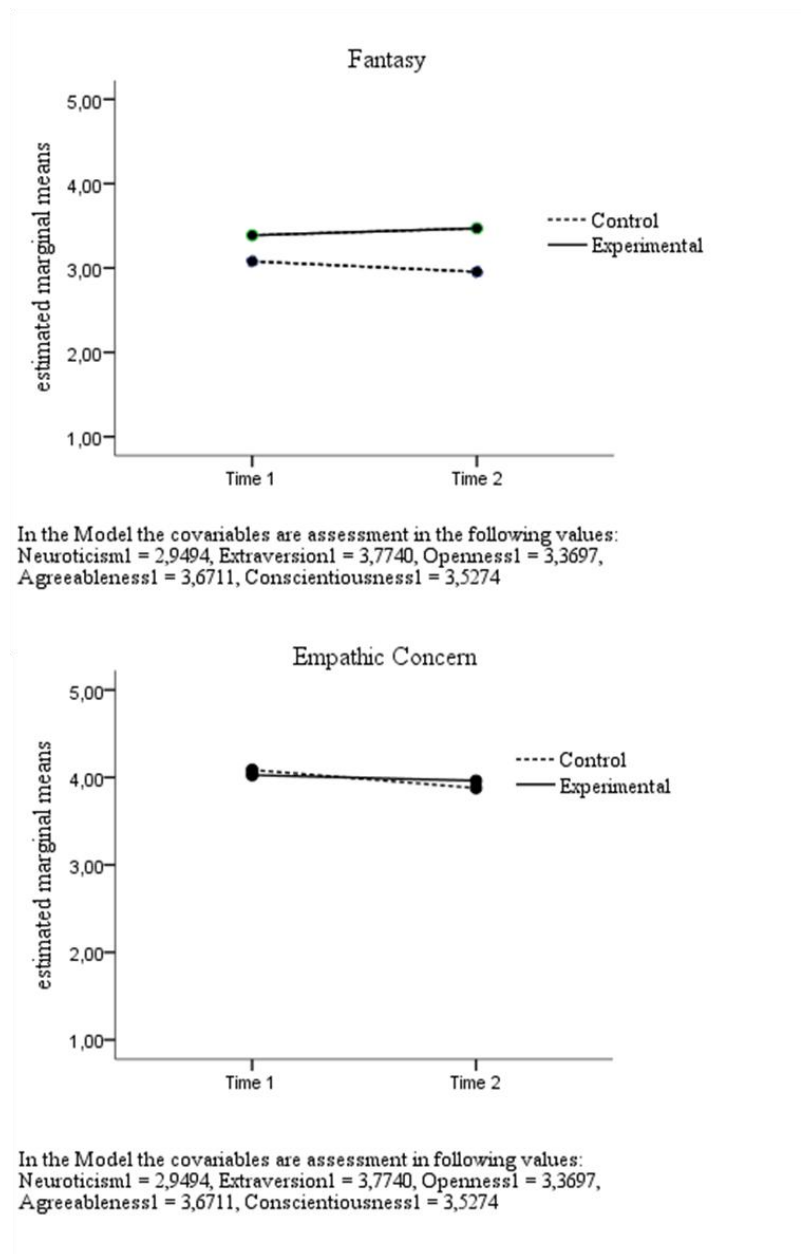


Figure 2. Results for two factors of empathy: fantasy and empathetic concern.

*Confidence as speaker* showed a within subject effect, especially for the experimental group,  $t(190) = -0.33$ ;  $p < .01$ , since an increase was obtained in this variable after the SEL program, while *fear of speaking* in public presented a significant decrease after training,  $t(190) = 0.35$ ;  $p < .01$ , (Figure 3). That is, in *confidence as speaker* it was obtained an interaction significant effect between the experimental conditions and assessment times,  $F(1,242) = 4.39$ ;  $p < .05$ ;  $\eta^2 = .02$ ;  $power = .55$ . With regard to the *fear of speaking in public*, it was obtained a significant interaction effect between the experimental conditions and assessment times,  $F(1,242) = 5.01$ ;  $p < .05$ ;  $\eta^2 = .02$ ;  $power = .61$ , and also significant differences between both conditions at Time 1,  $t(247) = 0.38$ ;  $p < .01$ , in Bonferroni test.

*Assurance when speaking in public* had a non significant interaction effect, while the Bonferroni test showed significant differences at Time 2 between both conditions,  $t(247) = 0.44$ ;  $p < .01$ .

