
REFERÊNCIAS

- Aghaei, J., Alizadeh, M., Abdollahi, A., & Barani, M. (2016). Allocation of demand response resources: Toward an effective contribution to power system voltage stability. *IET Generation, Transmission and Distribution*.
- Akhil, A., Huff, G., Currier, A., Kaun, B., Rastler, D., Chen, S., . . . Gauntlett, W. (2015). *DOE/EPRI Electricity storage handbook in Collaboration with NRECA*. Albuquerque: Sandia National Laboratories.
- Alhamali, A., Farrag, M., Bevan, G., & Hepburn, D. (2017). Review of Energy Storage Systems in electric grid and their potential in distribution networks. *2016 18th International Middle-East Power Systems Conference, MEPCON 2016 - Proceedings*.
- Alvarez, S. (22 de March de 2018). *Tesla*. Acesso em 22 de January de 2019, disponível em Tesla: <https://www.teslarati.com/tesla-sa-battery-response-time-billing-system/>.

Ambiente Energia. (28 de August de 2018). *Ambiente Energia*. Acesso em 5 de June de 2019, disponível em Ambiente Energia: <https://www.ambienteenergia.com.br/index.php/2018/08/primeiro-sistema-de-armazenamento-de-energia-brasil-entra-em-operacao/34615/34615>.

Ayre, J. (30 de October de 2013). *CleanTechnica*. Acesso em 23 de May de 2018, disponível em CleanTechnica: <https://cleantechnica.com/2013/10/30/copper-foam-batteries-increased-energy-storage-faster-charge-times-decreased-production-costs/>.

Banguero, E., Correcher, A., Pérez-Navarro, Á., Morant, F., & Aristizabal, A. (2018). A review on battery charging and discharging control strategies: Application to renewable energy systems. *Energies*.

Battery University. (16 de November de 2018). *Battery University*. Acesso em 22 de January de 2019, disponível em Battery University: https://batteryuniversity.com/learn/article/elevating_self_discharge.

Battery University. (31 de May de 2018). *Battery University*. Acesso em 20 de July de 2018, disponível em Battery University: https://batteryuniversity.com/learn/article/bu_210b_flow_battery.

Battery University. (19 de July de 2019). *Battery University*. Acesso em 12 de August de 2019, disponível em Battery University: https://batteryuniversity.com/learn/article/bu_214_summary_table_of_lead_based_batteries.

Bellido, M. (2018). *MICRORREDES ELÉTRICAS: UMA PROPOSTA DE IMPLEMENTAÇÃO NO BRASIL*. Universidade Federal do Rio de Janeiro.

Bellini, E. (5 de April de 2018). *Renewable Energy Times*. Acesso em 27 de May de 2019, disponível em Renewable Energy Times: <https://renewableenergystimes.com/2018/04/05/italian-grid-operator-terna-teams-up-with-tesla-on-storage>.

Benato, R., Cosciani, N., Crugnola, G., Dambone Sessa, S., Lodi, G., Parmegiani, C., & Todeschini, M. (2015). Sodium nickel chloride battery technology for large-scale stationary storage in the high voltage network. *Journal of Power Sources*.

