



Module name: Strategy of research papers preparation and revision for high impact factor ISI List journals

Academic year: 2019/2020 Code: ZSDA-3-0023-s ECTS credits: 3

Faculty of: Szkoła Doktorska AGH

Field of study: Szkoła Doktorska AGH Specialty: —

Study level: Third-cycle studies Form and type of study: Full-time studies

Lecture language: English Profile of education: Academic (A) Semester: 0

Course homepage: —

Responsible teacher: Paszyński Maciej (paszynsk@agh.edu.pl)

Module summary

The main goal of the lecture is to make students familiar with practical methods of preparation of research papers for high impact factor ISI List journals from Q1, Q2, and Q3 quartiles, methods for the preparation of letters with answers to reviewer's comments, and methods for papers revisions. In particular, during the lecture, we will present examples of papers, revisions, and answers to the reviewer's comments selected from 50 different papers from 20 different Q1, Q2, and Q3 journals.

Description of learning outcomes for module

MLO code	Student after module completion has the knowledge/ knows how to/is able to	Connections with FLO	Method of learning outcomes verification (form of completion)
Social competence: is able to			
M_K001	He is able to discuss with co-authors improvements and revisions for a high-quality research paper targeting Q1, Q2, Q3 journal, using the scientific arguments and ethics.	SDA3A_K01, SDA3A_K03, SDA3A_K02	Activity during classes
M_K002	He is able to discuss critics of his paper targeting Q1, Q2, Q3 journals, using scientific arguments, ethics and research discussion, avoiding unnecessary emotions.	SDA3A_K01, SDA3A_K03, SDA3A_K02	Activity during classes
Skills: he can			
M_U001	He can identify journals from ISI List from Q1, Q2, Q3 quartiles for a given scientific discipline.	SDA3A_U07, SDA3A_U06, SDA3A_U03, SDA3A_U05	Scientific paper

M_U002	He can lead a critical scientific discussion concerning a given research topic, referring to the actual state of the art, with high-quality scientific standards and ethics.	SDA3A_U02, SDA3A_U01, SDA3A_U04	Presentation
M_U003	He can write a reliable letter with the answer to the reviewers' comments referring to a research paper from Q1, Q2, Q3 journal, using high-level scientific arguments, ethics, and the state of the art.	SDA3A_U06, SDA3A_U02, SDA3A_U03, SDA3A_U05, SDA3A_U01, SDA3A_U04	Presentation
M_U004	He can write a high-quality research paper targeting Q1, Q2, Q3 journals, with proper structure, including the introduction, state of the art, main research thesis, methodology, and numerical results/experiments.	SDA3A_U06, SDA3A_U03, SDA3A_U05	
M_U005	He can write a review of a research paper taking into account actual state of the art, as well as check the requirements necessary a publication in high-quality Q1, Q2, Q3 journals.	SDA3A_U02, SDA3A_U05, SDA3A_U01, SDA3A_U04	Presentation
Knowledge: he knows and understands			
M_W001	He knows and understands the classification of high-quality scientific journals within Q1, Q2, Q3 quartiles, rules for indexing journals in different data-bases, rules for estimating impact factor przypisywania impact factor, as well as methods for assigning points for publications.	SDA3A_W02, SDA3A_W04, SDA3A_W01	Presentation
M_W002	He knows and understands methods and tools of searching for actual, state of the art, important from the point of view of science, scientific papers for a given scientific discipline.	SDA3A_W03, SDA3A_W05, SDA3A_W06	Activity during classes

Number of hours for each form of classes

Suma	Form of classes										
	Lectures	Auditorium classes	Laboratory classes	Project classes	Conversation seminar	Seminar classes	Practical classes	Fieldwork classes	Workshops	Prace kontrolne i przejściowe	Lektorat
28	14	0	14	0	0	0	0	0	0	0	0

FLO matrix in relation to forms of classes

MLO code	Student after module completion has the knowledge/ knows how to/is able to	Form of classes

