

CONTENT

| | |
|--|-----------|
| SOME ISSUES OF PROFESSIONAL EDUCATION OF STUDENTS AMELINA Svitlana, UA | 2 |
| DISSEMINATION OF METHODOLOGICAL ASSISTANCE FOR TECHNOLOGY SUBJECTS TEACHERS BÁNESZ Gabriel, SR | 6 |
| USE OF METHOD OF ANALYSIS OF CONCRETE SITUATIONS AS THE BASIC VARIETY OF IMITATION UNPLAYING METHOD OF ACTIVE EDUCATIONAL-COGNITIVE ACTIVITY IN THE PROCESS OF TEACHING IN HIGHER EDUCATIONAL ESTABLISHMENTS BERMICHEVA Olena – BURUKOVSKA Nataliia – SYSOIENKO Grigoriy, UA | 10 |
| STUDENTS' TECHNICAL LITERACY IN THE FIRST YEAR OF THEIR UNIVERSITY STUDIES BITTEROVÁ Miriam – IVANČÍK Peter, SR | 16 |
| THE UTILIZATION OF THERMOVISION MEASUREMENTS AROUND HEAT TRANSFER SURFACES ČERNECKÝ Jozef, SR | 21 |
| THE ESSENCE OF THE ORGANIZATION AND MANAGEMENT FUNCTION - SELECTED CONCEPTS CICHON Seweryn, PL | 25 |
| THE CONSUMPTION OF EDUCATIONAL SERVICES OF HIGHER EDUCATION AGAINST SELECTED CRITERIA FOR THE CLASSIFICATION OF CONSUMPTION CICHON Seweryn, PL | 29 |
| REGULATIONS FOR THE APPROXIMATION OF THE EDUCATION SYSTEMS IN EUROPEAN HIGHER EDUCATION CICHON Seweryn, PL | 33 |
| THE HAZARDOUS SUBSTANCES IN SPECIAL SURFACE TREATMENT OF WOOD PRODUCTS DANIHELOVÁ Anna, SR | 37 |
| TECHNICAL EDUCATION AS A PLATFORM FOR VISUAL ART EDUCATION DOVALOVÁ Dana, SR | 41 |
| TEACHER'S EDUCATION OF TECHNICAL SUBJECTS IN SLOVAK REPUBLIC DUCHOVIČOVÁ Marcela, SR | 45 |

| | |
|--|------------|
| THE DISCIPLINE DANGEROUS SUBSTANCES AND PROCESSES AND ITS PLACE IN EDUCATION FESZTEROVÁ MELÁNIA, SR | 50 |
| ASSIGNMENT TEST TASKS WITHIN TECHNICAL SUBJECTS FILÍPEK JOSEF, ČR | 54 |
| FACTORS OF PROFESSIONAL ASPIRATIONS IN SOCIALLY DISADVANTAGED PUPILS OF BASIC SCHOOLS FRIEDMANN ZDENĚK, ČR | 57 |
| SCHOOL AS AN EFFECTIVE LEARNING ORGANIZATION GAJDA Joanna, PL | 61 |
| DETERMINANTS OF ORGANIZATIONAL CULTURE GAJDA Joanna, PL | 65 |
| SCHOOL AS A KNOWLEDGE – BASED ORGANIZATION GAJDA Joanna, PL | 69 |
| DRAWING METHODS FOR TECHNICAL PRAXIS HODAŇOVÁ JITKA, ČR | 73 |
| STUDY OF PREPRIMARY EDUCATION AS DIALOG PRAXIS BETWEEN THEORY HONZÍKOVÁ JARMILA, ČR . | 76 |
| APPLIANCE OF KEY COPETENCIES IN PRIMARY EDUCATION WITH A VIEW TO ELEMENTARY TEACHING AND NATURAL HISTORY HRDLÍČKOVÁ Vlasta, ČR | 80 |
| TECHNICAL EDUCATION IN PRESCHOOL EDUCATION AS ELEMENT SUPPORTING DEVELOPMENT OF A CHILD KNYCH Aleksandra, PL | 85 |
| EDUCATIONAL INFLUENCE OF THE TV COMMERCIAL KNYCH Aleksandra, PL | 89 |
| VISUALIZATION OF TEMPERATURE FIELDS AROUND CURVED SURFACES BY THERMOVISION KONIAR Ján – BRODNIANSKÁ Zuzana, SR | 93 |
| THE REMOTE EXPERIMENTS FROM THE POINT OF VIEW OF PEDAGOGICAL RESEARCH KOZÍK Tomáš – ŠIMON Marek – KUNA Peter, SR | 97 |
| PROFESSIONAL TEACHING QUALITY EVALUATION KRIŠTOFIAKOVÁ Lucia – TÓBLOVÁ Eva, SR | 102 |