- Bender, D. (2016). Chapter 10 – Flywheels. Em D. Bender, *Storing Energy*.
- Berke, J. (9 de May de 2018). *Business Insider Australia*. Acesso em 20 de June de 2019, disponível em Business Insider Australia: <https://www.businessinsider.com.au/solar-power-cost-decrease-2018-5>.
- Bitencourt, R. (28 de June de 2018). *Companhia Ambiental do Estado de São Paulo*. Acesso em 5 de June de 2019, disponível em Companhia Ambiental do Estado de São Paulo: <https://cetesb.sp.gov.br/proclima/2018/06/28/fernando-de-noronha-usa-baterias-na-geracao-solar/>.
- BloombergNEF. (20 de November de 2017). *BloombergNEF*. Acesso em 20 de January de 2019, disponível em BloombergNEF: <https://about.bnef.com/blog/global-storage-market-double-six-times-2030/>.
- Bolund, B., Bernhoff, H., & Leijon, M. (2007). Flywheel energy and power storage systems. *Renewable and Sustainable Energy Reviews*.
- Breyer, C., Bogdanov, D., Aghahosseini, A., Gulagi, A., Child, M., Oyewo, A., ... Vainikka, P. (2018). Solar photovoltaics demand for the global energy transition in the power sector. *Progress in Photovoltaics: Research and Applications*.
- Burheim, O. (2017). *Engineering energy storage*. Academic Press.
- CAISO. (2019). *CAISO*. Acesso em 10 de June de 2019, disponível em CAISO: <http://www.caiso.com/about/Pages/OurBusiness/Opening-access.aspx>.
- California ISO. (2019). *2018 Annual Report on Market Issues & Performance*. California ISO. Fonte: <http://www.caiso.com/Documents/2018AnnualReportonMarketIssuesandPerformance.pdf>.
- Canales, F., Beluco, A., & Mendes, C. (2015). Usinas hidrelétricas reversíveis no Brasil e no mundo: aplicação e perspectivas. *Revista Eletrônica em Gestão, Educação e Tecnologia Ambiental - Revista do Centro de Ciências Naturais e Exatas – UFSM*.
- Ceraolo, M. (2000). New dynamical models of lead-acid batteries. *IEEE Transactions on Power Systems*.

Clark, S., Horstmann, B., & Latz, A. (2017). Development of Zinc-Air Batteries with Advanced Aqueous Electrolytes: A Model-Based Approach. *Meeting Abstracts*.

Cole, W. J., & Frazier, A. (2019). *Cost Projections for Utility-Scale Battery Storage*. Golden: NREL.

Colthorpe, A. (12 de April de 2018). *Energy Storage News*. Acesso em 23 de May de 2018, disponível em Energy Storage News: <https://www.energy-storage.news/news/siemens-gamesa-is-epc-for-neoens-194mw-34mwh-australian-wind-plus-storage-p>.

Consortium for Battery Innovation. (s.d.). *Consortium for Battery Innovation*. Acesso em 23 de May de 2018, disponível em Consortium for Battery Innovation: <https://www.gopherresource.com/assets/documents/alabc-ss-ul-trabattery-a4.pdf>.

Convergent. (2019). *Convergent Energy + Power*. Acesso em 12 de August de 2019, disponível em Convergent Energy + Power: <https://www.convergentep.com/portfolio/orange-county-ca/>.

Crompton, T. (2000). Introduction to battery technology. Em T. Crompton, *Battery Reference Book*.

Daniel, C., & Besenhard, J. (2012). *Handbook of battery materials*. John Wiley & Sons.

Danzer, M., Liebau, V., & Maglia, F. (2015). Aging of lithium-ion batteries for electric vehicles. Em M. Danzer, V. Liebau, & F. Maglia, *Advances in Battery Technologies for Electric Vehicles*.

Das, S. (2018). Graphene: A Cathode Material of Choice for Aluminum-Ion Batteries. *Angewandte Chemie - International Edition*.

Department for Business, Energy & Industrial Strategy. (29 de August de 2019). *gov.uk*. Acesso em 3 de September de 2019, disponível em gov.uk: <https://www.gov.uk/government/statistics/electricity-section-5-energy-trends>.

Department of Energy. (2019). *DOE Global Energy Storage Database*. Acesso em 5 de April de 2019, disponível em DOE Global Energy Storage Database: <https://www.energystorageexchange.org/projects>.

Díaz-González, F., Sumper, A., & Gomis-Bellmunt, O. (2016). *Energy storage in power systems*. John Wiley & Sons.

DiOrio, N., Dobos, A., & Janzou, S. (2015). *Economic analysis case studies of battery energy storage with SAM*. Golden: National Renewable Energy Laboratory (NREL).

DURACELL. (March de 2016). *DURACELL*. Acesso em 23 de May de 2018, disponível em DURACELL: <https://d2ei442zrkqy2u.cloudfront.net/wp-content/uploads/2016/03/Zinc-Air-Tech-Bulletin.pdf>.

