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Investigating the Relationship Between Physical Education Teachers' Perceptions, Technological Knowledge and Classroom Management Profiles

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Abstract

Overcoming the technology barrier is critical to integrating technology and education. Emerging and changing technologies are rapidly impacting individuals' daily lives as well as their educational lives. The concept of technostress seems to be associated with technological pedagogical field knowledge and classroom management profiles. This study also aims to determine if there is a relationship between PE and physical education teachers' technostress levels, technological pedagogical knowledge, and classroom management profiles. 275 PE and physical education teachers working in Ankara province participated in the study. Data collection was done using the scale to determine teachers' technostres level, technological-pedagogical knowledge and class management profile. The levels of technostres and technological-pedagogical knowledge did not differ significantly by gender, educational status, sport type, place of graduation, age, professional seniority, and time of technology use of physical education teachers. When examining classroom management profiles, there were differences by gender, educational status, athletic department, and age group, but no significant differences between place of graduation, professional seniority, and time of technology use. When examining the class management profiles by gender variable, it was found that female teachers are on the peripatetic and ignorant profile compared to males, by educational level of graduates and in the scatter profile, those who are in the athletic department in the individual sports do not match those in the team sports department in the profile, and in the age group of 24-34 years old were highly rated by the class management profiles in the 35-44 years old category. As a result, it was found that there is an excellent level of significant relationship between the perception of technostars and class management profiles of physical education teachers, in a negative way, while there is a non-significant relationship between Tpba and technostars, with class management and Tpba being positive.

Keywords: Class Management Profile, Technological Pedagogical Field Information, Technosterss

1. Introduction

Technology is a duty in every aspect of our lives, and for teachers it is not a privilege but a routine requirement. It is of great importance that technology is integrated into education (Komis, Ergazakia & Zogzaa, 2007). The presence and impact of technology in applied courses outside of theoretical courses can also be assumed as an undeniable fact in educational activities. Teachers need to keep up with the demands of our time in order to develop personally (Erdem and Akkoyunlu, 2002). In order to improve the quality of education, lessons must be delivered in a way that appeals to multiple sensory organs of individuals (Kosar et al., 2003). As education is changing in today's conditions, in addition to the use of technology, year plans and measurement assessments have been fully integrated with technology so that learning can be delivered to students with a simpler understanding (Scherer et al., 2019).

Stress is a physiological and psychological response of individuals that are influenced by a variety of factors (Keller et al., 2012). Individuals' responses to technology-related stress, such as anxiety about technological activities, discomfort, or nervousness, are referred to as technostres (Weil and Rosen, 1997). Technostres; As a result of an adaptation problem in the face of emerging technological progress, ire causes the body's reactions against technology (Cicek and Kılınc, 2020). Problems in adaptation of people due to the constant change of technology; Physical technostress, psychological vulnerability, anxiety, emotional technostress, technology dependency, minimization of socialization, increased workload in behavioral technostress and transfer of data stored in digital media to secure environments, and psychological technostress have also arisen as the responsibilities are not apparent (Ennis, 2005). Technostress induced; working more than hours techno overload, increased responsibilities of employees outside work techno infestation, people not adapting to technology enough techno complexity, fear of not keeping up with emerging technologies with the advancement of technology, techno distrust and lack of knowledge of how far these technologies will go has led to the emergence of techno insecurity components (Taraftar vd., 2007).

Due to technological advances, the concept of technostress is addressed in different dimensions; There have been several studies in the literature in order to be familiar with the emotional well-being of the person (Artnetz and Wilholm, 1997), the physical and physiological well-being of the person (Califf et al., 2015), the effort to make permanent changes to their behavior (Longman, 2013) and the acceptance of information technologies (Akgun, 2019).

The method of technological pedagogical field information has started to talk about itself in education today. The technological pedagogical field information model tries to explain the content, pedagogy and technology in a whole state to ensure that technology adapts to the programming and learning process in the broadest sense. In the theoretical framework, technological pedagogical field knowledge is that teachers use technology effectively to teach students a topic effectively. Known as Technologic Pedagogical Content Knowledge (TPACK), technological Pedagogical Field Information (TPAB) in Turkish; today's technological requirement is an important part of the training that enables teachers to use it in training, and support it with pedagogical information (Koehler and Mishra, 2009).

The technological Pedagogical Field Information (TPAB) model is an important concept that affects each other and determines the areas of area, pedagogy and technology information as a junction (Mishra and Koehler, 2006). The model includes technology information (TB), pedagogy information (PB) and field information (EU), which can be ranked as three different types of information on its basis, along with pedagogical field information (PAB), technological field information (TAB), technological pedagogy information (TPB) and technological pedagogical area information (TPAB) as a result of intersecting these areas.