| | |
|---|------------|
| ACTIVITIES OF THE SELECTED FOREIGN SCIENCE CENTERS IN THE DEVELOPMENT OF TECHNICAL SKILLS KROTKÝ Jan, ČR | 106 |
| MEASUREMENT OF ABILITIES OF STUDENTS TO UNDERSTAND THE TEXT BY MEANS OF CLOZE-TEST LABAŠOVÁ Eva – LABAŠ Vladimír, SR | 110 |
| COMPARISON OF THE CONTENTS OF TECHNICALLY ORIENTED SUBJECTS IN PRIMARY SCHOOLS IN THE CZECH REPUBLIC AND SLOVAK REPUBLIC LUKÁČOVÁ Danka, SR | 114 |
| ELEMENTS OF LOST WAX CASTING IN PRACTICAL TEACHING LUKŮVKA Radek, ČR | 118 |
| EASY TO BUILD REMOTE MEASUREMENT AND CONTROL LUSTIG František, ČR | 122 |
| OBSERVATION FORM AS A TOOL FOR EVALUATION MACH Petr, ČR | 131 |
| PROBABILITY AND STATISTICS IN ENGINEERING MACUROVÁ Anna – MACURA Dušan, SR | 135 |
| TO THE PROBLEM OF DEFINITION “MANAGEMENT ACTIVITY” MAKODZEI Lyudmila, UA | 137 |
| A SYNOGRAPH: THE COORDINATE SYSTEM VIEWPOINT MARKECHOVÁ Iveta, SR | 141 |
| REALIZATION OF DEMONSTRATION EXPERIMENT IN TEACHING THE SUBJECT DANGEROUS SUBSTANCES MARKOVÁ Iveta, SR | 144 |
| FIRST LESSON – COGNITIVE APPROACH TO DIDACTIC PROCESS MASTALERZ Elżbieta, PL | 149 |
| NEW TRENDS IN TEACHING THE THEORY OF MANUFACTURING AT UNIVERSITIES MURČINKO Jaromír, SR | 153 |
| THE DETECTION METHODS OF ESCAPE RISK MATTERS FROM THE COOLING SYSTEM FOR EDUCATION OF TECHNICAL SUBJECTS NEUPAUEROVÁ Andrea, SR | 157 |
| THE ROLE OF ‘SCHOOL OF WORK’ IN TECHNICAL EDUCATION NOGA Henryk – KIEŁBASA Marzena, PL | 161 |