		Lectures	Auditorium classes	Laboratory classes	Project classes	Conversation seminar	Seminar classes	Practical classes	Fieldwork classes	Workshops	Prace kontrolne i przejściowe	Lektorat
Social competence: is able to												
M_K001	He is able to discuss with co-authors improvements and revisions for a high-quality research paper targeting Q1, Q2, Q3 journal, using the scientific arguments and ethics.	-	-	+	-	-	-	-	-	-	-	-
M_K002	He is able to discuss critics of his paper targeting Q1, Q2, Q3 journals, using scientific arguments, ethics and research discussion, avoiding unnecessary emotions.	-	-	+	-	-	-	-	-	-	-	-
Skills: he can												
M_U001	He can identify journals from ISI List from Q1, Q2, Q3 quartiles for a given scientific discipline.	+	-	+	-	-	-	-	-	-	-	-
M_U002	He can lead a critical scientific discussion concerning a given research topic, referring to the actual state of the art, with high-quality scientific standards and ethics.	+	-	+	-	-	-	-	-	-	-	-
M_U003	He can write a reliable letter with the answer to the reviewers' comments referring to a research paper from Q1, Q2, Q3 journal, using high-level scientific arguments, ethics, and the state of the art.	+	-	+	-	-	-	-	-	-	-	-
M_U004	He can write a high-quality research paper targeting Q1, Q2, Q3 journals, with proper structure, including the introduction, state of the art, main research thesis, methodology, and numerical results/experiments.	+	-	+	-	-	-	-	-	-	-	-
M_U005	He can write a review of a research paper taking into account actual state of the art, as well as check the requirements necessary a publication in high-quality Q1, Q2, Q3 journals.	+	-	+	-	-	-	-	-	-	-	-
Knowledge: he knows and understands												

M_W001	He knows and understands the classification of high-quality scientific journals within Q1, Q2, Q3 quartiles, rules for indexing journals in different data-bases, rules for estimating impact factor przypisywania impact factor, as well as methods for assigning points for publications.	+	-	+	-	-	-	-	-	-	-	-
M_W002	He knows and understands methods and tools of searching for actual, state of the art, important from the point of view of science, scientific papers for a given scientific discipline.	+	-	+	-	-	-	-	-	-	-	-

Student workload (ECTS credits balance)

Student activity form	Student workload
Udział w zajęciach dydaktycznych/praktyka	28 h
Preparation for classes	28 h
przygotowanie projektu, prezentacji, pracy pisemnej, sprawozdania	28 h
Summary student workload	84 h
Module ECTS credits	3 ECTS

Additional information

Module content

Lectures

Evaluation of scientific journals

ISI Lists, quartiles, journals Q1, Q2, Q3, Q3, Web of Science, Impact Factor, Scimago, h-index, SCOPUS, Google Scholar, scientific journals list and points of journals in Poland, the relation between scientific publications and research carrier, Highly Cited Researchers, preface papers, paid journals, predatory journals

Preparation and revision of research papers for Q3 journals

Examples of preparation and revision of research papers from Q3 journals (selected examples from journals Parallel Computing, Concurrency and Computations: Practise and Experience, Computational Geosciences, Scientific Programming)

Preparation and revision of research papers for Q2 journals

Examples of preparation and revision of research papers from Q2 journals (selected examples from journals Computer & Physics Communications, Journal of Parallel and Distributed Computing, Fundamenta Informaticae, SIAM Journal on Applied Mathematics, Journal of Computational Science, Engineering with Computers, Computer Methods in Biomechanics and Biomedical Engineering)

Rules for preparation of papers for Q1 journals

Main scientific goal of the paper, state of the art, from presentation to plan of the

paper, guidelines for writing a high quality text for a research paper, guidelines for producing a high quality graphics, selection of citations and acknowledgements, rules for communications with co-authors, ethics for writing of research papers, ethics of selecting of citations and acknowledgements

Rules for writing letters with answers to reviewers comments, rules for papers revisions

Creation of letter with answers to reviewers comments, planning of revisions in the paper, politics of answering to reviewers comments, distinguishing scientific arguments and emotions during the scientific discussion, ethics for the writing of letters with answers to reviewers comments.

Examples of letters with answers to reviewers comments and revisions of papers submitted to Q1 journals

Examples of letters with answers to reviewers comments and revisions of papers submitted to Q1 journals (selected examples from journals Computer Methods in Applied Mechanics and Engineering, Computers and Mathematics with Applications, Applied Soft Computing, IEEE Transactions on Parallel and Distributed Systems)

Rules for writing revisions of papers

Politics of writing of revisions of papers. Identification of the main research goal of the paper. Identification of proper state of the art and citations. Evaluation of the research methodology. Evaluation of the correctness of the numerical results and experiments. Ethics in writing the reviews.

