

References

- [1] R. D. Amado and F. C. Greenwood. There is no efimov effect for four or more particles. *Phys. Rev. D*, 7:2517–2519, Apr 1973. doi: 10.1103/PhysRevD.7.2517. URL <https://link.aps.org/doi/10.1103/PhysRevD.7.2517>.
Original analysis of the 3-body connected kernel of the 4-body bound-state equation evidencing the peculiar case of the 3-body amplitude. “How to foresee pathologies arising in few-body systems as they are described by contact interactions.”.
- [2] R. D. Amado and J. V. Noble. Efimov’s effect: A new pathology of three-particle systems. II. *Phys. Rev. D*, 5: 1992–2002, Apr 1972. doi: 10.1103/PhysRevD.5.1992. URL <https://link.aps.org/doi/10.1103/PhysRevD.5.1992>.
Details on the first part of an analysis of the non-compactness of the 2-body connected 3-body kernel.
- [3] R. D. Amado and Morton H. Rubin. Low-energy expansion for elastic three-body scattering. *Phys. Rev. Lett.*, 25: 194–197, Jul 1970. doi: 10.1103/PhysRevLett.25.194. URL <https://link.aps.org/doi/10.1103/PhysRevLett.25.194>.
Analysis of the $E \rightarrow 0$ limit of the three-body amplitude based on single diagrams. “Why is it sufficient to consider single terms when the wave function receives contributions from any iteration of the kernel?”.
- [4] R.D. Amado and J.V. Noble. On efimov’s effect: A new pathology of three-particle systems. *Physics Letters B*, 35(1): 25 – 27, 1971. ISSN 0370-2693. doi: [https://doi.org/10.1016/0370-2693\(71\)90429-1](https://doi.org/10.1016/0370-2693(71)90429-1). URL <http://www.sciencedirect.com/science/article/pii/0370269371904291>.
Relate the emergence of an infinite number of bound states to the non-compactness of the kernel of the 3-body, homogeneous Lippmann-Schwinger equation. “Properties of a non-relativistic integral kernel exhibiting the deficient renormalization of an EFT in the 3-body sector.”.
- [5] B. Bazak, J. Kirscher, S. König, M. Pavón Valderrama, N. Barnea, and U. van Kolck. Four-Body Scale in Universal Few-Boson Systems. *Phys. Rev. Lett.*, 122:143001, 2019. doi: 10.1103/PhysRevLett.122.143001.
On the unnatural scaling of the four-body vertex at next-to-leading order in a contact theory for identical bosons. “At which order do n -body system exhibit features which are independent of $n - 1$ -body properties?”.
- [6] Jiunn-Wei Chen, Gautam Rupak, and Martin J. Savage. Nucleon-nucleon effective field theory without pions. *Nuclear Physics A*, 653(4):386–412, July 1999. ISSN 0375-9474. doi: 10.1016/S0375-9474(99)00298-5. URL [http://dx.doi.org/10.1016/S0375-9474\(99\)00298-5](http://dx.doi.org/10.1016/S0375-9474(99)00298-5).
- [7] Michael E. Peskin and Daniel V. Schroeder. *An Introduction to quantum field theory*. Addison-Wesley, Reading, USA, 1995. ISBN 978-0-201-50397-5, 978-0-429-50355-9, 978-0-429-49417-8. doi: 10.1201/9780429503559.