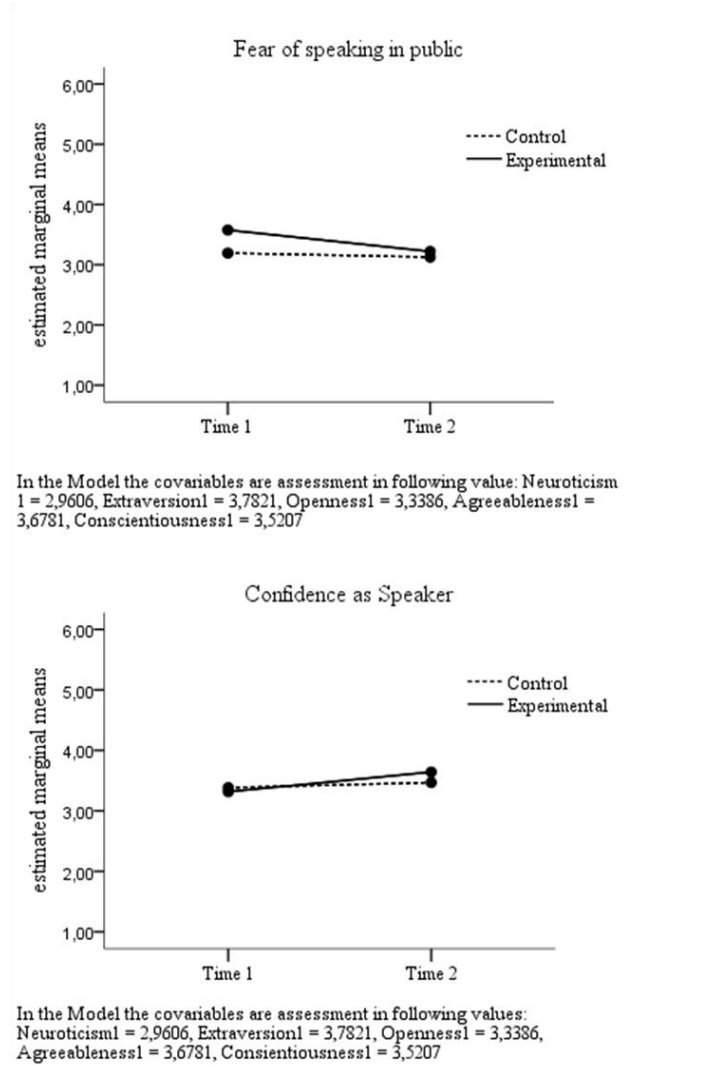


Figure 3. Results for confidence and fear as speaker.

*Negative affect* decreased significantly in the experimental group and increased in the control group (Figure 4). Thus, a significant interaction effect was obtained between the experimental conditions and assessment times,  $F(1,192) = 6.68$ ;  $p < .05$ ;  $\eta^2 = .03$ ;  $power = .73$ , and pre and post-test differences for the control group,  $t(45) = -0.19$ ;  $p < .05$ , and marginal for the experimental group,  $t(152) = 0.09$ ;  $p = .08$ ), following Bonferroni test. In addition, significant differences were obtained between both conditions at Time 2,  $t(197) = -0.27$ ;  $p < .01$ .

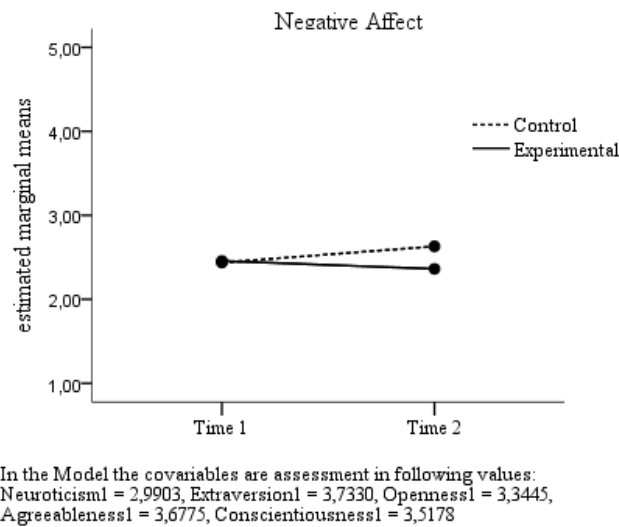


Figure 4. Results of negative affect.

As noted above, there were marginal results regarding *assertiveness*; marginal interaction effects between the experimental conditions and assessment times were obtained,  $F(1,242) = 2.58$ ;  $p = .10$ ;  $\eta^2 = .01$ ;  $power = .36$ , and, also marginal pre and post test differences for the experimental group,  $t(190) = -0.05$ ;  $p = .07$ , following Bonferroni test.

## Discussion

The present study analyses the effectiveness of 10-weeks groundbreaking pre-service teacher training based on the SEL model and SAFE criteria application using a quasi-experimental methodology. On one hand, the program increased self-esteem, fantasy, and confidence as speaker and marginally improved empathic concern and assertiveness of trained students, partially confirming Hypothesis 1, since was expected to impact on positive emotions, as well. Second, the program reduced fear at public speaking, and frequency of negative emotions on students under SEL program, fully confirming Hypothesis 2. Finally, all significant results were obtained once personality traits had been taken into account, thereby confirming Hypothesis 3. Similar results were found in short higher education interventions (Bond, & Manser, 2009). The effects sizes obtained with the program are according to effectiveness on school-based programs (Diekstra, 2008), where effective programs show modest but significant results, taking into account from a developmental perspective the sort time of implementation. Moreover, Taylor, Russ-Eft, and Chan (2005) found in a meta-analysis review that small effects on SEL programs were stable over time. Others report a so-called 'sleeper effect' (e.g. Neill & Christensen, 2007). This means that effects at follow-up, 6 months or longer after termination are larger than at post-test.

