## Paolo Amore

## List of Publications by Year in descending order

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Computing the solutions of the van der Pol equation to arbitrary precision. Physica D: Nonlinear
Phenomena, 2022, 435, 133279.

Energy levels of a coupled-rotors model. Journal of Mathematical Chemistry, 2021, 59, 161-167.
1.5

An ubiquitous three-term recurrence relation. Journal of Mathematical Physics, 2021, 62, 032106.
1.1

Exceptional points of the eigenvalues of parameter-dependent Hamiltonian operators. European
$4 \quad \begin{aligned} & \text { Exceptional points of the eigenvalues } \\ & \text { Physical Journal Plus, 2021, 136, } 1 .\end{aligned}$
$5 \quad$ Exact sum rules for heterogeneous spherical drums. Annals of Physics, 2020, 412, 168041.
2.8

0

6 Spectral sum rules for the SchrÃๆdinger equation. Annals of Physics, 2020, 423, 168334.
2.8

1
$7 \quad$ Quantum particles in a moving potential. Physica Scripta, 2020, 95, 065405.

8 On the Hellmann-Feynman theorem in statistical mechanics. Physics Letters, Section A: General, Atomic and Solid State Physics, 2020, 384, 126531.

Comment on: â€œBidimensional bound states for charged polar nanoparticlesâ€: Journal of Nanoparticle
Research, 2020, 22, 1.

10 On some conditionally solvable quantum-mechanical problems. Physica Scripta, 2020, 95, 105201.
2.5

15

Gross misinterpretation of a conditionally solvable eigenvalue equation. International Journal of
Modern Physics A, 2020, 35, 2050200.

12 On a model for rotational tunneling with a \$\$C_\{6\}\$\$-space-time symmetric analog. Journal of Mathematical Chemistry, 2019, 57, 1840-1849.
1.5
.5
1

Thomson problem in one dimension: Minimal energy configurations of $N$ charges on a curve. Physica $A$ :
Statistical Mechanics and Its Applications, 2019, 519, 256-266.

Isospectral heterogeneous domains: A numerical study. Journal of Computational Physics: X, 2019, 1, 100018.

0

Remark on Landau quantization, Aharonovâ€"Bohm effect and two-dimensional pseudoharmonic
15 quantum dot around a screw dislocation. Physics Letters, Section A: General, Atomic and Solid State
$2.1 \quad 1$
Physics, 2018, 382, 139-140.

16 The harmonic oscillator in a space with a screw dislocation. Annals of Physics, 2018, 388, 235-240.
2.8

2
$\begin{array}{ll}17 \text { Exact sum rules for quantum billiards of arbitrary shape. Annals of Physics, 2018, 388, 12-25. } & 2.8 \quad 1\end{array}$

High order analysis of the limit cycle of the van der Pol oscillator. Journal of Mathematical Physics,
2018,59 .

On the straightforward perturbation theory in classical mechanics. European Journal of Physics, 2018, 39, 055001.

> Weakly (and not so weakly) bound states of a relativistic particle in one dimension. Physics Letters,
> Section A: General, Atomic and Solid State Physics, 2018, 382, 2097-2102.

On the application of the Lindstedtâ€"PoincarÃ© method to the Lotkaâ€"Volterra system. Annals of Physics, 2018, 396, 293-303.

Perturbation theory for short-range weakly-attractive potentials in one dimension. Annals of Physics, 2017, 378, 253-263.

24 Comment on â€œThomson rings in a diskâ€: Physical Review E, 2017, 95, 026601.
$2.1 \quad 6$

Comment on: â€œGround state energies from converging and diverging power series expansionsâ€; Ann.
Phys. 373 (2016) 456â€"469. Annals of Physics, 2017, 376, 499-504.

BOUND STATES IN WEAKLY DEFORMED WAVEGUIDES: NUMERICAL VERSUS ANALYTICAL RESULTS. ANZIAM
Journal, 2017, 59, 200-214.

A quantum-mechanical anharmonic oscillator with a most interesting spectrum. Annals of Physics,
2017, 385, 1-9.
High order eigenvalues for the Helmholtz equation in complicated non-tensor domains through Richardson extrapolation of second order finite differences. Journal of Computational Physics, 2016, 3.8 312, 252-271.

29 Weakly bound states in heterogeneous waveguides. European Physical Journal B, 2016, 89, 1.
1.5

2

30 HETEROGENEOUS SYSTEMS IN DIMENSIONS: LOWERÂSPECTRUM. ANZIAM Journal, 2015, 57, 150-165.
0.2

1

Comment on: $\hat{e}^{\text {E PTT-/non-PT-symmetric and non-Hermitian Hellmann potential: approximate bound and }}$
scattering states with anyâ,""-valuesấ ${ }^{\text {TM }}$. Physica Scripta, 2015, 90, 087001.
2.5

0

Small-energy series for one-dimensional quantum-mechanical models with non-symmetric potentials.
32 Journal of Mathematical Chemistry, 2015, 53, 1351-1362.
1.5

0

On the symmetry of three identical interacting particles in a one-dimensional box. Annals of Physics,
2015, 362, 118-129.

