
PUBLICATII

- **Articole publicate in jurnale cu factor de impact sau in conferinte indexate Web of Science**

1. "A probabilistic parametrization for geological uncertainty estimation using the Ensemble Kalman Filter (EnKF)", **Sebacher B.**, Hanea R.G. and A.W. Heemink, Computational Geosciences (factor de impact 2018: 2.108), Volume 17, Issue 5, pp 813-832, DOI 10.1007/s10596-013-9357-z, 2013.
2. "Bridging Multi Point Statistics and Truncated Gaussian Fields for Improved Estimation of Channelized Reservoirs with Ensemble Methods", **Sebacher B.**, Stordal A. and Hanea R.G., Computational Geosciences, (factor de impact 2018: 2.108), Volume 19, Issue 2, pp 341-369, DOI 10.1007/s10596-014-9466-3, 2015.
3. "Complex geology estimation using the iterative adaptive Gaussian mixture filter", **Sebacher B.**, Stordal A. and Hanea R.G., Computational Geosciences, (factor de impact 2018: 2.108), Volume 20, Issue 1, pp 133-148, DOI: 10.1007/s10596-015-9553-0, 2016.
4. "An adaptive pluri-Gaussian simulation model for geological uncertainty quantification", **Sebacher B.**, Hanea R.G. and Stordal A., Journal of Petroleum Science and Engineering, Volume 158, pp 494-508, (factor de impact 2018: 2.886), DOI: 10.1016/j.petrol.2017.08.038, 2017.
5. "Channelized reservoir estimation using a low-dimensional parameterization based on high-order singular value decomposition", **Sebacher B.** and Hanea R.G. Computational Geosciences, (factor de impact 2018: 2.108), Article in Press, DOI <https://doi.org/10.1007/s10596-019-09856-1>, First Online 16 July 2019
6. "On the modeling of urban infrastructure deformation profiles using the applied element method and multiple hypothesis testing", **Bogdan Sebacher**, Stefan-Adrian Toma, Marin Lupoae, Mihai Lica Pura, IGARSS-International Geoscience and Remote Sensing Symposium July 22-27, 2018, pp. 874-877, Valencia, Spain.

- **Capitole de carti**

- "The Adaptive Plurigaussian Simulation (APS) Model Versus the Truncated Plurigaussian Simulation (TPS) Model Used in the Presence of Hard Data", **Sebacher B.**, Stordal A. and Hanea R.G., Geostatistics Valencia 2016, Series Title "Quantitative Geology and Geostatistics", Volume 19, pp

697-707, ISSN 0924-1973, DOI 10.1007/978-3-319-46819-8_47, Publisher "Springer International Publishing" 2017 (Web of Science).

• **Articole publicate in jurnale fara factor de impact, indexate BDI**

- "Aspecte privind optimizarea profilului danturii angrenajelor cicloidale cu bolturi", Aristia Popovici, Florin Petrescu, **Bogdan Sebacher**, Tehnologia Inovativa 3-4 pp 45:48, 2011 (indexata ProQuest), ISSN 2248-0420.

• **Articole de Conferinta si Workshop-uri publicate in proceedings, indexate BDI**