Laboratory classes

Identification of journals from Q1, Q2, and Q3 quartiles including a given research topics

How to find proper journals from Q1, Q2, and Q3 for a given research topic. How to evaluate well journal quality. How to find a journal proper for a scientific level and research topic of a paper. Politics of selecting a journal for a research paper.

Open discussion on guidelines documents

Open discussion on the following documents: a) checklist to do for writing a paper revision, b) guidelines for producing high-quality graphics c) guidelines to prepare and give a presentation, d) checklist to do before sending a written text

Identification of state-of-the-art in a given research topic

Identification of state-of-the-art in a given research topic. How to place your research paper with respect to other research papers in a given discipline. Methods of finding references. Methods for writing the state-of-the-art chapter. Ethics of citations

Identification of the main research topic of the paper

Identification of the main research topic of the paper. How to write an abstract and plan for the research paper. From presentation to plan of a research paper. Preparation of a plan of presentation describing a research paper. Politics and ethics of selecting of co-authors of a research paper.

Preparation of selected parts of research paper

Preparation of selected parts of a research paper (e.g. introduction, conclusions, methodology). Preparation of graphics for a research paper.

Politics of revision of a research paper

Politics of revision of a research paper. Preparation of the letter with answers to reviewers comments. Decisions and politics of answers for reviewers remarks. Distinguishing between scientific arguments and emotions in research discussions. Ethics in writing revisions of research papers.

Preparation of review of a paper

How to find weak points of a research paper. Identification of the main goal of the research paper. Preparation of review of a research paper. Distinguishing between scientific arguments and emotions in research discussions. Ethics in writing reviews of research papers.

Teaching methods and techniques:

Lectures: Lecture: The topics are presented in the form of the multi-media presentation, together with open discussions with lecture audience concerning the presented subjects.

Laboratory classes: Laboratory classes include preparations and presentation of selected parts of research papers, revisions, and reviews, as well as elements of communications with editors and reviewers, together with open discussions on presented topics.

Warunki i sposób zaliczenia poszczególnych form zajęć, w tym zasady zaliczeń poprawkowych, a także warunki dopuszczenia do egzaminu:

The final grade is given based on presentations made by students concerning selected topics including e.g. 1. List of journals from Q1, Q2, and Q3 quartiles for a given research topic 2. List of papers describing state of the art for a given research topic 3. Abstract for a research paper 4. Plan of the research paper 5. The review of the research paper 6. The letter with answers to reviewers comments.

Zasady udziału w poszczególnych zajęciach, ze wskazaniem, czy obecność studenta na zajęciach jest obowiązkowa:

Lectures:

- Attendance is mandatory: No
- Participation rules in classes: Lecture: the attendance according to the general rules is not obligatory, however, it is highly recommended.

Laboratory classes:

- Attendance is mandatory: Yes
- Participation rules in classes: Laboratory classes: Obligatory attendance. The final grade is based on students presentations and activities in discussions.

Method of calculating the final grade

1. The final positive grade is based obtained when students get a positive grade from laboratories.
2. Students get partial grades from presentations of selected parts of the prepared research paper. The final grade is an average of the partial grades.
3. The final grade is given based on the following algorithm:
if $sr > 4.75$ then $OK = 5.0$ else
if $sr > 4.25$ then $OK = 4.5$ else
if $sr > 3.75$ then $OK = 4.0$ else
if $sr > 3.25$ then $OK = 3.5$ else $OK = 3$
4. If the positive grade is obtained on the required deadlines, the final grade is upgraded by 0.5

Sposób i tryb wyrównywania zaległości powstałych wskutek nieobecności studenta na zajęciach:

The missing grades can be obtained during individual office hours with teaching professor

Prerequisites and additional requirements

The intention to write a high-quality research paper to the highly cited journal from ISI List

Recommended literature and teaching resources

<https://www.webofknowledge.com/>

<https://scholar.google.com/>

<https://www.scopus.com/>

<https://www.scimagojr.com/>

<https://hcr.clarivate.com/>

<https://konstytucjadlanauki.gov.pl/wykaz-czasopism>

<https://www.archiwum.nauka.gov.pl/lista-czasopism-punktowanych/>

<https://ncn.gov.pl/aktualnosci/2018-09-21-list-dyrektora-ncn-predatory-journals>