Teachers are very effective in increasing quality of education. In order to be effective in education, class management requires the use of methods that improve students' performance and provide permanence (Palic and Keles, 2011). The basic concept of classroom management is to pedagogically plan courses for the needs of students and to put people into learning action using resources efficiently according to the environment of the classroom (Jelep, 2008). Teachers are obliged to demonstrate the most appropriate class management profile,

taking into account the conditions of the class, students and environment. Kris (1996) class management profiles; the profile shape in which all authority is in the teacher, boundaries are determined by the teacher is authoritarian; the profile shape in which students are given a control mechanism for understandable reasons for certain goals is appreciated, the profile shape of which students are free to act and the teacher is very little active is unattended; The profile of teachers who are completely uninterested in events where their presence and absence are not apparent in the classroom is considered a class management profile (Ekici and Kurt, 2014).

Teachers, who are responsible for organizing educational activities within the classroom, present different class management profiles. More authoritarian, accendiated, unattended and indifferent class management profiles are used (Ekici, 2012).

In the technological era, it is very important for teachers to mix different class management profiles when passing information to students, but teachers are not able to receive proper maid training in technology, which has revealed the concept of technostress and has a negative impact on teachers' performance. In this study, it is believed that the perception of technostress by physical education teachers will help students and teachers to find out what kind of relationship they have between these concepts by examining them in terms of class management profiles as a result of this study.

2. Method

This section contains the model of the research, research group, data collection tools and analysis of the data.

2.1. Model of Research

This study uses a scanning model from quantitative research methods. The aim of screening is to describe the subject under study, and to reveal the current situation, so studies in education are often used for screening studies. (Buyukozturk et al., 2014). This type of research is generally used in social sciences for descriptive studies to reveal the basic research subjects for an audience with over sampling (gender, age, education level, work experience) (Can, 2020).

2.2. Research Group

The universe of this study consists of physical education teachers working in public schools under the National Directorate of Education in Ankara and physical education teachers working in the central districts of Ankara province. For this study, 295 physical education teachers in Ankara were reached. Data from a total of 275 teachers were used to extract incompatible data to make the statistics meaningful. The demographic data of the study participants are shown in Table 1.

Table 1: Frequency and percentage distributions of Teachers Demographic characteristics

Properties	Categories	f	%
Gender	Male	174	63.3
	Female	101	36.7
Education Status	License	221	80.4
	Master's and above	54	19.6
Graduation	Ankara	77	34.5
	Other Provinces	593	65.5
Sports Branch	Team	174	63.3
	Individual	101	36.7
Age	24-34 Age	77	28
	35-44 Age	118	42.9

	45 and More Age	80	29.1
Professional Seniority	1-7 Year	46	16.7
	8-15 Year	128	46.5
	16 Year and More	101	36.7
Daily Technology Usage Time	1-2 Hour	122	44.4
	3-4 Hour	107	38.9
	5 Hour and More	46	16.7
Total		275	100

2.3. Data Collection Tools

The study used the Scale of Teachers to Determine Tech Level developed by Çoklar, Efilti, and Şahin (2017), which consists of 28 items used to collect data on teknostress. The multipliers were found by Efilti and Şahin (2017) in the whole scale as Cronbach Alpha .92 in the reliability of the scale. All sub-dimensions of the scale ranged from .71 to .79. In this study, the internal coherence coefficient is .98 when all measured characteristics of the scale are considered. When all sub-dimensions of the scale are considered, it ranges from .87 to .95. Considering these results, the scale can be considered reliable.

The study used the "technological Pedagogical Field Information Scale" adapted into Turkish by Horzum, Akgun, and Ozturk (2014), which was developed by Schmitd and others (2009) consistedists of 51 items used to collect data on TPAB as a data collection instrument. Horzum, Akgun, and Ozturk (2014) found a Cronbach's alpha of .98 for the scale reliability of the entire scale. All sub-dimensions of the scale ranged from .82 to .89. In this study, the internal coherence coefficient is .98 when all measured characteristics of the scale are considered. When all sub-dimensions of the scale are considered, it ranges from .87 to .95. Considering these results, the scale can be considered reliable.

The data collection instrument used in the study, Class Management Profile Scale, was developed by Kris (1996) (Classroom Management Profile) and adapted to the Turkish "Class Management Profile Scale" by Ekici (2004). The entire scale developed by Pflug (2004) was assessed with a Cronbach's alpha of .80. All of its sub-dimensions ranged from .78 to .84. In this study, the internal coherence coefficient is .92 when all measured characteristics are considered. Considering these results, the scale can be considered reliable.