1. "Geologically Realistic Facies Updates for a North Sea Field", R.G. Hanea, T. Ek, **B. Sebacher**, J. Satrom, D.B. Sollien, Amsterdam, 76th EAGE Conference and Exhibition, 2014 (indexata Scopus). DOI: 10.3997/2214-4609.20141514.
2. "Complex geology estimation using the iterative adaptive Gaussian mixture (IAGM)", ECMOR XIV-14th European Conference on the mathematics of oil recovery, **Bogdan Sebacher**, Andreas Stordal, Remus Hanea, 2014 (indexata Scopus). DOI: 10.3997/2214-4609.20141789
3. "An adaptive plurigaussian simulation (APS) model for geological uncertainty quantification using the ensemble Kalman filter (EnKF)", **Bogdan Sebacher**, Technical University of Civil Engineering of Bucharest, the 13th Workshop of scientific communications, department of Mathematics and Computer Science, pp 146:151, Bucharest 2014 (indexata Google scholar), ISSN 2392-6317.
4. "Application of the EnKF and the truncated Gaussian method in the geological uncertainty quantification of the channelized reservoirs", **Bogdan Sebacher**, Technical University of Civil Engineering of Bucharest, the 12th Workshop of scientific communications, department of Mathematics and Computer Science, pp 107:110, Bucharest 2013 (indexata Google scholar), ISSN 2067-3132.
5. "Quantifying the Uncertainty in the Facies Probability Cubes Using an Ensemble Kalman Filter Methodology", **B. Sebacher**, R.G. Hanea and T. Ek, Petroleum Geostatistics, Biarritz, 7-11 Septembrie 2015 (indexata Google scholar) DOI: 10.3997/2214-4609.201413630
6. "Consistent Joint Updates of Facies and Petrophysical Heterogeneities Using an Ensemble Based Assisted History Matching", R.G. Hanea, T. Ek and **B. Sebacher**, Petroleum Geostatistics, Biarritz, 7-11 Septembrie 2015 (indexata Google scholar). DOI: 10.3997/2214-4609.201413598
7. "Different Parameterizations of the Initial Ensemble for a Channelized Reservoir in an Assisted History Matching Context", ECMOR XV-15th European Conference on the mathematics of oil recovery, **Bogdan Sebacher**, Andreas Stordal, Remus Hanea, 2016 (indexata Scopus). DOI: 10.3997/2214-4609.201601817

8. "Channelized Reservoir Estimation Using A Low Dimensional Parameterization Based On High Order Singular Value Decomposition", **B. Sebacher**, R.G Hanea, ECMOR XVI-16th European Conference on the mathematics of oil recovery, September 3-6, 2018, Barcelona, Spain. (indexata Scopus)
9. "Conditioning the Probability Field of Facies to Facies Observations Using a Regularized Element-free Galerkin (EFG) Method", **B. Sebacher**, R.G Hanea and S. Marzavan, Petroleum Geostatistics Florence, September 2-6, 2019, (indexata Scopus).
10. "On Anomalous Deformation Profile Detection Through Supervised and Unsupervised Machine Learning", Stefan-Adrian Toma, **Sebacher Bogdan**, Adrian Focsa, Mihai-Lica Pura, IGARSS 2019 IEEE International Geoscience and Remote Sensing Symposium, pp. 7419-7422, DOI: 10.1109/IGARSS.2019.8898459, 28 July-2 Aug. 2019 Yokohama, Japan.(indexata IEEEExplore)

• **Articole de Conferinta si Workshop-uri publicate in proceedings, neindexate BDI**

1. "Inverse modeling using the ensemble Kalman filter (EnKF). Application in reservoir engineering", **Bogdan Sebacher**, Mircea Ariciuc, Simpozionul national de utilaje pentru constructii, Editia XVIII, SINUC 15-16 decembrie 2011, format electronic, ISBN 978-973-100-195-1.
2. "History matching of channelized reservoirs in the context of multiple point geostatistical (MPS) simulation using a probabilistic parameterization", **Bogdan Sebacher**, Daniel Tudor, Simpozionul national de utilaje pentru constructii, Editia XIX, SINUC 12-13 decembrie 2013, format electronic, ISSN 2285 - 9209.
3. "Truncated Gaussian model for uncertainty quantification of the sand holes in a shale reservoir in an ensemble Kalman filter (EnKF) framework", **Bogdan Sebacher**, Daniel Tudor, Simpozionul national de utilaje pentru constructii, Editia XIX, SINUC 12-13 decembrie 2013, format electronic, ISSN 2285 - 9209.
4. "Estimation of the facies distribution of a reservoir using Ensemble Kalman Filter", **Bogdan Sebacher**, Ion Mierlus Mazilu, Technical University of Civil Engineering of Bucharest, the 11th Workshop of scientific communications, department of Mathematics and Computer Science, Bucharest 2011, ISBN 978-973-100-202.
5. "A normal score parameterization for channelized reservoirs estimation using the iterative adaptive Gaussian mixture filter", **Bogdan Sebacher**, Technical University of Civil Engineering of Bucharest, the 13th Workshop of Scientific Communications, Department of Mathematics and Computer Science, pag 167:173, ISSN 2067-3132, Bucharest 23 mai 2015.
6. "Low-dimensional parameterization of channelized reservoirs using high order singular value decomposition (HOSVD)", **Bogdan Sebacher**, Technical University of Civil Engineering of Bucharest, the

14th Workshop of Scientific Communications, Department of Mathematics and Computer Science, Bucharest 27 Mai 2017.