Scientific publications of module course instructors related to the topic of the module

2019:

[1] Isogeometric Residual Minimization Method (iGRM) with direction splitting for non-stationary advection-diffusion problems, Marcin Łoś, Judit Muñoz-Matute, Ignacio Muga, Maciej Paszyński, *Computers and Mathematics with Applications*, <https://doi.org/10.1016/j.camwa.2019.06.023>, journal Q1, IF: 2.81

[2] Parallel fast isogeometric L2 projection solver with GALOIS system for 3D tumor growth simulations / Marcin Łoś, Adrian Kłusek, Muhammad Amber Hassaan, Keshav Pingali, Witold Dzwiniel, Maciej Paszyński, *Computer Methods in Applied Mechanics and Engineering*, 343 (2019) 1-22, journal Q1, IF: 4.17

[3] Object-oriented implementation of the Alternating Directions Implicit Solver for Isogeometric Analysis / Grzegorz Gurgul, Maciej Paszyński, *Advances in Engineering Software* 128 (2019) 187-220, journal Q1, IF: 4,194

[4] Parallel refined isogeometric analysis in 3D, Leszek Siwik, Maciej Woźniak, Victor Trujillo, David Pardo, Victor Calo, Maciej Paszyński, *IEEE Transaction on Parallel and Distributed Systems*, 30(5) (2019) 1134-1142, Q1 journal, IF: 3.402

[5] Fast and Green Parallel Isogeometric Finite Element Method Computations for Multi-objective Optimization of Liquid Fossil Fuel Reserve Exploitation with Minimal Groundwater Contamination, Leszek Siwik, Maciej Wozniak, Marcin Łos, Maciej Paszynski, *Journal of Parallel and Distributed Computing* (2019) in press., journal Q2, IF: 1.819

2018:

[6] Parallel space-time hp-adaptive discretization scheme for parabolic problems, Marcin Łoś, Robert Schaefer, Maciej Paszyński, *Journal of Computational and Applied Mathematics*, 344 (2018) 819-835, journal Q2 IF: 1:883

[7] Concurrency of three-dimensional refined isogeometric analysis, Maciej Paszyński, Leszek Siwik, Maciej Woźniak, *Parallel Computing*, 80 (2018) 1-22, journal Q2, IF: 1.281

[8] Heuristic algorithm to predict the location of C0 separators for efficient isogeometric analysis simulations with direct solvers, Anna Paszyńska, Konrad Jopek, Maciej Woźniak, Maciej Paszyński, *Bulletin of the Polish Academy of Sciences. Technical Sciences*, 66(6) (2018) 907-917, journal Q2, IF 1:361

2017:

[9] Agent-based simulations, adaptive algorithms, and solvers, Maciej Paszyński, *Journal of Computational Science*, 18 (2017) 57-58, journal Q2, IF: 2:502

[10] Application of fast isogeometric L2 projection solver for tumor growth simulations, Marcin Łoś, Maciej Paszyński, Adrian Kłusek, Witold Dzwiniel, *Computer Methods in Applied Mechanics and Engineering* 316 (2017) spec. iss.: Isogeometric Analysis: Progress and Challenges, 1257-1269. journal Q1, IF: 4.17

[11] Element partition trees for h-refined meshes to optimize direct solver performance. P. 1, Dynamic programming, Hassan AbouEisha, Victor Manuel Calo, Konrad Jopek, Mikhail Moshkov, Anna Paszyńska, Maciej Paszyński, Marcin Skotniczny, *International Journal of Applied Mathematics and Computer Science* 27(2) (2017) 351-365, journal Q2, IF: 1.694

[12] IGA-ADS: isogeometric analysis FEM using ADS solver, Marcin Łoś, Maciej Woźniak, Maciej Paszyński, Andrew Lenharth, Muhammm Amber Hassaan, Keshav Pingali, *Computer Physics Communications*, 217 (2017) 99-116, journal Q1, IF: 3,97

[13] The value of continuity: refined isogeometric analysis and fast direct solvers, Daniel Garcia, David Pardo, Lisandro Dalcin, Maciej Paszyński, Nathan Collier, Victor M. Calo, *Computer Methods in Applied Mechanics and Engineering*, 316 (2017) 586-605, journal Q1, IF: 4,17