2.4. Data Analysis

SPSS 26.0 package program was used in the analysis of the data obtained as a result of the research. First of all, the data was edited and transferred to the SPSS program. Then the inverse substances found on the scales are converted. Another process performed before the analysis is to make the necessary extractions in terms of single-variable and multivariate outliers. The results of the Kolmogorov-Smirnov test were taken into account because the number of people in the subcategories was generally more than 30. In addition, the values of pressure and distortion were evaluated and as a result, it was discussed that the data were distributed normally. In addition to the hypothesis of normality, the homogeneity assumption was also tested and Levene's test was performed. As a result, the assumption of homogeneity was also found to be provided. Based on all this information, it was deemed appropriate to use parametric tests in the analysis of data obtained from both inventories. In this respect, independent sampling t test to test two variables; one-way variance analysis (ANOVA) was used to test three or more variables. LSD test from Post-Hoc tests was used to find the source of the difference when significant difference was detected as a result of one-way variance analysis. Pearson Moments Multiplication Correlation Coefficient (r) was used to test the relationship between technostres, Tpba and classroom management profiles of physical education and sports teachers.

The data obtained by applying the technostres scale, Tpba scale and class management profile scale to physical education teachers were recorded in the database and evaluated. Descriptive statistics were made by calculating percentage, frequency, average and standard deviations for each subdivision of the scale related to Technostres

qualifications, Tpba levels and Classroom Management Profiles of physical education and sports teachers who participated in the study.

The descriptive characteristics of the scores of physical education and sports teachers who participated in the study from teknostres scale, Tpba scale and Class Management Profile Scale and the distribution of normality according to distortion and pressure levels are shown in Table 2.

Table 2: Simulational Statistics for Total Ratings from Teknostress perceptions, tab levels and Class Management Profile Scale

Scale Score	Minimum	Maksimum	Distortion	Plasticity
Technostress Total	1.14	4.61	.070	.356
Tpab Total	1.04	5.00	-.147	-.293
Class Management Profile Total	2.42	4.17	.057	-.254

3. Findings

In this section, the findings as a result of the analysis of the data collected for the research questions were provided with and interpreted in accordance with the tables and descriptions of the research questions.

Table 3: Descriptive Statistics of Physical Education and Sports Teachers

Teknostress	N	Minimum	Maximum	$\overline{X}$	S
Teaching Learning	275	1,00	4,86	2,90	,718
Fort he Profession	275	1,00	4,50	2,22	,699
Technical Topic	275	1,00	4,83	2,94	,746
Personal Sourced	275	1,00	4,80	2,40	,793
Socially Focused	275	1,00	5,00	3,01	,741
Teknostress Total	275	1,14	4,61	2,69	,599
Technological Pedagogical Content Knowledge	N	Minimum	Maximum	$\overline{X}$	S
Technology Knowledge	275	1,17	5,00	4,04	,695
Pedagocical Knowledge	275	1,00	5,00	4,29	,581
Content Information	275	1,00	5,00	4,35	,605
Technological Content Knowledge	275	1,17	5,00	4,17	,647
Pedagogical Content Information	275	1,00	5,00	4,33	,613
Technological Pedagogical Information	275	1,00	5,00	4,19	,674
Technological Pedagogical Content Knowledge	275	1,00	5,00	4,17	,673
TPAB Total	275	1,04	5,00	4,23	,573
Class Management Profile	N	Minimum	Maximum	$\overline{X}$	S
Authoritarian	275	1,00	4,67	2,86	,675
Appreciated	275	2,67	5,00	4,06	,568
Stray	275	1,67	5,00	3,54	,703
Doesn't Mind	275	1,33	4,67	2,87	,558
Class Total	275	2,42	4,17	3,33	,338

What are the technostress levels of pysical education and sports teachers?

Table 4: Independent Samples T-Test Results for Tech scores according to Teachers' Gender

	Gender	N	$\overline{X}$	S	t	sd	p
Teknostress Total	Male	174	2.64	.567	-1.84	273	.066
	Female	101	2.78	.645			

As shown in Table 4, the scores taken by teachers on the scale of technostress show that there is no significant difference in gender. According to the statistical results obtained, teachers' levels of technostress are not different from gender.

Table 5: Independent Samples T-Test Results for Tech Points based on Teachers' Education Status

	Educational Status	N	$\overline{X}$	S	t	sd	p
Teknostres Toplam	License	221	2.69	.608			
	Master's and More	54	2.66	.568	.379	273	.705

As shown in Table 5, the scores taken by teachers on the scale of technostress show that there is no significant difference in education. Based on the statistical results obtained, teachers' levels of technostress may not vary according to the education situation.

