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OJER is an online, open-access, international, scholarly, peer-reviewed journal offering scholarly research articles on various topics in all areas of educational sciences.

All submitted manuscripts must be original, previously unpublished and not under consideration for publication in any type of publication outlet.

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“The future of our civilisation depends upon the widening spread and deepening hold of the scientific habit of mind.”

(John Dewey)

Dear Readers,

In the 21st century, education and training researches are accelerated with the developing technology. Today, as in the past, knowledge sometimes arises from curiosity and sometimes from the need to overcome some difficulties. Man has always been in an effort to understand and make sense of himself, existence, what is happening around him, and the universe. This effort has caused researchers to understand and explain everything that individuals see and are aware of, such as existence, event, phenomenon, emotion and thought. All kinds of outputs that enable the development of civilizations that people research and produce are information. In order for a knowledge to be scientific knowledge, it must be based on reason, experimentation and observation and must be obtained by scientific methods. Confucius describes the research process that leads to scientific knowledge with the phrase "study thoroughly, research correctly, think carefully, review what you think, apply seriously and sincerely". The birth of scientific knowledge has become possible by revealing the knowledge with the highest degree of precision in terms of validity and accuracy produced by human beings. Although the definition of knowledge varies depending on the field and approaches in which it is used, the definition and limits of scientific knowledge are accepted as undisputed. Knowledge is also explained as the relationship between the knower and the known. The famous thinker Yunus Emre, one of Eskisehir's prominent historical figures, emphasizes that knowing is the first thing to know and know yourself, with the stanza "*Science is knowledge, knowledge is knowing yourself, if you do not know yourself, what is the point of reading?*". Human's curiosity in the process of existence, his/her search for who he/she is, and his/her self-knowledge are among the greatest sources of information. This sense of wonder is "*Why?, How?, What if it were like this?*". It can only be nourished by taking into account high-level thinking skills such as reasoning, critical thinking and creativity. Peter Abelard says that the only key to wisdom is to constantly ask questions. He states that he started the research with doubt and that the right information was reached by doing research. Only as a result of this curiosity, scientific knowledge is revealed.

As the Institute of Educational Sciences, our main aim is to train people who know the theory and practice in the field of teacher training, human and natural sciences; and establish their balance. Research and applications in the field of educational sciences are designed to create impact-oriented educational communities. Our goal is to promote researches that are original, creative, enlightened and that shape the future with the ethical values.

In this issue the **Osmangazi Journal of Educational Research (OJER)**, there are important studies that will contribute to the field of educational sciences. We would like to express our gratitude to the researchers, the reviewer referees, the editorial board, the journal secretariat and our valuable readers who examined our journal and reached us via e-mail. In this issue of **OJER** in 2022, there are 11 studies in total, as introduced below:

The 1st article of this issue is entitled “Effectiveness of Creative Drama as a Method in Problems Requiring Mathematical Modeling” written by Akın KEKLİK and Ali ÖZTÜRK. The purpose of this study is to investigate the effect of creative drama processes in solving mathematical modeling questions of students. A total of 38 eighth grade students, 19 in the experimental group and 19 in the control group, participated in the research. In the light of the findings, it was discovered that the creative drama method and its approaches have positive effects on both success and permanence in the mathematical modeling process.

The 2nd article of this issue is entitled “High School Students’ Effective Study Attitude and School Burnout: A Scale Development Study” written by Ayşe AYPAY and Fatma ALTINSOY. The aim of this study is to develop the Effective Studying Attitude Scale for high school students and to determine whether school burnout predicts their effective studying. The data were obtained from 368 high school students [182 girls and 186 boys, aged between 14-19]. The factor analysis showed that the scale consists of three factors: Belief in the Value of Learning and Persistence in Learning; Time Planning and Application in Learning and Flow in Learning. The reliability coefficients for the factors of the scale range between .72 and .84. Whereas the effective study attitude is negatively predicted by the "loss of interest in school", "burnout from studying," and "burnout from homework," it is positively predicted by the need to rest and time for fun. Based on the findings; it can be suggested that the school burnout variable should also be taken into account in studies conducted to increase students' effective study skills.

