

DAFTAR PUSTAKA

- Abdurrahman, M. (2003). *Pendidikan Bagi Anak Berkesulitan Belajar*. Jakarta: Rhineka Cipta
- Amalia, E. 2017. *Pengembangan Media Pembelajaran Berbantuan Macromedia Flash Untuk Meningkatkan Kemampuan Spasial Siswa di SMP Negeri 30 Medan*. Thesis. Medan: Pascasarjana UNIMED.
- Anwar. 2010. Media Pembelajaran (Modul, Podcast,dll) Catatannya. Tersedia online di: <https://civitans.uns.ac.id>.
- Arikunto, S. (2009). *Dasar - Dasar Evaluasi Pendidikan*. Jakarta: Bumi Aksara.
- Arends, R.I. 1998. *Learning to Teach*. New York: MC Grow Hill. Inc.
- Aryan, Bambang. 2002. *Kemampuan Pemecahan Masalah Matematika Siswa dengan Strategi Heuristik*. Tesis UPI, Bandung.
- Asyhar, Rayandra. 2012. *Kreatif Mengembangkan Media Pembelajaran*. Jakarta: Referensi Jakarta
- Baum, S & Slatin, B. 2005. *Multiple Intellegence In The Elementary School Classroom: A Teacher's Toolkit (In Consulation With Howard Gardner)*. ISBN 0-8077-4610-X. America: Manufactured of The USA.
- Burt, C. (1965). Spatial Ability. *British Journal of Mathematical and Statistical Psychology*, 18(2), 257–259. <https://doi.org/10.1111/j.2044-8317.1965.tb00347.x>
- Criticos, C. 1996. *Media selection*. Plomp, T., & Ely, D. P. (Eds.): *International Encyclopedia of Educational Technology, 2nd edition*. New York: Elsevier Science, Inc.
- Daryanto. *Pendekatan Pembelajaran Saintifik Kurikulum 2013*. Yogyakarta: Gava Media.
- Dogan-Dunlap, H. 2010. *Linear Algebra Students' Modes of Reasoning: Geometric Representations*. *Linear Algebra and Its Applications*. 432. 2141-2159. (<http://dx.doi.org/10.1016/j.laa.2009.08.037,2010>).
- Dominguez, M. G.; Gutierrez, J. M.; Gonzales, C. R.; Corredeaguas, C. M. M. 2012. *Methodologist and Tools to Improve Spatial Ablity*. *Procedia- Social and Behavioral Science* 51. pp. 736-744. Doi: 10.1016/j.sbspro.2012.08.233.

- Ernest, P. 2015. *The Social Outcomes of Learning Mathematics: Standard, Unintended or Visionary? International Journal of Education in Mathematics, Science, and Technology*. Vol. 3, No. 3, Page: 187-192.
- Fabiyi, T. R. 2017. *Geometry Concept in Mathematics Perceived Difficult To Learn By Senior Secondary School Students in Ekiti State, Nigeria. IOSR Journal of Research & Method in Education (IOSR-JRME)*. Vol. 7, Issue 1 Ver.1 (Jan-Feb), Pp: 83-90. Doi: 10.9790/7388-0701018390.
- Fauzi, KMS. A. 2002. *Pembelajaran Matematika Realistik pada Pokok Bahasan Pembagian di SD. Tesis. Tidak dipublikasikan. Surabaya: PPs Universitas Negeri Surabaya*.
- Ferguson, A. M.. 2015. *On The Relation Between Math and Spatial Ability: The Case of Math Anxiety. Journal of Learning and Individual Differences*. Vol. 39, P: 1-12. (<http://doi.org/10.1016/j.lindif.2015.02.007>)
- Hadi, S. 2017. *Pendidikan Matematika Realistik : Teori Pengembangan dan Implementasinya*. Jakarta: PT Raja Grafindo Persada
- Hake, Richard R. 1998. Interactive-Engagement Versus Traditional Methods : A Six-Thousand-Student Survey of Mechanics Test Data For Introductory Physics Courses. *American Journal of Physics*. Vol. 66, No.1.January. Doi:10.1119/1.18809
- Hasibuan, M. S., Simarmarta, & J., Sudirman, A. (2019). E-learning: Implementasi, Strategi dan Inovasinya. In *Yayasan Kita Menulis*. Yayasan Kita Menulis.
- Hasratuddin. 2015. *Mengapa Harus Belajar Matematika?*. Medan: Perdana Publishing
- Hegarty, M. 2010. Components of Spatial Ability. *Psychology of Learning and Motivation*. Vol. 52. (Elsevier). Doi: 10.1016/S0079-7421(10)52007-3.
- Heinich, R., Molenda, M., Russell, J. D., & Smaldino, S.E. 2002. *Instructional media and technology for learning*, 7th edition. New Jersey: Prentice Hall, Inc.
- Herman. 2012. Pengembangan Perangkat Pembelajaran Model Pengajaran Langsung untuk Mengajarkan Materi Keseimbangan Benda Tegar. *Jurnal Sains dan Pendidikan Fisika*, (Online), Jilid 8 Nomor 1, April 2012 hlm 1-11, (<http://digilib.unm.ac.id/download.php?id=236>)
- Herman Hudojo. (2005). *Pengembangan Kurikulum dan Pembelajaran Matematika*. Malang: UM Press
- Hewi, L., & Shaleh, M. (2020). Refleksi Hasil PISA (The Programme For