Table 6: Independent Samples T-Test Results for Teachers' Graduation of Teknostress Points

	Graduation	N	$\overline{X}$	S	t	sd	p
Teknostres Total	Ankara	95	2.73	.563			
	Other Province	180	2.67	.618	.804	273	.422

As shown in Table 6, the scores taken by teachers on the scale of technostress show that there is no significant difference in relation to where they graduated. According to the statistical results, teachers' levels of technostress are not different from where they graduated.

Table 7: Independent Samples of Technostres Scores by Teachers' Sports Branch T-Test Results

	Sports Branch	N	$\overline{X}$	S	t	sd	p
Teknostress Total	Team	174	2.68	.531			
	Individual	101	2.70	.705	-.238	273	.812

As shown in table 7, there is no significant difference in the type of sports branch when looking at the scores teachers receive on the technosters scale. According to statistical results, teachers' technostres levels do not differ according to the type of sports branch.

Table 8: Independent Samples of Teachers' Technostres Scores by Age One-Way Anova Results

	Age Group*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
Teknostress Total	24-34 Age	77	2.67	.661	.384			
	35-44 Age	118	2.66	.601	98.058	.192 .361	.533	.588
	45 Age and More	80	2.75	.533	98.442			

As shown in Table 8, the scores taken by teachers from the technostress scale show that there is no significant difference in age group. According to the statistical results, teachers' levels of technostress do not differ by age group.

Table 9: Independent Samples of Teachers' Technostres Scores by Professional Seniority One-Way Anova Results

	Professional Seniority*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
Teknostress Total	1-7 Years	46	2.75	.679	.414	.207	.575	.564
	8-15 Years	128	2.65	.641	98.028	.360		
	16 Years and More	101	2.71	.501	98.442			

As shown in Table 9, the scores taken by teachers on the scale of technostress show that there is no significant difference in professional seniority. According to the statistical results, teachers' levels of technostress may not differ according to professional seniority.

Table 10: Independent Samples of Technostres Scores by Teacher's Technology Usage One-Way Anova Results

	Technology Usage*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
Teknostress Total	1-2 Hour	122	2.72	.569	.214	.107	.296	.744
	3-4 Hour	107	2.66	.621	98.229	.361		
	5 Hour and More	46	2.67	.635	98.442			

As shown in Table 10, the scores taken by teachers from the technostress scale show that there is no significant difference in technology usage time. According to the statistical results, teachers' levels of technostress may not vary according to the time of use of technology.

What is Physical Education and sports teachers' Technological Pedagogical Content Knowledge levels like?

Table 11: Independent Samples of Teachers' Tpab Scores Based on Their Gender T-Test Results

	Gender	N	$\overline{X}$	S	t	sd	p
TPAB Total	Male	174	4.24	.572	.620	273	.536
	Female	101	4.20	.577			

As shown in Table 11, the scores taken by teachers from the Tpba scale show that there is no significant difference in gender. According to the statistical results obtained, teachers' Tpba levels do not differ by gender.

Table 12: Independent Samples of Tpab Scores by Teacher Education Status T-Test Results

	Education Status	N	$\overline{X}$	S	t	sd	p
TPAB Total	License	221	4.22	.584	-.532	273	.595
	Master's and More	54	4.26	.530			

As shown in Table 12, the scores taken by teachers from the Tpba scale show that there is no significant difference in education status. Based on the statistical results obtained, teachers' Tpba levels may not vary according to the education situation.

Table 13: Independent Samples of Teachers' Tpab Scores by Graduation T-Test Results

	Graduation	N	$\overline{X}$	S	t	sd	p
TPAB Total	Ankara	95	4.24	.529	.356	273	.722
	Other Province	180	4.22	.597			

As shown in Table 13, the scores taken by teachers from the Tpba scale show that there is no significant difference in the places they graduated from. According to the statistical results, teachers' levels of Tpba may not differ from where they graduated.

Table 14: Independent Samples of Tpab Scores by Teachers' Sports Branch T-Test Results

	Sports Branch	N	$\overline{X}$	S	t	sd	p
TPAB Total	Team	174	4.20	.601	-1.173	273	.242
	Individual	101	4.28	.520			

As shown in Table 14, the scores taken by teachers from the Tpba scale show that there is no significant difference in sports. Based on the statistical results, teachers' Tpba levels may not vary by place in the field of sports.

Table 15: Independent Samples of Teachers' Tpab Scores by Age One-Way Anova Results

	Age Group*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
TPBA Total	24-34 Age	77	4.24	.630	.483	.241	.733	.481
	35-44 Age	118	4.26	.537	89.524	.329		
	45 Age and More	80	4.16	.570	90.007			

As shown in Table 15, the ratings taken by teachers from the Tpba scale show that there is no significant difference in age group. According to the statistical results, teachers' Tpba levels do not differ by age group.