Edwards, L. (16 de June de 2014). Pocket-lint. Acesso em 23 de May de 2018, disponível em Pocket-lint: <https://www.pocket-lint.com/cars/news/tesla/129419-electric-car-with-light-aluminium-air-battery-travels-1-100 -miles -on -a -single-charge -take-note-tesla>.

Ehnberg, J., Liu, Y., & Grahn, M. (2014). Grid and Storage. Em B. Sandén, *Systems Perspectives on Renewable Power* (pp. 46-59). Gothenburg: Chalmers.

EIA. (2018). *U.S. Battery Storage Market Trends*. Washington: U.S. Energy Information Administration.

EIA. (28 de February de 2018). *U.S. Energy Information Administration*. Acesso em 17 de February de 2019, disponível em U.S. Energy Information Administration: <https://www.eia.gov/todayinenergy/detail.php?id=35132#>.

EIA. (1 de March de 2019). *U.S. Energy Information Administration*. Acesso em 12 de June de 2019, disponível em U.S. Energy Information Administration: <https://www.eia.gov/tools/faqs/faq.php?id=427&t=%203>.

Electrical Baba. (5 de November de 2017). *Electrical Baba*. Acesso em 29 de January de 2019, disponível em Electrical Baba: <https://electricalbaba.com/vrla-battery-valve-regulated-lead-acid-battery/>.

Electronics Notes. (2018). *Electronics Notes*. Acesso em 13 de February de 2019, disponível em Electronics Notes: https://www.electronics-notes.com/articles/electronic_components/battery-technology/li-ion-lithium-ion-advantages-disadvantages.php.

EneRa. (2014). *EneRa*. Acesso em 20 de May de 2018, disponível em EneRa: <http://www.enera.eu/en/products/batteries/comparing-deep-cycle-flooded-batteries-to-vrla-batteries/>.

Energy Storage Assocation. (2019). *Energy Storage Assocation*. Acesso em 12 de August de 2019, disponível em Energy Storage Assocation: <https://energystorage.org/why-energy-storage/technologies/solid-electrode-batteries/>.

Energy Storage Association. (2018). *Energy Storage Association*. Acesso em 14 de February de 2019, disponível em Energy Storage Association: <https://www.pjm.com/-/media/committees-groups/committees/mic/20180803-special-energy/20180802-item-02-esa-storage-technology-reference.ashx>.

Energy Storage Association. (2019). *Energy Storage Association*. Acesso em 27 de June de 2019, disponível em Energy Storage Association: <https://energystorage.org/why-energy-storage/technologies/mechanical-energy-storage/>.

Energy Storage Association. (2019). *Energy Storage Association*. Acesso em 27 de June de 2019, disponível em Energy Storage Association: <https://energystorage.org/why-energy-storage/technologies/pumped-hydropower/>.

Energy Storage Association. (2019). *Energy Storage Association*. Acesso em 28 de June de 2019, disponível em Energy Storage Association: <https://energystorage.org/why-energy-storage/technologies/mechanical-energy-storage/>.

Energy Storage Association. (2019). *Energy Storage Association*. Acesso em 21 de May de 2019, disponível em Energy Storage Association: <https://energystorage.org/why-energy-storage/technologies/solid-electrode-batteries/>.

Energy Storage Sense. (2014). *Energy Storage Sense*. Acesso em 4 de February de 2019, disponível em Energy Storage Sense: <http://energystoragesense.com/superconducting-magnetic-energy-storage-smes>.

Fraunhofer ICT. (2016). *Fraunhofer Institute for Chemical Technology*. Acesso em 10 de June de 2019, disponível em Fraunhofer Institute for Chemical Technology: <https://www.ict.fraunhofer.de/en/comp/ae/rw.html>.