[14] Mesh-Based Multi-Frontal Solver with Reuse of Partial LU Factorizations for Antenna Array, Ignacio Martinez-Fernandez, Maciej Wozniak, L.E. Garcia-Castillo, Maciej Paszynski, *Journal of Computational Science*, 18 (2017) 132-142, journal Q2, IF: 2:502

[15] Parallel fast isogeometric solvers for explicit dynamics, Maciej Woźniak, Marcin Łoś, Maciej Paszyński, Lisandro Dalcin, Victor Manuel Calo, *Computing and Informatics*, 36(2) (2017) 423-448, journal Q3, IF: 0.524

2015:

[16] Agent-based simulations, adaptive algorithms, and solvers, Maciej Paszyński, *Journal of*

Computational Science, 11 (2015) 121–122, journal Q2, IF: 2:502

[17] An agent-oriented hierarchic strategy for solving inverse problems, Maciej Smółka, Robert Schaefer, Maciej Paszyński, David Pardo, Julen Álvarez-Aramberri, International Journal of Applied Mathematics and Computer Science, 25(3) (2015)483–498, journal Q2, IF: 1.694

[18] A hybrid method for inversion of 3D AC resistivity logging measurements, Maciej Smółka, Ewa Gajda-Zagórska, Robert Schaefer, Maciej Paszyński, David Pardo, Applied Soft Computing, 36 (2015)442–456, journal Q1, IF: 4:873

[19] A hybrid method for inversion of 3D DC resistivity logging measurements, Ewa Gajda-Zagórska, Robert Schaefer, Maciej Smółka, Maciej Paszyński, David Pardo, Natural Computing, 14(3) (2015) spec. iss. Pt. 1 Algorithms and models for complex natural systems; Pt. 2 Optical parallel supercomputing, 355–374, journal Q2, IF: 1:330

[20] Computational cost of isogeometric multi-frontal solvers on parallel distributed memory machines, Maciej Wozniak, Maciej Paszynski, David Pardo, Lisandro Dalcin, Victor Calo, Computer Methods in Applied Mechanics and Engineering, 284 (2016) 971-987, journal Q1, IF:4,17

[21] Direct solvers performance on h-adapted grids, Maciej Paszyński, David Pardo, Victor Calo, Computers and Mathematics with Applications 70 (3) (2015) 282–295, journal Q1, IF: 2.81

[22] Graph transformation systems for modeling three-dimensional finite element method, Pt. 1, Iwona Ryszka, Anna Paszyńska, Ewa Grabska, Marcin Sieniek, Maciej Paszyński, Fundamenta Informaticae, 140(2) (2015) 129–172, journal Q2, IF: 0:658

[23] Graph transformation systems for modeling three-dimensional finite element method, Pt. 2, Iwona Ryszka, Anna Paszyńska, Ewa Grabska, Marcin Sieniek, Maciej Paszyński, Fundamenta Informaticae 140(2) (2015) 173–203, journal Q2, IF: 0:658

[24] Impact of element-level static condensation on iterative solver performance, David Pardo, Julen Álvarez-Aramberri, Maciej Paszyński, Lisandro Dalcin, Victor Calo, Computers and Mathematics with Applications, 70(10) (2015) 2331–2341, journal Q1, IF: 2.81

[25] Petri nets modeling of dead-end refinement problems in a 3D anisotropic hp-adaptive finite element method, Arkadiusz Szymczak, Maciej Paszynski, David Pardo, Anna Paszynska, Computing and Informatics 34(2) (2015) 425-457 journal Q3, IF: 0.524

[26] Quasi-linear computational cost adaptive solvers for three-dimensional modeling of heating of a human head induced by cell phone, Robert Schaefer, Marcin Łoś, Marcin Sieniek, Leszek Demkowicz, Maciej Paszyński, Journal of Computational Science, 11 (2015) 163–174, journal Q2, IF: 2:502

[27] Quasi-Optimal Elimination Trees for 2D Grids with singularities, // Anna Paszynska, Maciej Paszynski, Konrad Jopek, Maciej Wozniak, Damian Goik, Piotr Gurgul, Hassan AbouEisha, Mikhail Moshkov, Victor Calo, Andrew Lenharth, Donald Nguyen, Keshav Pingalli, Scientific Programming (2015), journal Q3, IF:0.667

2014:

[28] A hybrid algorithm for solving inverse problems in elasticity accepted to International – Barbara Barabsz, Ewa Gajda-Zagorska, Stanislaw Migorski, Maciej Paszynski, Robert Schaefer, Maciej Smolka, International Journal of Applied Mathematics and Computer Science 24(4) (2014) 865-886 , journal Q2, IF: 1.694

[29] Computational cost estimates for parallel shared memory isogeometric multi-frontal solvers // Maciej Wozniak, Krzysztof Kuznik, Maciej Paszynski, Victor Calo, David Pardo Computers and Mathematics with Applications, 67(10) (2014) 1864-1883, journal Q1, IF:2.81

[30] Adaptive Projection-Based Interpolation as a preprocessing tool in the Finite Element workflow for elasticity simulations of the dual phase microstructures, Marcin Sieniek, Maciej Paszynski, Lukasz Madej, Damian Goik, Steel Research International (2014) 85 (6) 1109-1119, journal Q2, IF: 1:021

[31] Subtree reuse in multi-frontal solvers for regular grids in Step-and-Flash Imprint Nanolithography Modeling, Marcin Sieniek, Maciej Paszynski, Advanced Engineering Materials (2014), journal Q1, IF:2:391

2013:

[32] Using the system of graph grammar in finite element method, Barbara Strug, Anna Paszynska, Maciej Paszynski, Ewa Grabska, International Journal of Applied Mathematics and Computer Science, 23(4) (2013) 839-853, journal Q2, IF: 1.694

[33] A direct solver with reutilization of previously-computed LU factorizations for h-adaptive finite element grids with point singularities, Maciej Paszynski, Victor Calo, David Pardo, Computers and Mathematics with Applications, 65, 8 (2013) 1140-1151, journal Q1, IF: 2.81

[34] A graph grammar model of the hp-adaptive three-dimensional Finite Element Method. P. 2, Anna Paszyńska, Ewa Grabska, Maciej Paszyński, Fundamenta Informaticae, 114(2) (2012) 183–201, journal Q2, IF: 0:658

[35] Preventing deadlock during anisotropic 2D mesh adaptation in hp-adaptive FEM, Arkadiusz Szymczak, Anna Paszyńska, Maciej Paszyński, David Pardo, Journal of Computational Science, 4(3) (2013) 170–179, , journal Q2, IF: 2:502

2012:

[36] The cost of continuity: A study of the performance of isogeometric finite elements using direct