Table 16: Independent Samples of Teachers' Tpab Scores by Professional Seniority One-Way Anova Results

	Professional Seniority*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
TPBA Total	1-7 Years	46	4.23	.601	.163	.082	.247	.781
	8-15 Years	128	4.25	.580	89.844	.330		
	16 Yearsn and More	101	4.20	.555	90.007			

As shown in Table 16, the scores taken by teachers from the Tpba scale show that there is no significant difference in professional seniority. According to the statistical results obtained, teachers' Tpba levels may not differ according to vocational grade.

Table 17: Independent Samples of Tpab Scores by Teacher's Technology Usage One-Way Anova Results

	Technology Usage*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
TPBA Total	1-2 Hour	122	4.20	.560	.335	.168	.509	.602
	3-4 Hour	107	4.23	.605	89.672	.330		
	5 Hour and More	46	4.30	.536	90.007			

As shown in Table 17, the scores taken by teachers from the Tpba scale show that there is no significant difference in technology usage. According to the statistical results, teachers' Tpba levels may not differ according to technology usage.

What are Physical Education and sports teachers' Class Management Profiles levels like?

Table 18: Independent Samples of Teachers' Class Management Scores Based on Their Gender T-Test Results

	Gender	N	$\overline{X}$	S	t	sd	p
Authoritarian	Male	174	2.89	.632	.720	273	.472
	Female	101	2.82	.745			
Appreciated	Male	174	4.03	.528	-1.109	273	.268
	Female	101	4.11	.631			
Stray	Male	174	3.47	.649	-2.108	273	.036*
	Female	101	3.65	.776			
Doesn't Mind	Male	174	2.82	.520	-2.046	273	.046*
	Female	101	2.96	.609			

As shown in Table 18, the scores taken by teachers on the scale of class management profiles show that there is a significant difference in gender. When the lower dimensions of the scale are examined, the authoritative, appreciated class management profile does not differ, but it has been determined that women ($\overline{X}$ =3.65) of the unattended sub-size have scored statistically higher than men ($\overline{X}$ =3.47); women of the indifferent sub-size ($\overline{X}$ =2.96) than men ($\overline{X}$ =2.82). According to the statistical results, teachers' class management profiles may be said that female teachers who have a stray and indifferent class management profile based on the lower level of their class management levels differ according to male teachers.

Table 19: Independent Samples of Class Management Scores by Teacher Education Status T-Test Results

	Education Status	N	$\overline{X}$	S	t	sd	p
Authoritarian	License	221	2.84	.681	-.612	273	.541
	Master's and More	54	2.90	.652			
Appreciated	License	221	4.01	.554	-2.699	273	.007*
	Master's and More	54	4.24	.591			
Stray	License	221	3.49	.677	-2.209	273	.043*
	Master's and More	54	3.70	.783			
Doesn't Mind	License	221	2.89	.576	.960	273	.338
	Master's and More	54	2.81	.474			

As shown in Table 19, the scores taken by teachers on the scale of class management profiles show that there is a significant difference in education status. When the sub-dimensions of the scale are examined, the authoritarian and indifferent class management profile does not differ, while the underrated graduate and higher ($\overline{X}$ =4.24), according to the license ($\overline{X}$ =4.01), the unattended sub-size graduate and higher ($\overline{X}$ =3.70) were determined to have statistically higher scores than the license ($\overline{X}$ =3.49). According to the statistical results, teachers' class management profiles can be said to be appreciated by the lower level of their level and have a disorderly class management profile and have a graduate degree above and graduate degree vary by teachers with a degree in undergraduate graduation.

Table 20: Independent Samples of Teachers' Class Management Scores by Graduation T-Test Results

	Graduation	N	$\overline{X}$	S	t	sd	p
Authoritarian	Ankara	95	2.85	.699	-.140	273	.889
	Other	180	2.86	.664			

	Province						
Appreciated	Ankara	95	4.09	.553	.751	273	.453
	Other Province	180	4.04	.577			
Stray	Ankara	95	3.47	.653	.213	273	.253
	Other Province	180	3.57	.727			
Doesn't Mind	Ankara	95	2.80	.533	.446	273	.094
	Other Province	180	2.91	.567			

As shown in Table 20, the scores taken by teachers on the scale of class management profiles show that there is no significant difference in relation to where they graduated. Based on the statistical results, it is possible that teachers' class management profiles do not differ from where they graduate.