Freitas, L. (12 de December de 2018). *Jornal do Commercio*. Acesso em 5 de June de 2019, disponível em Jornal do Commercio: <https://jconline.ne10.uol.com.br/canal/economia/pernambuco/noticia/2018/12/12/fernando-de-noronha-ganha-baterias-para-armazenamento-de-energia-solar-365257.php>.

Gabay, J. (7 de August de 2013). *Digi-Key*. Acesso em 4 de February de 2019, disponível em Digi-Key: <https://www.digikey.com/en/articles/techzone/2013/aug/supercapacitor-options-for-energy-harvesting-systems>.

Golden Energy Century Limited. (2018). *Golden Energy Century Limited*. Acesso em 21 de May de 2018, disponível em Golden Energy Century Limited: http://www.gec.com.cn/root/web/product_detail.php?id=2.

González, A., Goikolea, E., Barrena, J., & Mysyk, R. (2016). Review on supercapacitors: Technologies and materials. *Renewable and Sustainable Energy Reviews*.

Graphene-Info. (24 de January de 2019). *Graphene-Info*. Acesso em 12 de August de 2019, disponível em Graphene-Info: <https://www.graphene-info.com/graphene-batteries>.

Green Car Congress. (10 de December de 2012). *Green Car Congress*. Acesso em 28 de January de 2019, disponível em Green Car Congress: <https://www.greencarcongress.com/2012/12/lab-20121210.html>.

Hannan, M. A., Lipu, M. H., Hussain, A., & Mohamed, A. (2017). A review of lithium-ion battery state of charge estimation and management system in electric vehicle applications: Challenges and recommendations. *Renewable and Sustainable Energy Reviews*, 834-854.

Hannan, M., Lipu, M., Hussain, A., & Mohamed, A. (2017). A review of lithium-ion battery state of charge estimation and management system in electric vehicle applications: Challenges and recommendations. *Renewable and Sustainable Energy Reviews*.

Hawaii State Energy Office. (2018). *Hawaii State Energy Office*. Acesso em 13 de April de 2019, disponível em Hawaii State Energy Office: <https://energy.hawaii.gov/renewable-energy>.

Helmholtz Institute Ulm Electrochemical Energy Storage. (2015). *Helmholtz Institute Ulm Electrochemical Energy Storage*. Acesso em 20 de January de 2019, disponível em Helmholtz Institute Ulm Electrochemical Energy Storage: <http://www.hiu-batteries.de/battery-research-center-in-germany/research/electrochemistry/electrochemistry-for-batteries/research/>.

HOMER Energy LLC. (2019). *HOMER Energy*. Fonte: HOMER Energy: <https://www.homerenergy.com/>.

IEA. (2013). *Technology Roadmap Wind Energy*. Paris: International Energy Agency.

International Hydropower Association. (2019). *2019 Hydropower Status Report*. International Hydropower Association.

IRENA. (2016). *The Power to Change: Solar and Wind Cost Reduction Potential to 2025*. International Renewable Energy Agency (IRENA).

Ji, X., Li, D., Lu, Q., Guo, E., Yao, L., & Liu, H. (7 de 2018). Electrospinning preparation of one-dimensional Co²⁺-doped Li₄Ti₅O₁₂ nanofibers for high-performance lithium ion battery. *Ionics*, 24(7), 1887-1894.

John, J. (3 de December de 2015). *Greentech Media*. Acesso em 23 de May de 2018, disponível em Greentech Media: <https://www.greentechmedia.com/articles/read/pges-75mw-energy-storage-procurement-to-test-flywheels-zinc-air-batteries#gs.0q0ufp>.

John, J. (23 de January de 2019). *Greentech Media*. Acesso em 12 de June de 2019, disponível em Greentech Media: <https://www.greentechmedia.com/articles/read/a-snapshot-of-texas-growing-appetite-for-wind-and-solar-power#gs.1dpjfw>.

Käbitz, S., Gerschler, J., Ecker, M., Yurdagel, Y., Emmermacher, B., André, D., . . . Sauer, D. (2013). Cycle and calendar life study of a graphite|LiNi₁/3Mn

1/3Co1/3O2 Li-ion high energy system. Part A: Full cell characterization. *Journal of Power Sources*.