International Student Assesment): Upaya Perbaikan Bertumpu Pada Pendidikan Anak Usia Dini). *Jurnal Golden Age*, 4(01), 30–41. <https://doi.org/10.29408/jga.v4i01.2018>

Ibrahim, H. 1997. Media pembelajaran: Arti, fungsi, landasan penggunaan, klasifikasi, pemilihan, karakteristik oht, opaque, filmstrip, slide, film, video, Tv, dan penulisan naskah slide. Bahan sajian program pendidikan akta mengajar III-IV. FIP-IKIP Malang.

Ibrahim, H., Sihkabuden, Suprijanta, & Kustiawan, U. 2001. Media pembelajaran: Bahan sajian program pendidikan akta mengajar. FIP. UM

Imansari, N., & Sunaryantiningsih, I. (2017). Pengaruh Penggunaan E-Modul Interaktif Terhadap Hasil Belajar Mahasiswa pada Materi Kesehatan dan Keselamatan Kerja. *VOLT : Jurnal Ilmiah Pendidikan Teknik Elektro*, 2(1), 11. <https://doi.org/10.30870/volt.v2i1.1478>

Imdad, A.; Bhagawati, S., & Sarmah, J. 2014. Performance of Geometry among Secondary School Students of Bhurbandha CD Block of Morigaon District, Assam, India. *International Journal Of Innovative Research And Development*. Vol. 3, Issue 11, November, Page 73-77

Koderi. (2017). Pengembangan Modul Elektronik Berbasis SAVI Untuk Pembelajaran Bahasa Arab. *Jurnal Teknologi Pendidikan*, 19(3), 206–223. <http://journal.unj.ac.id/unj/index.php/jtp/article/view/6709>

Lambas dkk (2004) Materi pelatihan terintegrasi Matematika (Buku 3). Jakarta: Depdiknas

Learner, J. W. (1981). *Learning Disabilities: Theories, Diagnosis, and Teaching Strategies*. Boston: Houghton Mifflin.

Maier, P. H. 1998. Spatial Geometry and Spatial Ability – How to Make Solid Geometry Solid? In Elmar Cohors-Fresenborf, K. Reiss, G. Toener, and H – G. Weigand Editors, Selected papers from the Annual Conference of Didactics Mathematics, p. 63 – 67.

Mataka, L. M. dkk. (2014). The effect of using an explicit general problem solving teaching approach on elementary pre-service teachers' ability to solve heat transfer problems. *International Journal of Education in Mathematics, Science and Technology*, 2 (3). hlm. 164-174.

National Research Council. 1989. Every Body Counts. A Report to The Nation on the Future Mathematics Education. Washington DC: National Academy Press.

National Center for Education Statistics USA, NCES. 2014). PISA 2012: Data Table, Figure,

and Exhibits. Available on http://nces.ed.gov./2014024_tables.

National Research Council. 2006. *Learning to Think Spatially*. Washington DC: The National academic Press.

NCTM. 2000. *Principles and Standards For School Mathematics*. America: The National Council of Teacher of Mathematics Inc. United State of America.

Nesri, Fabiana Dini Prawingga (2020) *Pengembangan modul ajar cetak dan elektronik materi lingkaran untuk meningkatkan kecakapan abad 21 siswa kelas XI SMA Marsudirini Muntilan*. Skripsi thesis, Sanata Dharma University.