The 3rd article of this issue is entitled “Exploring Pre-service Teachers’ Attitudes towards Online Peer Assessment” written by Kübra KARAKAYA ÖZYER. This study explores pre-service teachers’ attitudes towards and opinions about the online peer assessment process. To this end, a basic qualitative research method was applied. A sample of 125 pre-service teachers participated in the study. The study employed the “Attitudes towards Peer Assessment Scale” and open-ended questions to investigate participants’ attitudes and opinions. The study found that the vast majority of the participants felt that peer assessment is beneficial and enjoyable. However, some of the participants indicated that fairness and efficacy might be questionable. The study highlights the influence of anonymity, rater training, and teacher monitoring. Recommendations are provided to improve the design and implementation of peer assessment in Teacher Training Programmes.

The 4th article of this issue is entitled “Awareness of Pre-Service Teacher on Digital Eye – Strain” written by Nida BAYINDIR and Nejla GÜLTEPE. The purpose of this study is to investigate the awareness of pre-service teachers about digital eye-strain symptoms. Participants are twelve pre-service teachers studying at Faculty of Education in Eskisehir, in the fall semester of the 2020-2021 academic year. According to the results of the study the pre-service teachers stated the general eye defect symptoms, listed the possible negative effects of these defects on students’ academic life, and described what teachers should do in such cases. The pre-service teachers couldn’t distinguish between digital eye-strain and general eye defects. It is suggested to provide pre-service and in-service training opportunities for pre-service teachers and teachers about digital eyestrain.

The 5th article of this issue is entitled “Research on the Reasons of Primary Education Teachers Not Taking Postgraduate Education” written by Cavide DEMİRCİ and Gamze KURU. This study aims to find out the reasons why primary school teachers do not prefer doing master’s degree, and to reveal their opinions and suggestions. This is a qualitative case study with randomly selected teachers. A semi-structured interview form based on an expert opinion has been adopted. The interviews have been held with 60 primary school teachers working in Gediz district of Kütahya in the 2019-2020 Academic Year. As a result of the interviews, 4 of the 60 teachers participating in the research have taken graduate education and 56 have not. The reasons for their preference of postgraduate education are “academic career” and “professional career”. The reasons why teachers do

not prefer postgraduate education are generally stated as “not needing it”, “not having time”, and “not being able to adjust course schedules”. It can be said that the Ministry of National Education should change its strategies and carry out activities that encourage teachers to do postgraduate education.

The 6th article of this issue is entitled “A Biology Teacher’s Notions and Instruction of Nature of Science” written by Arzu TANIŞ ÖZÇELİK. This case study investigated a biology teacher’s notions of nature of science (NOS), how and if he used nature of science aspects in his teaching and what he thinks impacts his teaching of nature of science in depth. The context of the study includes a big high school in a rural school district in the USA. The participant of the study is a male biology teacher with fifteen years of teaching experience. Data sources of the study include three interviews with the teacher, fieldnotes taken during the classroom observations, and handouts given to the classroom. Findings show that the teacher had adequate understandings in some aspects of NOS such as tentativeness of scientific knowledge, empirical aspect of scientific knowledge, and role of creativity and imagination in the scientific knowledge. Also, he had some partly-adequate understandings in other aspects such as subjectivity, the difference between scientific theory and law, social-cultural aspect, and the difference between observation and inference. According to the data, the teacher’s conceptions of nature of science revealed from the interviews and his instruction and handout analysis do not match all together. Results were discussed in the context of biology teaching and teacher education.

The 7th article of this issue is entitled “Bioeconomy through the Perspective of Science Teachers” written by Semih ESENDEMİR and Burcu ANILAN. This study aims to determine the opinions of science teachers about bioeconomy, who can play an active role in introducing and promoting the concept of bioeconomy. The participants of the research consist of eight science teachers working in institutions affiliated to the Ministry of National Education. Since it was aimed to reveal the views of science teachers about bioeconomy in depth, the data were collected by the semi-structured interviews. According to the data obtained, it demonstrates that most of the science teachers do not recognize the concept of bioeconomy, do not include it in their lessons in parallel with the fact that it is not included in the science curriculum, and cannot relate this concept to real life problems. It is considered that this research will contribute to bioeconomy education and research.