| | |
|---|------------|
| QUALITY EVALUATION OF VOCATIONAL SECONDARY SCHOOLS IN SLOVAKIA | 165 |
| NOVOTA Marian – ZÁŇ Michal – TKÁČ Lukáš – KADNÁR Jozef – KLIEROVÁ Martina – ZÁHORCOVÁ Erika – RIDZOŇOVÁ Zuzana – ŠTEFKOVÁ Petra – PODAŘIL Martin – ŠTÚR Milan – PETNUCHOVÁ Jana – HORŇÁKOVÁ Veronika, SR | |
| INVESTIGATION OF OPTICALLY ACTIVE SUBSTANCES BY POLARIZED LIGHT USING | 170 |
| NOVOTNÝ Jan, ČR | |
| POROUS MATERIALS – THEIR PROPERTIES AND APPLICATIONS | 174 |
| PACIOREK Jakub, PL | |
| REFLECTIVE COMPONENTS OF PSYCHOLOGICAL READINESS OF FUTURE SPECIALISTS IN TO THE PROFESSIONAL ACTIVITY | 178 |
| POLOZENKO Oksana, UA | |
| LEADING APPROACHES ON TEACHER TRAINING TOWARDS THE EUROPE OF KNOWLEDGE | 182 |
| POSTRYGACH Nadiia, UA | |
| MEASUREMENT VARICAP | 187 |
| RADOCHA Karol, ČR | |
| ANALYSIS OF THE CULTURAL RELATIONS OF MAN AND SOCIETY | 191 |
| RIDEI Nataliia – MELNYCHUK Tatiana – KUCHERENKO Iuliia, UA | |
| FORMS AND METHODS OF TEACHING DISCIPLINE "ECOLOGICAL EXPERTISE" FOR STUDENTS ECOLOGISTS | 195 |
| RIDEI Nataliia – PALAMARCHUK Svetlana, UA | |
| STATE EDUCATIONAL PROGRAMS IN UKRAINE | 200 |
| RIDEI Natalya – PIRUTSKA Irina – EPELBOIM Elena, UA | |
| LEVELS OF PROFESSIONAL COMPETENCE OF ENVIRONMENTALISTS | 203 |
| RIDEI Nataliia – RYBALKO Yuliya – STROKAL Vita, UA | |
| USE OF SOLAR TECHNIQUE COMPONENTS IN EDUCATION | 206 |
| RUDOLF Ladislav, ČR | |
| INNOVATIVE TECHNICAL EDUCATION IN THE AREA OF REDUCING HAZARDOUS SUBSTANCES IN ENVIRONMENTAL TECHNOLOGY | 210 |
| RUŽINSKÁ Eva, SR | |

| | |
|--|------------|
| ASSESSMENT OF PROGRAM HANDICRAFTS AT UNIVERSITIES OF THIRD AGE IN NITRA | 214 |
| ŠIRKA Ján, SR | |
| PNEUMATIC CONTROL SYSTEMS IN TECHNICAL AND INFORMATION TECHNOLOGY EDUCATION | 218 |
| ŚLEZIAK Mariusz, PL | |
| HYDRAULIC CONTROL SYSTEMS IN TECHNICAL AND INFORMATION TECHNOLOGY EDUCATION | 222 |
| ŚLEZIAK Mariusz, PL | |
| THE USE OF EEG | 227 |
| ŚLÓSZARZ Piotr, PL | |
| HOW CLASSIFY MISTAKES AND SHORTCOMINGS IN REVIEWS OF SPECIAL AND SCIENTIFIC WORKS | 231 |
| STOFFA Ján – STOFFOVÁ Veronika, SR | |
| THE SPATIAL IMAGINATION IN EDUCATION OF PRIMARY SCHOOL | 238 |
| TOMKOVÁ Viera, SR. | |
| CURRENT TENDENCIES OF SOCIAL DEVELOPMENT AND CREATING UNIVERSITY EDUCATION | 243 |
| TOBKACHEIȚ AHHa, UA | |
| NUMBER - ITS FORM, STATUS AND ROLES IN ANCIENT GREEK MATHEMATICS | 248 |
| TRUBENOVÁ Jaroslava, SR | |
| CHILDREN'S DRAWING IN A QUALITATIVE RESEARCH OF PUPIL'S PREFERENCES TO CHOICE OF TECHNICAL SUBJECTS | 252 |
| TVARŮŽKA VÁCLAV, ČR | |
| THE IMPLEMENTATION OF TECHNICAL APPLICATIONS TO THE TEACHING OF APPLIED MATHEMATICS | 259 |
| VAGASKÁ Alena – GOMBÁR Miroslav – KMEC Ján, SR | |
| THE HEAT TRANSFER MECHANISM DURING CONDENSATION PROCESS IN HEAT PIPES | 264 |
| VALENTOVÁ Karina – ČERNECKÝ Jozef, SR | |
| CAUSES OF THE TECHNICAL PROFESSIONALS LACK IN THE CZECH REPUBLIC AND ITS ANALYSIS | 269 |
| VANĚK Vladimír – VAŇKOVÁ Hana, ČR | |