Table 21: Independent Samples T-Test Results for Class Management Scores by Teachers' Sports Branch

	Sports Branch	N	$\overline{X}$	S	t	sd	p
Authoritarian	Team	174	2.83	.646	-1.009	273	.314
	Individual	101	2.91	.722			
Appreciated	Team	174	4.03	.541	-.962	273	.337
	Individual	101	4.10	.612			
Stray	Team	174	3.57	.717	1.051	273	.294
	Individual	101	3.48	.677			
Doesn't Mind	Team	174	2.82	.539	-2.199	273	.029*
	Individual	101	2.97	.578			

As shown in Table 21, the scores taken by teachers on the scale of class management profiles show that there is a significant difference in sports. When the sub-dimensions of the scale are examined, there is no difference in the profile of authoritarian, appreciated and unattended class management, but it has been determined that those who have undersized individual sports majors ($\overline{X}$ =2.97) are statistically higher than those who are team sports ($\overline{X}$ =2.82). According to the statistical results, the class management profiles of individual sports teachers may be said to differ according to the lower dimensions of their level, and the class management profile varies according to the teachers who play team sports.

Table 22: Independent Samples of Teachers' Class Management Scores by Age One-Way Anova Results

	Age Group*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p	Post Hoc (LSD
Authoritarian	24-34 Age	77	2.87	.685	.751	.375	.823	.440	
	35-44 Age	118	2.90	.632	124.068	.456			
	45 Age and More	80	2.78	.723	124.819				
Appreciated	24-34 Age	77	4.19	.665	2.138	1.069	3.367	.036*	a>b
	35-44 Age	118	3.98	.477	86.341	.317			
	45 Age and More	80	4.04	.575	88.478				
Stray	24-34 Age	77	3.50	.842	.331	.166	.334	.717	
	35-44 Age	118	3.53	.609	134.932	.496			
	45 Age and More	80	3.59	.690	135.263				
Doesn't mind	24-34 Age	77	2.94	.578	.929	.464	1.499	.225	
	35-44 Age	118	2.88	.572	84.257				
	45 Age and More	80	2.79	.510	85.185	.310			

As shown in Table 22, the ratings taken by teachers on the scale of class management profiles show that there is a significant difference in age group. When the lower dimensions of the scale are examined, there are no differences in the authoritarian, unattended and indifferent class management profile, while the underrated 24-34-year-olds ($\overline{X}$ =4.19) were determined to score statistically higher than the 35-44-year-old group ($\overline{X}$ =3.98). According to the statistical results, the class management profile of 24-34 year-olds teachers, which is appreciated by the lower level of their class management profile, may be said to vary according to the 35-44 year-old teachers.

Table 23: Independent Samples of Teachers' Class Management Scores by Professional Seniority One-Way Anova Results

	Professional Seniority*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
Authoritarian	1-7 Year	46	2.71	.646	1.232	.616	1.356	.259
	8-15 Year	128	2.90	.653	123.586	.454		
	16 Year and More	101	2.87	.712	124.819			
Appreciated	1-7 Year	46	4.15	.666	.753	.376	1.167	.313
	8-15 Year	128	4.07	.544	87.726	.323		
	16 Year and More	101	4.00	.550	88.478			
Stray	1-7 Year	46	3.51	.756	.030	.015	.030	.971
	8-15 Year	128	3.54	.704	135.233	.497		
	16 Year and More	101	3.54	.683	135.263			
Doesn't mind	1-7 Year	46	2.88	.618	.348		.558	.573
	8-15 Year	128	2.91	.566	84.838	.174		
	16 Year and More	101	2.83	.520	85.185	.312		

As shown in Table 23, the scores taken by teachers on the scale of class management profiles show that there is no significant difference in professional grade. Based on the statistical results, it can be said that the class management profiles of teachers do not differ according to the professional grade.

Table 24: Independent Samples of Teachers' Class Management Scores by Technology Usage One-Way Anova Results

	Technology Usage*	N	$\overline{X}$	S	Squares Total	Squares Average	F	p
Authoritarian	1-2 Hour	122	2.80	.656	.801	.401	.879	.416
	3-4 Hour	107	2.92	.702	124.017	.456		
	5 Hour and More	46	2.86	.661	124.819			
Appreciated	1-2 Hour	122	4.07	.530	.055	.027	.084	.920
	3-4 Hour	107	4.04	.605	88.424	.325		
	5 Hour and More	46	4.05	.588	88.478			
Stray	1-2 Hour	122	3.47	.652	1.006	.503	1.019	.362
	3-4 Hour	107	3.60	.787	135.257	.494		
	5 Hour and More	46	3.57	.615	135.263			
Doesn't mind	1-2 Hour	122	2.83	.513	1.202	.601	1.946	.145
	3-4 Hour	107	2.87	.591	83.984	.309		
	5 Hour and More	46	3.01	.579	85.185			

As shown in Table 24, the scores taken by teachers on the scale of class management profiles show that there is no significant difference in technology usage. According to the statistical results, teachers' class management profiles do not differ according to technology usage.