Kaneko, K. (5 de September de 2016). *Mega Solar Business*. Acesso em 27 de May de 2019, disponível em Mega Solar Business: https://tech.nikkeibp.co.jp/dm/atclen/news_en/15mk/090500810/?ST=%20msbe.

Kellner, T. (18 de January de 2019). *GE Reports*. Acesso em 20 de June de 2019, disponível em GE Reports: <https://www.ge.com/reports/towering-achievement-summer-holland-ge-will-build-worlds-largest-wind-turbine/>.

Kim, H., Park, K., Hong, J., & Kang, K. (2014). All-graphene-battery: Bridging the gap between supercapacitors and lithium ion batteries. *Scientific Reports*.

Kluiters, E., Schmal, D., Ter Veen, W., & Posthumus, K. (1999). Testing of a sodium/nickel chloride (ZEBRA) battery for electric propulsion of ships and vehicles. *Journal of Power Sources*.

Kumar, N. (2004). Superconducting Magnetic Energy Storage (SMES) System.

Langridge, M., & Edwards, L. (17 de June de 2019). *Pocket-lint*. Acesso em 12 de August de 2019, disponível em Pocket-lint: <https://www.pocket-lint.com/gadgets/news/130380-future-batteries-coming-soon-charge-in-seconds-last-months-and-power-over-the-air>.

Li, B., Shen, J., Wang, X., & Jiang, C. (2016). From controllable loads to generalized demand-side resources: A review on developments of demand-side resources. *Renewable and Sustainable Energy Reviews*.

Li, D., Danilov, D., Gao, L., Yang, Y., & Notten, P. (2016). Degradation Mechanisms of C 6 /LiFePO 4 Batteries: Experimental Analyses of Cycling-induced Aging. *Electrochimica Acta*.

Li, Y., & Dai, H. (2014). Recent advances in Zinc-air batteries. *Chemical Society Reviews*.

Lithium Ion Battery. (2017). *Lithium Ion Battery*. Acesso em 20 de January de 2019, disponível em Lithium Ion Battery: <http://lithiumionbattery.org/activities/battery-management-system>.

Liu, Y., Sun, Q., Li, W., Adair, K., Li, J., & Sun, X. (2017). A comprehensive review on recent progress in aluminum–air batteries. *Green Energy and Environment*.

Lotfi, H., & Khodaei, A. (2017). AC versus DC microgrid planning. *IEEE Transactions on Smart Grid*.

Maheshwari, A. (2018). Modelling, aging and optimal operation of lithium-ion batteries.

Mainar, A., Colmenares, L., Leonet, O., Alcaide, F., Iruin, J., Weinberger, S., . . . Blazquez, J. (2016). Manganese oxide catalysts for secondary zinc air batteries: from electrocatalytic activity to bifunctional air electrode performance. *Electrochimica Acta*.

Martin, J. (2009). Distributed vs. Centralized Electricity Generation: Are We Witnessing a Change of Paradigm? *Energy*.

MathWorks. (2017). *Battery*. Acesso em 25 de June de 2019, disponível em MathWorks: <https://www.mathworks.com/help/physmod/sps/powersys/ref/battery.html>.

MathWorks. (2019). *Battery*. Acesso em 25 de June de 2019, disponível em MathWorks: https://la.mathworks.com/help/physmod/sps/ref/battery.html?searchHighlight=battery&s_tid=doc_srctitle.

MathWorks. (2020). Fonte: MATLAB - MathWorks: <https://www.mathworks.com/products/matlab.html>.

Metso. (6 de February de 2019). *MINING.COM*. Acesso em 13 de April de 2019, disponível em MINING.COM: <http://www.mining.com/web/%20where-is-lithium-coming-from/>.

Mjølhus, L. B. (2017). *Evaluation of Hybrid Battery System for Platform Support Vessels*. Stavanger: University of Stavanger.