Nisa, H. A., Mujib, & Putra, R. W. Y. (2020). Efektivitas E-modul dengan Flip PDF Professional Berbasis Gamifikasi terhadap Siswa SMP. *Jurnal Pendidikan Matematika Raflesia*, 5(2), 13–25.
<https://ejournal.unib.ac.id/index.php/jpmr/article/view/11406/5732>

Noviani, J.; Syahputra, E. & Murad, A. 2017. The Effect of Realistic Mathematic Education (RME) in Improving Primary School Students' Spatial Ability in Subtopic Two Dimension Shape. *Journal of Education and Practice* Vol. 8 No.34

OECD. (2019). What Students Know and Can Do: Indonesia. *Oecd*, 1–10.
https://www.oecd-ilibrary.org/education/pisa-2018-results-volume-iii_bd69f805-en%0Ahttps://www.oecd-ilibrary.org//sites/bd69f805-en/index.html?itemId=/content/component/bd69f805-en#fig86

Olkun, S. 2003. Making Connections: Improving Spatial Abilities With Engineering Drawing Activity. *International Journal of Mathematics Teaching*

Ozerem, A. 2012. Misconceptions in Geometry and Suggested Solution for Seventh Grade Students. *Procedia-Social and Behavioral Sciences*. Vol. 55, P: 720-729. Doi:10.1016/j.sbspro.2012.09.557

Permendikbud Nomor 104 Tahun 2014 tentang Penilaian Hasil Belajar oleh Pendidik pada Pendidikan Dasar dan Pendidikan Menengah. Jakarta: Menteri Pendidikan Nasional

Prastowo, Andi. (2012). *Panduan Kreatif Membuat Bahan Ajar Inovatif*. Jogjakarta: DIVA Press (Anggota IKAPI).

Purborini, S. D., & Hastari, R. C. (2019). Analisis Kemampuan Spasial Pada Bangun Ruang Sisi Datar Ditinjau Dari Perbedaan Gender. *Jurnal Derivat: Jurnal Matematika Dan Pendidikan Matematika*, 5(1), 49–58.

<https://doi.org/10.31316/j.derivat.v5i1.147>

Purwanto. (2011). *Evaluasi Hasil Belajar*. Yogyakarta: Pustaka Pelajar.

Purwanto, A., Pramono, R., Asbari, M., Hyun, C. C., Wijayanti, L. M., Putri, R. S., & Santoso, P. B. (2020). Studi Eksploratif Dampak Pandemi COVID-19 Terhadap Proses Pembelajaran Online di Sekolah Dasar | EduPsyCouns: Journal of Education, Psychology and Counseling. *Journal of Education, Psychology and Counseling*, 2(1), 1–12. <https://ummaspul.e-journal.id/Edupsycouns/article/view/397>

Ricu Sidiq, & Najuah. (2020). Pengembangan E-Modul Interaktif Berbasis Android pada Mata Kuliah Strategi Belajar Mengajar. *Jurnal Pendidikan Sejarah*, 9(1), 1–14. <https://doi.org/10.21009/jps.091.01>

Saha, A. 2010. The Effects of Geogebra on Mathematics Achievement: Enlightening Coordinate Geometry Learning. *International Conference on Mathematics Education Research (ICMER)*. Vol. 8, Page: 686-693. Doi: 10.1016/j.sbspro.2010.12.095

Seruni, R., Munawaoh, S., Kurniadewi, F., Nurjayadi, M., Prabowo, A., Artikel, I. T., Dewi, M., Syahputra, E., Utara, S., Nita, S., Thiagarajan, S., Semmel, D., Semmel, M., Santyasa, I. W., Susanti, E. D., Sholihah, U., Subroto, T., & Saputra, H. (2021). Pengembangan E-Modul Berbasis Flip Pdf Corporate Pada Materi Luas Dan Volume Bola. *RANGE: Jurnal Pendidikan Matematika*, 3(1), 37–46. <https://doi.org/10.32938/jpm.v3i1.1275>

Setiawan, M. A., Dasna, I. W., & Marfu'ah, S. (2016). Pengaruh Bahan Ajar Multimedia Terhadap Hasil Belajar Dan Persepsi Mahasiswa Pada Matakuliah Kimia Organik I. *Jurnal Pendidikan: Teori, Penelitian, dan Pengembangan*, 1(4), 746-751

Sinaga, B. 2007. *Pengembangan Model Pembelajaran Matematika Berdasarkan Masalah Berbasis Budaya Batak (PBM-B3)*. Disertasi. Program Pasacasarjana Universitas Negeri Surabaya

Suparyan. 2007. *Kajian Kemampuan Keruangan (Spatial Abilities) dan Kemampuan Penugasan Materi Geometri Ruang Mahasiswa Program Studi Pendidikan Matematika FMIPA Universitas Negeri Semarang*. Thesis. Program Pascasarjana Universitas Negeri Semarang

Suyatna, A., Maulina, H., Rakhmawati, I., & Khasanah, R. A. N. (2018). Electronic Versus Printed Book: Comparison Study on the Effectivity of Senior High School Physics Book. *Jurnal Pendidikan IPA Indonesia*, 7(4), 391–398. <https://doi.org/10.15294/jpii.v7i4.14437>

Sriadhi. (2019). Diadaptasi dari Purdue Spatial Visualization Test (Test of Rotation) . Universitas Negeri Medan.