Table 25: Pearson Correlation Analysis Results for Relationship between Technosters, Technological Pedagogical Content Knowledge, and Class Management Profiles

	Teknostress		Tpba		Class Mangement	
	r	p	r	p	r	p
Teknostress Perceptions			.087	.148	-.122	.044*
Tpba Levels	.087	.148			-.037	.542
Class Management	-.122	.044*	-.037	.542		

*p<,05

As shown in Table 25, it has been determined that physical education teachers have a perfectly meaningful relationship with their technostress perceptions and class management profiles in a negative way (r=.-.122; p=.044<.05). It is possible to say that as teachers' levels of technostress fall, class management profiles become more positive. A negative-directional, non-positive relationship between Tpba levels and class management is found between technostress.

4. Discussion

In the research, when looking at the descriptive statistics of the scales, the highest sub-size social focus on the scale technostress, the lowest sub-size size of occupation; the highest sub-size field information on the scale technological education field information, the lowest sub-size technological knowledge; the class management profile recognized for the highest sub-size on the scale of class management profiles, has the lowest sub-size authoritarian class management profile.

The study examined the total score of technostress scale and its sub-scores, gender, educational status, place of graduation, sports major, and age. There were no statistical differences between professional seniority and daily time of technology use.

According to gender, Akgun (2019) in the study of technostress levels of lecturers, according to female lecturers, technology, acceptance values are high, and in Gokbulut and Dindas (2022) teachers, the study of technostress perceptions is higher than male teachers, Kopuz and Aydın (2020) in the technostress study of health personnel, males have higher levels of technostress than female health personnel, La Torre et al. (2019) in the systematic technostress research, that men have higher perceptions of technostress compared to women, and Ragu-Nathab et al. (2008) in the study of technostress in the use of organizations, that men have higher levels of technostress than women.

According to the educational situation, Kopuz and Aydın (2020) people with high levels of education in technostress levels for health workers have high techno uncertainty sub-size scores, Ragu-Nathab et al (2008) the higher the level of education in technostress research in the use of organizations, the lower the level of technostress, the more Turen et al (2015) in his research on technology use at work, it was found that technological uncertainties were higher than those graduated from college and college graduates.

Gokbulut and Dindas (2022) in their research on teachers' recognition of technostress found no statistical difference according to where teachers were stationed.

According to the age variation, Akgun (2019) teachers in their research have higher technostress score than those who are 48 years and older than 32 years and younger, and La Torre et al. (2019) in a systematic study on technostress, the increase of age in technostress increased, Marchiori et al. (2018) in the study of variables in the types of technostress of workers, older workers feel more pressured by technostress than young workers, Tams, etc. (2018) the result of age-based technostress study is that age is negatively affected by technostress.

Gokbulut and Dindas (2022) in the study of teachers' perception of technostress, many and many (2016) according to technostress in teachers' professional life, Longman (2013) there is no discrepancy in people who teach at technostress level for teachers professional experience for more than 10 years and teach for more than 10 years, Marchiori et al. (2018) concluded in the study on the variables of types of technostress that experienced

workers have more technostress than workers with young experience and that their technostress increases as their work experience increases.

In terms of everyday technology use, Coklar etc. (2016) found that teachers who use technology for 1 hour a day to study have a higher level of technostress at work than those who use the Internet for 1-2 hours, 3-4 hours, and 4 hours, and Jena (2015) found that technostress increases with increasing time of computer use and technostress.

In the study, the total score of technological pedagogical content knowledge scale and sub-scores were examined, and gender, education status, place of graduation, sports department, age, there were no statistical differences between professional seniority and daily time of technology use.

By gender; Jang and Tsai (2013) see that there is gender differentiation in the technological-educational study of secondary school students, Bakar, Maat and Rosli (2020) the study of mathematics teachers on technological-educational field information is not statistically different in gender study, Physical Education and Training by Erbas and Uenlue (2017) and physical education teacher candidates in technological pedagogical education, training and training levels, In the study of Koh, Chai and Tsai (2010), it was found that male teacher candidates have higher technology knowledge than female teacher candidates.

After the training situation; Car and Aydos (2022) concluded that there was no difference in our work parallel to the training situation in the study of technological pedagogical level of physical education teachers, and Turgut (2017) was no different in the study of technological pedagogical field knowledge competencies for teachers.

According to the graduate position; Hıcyılmaz (2018), visual arts in the study of technological-pedagogical content information of teacher candidates; content information of visual arts teacher candidates studying in Inner Anatolian region; visual arts in other regions differ according to teacher candidates; Afacan and Cemil (2017), field information in the study of students by university variables in the study of TPAB's, Pedagogical field information and technological pedagogical field information were found that Gazi University has a change in its sub-dimensions where it is higher than Balıkesir University.