• **Prezentari la Conferinte si Workshop-uri fara proceedings**

1. "EnKF for estimating the probability of occurrence of the facies at a certain location", **Sebacher, B.**, Hanea, R.G., Heemink A., EnKF Workshop 20-22 June 2011, Ulvik, Norway (poster).
<http://enkf.iris.no/>
2. "Complex geology estimation using EnKF. A probabilistic approach", **Sebacher, B.**, Hanea, R.G., Heemink A., EnKF Workshop 2012, Os (Bergen), 18-20 June 2012, Norway.
<http://enkf.iris.no/>
3. "Adaptive plurigaussian truncation scheme for geological uncertainty quantification using the EnKF", **Sebacher, B.**, Hanea, R.G., Heemink A., EnKF Workshop 27-29 May 2013, Steinsland, Norway.
<http://enkf.iris.no/>
4. "Complex geology estimation using the iterative adaptive Gaussian mixture", **Sebacher, B.**, Stordal, A., Hanea, R.G., EnKF Workshop 2014, Os (Bergen), 23-25 June 2014, Norway.
<http://enkf.iris.no/>
5. "Consistent joint updates of facies maps and petrophysical heterogeneity using an ensemble based assisted history matching", Remus Hanea, Torbjorn Ek, **Bogdan Sebacher**, EnKF Workshop 2015 Flam (Norway) June 8-10, 2015.
<http://enkf.iris.no/>
6. "Facies estimation and uncertainty quantification coupling an adaptive plurigaussian methodology with a Kalman filtering framework", **Bogdan Sebacher**, Remus Hanea, Torbjorn Ek, EnKF Workshop 2015 Flam (Norway) June 8-10, 2015 (poster).
<http://enkf.iris.no/>
7. "History matching of channelized reservoirs using ensemble based methods", **Sebacher, B.**, Stordal, A., Hanea, R.G., SIAM Conference on Mathematical and Computational Issues in the Geosciences 17-20 June, 2013, Padova, Italy.
http://meetings.siam.org/sess/dsp_programsess.cfm?SESSIONCODE=16495.
8. "Channelized geology estimation with EnKF. A probabilistic approach", **Sebacher, B.**, Hanea, R.G., Heemink A., SPE Heavy Oil: Industry Best Practices and Case Studies, 12-14 November 2012 Bucharest.
9. "Complex geology estimation using EnKF. A probabilistic approach", **Bogdan Sebacher**, A 15-a Conferinta a Societatii de Probabilitati si Statistica din Romania, Bucuresti 27 aprilie 2012.
<http://csm.ro/spsr/news.php?id=20>.
10. "An adaptive plurigaussian simulation (APS) model for geological uncertainty quantification using the Ensemble Kalman Filter (EnKF)", **Bogdan Sebacher**, A 17-a Conferinta a Societatii de Probabilitati si Statistica din Romania, Bucuresti 25 aprilie 2014.
<http://csm.ro/spsr/news.php?id=31>.