Monitoring Analytics. (2018). *2017 State of the Market Report for PJM*. Eaville: Monitoring Analytics. Acesso em 12 de June de 2019, disponível em <https://www.pjm.com/-/media/committees-groups/committees/mc/20180322-state-of-market-report-review/20180322-2017-state-of-the-market-report-review.ashx>.

NGK Insulators. (2016). *NGK Insulators*. Acesso em 27 de May de 2019, disponível em NGK Insulators: https://www.ngk.co.jp/nas/case_studies/buzen/.

NGK Insulators Limited. (2017). *NGK Insulators Limited*. Acesso em 21 de May de 2018, disponível em NGK Insulators Limited: https://www.ngk.co.jp/nas/case_studies/.

Nikdel, M., & others. (2014). Various battery models for various simulation studies and applications. *Renewable and Sustainable Energy Reviews*, 477-485.

Nishi, Y. (2001). Lithium ion secondary batteries; Past 10 years and the future. *Journal of Power Sources*.

Nova Scotia Boatbuilders Association. (2015). *Review of All-Electric and Hybrid-Electric Propulsion Technology for Small Vessels*. Nova Scotia: Nova Scotia Boatbuilders Association.

Ould Amrouche, S., Rekioua, D., Rekioua, T., & Bacha, S. (2016). Overview of energy storage in renewable energy systems. *International Journal of Hydrogen Energy*.

Paiste, D. (2 de November de 2016). *MIT News*. Acesso em 6 de February de 2019, disponível em MIT NEWS: <http://news.mit.edu/2016/battery-challenges-cost-and-performance-1102>.

Park, D., Yang, W., Jeong, H., & Ryu, K. (2017). Study of Zinc Compounds for Improving the Reversibility of the Zinc Anode in Zinc–Air Secondary Batteries. *Bulletin of the Korean Chemical Society*.

Parker, D. (6 de June de 2016). *New Civil Engineer*. Acesso em 27 de January de 2019, disponível em New Civil Engineer: <https://www.newcivilengineer.com/archive/going-underground-energy-storage-06-06-2016/>.

Parkhideh, B. (2006). *Storage Technologies for Hybrid Electric Buses: ZEBRA Battery*. Aachen: RWTH Aachen University. Fonte: https://www.euromatic.no/ZEBRA_Aug17.pdf.

Pasetti, M., Rinaldi, S., & Manerba, D. (2018). A virtual power plant architecture for the demand-side management of smart prosumers. *Applied Sciences (Switzerland)*.

Peralta Piernagorda, C. O. (2019). *Reduction of CO₂ emissions in isolated power systems using energy storage*. Universidade de São Paulo. São Paulo: University of São Paulo.

Peralta, C., Vieira, G., Meunier, S., Vale, R., Salles, M., & Carmo, B. (2019). Evaluation of the CO₂ emissions reduction potential of Li-ion batteries in ship power systems. *Energies*.

Pistoia, G. (2005). *Batteries for Portable Devices*.

PJM. (2019). *PJM*. Acesso em 17 de February de 2019, disponível em PJM: <https://www.pjm.com/%20markets-and-operations/interregional-map.aspx>.

Power Electronics. (22 de August de 2017). *Power Electronics*. Acesso em 23 de May de 2018, disponível em Power Electronics: <https://www.power-electronics.com/alternative-energy/rechargeable-zinc-air-batteries-could-threaten-li-ion-s-dominance>.

Prieto Battery. (s.d.). *Prieto Battery*. Acesso em 23 de May de 2018, disponível em Prieto Battery: <https://www.prietobattery.com/how-it-works-2/foam/>.

Purewal, J., Wang, J., Graetz, J., Soukiazian, S., Tataria, H., & Verbrugge, M. (2014). Degradation of lithium ion batteries employing graphite negatives and nickel-cobalt-manganese oxide + spinel manganese oxide positives: Part 2, chemical-mechanical degradation model. *Journal of Power Sources*.

Rahimi-Eichi, H., Ojha, U., Baronti, F., & Chow, M.-Y. (2013). Battery management system: An overview of its application in the smart grid and electric vehicles. *IEEE Industrial Electronics Magazine*, 4-16.