Non-Hermitian oscillators withTdsymmetry. Annals of Physics, 2015, 353, 238-251.
2.8

7

Accurate calculation of the solutions to the Thomasâ€"Fermi equations. Applied Mathematics and
Computation, 2014, 232, 929-943.
2.2

Exact sum rules for inhomogeneous systems containing a zero mode. Annals of Physics, 2014, 349,
253-267.
37
38
Is space-time symmetry a suitable generalization of parity-time symmetry?. Annals of Physics, 2014, 350,
533-548.
<mml:math xmlns:mml="http:/|www.w3.org/1998/Math/MathML" altimg="si32.gif" display="inline"
overflow="scroll"><mml:mi mathvariant="script">PT<|mml:mi></mml:math>-symmetric strings. Annals of Physics, 2014, 343, 61-71.
Particle correlation from uncorrelated non Bornâ€"Oppenheimer SCF wavefunctions. Journal of
Mathematical Chemistry, 2013, 51, 1023-1035.

40 Solution to the equations of the moment expansions. Open Physics, 2013, 11, .
$1.7 \quad 1$

41 Exact sum rules for inhomogeneous drums. Annals of Physics, 2013, 336, 223-244.
$2.8 \quad 7$

42 Exact sum rules for inhomogeneous strings. Annals of Physics, 2013, 338, 341-360. $2.8 \quad 7$
Comment on ấ Numerical estimates of the spectrum for anharmonic PT symmetric potentialsấ ${ }^{\text {TM }}$. Physica
Scripta, 2013, 87,047001.
Mathematical analysis of recent analytical approximations to the collapse of an empty spherical
bubble. Journal of Chemical Physics, 2013, 138,084511.
One cannot hear the density of a drum (and further aspects of isospectrality). Physical Review E, 2013,
$88,042915$.

46 Bound states in open-coupled asymmetrical waveguides and quantum wires. Journal of Physics A: Mathematical and Theoretical, 2012, 45, 105303.
$2.1 \quad 9$
$\begin{array}{ll}1.5 & 7\end{array}$
Molecular and Optical Physics, 2012, 45, 235004.

A perturbative approach to the spectral zeta functions of strings, drums, and quantum billiards.
48 Journal of Mathematical Physics, 2012, 53, 123519.
$1.1 \quad 5$

49 Accurate calculation of the bound states of the quantum dipole problem in two dimensions. Open
Physics, 2012, 10,
$1.7 \quad 2$

50 High-order connected moments expansion for the Rabi Hamiltonian. Open Physics, 2012, 10, .
$1.7 \quad 1$

Accurate calculation of the eigenvalues of non-uniform strings and membranes. Open Physics, 2012,
1.7

10,

Further analysis of the connected moments expansion. Journal of Physics A: Mathematical and Theoretical, 2011, 44, 505302.
2.1

3

53 The string of variable density: Further results. Annals of Physics, 2011, 326, 2315-2355.
2.8

7
$55 \quad \begin{aligned} & \text { Spectroscopy of annular drums and quantum rings: Perturbative and nonperturbative results. } \\ & \text { Journal of Mathematical Physics, 2011, 52, 063516. }\end{aligned}$

56 Can one hear the density of a drum? Weyl's law for inhomogeneous media. Europhysics Letters, 2010, 92, 10006.
2.0
1.1

8

The string of variable density: Perturbative and non-perturbative results. Annals of Physics, 2010, 325, 2679-2696.

Collocation approach to the Helmholtz eigenvalue problem on multiply connected domains. Journal of Sound and Vibration, 2010, 329, 1362-1375.
3.9
2.8

59 One-dimensional oscillator in a box. European Journal of Physics, 2010, 31, 69-77.
0.6

10

60 Spectroscopy of drums and quantum billiards: Perturbative and nonperturbative results. Journal of Mathematical Physics, 2010, 51, 052105.
1.1

Variational collocation for systems of coupled anharmonic oscillators. Physica Scripta, 2010, 81,
045011.