11. "Uncertainty quantification of complex geology using the iterative adaptive Gaussian mixture filter (IAGM).", **Bogdan Sebacher**, A 18-a Conferinta a Societatii de Probabilitati si Statistica din Romania, Bucuresti 8 mai 2015.
<http://csm.ro/spsr/manifestari.php>.
12. "Different parameterizations of the initial ensemble for a channelized reservoir in an Assisted History Matching context", **Sebacher, B.**, Stordal, A., Hanea, R.G., EnKF Workshop 2016 Ulvik (Norway) June 20-22, 2016.
<http://www.iris.no/enkf/enkf-homepage>

• **Carti Publicate**

- "Culegere de probleme de tip grila pentru admiterea in invatamantul superior", Dana Simona Bereanu, Anca Ileana Lupas, Silvia Marzavan, Simona Roatesi, **Bogdan Sebacher**, Iuliana Sprintu, Editura Academiei Tehnice Militare, ISBN 978-973-640-260-9, Bucuresti, 2017.
- "Aplicatii de laborator in Mathematica si Mathcad". Iuliana Florentina Iatan, **Bogdan Sebacher**, Conspress 2014, ISBN 978-973-100-323-8.
- "Data Assimilation under Geological Constraints", **Bogdan Marius Sebacher**, Gildeprint, Enschede 2014, ISBN 978-94-6186-405-5.

SCOLI DE VARA-MEMBRU IN COMITETUL DE ORGANIZARE SI PARTICIPANT

- 17 July-28 July 2017 - The 4th International Summer School on Data Assimilation and its Applications in Engineering, Brasov, Romania
- 20 July-31 July 2015 - The 4th International Summer School on Data Assimilation and its Applications in Engineering, Brasov, Romania
- 22 July-2 August 2013 - The 3rd International Summer School on Data Assimilation and its Applications in Engineering, Cluj, Romania
- 24 July-5 August 2011 - The 2nd International Summer School on Data Assimilation and its Applications in Engineering, Iasi, Romania
- 26 July-7 August 2009 - The 1st International Summer School on Data Assimilation and its Applications in Engineering, Sibiu, Romania

PROIECTE DE CERCETARE-MEMBRU

- 2015-2016 Proiect TU Delft-Statoil: *Maturation of the AHM process*
- 2016-2018 Proiect TU Delft-Statoil: *Robust Optimization of Field development plans*
- 2017-2018 Proiect ROSA: *PSTool - Persistent Scatterers Time-Series Analysis and Post-processing Tool with Application to Infrastructure Threat Detection”, contract 126/2017, ROSA.*

EXPERTIZA TEHNICA

- Programare nivel superior in **Matlab**
- Softuri specializate:
 1. Softuri geostatistice: **S-GeMS** Stanford Geostatistical Modeling Software, **PETREL** (Schlumberger)
 2. Simulatoare de zacaminte: **GPRS** General Purpose Reservoir Simulator (Stanford), **ECLIPSE** (Schlumberger)
- Programare nivel bun **PASCAL**
- Softuri de calcule matematice: **Mathcad**, **Mathematica**
- Sisteme de operare: **Windows**
- Editoare de text: **MS-Word**, **Latex**
- Alte softuri: **MS-Excel**, **MS-Access**, **MS-Power Point**

ALTE INFORMATII PROFESIONALE

- 1 Referent al jurnalelor :
 - *Computational Geosciences*, impact factor 2018, 2.108
 - *Advances in Water Resources*, impact factor 2018, 3.673
 - *Journal of Petroleum Exploration and Production Technology*, indexata Web of Science
 - *SPE Journal*, impact factor 2018, 3.095
 - *International Journal of Multiphase Flow*, impact factor 2018, 2.829
 - *Spatial Statistics*, impact factor 2018, 1.219
 - *Mathematical Geosciences*, impact factor 2018, 1.966
 - *Journal of Petroleum Science and Engineering*, impact factor 2018, 2.886

- 2 Membru al organizatiei "EAGE (European Association of Geoscientists and Engineers) Card No: M2012-2625"
 - 3 Membru al Societatii de Probabilitati si Statistica din Romania
 - 4 Membru in comitetul de organizare a conferintei anuale a Societatii de Probabilitati si Statistica din Romania (2014 si 2015)
- Visiting Researcher - Delft University Of Technology (TU Delft), Delft Institute of Applied Mathematics (DIAM), Olanda, in perioada 2010-2014.
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LIMBI STRAINE

Engleza	intelegere foarte bine vorbire foarte bine
Franceza	intelegere incepator vorbire incepator

Bucuresti, March 17, 2020