According to the sport type; In the study of techno-pedagogical level of physical education teacher candidates, Erbaş and Unlu (2017) concluded that the techno-pedagogical competencies of physical education teachers performing individual sports and team sports did not change in parallel with our study.

According to the age variation; Car and Aydos (2022) 24-28, in the study of the techno-pedagogical levels of physical education teachers, the TPAB levels of physical education teachers aged 39-43 and 44-48 were higher than the TPAB levels, In Demirezen and Keles' (2020 25-29) study of technical-pedagogical field competencies, 23-28 year old teachers concluded that pedagogical information size and Dereli's (2017) teacher candidates increased their pedagogical information size scores according to other age group variables; Kaya and Drucker's (2019) views parallel our work on techno-pedagogical training competencies, In Bilici and Guler's (2016) TPAB study for teachers concluded that Sabo and Archambault (2012) found no significant difference between K12 online and traditional teachers when comparing technological pedagogical information size.

In relation to my professional group; In the research conducted by Niess, Suharwoto, Lee, and Sadri (2006), it was found that the newly appointed teachers with low level of pedagogical knowledge were weaker in connecting technology, pedagogy, and content.

In terms of using everyday technology; Car and Aydos (2022), physical education teachers who use technology three hours a day and more have increased from the TPAB level in their study to determine the technological pedagogical level of physical education teachers Physical education teachers who use technology two hours a day have increased from the TPAB level, Car and Aydos (2020) in their study teachers, who use one hour per day of technology from teachers who use three to four hours or more of technology per day, and Ucar, Demir,

and Hıgde (2014) showed that their research differed from teachers who use technology every day of the week based on technology use.

In their study, when examining the lower scores of class management profiles according to gender variability, it was found that female teachers were on the casual and indifferent profile compared to males. It was found that those who are in the field of individual sports are statistically different from those who are in the field of team sports, which are in the profile and age group that are 24-34 years old and higher than the class management profiles estimated by the category of 35-44 years old.

By gender; Yarar (2019) that there is no gender difference in the study of class management profiles in relation to the class teachers of Beyaztas (2009) and the study of class management profiles of English teachers, that Ciftçi (2015) in his study of class management styles has high authority scores compared to male teachers, Merey and Taskın's (2018) social information teachers class management profiles were also found to be statistically different from male teachers.

According to the educational situation; Yarar (2019) was found that the class management profile, which is estimated in the research among academic staff, is different from doctoral teachers and Oezcakir (2007) did not find any changes in the study of teachers' class management.

Karaman (2016) concluded that there are no differences in the study of teachers' classroom management behaviours.

According to the type of sport; In the study of class management behavior of physical education teachers by Celik (2014), it was found that there was no difference in class management behavior according to the type of sport.

According to the age variation; Yarar (2019) in the study of teachers aged 21-30 years and the class management profiles estimated by those aged 51 and above, Celik (2014) teachers aged 35-40 years have a higher grade point average than teachers aged 41 and above, Bila (2006) in her study has concluded that there is no difference for teachers working in private and public schools.

In relation to my professional group; Ekici (2012) has found a difference in the study of classroom management profile of teachers, Yarar (2019) has found that there is a difference between the profiles of teachers in the management of teachers with 1-10 years of professional experience compared to those with professional experience of 21 years or more, and the Car and Aydos (2022) have found a statistical difference between the behaviors of teachers in classroom management. has not been seen.

In Car and Aydos' (2022) study of teachers, it was found that those who worked three or more hours per day with technology had higher classroom management scores than teachers who worked only two hourswith technology

5. Conclusion

It is thus assumed that physical education teachers must adopt new methods to keep up with the needs of the rapidly evolving and changing times. They are under some technological pressure to update their knowledge of technological pedagogical areas and their classroom management profile. In this research, it is found that there is a perfectly significant relationship between the perceptions of technostres and class management profiles in a negative way, a positive non-significant relationship between technostres and tpba, and a positive non-significant relationship between tpba and class management. Gokbulut (2021) is a negative low correlation degree in the relationship between technostres and technopathic competencies of teachers, Marchiori et al. (2018) in their study on the use of technology workers are more exposed to technology and also the technostres level increases, Atanasoff and Vanable (2017) in the study on technostres applications in adult workers, the development of career areas in technostresin workers who positively engage with customers and improve their personal

strategies, and Yao and Wang (2022) study on the effect of smartphone use and sleep on technostres found that smartphones had a positive relationship with information retrieval and sleep quality and technostres.

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2. No potential conflict of interest was reported by the authors.
3. This article was screened for potential plagiarism using a plagiarism screening program.

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