| | |
|--|------------|
| PSYCHOLOGICAL SOURCES OF TECHNICAL STUDENT ACHIEVEMENT | 274 |
| WALAT Wojciech, PL | |
| THE ROLE OF EDUCATION IN THE INFORMATION SOCIETY | 278 |
| WARZOCHA Tomasz, PL | |
| TEACHER – STUDENT AS THE CO-CREATORS SCHOOL EDUCATION, OVERT AND COVERT ELEMENTS OF THE PROGRAM | 282 |
| WILK ELŻBIETA – MACHOWSKA MARTA, PL | |
| TEXTBOOKS VERIFICATION OF OBJECT TECHNOLOGY IN THE 7TH GRADE OF PRIMARY SCHOOLS IN SLOVAKIA | 290 |
| ŽÁČOK Ľubomír, SR | |
| VOCATIONAL TRAINING ISCED 3C IN THE CONTEXT OF THE SCHOOL REFORM | 309 |
| ZATKALÍK Martin – HAŠKOVÁ Alena, SR | |
| THE DEVELOPMENT OF SOCIAL PEDAGOGICS THEORY IN GERMANY IN 1960-70'S | 314 |
| ZAYCHENKO Natalia, UA | |
| TECHNICAL INTEREST ACTIVITIES AT BASIC SCHOOL | 318 |
| ZUKERSTEIN Jaroslav, ČR | |
| APPLICATION OF MODERN AND INTERACTIVE MULTIMEDIA TOOLS IN THE EDUCATION | 321 |
| DOSTÁL Jiří, ČR | |
| METHODOLOGY OF CREATION OF ELECTRONIC TEACHING MATERIALS FOR INTERACTIVE WHITEBOARDS | 324 |
| BREČKA Peter – KOPRDA Štefan, SR | |
| WOLFRAM ALPHA AS AN ON-LINE TEACHING TOOL FOR ORDINARY DIFFERENTIAL EQUATIONS SOLVING | 329 |
| ČERVEŇANSKÁ Zuzana – KOTIANOVÁ Janette, SR | |
| EDUTAINMENT AND FOREIGN LANGUAGES TEACHING | 333 |
| CHEREDNICHENKO Galina – KLYMOVA Olena, UA | |
| PEDAGOGICAL BASICS OF USING COMPUTERS IN FOREIGN LANGUAGE LEARNING | 338 |
| CHEREDNICHENKO Galina – KOVALCHUK Olha, UA | |
| THE ROLE OF MULTIMEDIA TOOLS IN TEACHING FOREIGN LANGUAGES | 343 |
| CHEREDNICHENKO Galina – SHAPRAN Lyudmila – KUNITZIA Lyidmila, UA | |