Renewable Energy Policy Network for the 21st Century. (2018). *Renewables 2017: Global Status Report*. REN21.

Renewable Energy World. (1 de December de 2015). *Calculating the True Cost of Energy Storage*. Fonte: Renewable Energy World: <https://www.renewableenergyworld.com/2015/01/12/calculating-the-true-cost-of-energy-storage/#gref>.

Rexed, I., Behm, M., & Lindbergh, G. (2010). Modelling of ZEBRA batteries. *Royal Institute of Technology*.

RICHARD. (30 de April de 2018). *Round Trip Efficiency in Batteries: A Critical Matter*. Fonte: UPS Battery Center.com: <https://www.upsbatterycenter.com/blog/round-trip-efficiency-batteries/>.

RTE. (2019). *Réseau de Transport d'Electricité*. Acesso em 10 de June de 2019, disponível em Réseau de Transport d'Electricité: <https://www.rte-france.com/en/article/major-electricity-trends-month>.

Rufer, A. (2017). *Energy Storage: Systems and Components*. Boca Raton: CRC Press.

Sabihuddin, S., Kiprakis, A., & Mueller, M. (2015). A numerical and graphical review of energy storage technologies. *Energies*.

Salles, M., Huang, J., Aziz, M., & Hogan, W. (2017). Potential arbitrage revenue of energy storage systems in PJM. *Energies*, 1100.

Santerno S.p.A. (17 de October de 2011). *Global Energy World*. Acesso em 23 de May de 2018, disponível em Global Energy World: http://www.globalenergyworld.com/news/2137/innovative_energy_storage_solutions_by_santerno_and_fiamm.htm.

Sasaki, T., Ukyo, Y., & Novák, P. (2013). Memory effect in a lithium-ion battery. *Nature Materials*.

Schmidt, O., Melchior, S., Hawkes, A., & Staffell, I. (2019). Projecting the future levelized cost of electricity storage technologies. *Joule*, 81-100.

Scialom, M. (6 de April de 2018). *Cambridge Independent*. Acesso em 21 de May de 2018, disponível em Cambridge Independent website: <https://www.cambridgeindependent.co.uk/business/cambridge-battery-recycling-technology-set-to-disrupt-global-market-9052189/>.

Shang, H., Zuo, Z., Li, L., Wang, F., Liu, H., Li, Y., & Li, Y. (2018). Ultrathin Graphdiyne Nanosheets Grown In Situ on Copper Nanowires and Their Performance as Lithium-Ion Battery Anodes. *Angewandte Chemie - International Edition*.

Silverstein, K. (24 de June de 2019). *Microgrid Knowledge*. Acesso em 28 de June de 2019, disponível em Microgrid Knowledge: <https://microgridknowledge.com/distributed-energy-resources-navigant/>.

Statista. (2019). *Statista*. Acesso em 13 de April de 2019, disponível em Statista: <https://www.statista.com/statistics/268790/countries-with-the-largest-lithium-reserves-worldwide/> Acessadoem 13/04/.

Sun, L., Jiang, P., Liu, H., Fan, D., Liang, J., Wei, J., . . . Shi, J. (2015). Graphdiyne: A two-dimensional thermoelectric material with high figure of merit. *Carbon*.

Suri, G., & Onori, S. (2016). A control-oriented cycle-life model for hybrid electric vehicle lithium-ion batteries. *Energy*.

Thavlov, A., & Bindner, H. (2015). Utilization of flexible demand in a virtual power plant set-up. *IEEE Transactions on Smart Grid*.

The American Geosciences Institute. (2017). *The American Geosciences Institute*. Acesso em 20 de June de 2019, disponível em The American Geosciences Institute: <https://www.americangeosciences.org/critical-issues/faq/what-are-advantages-and-disadvantages-offshore-wind-farms>.

The Wind Energy Institute of Canada. (2014). *Wind Energy R&D Park and Storage System for Innovation in Grid Integration*. Office of Energy Research and Development Natural Resources Canada.

