DAFTAR PUSTAKA

Abrams, D.S. & Lloyd, S., 1997. *Simulation of many-body Fermi systems on a universal quantum computer*. Physical Review Letters, 79(13), p.2586.

Bartlett, R.J, 1981. *Many-body perturbation theory and coupled cluster theory for electron correlation in molecules*. Annual review of physical chemistry, 32(1), pp.359-401.

Blatt, R. 2015. *Experimental Aspects of Quantum Computing*. Springer US. hal 61-73

CCJ, Roothaan. *New developments in molecular orbitaltheory*. Reviews Of Modern Physics, 23:69-89, 1951.

Cizek, J, 1966. *On the correlation problem in atomic and molecular systems. Calculation of wavefunction components in Ursell type expansion using quantum field theoretical methods*. The Journal of Chemical Physics, 45(11), pp.4256-4266.

Feynman, R. P, 1982. *Simulating physics with computers*. International journal of theoretical physics, 21(6), 467-488.

Georgescu, I. M., Ashhab, S., & Nori, F. 2014. *Quantum simulation*. Reviews of Modern Physics, 86(1), 153.

Grover, L. K. 1996. *A fast quantum mechanical algorithm for database search*. arXiv preprint quant-ph/9605043.

Aspuru-Guzik, A., Dutoi, A. D., Love, P. J., & Head-Gordon, M. 2005. *Simulated quantum computation of molecular energies*. Science, 309(5741), 1704-1707.

Hempel, C., Maier, C., Romero, J., McClean, J., Monz, T., Shen, H., & Aspuru-Guzik, A. 2018. *Quantum chemistry calculations on a trapped-ion quantum simulator*. arXiv preprint arXiv:1803.10238.

Helgaker, T., Jorgensen, P., & Olsen, J. 2014. *Molecular electronic-structure theory*. John Wiley & Sons.

Hohenberg, P., & Kohn, W. 1964. *Inhomogeneous electron gas*. Physical review, 136(3B), B864.

Jordan, P. and Wigner, E.P., 1993. *Aboit the Pauli Exclusion*. Z. Phys., 47:631, 1928.

Jordan, S. P., Lee, K. S., & Preskill, J. 2012. *Quantum algorithms for quantum field theories*. Science, 336(6085), 1130-1133.

Kitaev, A.Y., 1995. *Quantum measurements and the Abelian stabilizer problem*. arXiv preprint quant-ph/9511026.

Kohn, W., & Sham, L. J. 1965. *Self-consistent equations including exchange and correlation effects*. Physical review, 140(4A), A1133.

Lanyon, B. P., Whitfield, J. D., Gillett, G. G., Goggin, M. E., Almeida, M. P., Kassal, I., & Aspuru-Guzik, A. 2010. *Towards quantum chemistry on a quantum computer*. Nature chemistry, 2(2), 106.

Löwdin, P.O, 1955. *Quantum theory of many-particle systems. I. Physical interpretations by means of density matrices, natural spin-orbitals, and convergence problems in the method of configurational interaction*. Physical Review, 97(6), p.1474.

McArdle, S., Endo, S., Aspuru-Guzik, A., Benjamin, S., & Yuan, X. (2018). *Quantum computational chemistry*. arXiv preprint arXiv:1808.10402.

McClean, J. R., Romero, J., Babbush, R., & Aspuru-Guzik, A. (2016). *The theory of variational hybrid quantum-classical algorithms*. New Journal of Physics, 18(2), 023023.

McClean, J. R., Sung, K. J., Kivlichan, I. D., Cao, Y., Dai, C., Fried, E. S., & Hardikar, T. 2017. *OpenFermion: the electronic structure package for quantum computers*. arXiv preprint arXiv:1710.07629.

Nielsen, M. A., & Chuang, I. 2002. *Quantum computation and quantum information.*

Peruzzo, A., McClean, J., Shadbolt, P., Yung, M. H., Zhou, X. Q., Love, P. J., & OâĂŹbrien, J. L. 2014. *A variational eigenvalue solver on a photonic quantum processor*. Nature communications, 5, 4213.

Romero, J., Babbush, R., McClean, J. R., Hempel, C., Love, P. J., & Aspuru-Guzik, A. 2018. *Strategies for quantum computing molecular energies using the unitary coupled cluster ansatz*. Quantum Science and Technology, 4(1), 014008.

Smith, R. S., Curtis, M. J., & Zeng, W. J. 2016. *A practical quantum instruction set architecture*. arXiv preprint arXiv:1608.03355.

Seeley, J. T., Richard, M. J., & Love, P. J. 2012. *The Bravyi-Kitaev transformation for quantum computation of electronic structure*. The Journal of chemical physics, 137(22), 224109.

Setia, K., & Whitfield, J. D. 2017. *Bravyi-Kitaev Superfast simulation of fermions on a quantum computer*. arXiv preprint arXiv:1712.00446.

Shor, P. W. 1994. *Algorithms for quantum computation: Discrete logarithms and factoring*. In Proceedings 35th annual symposium on foundations of computer science (pp. 124-134). Ieee.

Somma, R., Ortiz, G., Gubernatis, J. E., Knill, E., & Laflamme, R. 2002. *Simulating physical phenomena by quantum networks*. Physical Review A, 65(4), p.042323.

Stokes, J., Izaac, J., Killoran, N., & Carleo, G. 2019. *Quantum natural gradient*. arXiv preprint arXiv:1909.02108.

Tranter, A., Love, P. J., Mintert, F., & Coveney, P. V. 2018. *A Comparison of the Bravyi-Kitaev and Jordan-Wigner Transformations for the Quantum Simulation of Quantum Chemistry*. Journal of chemical theory and computation, 14(11), 5617-5630.

Wang, Y., Dolde, F., Biamonte, J., Babbush, R., Bergholm, V., Yang, S., & Wrachtrup, J.. 2015. *Quantum simulation of helium hydride cation in a solid-state spin register*. ACS nano, 9(8), 7769-7774