| | |
|--|------------|
| SELECTED OUTPUTS OF PROJECT „APPLICATION OF MODERN AND INTERACTIVE MULTIMEDIA TOOLS IN THE EDUCATION“ DOSTÁL Jiří, ČR | 347 |
| UTILIZATION OF SOFTWARE SUPPORT IN EDUCATIONAL PROCESS FECHOVÁ Erika, SR | 353 |
| WEB TOOL FOR INNOVATION OF SEVERAL VARIABLES CALCULUS TUITION AT THE TBU IN ZLÍN WHICH IS USABLE ALSO AT UNIVERSITIES WITH ENGINEERS' DEGREE COURSES FIALKA Miloslav – CHARVÁTOVÁ Hana, ČR | 358 |
| IMPORTANCE OF 3D ANIMATIONS IN MATHEMATICS II EDUCATION FOR STUDENTS OF SECURITY TECHNOLOGIES STUDY FIELD AT TBU IN ZLÍN FIALKA Miroslav – URBANČOK Lukáš – CHARVÁTOVÁ Hana, ČR | 363 |
| MODELLING OF GRAPHS OF FUNCTIONS IN INTEGRAL CALCULUS TAUGHT IN FIRST TERM AT FAI OF THE TBU IN ZLÍN FIALKA Miloslav – URBANČOK Lukáš – CHARVÁTOVÁ Hana, ČR | 369 |
| WORK WITH PROTECTED DATA HAMBALÍK Alexander, SR | 375 |
| THE PROBLEMS CONNECTED WITH THE EVALUATION OF STUDENTS WITHIN SUBJECTS RELATED TO THE 3D MODELLING HARČÁR Adrián – DRAČKOVÁ Dana, SR | 379 |
| EVALUATION OF INFORMATICS TEACHING REALISATION IN SLOVAKIA AND CZECH REPUBLIC AS AN INTEGRAL PART OF TECHNICAL EDUCATION HAŠKOVÁ Alena – ZÁHOREC Ján, SR | 384 |
| INNOVATION OF TECHNICAL GRAPHICS AND DESIGN HODIS Zdeněk, ČR | 389 |
| SOME ASPECTS OF THE USE OF ICT IN THE TEACHING OF COMPUTER APPLICATIONS HREHOVÁ Stella, SR | 394 |
| EDUCATIONAL INFLUENCE OF THE COMPUTER GAMES MAIN CHARACTER KNYCH Aleksandra, PL | 398 |
| THE 3D MODELS OF THE LABORATORY ABRASSIVE WEAR TESTS LIŠKA Jaromír – FILÍPEK Josef, ČR | 403 |

| | |
|---|------------|
| THE USE OF INTERACTIVE WHITEBOARDS IN LESSONS OF SCIENCE FROM THE PERSPECTIVE OF PEDAGOGICAL INTERACTION AND COMMUNICATION | 409 |
| MANĚNOVÁ Martina – SVATOŠ Tomáš, ČR | |
| EVALUATION OF DEMONSTRATION EXPERIMENT IN TEACHING THE SUBJECT DANGEROUS SUBSTANCES | 415 |
| MARKOVÁ Iveta, SR | |
| IT SUPPORT OF EDUCATION OF THE LEAKAGE OF DANGEROUS SUBSTANCES | 420 |
| MARKOVÁ Iveta – ZELENÝ Ján, SR | |
| CREATIVE PEDAGOGICAL APPROACH IN USING OF INFORMATION TECHNOLOGY IN SECONDARY SCHOOL EDUCATION | 425 |
| MIKLOŠÍKOVÁ Miroslava – PELCEROVÁ Lenka, ČR | |
| THE APPLICATION OF COMPUTER SKILLS AT THE SPECIFICATION OF THE MECHANICAL SYSTEM MOTION | 430 |
| MONKOVÁ Katarína – MONKA Peter, SR | |
| THE APPLICATION OF COMPUTER SKILLS AT THE SPECIFICATION OF THE MECHANICAL SYSTEM MOTION | 435 |
| MONKOVÁ Katarína – MONKA Peter, SR | |
| ESSENTIALS OF LAMINATE MODELING BY SIMULATION SOFTWARE FOR SUBJECT STRUCTURAL ANALYSES BY PC | 440 |
| MURČINKOVÁ Zuzana, SR | |
| INFORMATION BASIS OF SUSTAINABLE DEVELOPMENT OF SOCIETY | 445 |
| NAGORNIUK Oksana – NAGORNIUK Olga – SHE Vladimir, UA | |
| FACTORS MOTIVATING ELDERLY PEOPLE TO LEARN NEW TECHNOLOGIES | 449 |
| NESTERAK Tomasz – DZIEDZINA Monika, PL | |
| INTERGENERATIONAL COMMUNICATION BARRIERS IN INFORMATION TECHNOLOGY TIMES | 457 |
| NESTERAK Tomasz – MAŁCZKA Iwona, PL | |
| THE CHALLENGES OF COMMUNICATION BETWEEN | 465 |
| NOGA Henryk, PL | |
| INTERGENERATIONAL COMMUNICATION BARRIERS IN INFORMATION TECHNOLOGY TIMES | 474 |
| NOGA Henryk, PL | |