Specifically, the program reinforced slightly student's self-esteem. A relevant meta-analysis conducted years ago (Judge & Bono, 2001), confirmed self-esteem is

related with job satisfaction and higher job performance. Teachers with high self-esteem perceive themselves with higher emotional intelligence, self-efficacy and less burnout (Extremera, Duran, & Rey, 2010).

With regard to empathy, the program promoted fantasy and marginally empathic concern, although it looks like more time and specific treatment is needed to change complex cognitive abilities such as perspective taking; for example, role-playing but also moral dilemmas appears as effective methodologies to train more cognitive empathy, as perspective taking (Feshbach & Feshbach, 2009). Recent functional neuroimaging studies show the involvement of shared neural circuits during the observation of pain in others and during the experience of pain in the self (what can lead to personal distress) and, how perspective taking, the ability to differentiate the self from the other, affect this sharing mechanism, preventing such distress. This could explain why personal distress were not improved neither, since depends on the perspective taking development first (Decety & Lamm, 2009). The program was able to promote emotional reactions of sympathy and concern to “other” situations, and feelings understanding of fictitious characters, as we use in case studies during the program. This is relevant, since a recent study reveals that teacher’s skill on emotional perception significantly predicted students’ emotions above and beyond teacher’s instructional behavior (Becker, Goetz, Morger, & Ranellucci, 2014). Published studies on empathy training effectiveness, show a variety of procedures to foster empathy. Evidence agreed on when students both young and old learn about empathy and are trained to recognize emotional states in themselves and others, their empathic skills increase (Altmann, Schönefeld, & Roth, 2015).

However, result on assertiveness development was marginal. This result can be explained because this social competency needs more focus and intensity to be developed, as SAFE criteria for effectiveness recommend (Durlak et al., 2011). Moreover, group size did not allow for any personalized modeling, as recommended by Kornacki and Caruso (2007). Also, this is a specific social competence while emotional competencies (empathic concern, self-esteem, affect) might reinforce others during training since they appear moderately related (Zafra, Martos, & Martos, 2014).

The program also proved effectiveness decreasing negative emotions in students under SEL program, it seems to denote a better student’s emotion regulation. Moreover, students who did not receive the training increased their frequency of negative emotions at the end of the semester. This result is important for future teachers professional development, since negative emotions such as anxiety, when is under-regulated, facilitates counterproductive work behavior (Fida et al., 2015). In fact, teachers identify the ability to regulate their emotions as an essential competence to achieve academic goals, build positive social relationships and control classroom processes (Sutton & Harper, 2009). Teacher emotion regulation has been associated with job satisfaction and personal accomplishment, preventing burnout (Brackett et al., 2010). Also, a study with elementary and primary teachers, found regulation of emotions competence related with life satisfaction and job engagement (vigor, dedication and absorption), at the time it is inversely related with perceived stress (Pena, Rey, & Extremera, 2012). However, SEL program did not increased positive emotions frequency in students. This can be explained because the program is focused on regulate and empathize with negative emotions and only few times with positive ones. Classical studies on the factor structure of affect have shown negative and positive affect being independent from the other (Diener, Smith, & Fujita, 1995).

In the same line, fear at speaking in public was decreased in trained students (although due to previous differences between groups it cannot be affirmed that it was caused exclusively by the program) and assurance as speaker was better for the trained group. In addition, the total construct, confidence as speaker -which involves both-increased after program. Orejudo, Fernández-Torrado and Briz (2012) found similar results with a 9-hours zero-course focused on this goal and developed with pre-service teachers.

The most important conclusion to emerge from the study is that it is possible to enhance social (SEC 4) and emotional (SEC1, SEC2, SEC3) competencies in pre-service teachers, and in particular emotional competencies, unless in a short time as an academic term. This means that we are preparing future professionals who are able to be aware on own and other's emotions, which has been observed having positive effects on the psychological adjustment of students, joining a healthy development, optimal learning and decreasing maladaptive behaviors (Westling, 2002). Moreover, students reported a very positive qualitative and anonymous written assessment of the educational experience at the end of the term (Gómez-Linares, Palomera, & Briones, 2014).

However, since this is a preliminary study, we need more replications, and proved it in larger sample and used more reliable measures to confirm and advance the possible effects of a teacher SEL program. A call is done for Faculties of Education to develop and assess SEL programs in the teacher curricula.

Teachers are aware of the role that emotions play in their daily work. Emotions and skills related to their management processes affect learning processes, health, quality of social relationships and academic and work performance (Brackett & Caruso, 2007). Teaching is considered one of the most stressful professions, especially because it involves daily work based on social interactions in which the teacher must make a great effort to manage not only their own emotions but also the ones from students, parents, peers, etc. (Brotheridge & Grandey, 2002).

Policymakers and educators could contribute to the healthy development of teachers and students by supporting the inclusion of evidence-based SEL programming in standard educational practice in teacher colleges.

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