Collocation method for fractional quantum mechanics. Journal of Mathematical Physics, 2010, 51, .
1.1

Rayleighâ€"Ritz variation method and connected-moments expansions. Physica Scripta, 2009, 80, 055002.
2.5

The virial theorem for nonlinear problems. European Journal of Physics, 2009, 30, L65-L66.
0.6

A new method for studying the vibration of non-homogeneous membranes. Journal of Sound and
Vibration, 2009, 321, 104-114.
3.9

10

66 Collocation on uniform grids. Journal of Physics A: Mathematical and Theoretical, 2009, 42, 115302.
2.1

10

Eigenvalues from power-series expansions: an alternative approach. Journal of Physics A:
Mathematical and Theoretical, 2009, 42, 075201.

Accurate calculation of the complex eigenvalues of the SchrÃ $\boldsymbol{d}$ dinger equation with an exponential potential. Physics Letters, Section A: General, Atomic and Solid State Physics, 2008, 372, 3149-3152.
2.1

7

Solving the Helmholtz equation for membranes of arbitrary shape: numerical results. Journal of
Physics A: Mathematical and Theoretical, 2008, 41, 265206.

Inversion of the perturbation series. Journal of Physics A: Mathematical and Theoretical, 2008, 41, 025201.

71 Alternative implementation of PadÃ@ approximants. Physical Review D, 2007, 76, .

| 73 | Variational collocation on finite intervals. Journal of Physics A: Mathematical and Theoretical, 2007, 40, 13047-13062. | 2.1 | 17 |
| :---: | :---: | :---: | :---: |
| 74 | Comment on $\hat{\text { á }}$ ( Quantization of Friedmann-Robertson-Walker spacetimes in the presence of a negative cosmological constant and radiationâ€: Physical Review D, 2007, 75, . | 4.7 | 2 |
| 75 | Gravitational lensing from compact bodies: Analytical results for strong and weak deflection limits. Physical Review D, 2007, 75, . | 4.7 | 15 |
| 76 | Development of accurate solutions for a classical oscillator. Journal of Sound and Vibration, 2007, 300, 345-351. | 3.9 | 5 |
| 77 | Wronskian perturbation theory. European Physical Journal A, 2007, 32, 109-112. | 2.5 | 0 |
| 78 | Dalgarnoâ€"Lewis perturbation theory for scattering states. Physics Letters, Section A: General, Atomic and Solid State Physics, 2007, 367, 182-187. | 2.1 | O |
| 79 | Analytical approximations to the spectra of quarkâ€"antiquark potentials. Journal of Physics G: Nuclear and Particle Physics, 2006, 32, 1061-1071. | 3.6 | 1 |

80 Analytical formulas for gravitational lensing: Higher order calculation. Physical Review D, 2006, 74, . ..... 4.7
83 Convergence acceleration of series through a variational approach. Journal of Mathematical Analysisand Applications, 2006, 323, 63-77.
1.0 ..... 15
84 Comment on an application of the asymptotic iteration method to a perturbed Coulomb model.Journal of Physics A, 2006, 39, 10491-10497.
1.614

Dispersion relation of the nonlinear Klein-Gordon equation through a variational method. Chaos, 2006, 16, 013131.
$2.5 \quad 2$86 The IX Mexican Workshop on Particles and Fields. Journal of Physics: Conference Series, 2006, 37, .
Asymptotic and exact series representations for the incomplete Gamma function. Europhysics Letters,
2005, 71, 1-7.2.031Improved Lindstedtâ€"PoincarÃ@ method for the solution of nonlinear problems. Journal of Sound andVibration, 2005, 283, 1115-1136.
Comparison of alternative improved perturbative methods for nonlinear oscillations. Physics Letters,
Section A: General, Atomic and Solid State Physics, 2005, 340, 201-208.
97 High order analysis of nonlinear periodic differential equations. Physics Letters, Section A: General,
Atomic and Solid State Physics, 2004, 327, 158-166. ..... $2.1 \quad 16$
Comparative study of quantum anharmonic potentials. Physics Letters, Section A: General, Atomic andSolid State Physics, 2004, 329, 451-458.
99 High order analysis of nonlinear periodic differential equations. Physics Letters, Section A: General, Atomic and Solid State Physics, 2004, 327, 158-158.
101 Color superconductivity in finite systems. Physical Review D, 2002, 65, .4.743
102 Pion dispersion relation at finite density and temperature. Physical Review C, 2002, 66, . ..... 2.9 ..... 14
103 Colour Superconductivity in Finite Systems. Acta Physica Hungarica A Heavy lon Physics, 2002, 16,0.42
104
Quark distribution functions in nuclear matter. Journal of Physics G: Nuclear and Particle Physics,3.62
105 Contrasting and parity-violating asymmetries in nuclei. Nuclear Physics A, 2001, 690, 509-534. ..... 1.5 ..... 2
106 Relativistic Hamiltonians in many-body theories. Physical Review C, 1996, 53, 2801-2808. ..... 2.9