| | |
|--|------------|
| TEXTURED IN PHOTOSHOP NOGA Henryk, PL | 483 |
| MODERN PROGRAMMING LANGUAGES IN THE IT SOLUTIONS IN THE EDUCATIONAL AND ADMINISTRATIVE ACTIVITIES OF A HIGHER EDUCATION INSTITUTION – THE SQL DATABASE LANGUAGE PACIOREK Jakub, PL | 495 |
| MICROPROCESSOR VERSUS MICROCONTROLLER PACIOREK Jakub, PL | 500 |
| USING OF INFORMATION AND COMMUNICATION TECHNOLOGY IN THE FIELD OF EDUCATION PROCESS PODAŘIL Martina – KLIEROVÁ Martina, SR | 505 |
| INFORMATION TECHNOLOGIES IN TEACHING HISTORY OF FINE ART AS PART OF THE UNIVERSITY OF THE THIRD AGE RÉCKA Adriana, SR | 509 |
| THE APPLICATION OF THE RESULTS OF RESEARCH IN THE TEACHING OF THE SUBJECT ANALYSIS OF PROCESSES WITH THE PRESENCE OF HAZARDOUS SUBSTANCES IN THE ENVIRONMENT RUŽINSKÁ Eva, SR | 513 |
| IT SUPPORT OF TEACHING IN THE AREA OF INDUSTRIAL TECHNOLOGY GENERATING OF DANGEROUS SUBSTANCES RUŽINSKÁ Eva, SR | 518 |
| INFLUENCE OF PC ON HUMAN HEALTH ŠEBO Miroslav, SR | 522 |
| CONCEPT OF WEBSITE FOR EDUCATION SITÁŠ Juraj, SR | 526 |
| CREATING OF WEB PAGE FOR SECONDARY VOCATIONAL SCHOOLS WITH FOCUS ON THE ELECTRICAL ENGINEERING TKÁČ Lukáš – GERHÁTOVÁ Žaneta, SR | 530 |
| COMMUNICATION MODELS WITH USE OF DIGITAL-VISUAL RECORDS IN EDUCATION TVARŮŽKA Václav, ČR | 535 |
| NATIONAL UNIVERSITY OF LIFE AND ENVIRONMENTAL SCIENCES OF UKRAINE – ON THE WAY FROM PROPRIETY SOFTWARE TO FREE SOFTWARE TVEREZOVSKA Nina – LIPSKA Victoria, UA | 540 |

| | |
|--|------------|
| THE USE OF NEURAL NETWORKS IN TECHNICAL EDUCATION URBANÍKOVÁ Marta, SR | 545 |
| THE ELECTRONIC TEXTBOOK OF DIDACTICS OF TECHNICAL EDUCATION VARGOVÁ Mária, SR | 549 |
| HOW IS A DIGITALLY CODED IMAGE CREATED? ZABADAL Lubomír, SR | 553 |
| LONG DISTANCE STUDY AND E-LEARNING FOR UNIVERZITY HENDRYCH Lumír, ČR | 558 |
| RESEARCH EVALUATION CRITERIA FOR EVALUATING ELECTRONIC STUDY SUPPORT MATERIAL HENDRYCH Lumír, ČR | 560 |
| PROJEKTE INNERHALB ALS TEIL DES PROGRAMMES FRVŠ 2012, MIT DEM NAMEN DER BAUKASTEN II IM UNTERRICHT ALLGEMEINEN TECHNISCHEN THEMA. MINARČÍK Josef, ČR | 562 |