# Julien Diaz

## List of Publications by Year
## in descending order

| 31 papers | 405 citations | 933447 10 h-index | 752698 20 g-index |
|---|---|---|---|
| 32 all docs | 32 docs citations | 32 times ranked | 279 citing authors |

| # | Article | IF | Citations |
|---|---------|-----|-----------|
| 1 | Energy Conserving Explicit Local Time Stepping for Second-Order Wave Equations. SIAM Journal of Scientific Computing, 2009, 31, 1985-2014. | 2.8 | 91 |
| 2 | A time domain analysis of PML models in acoustics. Computer Methods in Applied Mechanics and Engineering, 2006, 195, 3820-3853. | 6.6 | 80 |
| 3 | Multi-level explicit local time-stepping methods for second-order wave equations. Computer Methods in Applied Mechanics and Engineering, 2015, 291, 240-265. | 6.6 | 27 |
| 4 | An Analysis of Higher Order Boundary Conditions for the Wave Equation. SIAM Journal on Applied Mathematics, 2005, 65, 1547-1575. | 1.8 | 26 |
| 5 | Analytical Solution for Waves Propagation in Heterogeneous Acoustic/porous Media Part I: the 2D Case. Communications in Computational Physics, 2010, 7, 171-194. | 1.7 | 22 |
| 6 | Hybridizable discontinuous Galerkin method for the 2-D frequency-domain elastic wave equations. Geophysical Journal International, 2018, 213, 637-659. | 2.4 | 19 |
| 7 | Stability analysis of the Interior Penalty Discontinuous Galerkin method for the wave equation. ESAIM: Mathematical Modelling and Numerical Analysis, 2013, 47, 903-932. | 1.9 | 18 |
| 8 | ROBUST HIGH ORDER NON-CONFORMING FINITE ELEMENT FORMULATION FOR TIME DOMAIN FLUID-STRUCTURE INTERACTION. Journal of Computational Acoustics, 2005, 13, 403-431. | 1.0 | 13 |
| 9 | New absorbing layers conditions for short water waves. Journal of Computational Physics, 2010, 229, 58-72. | 3.8 | 12 |
| 10 | Numerical performances of a hybrid local–time stepping strategy applied to the reverse time migration. Geophysical Prospecting, 2011, 59, 907-919. | 1.9 | 10 |
| 11 | Micro-Differential Boundary Conditions Modelling the Absorption of Acoustic Waves by 2D Arbitrarily-Shaped Convex Surfaces. Communications in Computational Physics, 2012, 11, 674-690. | 1.7 | 9 |
| 12 | A local wave tracking strategy for efficiently solving mid- and high-frequency Helmholtz problems. Computer Methods in Applied Mechanics and Engineering, 2014, 276, 473-508. | 6.6 | 8 |
| 13 | Space–time Trefftz-DG approximation for elasto-acoustics. Applicable Analysis, 2020, 99, 747-760. | 1.3 | 8 |
| 14 | Performance Analysis of a High-Order Discontinuous Galerkin Method Application to the Reverse Time Migration. Communications in Computational Physics, 2012, 11, 660-673. | 1.7 | 7 |
| 15 | Non-conforming curved finite element schemes for time-dependent elastic–acoustic coupled problems. Journal of Computational Physics, 2016, 305, 44-62. | 3.8 | 7 |
| 16 | Equivalent Robin boundary conditions for acoustic and elastic media. Mathematical Models and Methods in Applied Sciences, 2016, 26, 1531-1566. | 3.3 | 6 |
| 17 | Construction and analysis of fourth order, energy consistent, family of explicit time discretizations for dissipative linear wave equations. ESAIM: Mathematical Modelling and Numerical Analysis, 2020, 54, 845-878. | 1.9 | 6 |
| 18 | Absorbing Boundary Conditions for 2D Tilted Transverse Isotropic elastic media. ESAIM Proceedings and Surveys, 2014, 45, 400-409. | 0.4 | 5 |

| # | Article | IF | Citations |
|---|---------|----|-----------|
| 19 | High-Order Schemes Combining the Modified Equation Approach and Discontinuous Galerkin Approximations for the Wave Equation. Communications in Computational Physics, 2012, 11, 691-708. | 1.7 | 4 |
| 20 | Non-conforming Galerkin finite element methods for local absorbing boundary conditions of higher order. Computers and Mathematics With Applications, 2015, 70, 2252-2269. | 2.7 | 4 |
| 21 | Time domain analysis and localization of a non-local PML for dispersive wave equations. Journal of Computational Physics, 2021, 445, 110638. | 3.8 | 3 |
| 22 | Asymptotic behavior of acoustic waves scattered by very small obstacles. ESAIM: Mathematical Modelling and Numerical Analysis, 2021, 55, S705-S731. | 1.9 | 3 |
| 23 | Analytical Solution for Waves Propagation in Heterogeneous Acoustic/porous Media Part II: the 3D Case. Communications in Computational Physics, 2010, 7, 445-472. | 1.7 | 3 |
| 24 | LONG-TERM STABILITY ANALYSIS OF ACOUSTIC ABSORBING BOUNDARY CONDITIONS. Mathematical Models and Methods in Applied Sciences, 2013, 23, 2129-2154. | 3.3 | 2 |
| 25 | An effective numerical strategy for retrieving all characteristic parameters of an elastic scatterer from its FFP measurements. Journal of Computational Physics, 2020, 419, 109683. | 3.8 | 2 |
| 26 | Implementation of hybridizable discontinuous Galerkin method for time‑harmonic anisotropic poroelasticity in two dimensions. International Journal for Numerical Methods in Engineering, 2021, 122, 3015-3043. | 2.8 | 2 |
| 27 | Local strategies for improving the conditioning of the plane-wave Ultra-Weak Variational Formulation. Journal of Computational Physics, 2021, 441, 110449. | 3.8 | 2 |
| 28 | Upscaling for the Laplace problem using a discontinuous Galerkin method. Journal of Computational and Applied Mathematics, 2013, 240, 192-203. | 2.0 | 1 |
| 29 | High-Order Time Discretization of The Wave Equation by Nabla-P Scheme.. ESAIM Proceedings and Surveys, 2014, 45, 67-74. | 0.4 | 1 |
| 30 | Absorbing Boundary Conditions for 3D elastic TTI modeling. , 2015, , . |  | 0 |
| 31 | Equivalent Boundary Conditions for Heterogeneous Acoustic Media. TeMa, 2014, 15, 301. | 0.1 | 0 |