- solvers, Nathan Collier, David Pardo, Lisandro Dalcin, Maciej Paszyński, Victor Calo, *Computer Methods in Applied Mechanics and Engineering*, 212-216 (2012), 353-361, journal Q1, IF: 4,17
- [37] A Graph Grammar Model of the hp Adaptive Three Dimensional Finite Element Method. Part I, Anna Paszyńska, Ewa Grabska, Maciej Paszyński, *Fundamenta Informaticae*, 114 (2012) journal Q2, IF: 0:658
- [38] A Graph Grammar Model of the hp Adaptive Three Dimensional Finite Element Method. Part II / A. Paszyńska, E. Grabska, M. Paszyński, *Fundamenta Informaticae*, 114 (2012) journal Q2, IF: 0:658
- 2011:
- [39] Multi-deme, twin adaptive strategy hp-HGS, Barbara Barabasz, Stanisław Migórski, Robert Schaefer, *Inverse Problems in Science and Engineering*, 19(1) (2011) , journal Q2, IF: 2:502
- [40] Modeling of bone conduction of sound in the human head using hp-finite elements: code design and verification, Leszek Demkowicz, Paulo Gatto, Jason Kurtz, Maciej Paszyński, Waldemar Rachowicz, Ewa Bleszyński, Marek Bleszyński, Mark Hamilton, Chris Champlin, David Pardo, *Computer Methods in Applied Mechanics and Engineering* 200 (21-22) (2011) 1757-1773, journal Q1, IF: 4,17
- 2010:
- [41] A parallel direct solver for the self-adaptive hp Finite Element Method, Maciej Paszyński, David Pardo, Carlos Torres-Verdín, Leszek Demkowicz, Victor Calo, *Journal of Parallel and Distributed Computing*, 70(3) (2010) 270-281, journal Q2, IF: 1.819
- [42] Graph grammar-driven parallel partial differential equation solver / Maciej Paszyński, Robert Schaefer // *Concurrency and Computation : Practice and Experience* ; 22(9) (2010) 1063-1097, journal Q3, IF: 1.004
- 2009:
- [43] On the parallelization of self-adaptive hp-Finite Element Methods. Part 1, Composite programmable graph grammar model / Maciej Paszyński, *Fundamenta Informaticae* 93 (2009) 411-434. journal Q2, IF: 0:658
- [44] On the parallelization of self-adaptive hp-Finite Element Methods. Part 2, Partitioning Communication Agglomeration Mapping (PCAM) analysis, Maciej Paszyński, *Fundamenta Informaticae* 93 (2009) 435-457. journal Q2, IF: 0:658
- [45] Application of a hierarchical chromosome based genetic algorithm to the problem of finding optimal initial meshes for the self-adaptive hp-FEM, Anna Paszyńska, Maciej Paszyński, *Computing and Informatics*, 28(2) (2009) 209-223 journal Q3, IF: 0.524
- 2008:
- [46] Fourier series expansion in a non-orthogonal system of coordinates for the simulation of 3D alternating current borehole resistivity measurements, David Pardo, Carlos Torres-Verdín, M. J. Nam, Maciej Paszynski, Victor Calo, *Computer Methods in Applied Mechanics and Engineering* 197 (2008)3836-3849, journal Q1, IF: 4,17
- [47] Simulations of 3D DC borehole resistivity measurements with a goal-oriented hp finite-element method. Pt. 2, Through-casing resistivity instruments, David Pardo, Carlos Torres-Verdín, Maciej Paszyński, *Computational Geosciences* 12 (2008) 83-89. journal Q3, IF: 1.306
- [48] Cellular automata coupled with hp-adaptive Finite Element Method applied to the simulation of austenite-ferrite phase transformation with a moving interface, Jerzy Gawąd, Maciej Paszyński, Paweł Matuszyk, Łukasz Madej, *Steel Research International*, 79 (2008) 579-586. journal Q2, IF: 1:021
- [49] Fully automatic hp-adaptive finite element method for the Stokes problem in two dimensions, Paweł Matuszyk, Maciej Paszynski, *Computer Methods in Applied Mechanics and Engineering*, 197 (2008) 4549-4558, journal Q1, IF: 4,17
- 2007:
- [50] A self-adaptive goal-oriented hp finite element method with electromagnetic applications. Pt. 2, Electrodynamics, David Pardo, Leszek Demkowicz, Carlos Torres-Verdín, Maciej Paszyński, *Computer Methods in Applied Mechanics and Engineering*, 196 (2007) 3585-3597, journal Q1, IF: 4,17
- 2006:
- [51] Parallel, fully automatic hp-adaptive 3d finite element package, Maciej Paszyński, Leszek Demkowicz, *Engineering with Computers* 22 (2006) 255-276. journal Q2, IF: 1.806
- [52] Parallel, fully automatic hp-adaptive 2d finite element package, Maciej Paszyński, Jason Kurtz, Leszek Demkowicz, *Computer Methods in Applied Mechanics and Engineering* 196 (2006) 711-741, journal Q1, IF: 4,17
- [53] Two-dimensional high-accuracy simulation of resistivity logging-while-drilling (LWD) measurements using a self-adaptive goal-oriented hp finite element method, David Pardo, Leszek Demkowicz, Carlos Torres-Verdín, Maciej Paszyński, *SIAM Journal on Applied Mathematics* 66 (6) (2006) 2085-2106, journal Q2, IF: 1.698
- [54] Application of the fully automatic 3D hp-adaptive code to orthotropic heat transfer in structurally graded material properties, Maciej Paszyński, Piotr Macioł, *Journal of Materials Processing Technology* 177(1) (2006) 68-71, journal Q2, IF: 1.726
- 2005:
- [55] The Modified Fluid-Particle Model for non-linear Casson Fluid and its parallel distributed

implementation, Maciej Paszynski, Robert Schaefer, Computer Methods in Applied Mechanics and Engineering, 194 (2005) 4386-4410, journal Q1, IF: 4,17

[56] Verification of goal-oriented HP adaptivity, Maciej Paszyński, Leszek Demkowicz, David Pardo, Computers and Mathematics with Applications, 50 (2005) 1395-1404, journal Q1, IF: 2.81

Additional information

It is recommended to bring and show your own research papers in order to get suggestions for improvements/hints for revisions/hints for writing letters with answers to reviewers comments