U.S. Department of Energy. (2018). *DOE Global Energy Storage Database*. Acesso em 23 de May de 2018, disponível em DOE Global Energy Storage Database website: <https://energystorageexchange.org/projects?q=lithium+ion>.

U.S. Geological Survey. (2018). *U.S. Geological Survey*. Acesso em 12 de February de 2019, disponível em U.S. Geological Survey: <https://s3-us-west-2.amazonaws.com/prd-wret/assets/palladium/production/mineral-pubs/sulfur/mcs-2018-sulfu.pdf>.

U.S. Geological Survey. (2019). *U.S. Geological Survey*. Acesso em 13 de April de 2019, disponível em U.S. Geological Survey: <https://prd-wret.s3-us-west-2.amazonaws.com/assets/palladium/production/atoms/files/mcs-2019-lithi.pdf>.

Uddin, K., Perera, S., Widanage, W., Somerville, L., & Marco, J. (2016). Characterising lithium-ion battery degradation through the identification and tracking of electrochemical battery model parameters. *Batteries*.

Union of Concerned Scientists. (9 de March de 2018). *Union of Concerned Scientists*. Acesso em 22 de January de 2019, disponível em Union of Concerned Scientists: <https://www.ucsusa.org/clean-vehicles/electric-vehicles/electric-cars-battery-life-materials-cost>.

Van Zyl, A. (1996). Review of the zebra battery system development. *Solid State Ionics*.

Vangari, M., Pryor, T., & Jiang, L. (2013). Supercapacitors: Review of materials and fabrication methods. *Journal of Energy Engineering*.

Vincent, C., & Scrosati, B. (1997). *Modern batteries*. Elsevier.

Wakihara, M., & Yamamoto, O. (2008). *Lithium ion batteries: fundamentals and performance*. John Wiley & Sons.

Wang, J., Lu, K., Ma, L., Wang, J., Dooner, M., Miao, S., . . . Wang, D. (2017). Overview of compressed air energy storage and technology development. *Energies*.

Weber, A., Mench, M., Meyers, J., Ross, P., Gostick, J., & Liu, Q. (2011). Redox flow batteries: A review. *Journal of Applied Electrochemistry*.

Whittingham, M. (2012). History, evolution, and future status of energy storage. *Proceedings of the IEEE*.

Wikner, E., & Thiringer, T. (2018). Extending Battery Lifetime by Avoiding High SOC. *Applied Sciences*, 1825.

Willuhn, M. (2 de August de 2018). *pv magazine*. Acesso em 6 de June de 2019, disponível em pv magazine: <https://www.pv-magazine.com/2018/08/02/milestone-over-one-trillion-watts-of-wind-and-solar-installed/>.

Wu, D., Kintner-Meyer, M., Yang, T., & Balducci, P. (2017). Analytical sizing methods for behind-the-meter battery storage. *Journal of Energy Storage*, 297-304.

Xing, Y., Ma, E. W., Tsui, K. L., & Pecht, M. (2011). Battery management systems in electric and hybrid vehicles. *Energies*, 1840-1857.

Xu, B., Oudalov, A., Ulbig, A., Andersson, G., & Kirschen, D. (2018). Modeling of lithium-ion battery degradation for cell life assessment. *IEEE Transactions on Smart Grid*.

Xu, X., Zhou, D., Qin, X., Lin, K., Kang, F., Li, B., . . . Wang, G. (2018). A room-temperature sodium–sulfur battery with high capacity and stable cycling performance. *Nature Communications*.

Yuan, X., Liu, H., & Zhang, J. (2011). *Lithium-ion batteries: advanced materials and technologies*. CRC press.

Zientara, B. (2018). *Solar Power Rocks*. Acesso em 20 de June de 2019, disponível em Solar Power Rocks: <https://www.solarpowerrocks.com/solar-basics/how-much-electricity-does-a-solar-panel-produce/>.

Zu, C., & Li, H. (2011). Thermodynamic analysis on energy densities of batteries. *Energy and Environmental Science*.