The 8th article of this issue is entitled “An Investigation of the Reading Comprehension Problems of Fourth Grade Students” written by Ertuğrul ÇAM and Muhammet BAŞTUĞ. The aim of this study is to examine the causes of reading comprehension problems of fourth grade students who have reading comprehension problems. Eight parents of fourth grade students participated in the research. The data for the research were collected through semi-structured interview. The data were analyzed by descriptive analysis method. According to the results, parents did not have their children do early literacy studies in the pre-school period. Interactive reading activities with children are insufficient. Their children did not show letter-sound and word awareness in the preschool period. Children's listening comprehension indicators are positive. There were no serious problems in the literacy learning process. No problem was observed in word recognition skills. The students' vocabulary is at a good level. The family's level of reading at home is very low for different reasons. The children do not have their own libraries at home. Students reach books by school library. These results were discussed within the framework of the relevant literature.

The 9th article of this issue is entitled “Science Teachers’ Views towards Argumentation” written by Hilal AKTAMIŞ and Emrah HIĞDE. The aim of this study was to determine science teachers’ views about argumentation-based science lessons. 6 science teachers, working in middle schools at the city center of Aydın, were chosen via the typical case sampling technique, as a purposeful sampling technique. Before argumentation based lesson implementations in middle schools, science teachers attended to pre-service education program about how teachers integrate argumentation in their science lessons. Semi-structured interviews were realized with participants who successfully completed this education program and perform argumentation based science lessons in their school. The findings of the interview data pointed that teachers did not know the meaning of argument before attending this study, took a long time to prepare argumentation based lessons but this lessons was enjoyable in practicum. They stated that it is hard to teach students about evidence and justification of argumentation but students attend lessons actively. The teachers explained that they selected type of activity according to topics given in science lessons but they did not implemented argumentation based lesson except for argumentation based activities used in study. It is recommended that junior teachers take attention to teach students argumentation based activities and inquiry-based science lessons in order to improve students’ inquiry skills.

The 10th article of this issue is entitled “The Evaluation of Flipped Classroom Themed Master’s Theses and Dissertations in Turkey between 2015 and 2020” written by Cavide DEMİRCİ, S. Ahmet SARIAY and H. Sinan AVCI. The aim of this study is to examine postgraduate theses on flipped classrooms between 2015 and 2020 in Türkiye. The sample consists of 21 dissertations and 62 master's theses which were subjected to document review with the measurement tool developed by Demirci, Arıkan and Onuk in 2018. Most studies on the subject of flipped classrooms were conducted in 2019 and 2020 which shows that this subject has started to attract the attention of researchers in recent years. As the integration of technology into education accelerates, the interest in technology-based applications such as flipped classrooms will continue to increase and this will show more reflections in academic research.

The 11th article of this issue is entitled “The Problems Experienced in the Integration of Syrian Students into the Turkish Education System” written by İsmail Mustafa AKÇAY and Fatih SERBEST. The aim of this study is to determine the problems that Syrian students experience in the integration process into the Turkish Education System. It is also aimed to determine the solution suggestions of the teachers for the problems of Syrian students. The participants of the research are 27 teachers working in the 2019-2020 academic year. It was determined that Syrian students’ Turkish language problem is an important obstacle in social cohesion and in the integration process into Turkish Education System, cultural and adaptation problems are the trauma they experience due to migration. It was seen that the support of Syrian parents to their children’s educational process is insufficient because they do not know Turkish. It was determined that the level of students’ attendance to school differs according to their ages, especially the children of low income families have started working life. At the end of the research, solution suggestions were also developed based on the teachers’ views.

See you in the next issue....

“Stay with Science, Stay with Us”

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