- Strong, S. & Smith. 2002. Spatial Visualization :Fundamental and Trend In Engineering Graphics. Journal of Industrial Technology. Vol. 18, No. 1.
- Sugiyono. 2013. Metode Penelitian Pendidikan (Pendekatan Kuantitatif, Kualitatif dan R & D). Bandung: CV Alfabeta
- Syahputra, E. 2013. Peningkatan Kemampuan Spasial Siswa Melalui Penerapan Pembelajaran Matematika Realistik. Jurnal Cakrawala Pendidikan. 2013, Th. XXXII, No. 3. Hal 353-364
- Syahrial, Asrial, Kurniawan, D. A., & Piyana, S. O. (2019). E-Modul Etnokonstruktivisme: Implementasi Pada Kelas V Sekolah Dasar Ditinjau Dari Persepsi, Minat Dan Motivasi. *JTP - Jurnal Teknologi Pendidikan*, 21(2), 165–177. <https://doi.org/10.21009/jtp.v21i2.11030>
- Thiagarajan, S.; Semmel, D.S. & Semmel, M. I. 1974. *Instructional Development for Training Teachers of Exceptional Children*. Indiana: Indiana University Bloomington.
- Tosto, M. G.; Hanscombe, K. B.; Haworth, C. M. A.; Davis, O. S. P.; Petrill, S. A.; Dale, P. S.; Malykh, S.; Plomin, R. & Kovas, Y. 2014. Why Do Spatial Abilities Predict Mathematical Performance? *Developmental Science*. Vol. 17:3, pp: 462-470. Doi :10.1111/desc.12138
- Velez, M. C.; Silver D, & Tremaine M. 2005. Understanding Visualization Through Spatial Differences. *IEEE Xplore Digital Library*. Vis 05, P. 511-518. USA: Rutgers State University
- Vembriarto, St. (1985). Pengantar Pengajaran Modul. Yogyakarta: Yayasan Pendidikan Paramita
- Wahyudi, D. (2019). Pengembangan E-Modul dalam Pembelajaran Matematika SMA Berbasis Android. *GAUSS: Jurnal Pendidikan Matematika*, 2(2), 1. <https://doi.org/10.30656/gauss.v2i2.1739>
- Watin, E., & Kustijono, R. (2017). Efektivitas penggunaan E-book dengan Flip PDF Professional untuk melatih keterampilan proses sains. *Prosiding Seminar Nasional Fisika (SNF)*, 1, 124–129. <https://fisika.fmipa.unesa.ac.id/proceedings/index.php/snf/article/view/25>
- Winkel, WS. Psikologi Pengajaran, Yogyakarta: Media Abadi, 2009
- Wiryanto. (2020). Proses Pembelajaran Matematika Di Sekolah Dasar Di Tengah Pandemi Covid-19. *Jurnal Review Pendidikan Dasar: Jurnal Kajian Pendidikan Dan Hasil Penelitian*, 6(2), 125–132.

- Wulansari, E. W., Kantun, S., & Suharso, P. (2018). Pengembangan E-Modul Pembelajaran Ekonomi Materi Pasar Modal Untuk Siswa Kelas Xi Ips Man 1 Jember Tahun Ajaran 2016/2017. *JURNAL PENDIDIKAN EKONOMI: Jurnal Ilmiah Ilmu Pendidikan, Ilmu Ekonomi Dan Ilmu Sosial*, 12(1), 1. <https://doi.org/10.19184/jpe.v12i1.6463>
- Yanindah, A. T. C., & Ratu, N. (2021). Pengembangan E-Modul SUGAR Berbasis Android. *Jurnal Cendekia : Jurnal Pendidikan Matematika*, 5(1), 607–622. <https://doi.org/10.31004/cendekia.v5i1.445>
- Zhou, G., Chen, S., & Chen, Z. (2020). Back to the spring of 2020: facts and hope of COVID-19 outbreak. *Frontiers of Medicine*, 14(2), 113–116. <https://doi.org/10.1007/s11684-020-0758-9>
- Zulfahmi; Syahputra, E., & Fauzi, A. 2017. Development of Mathematics Learning Tools Based Van Hiele Model to Improving Spatial Ability and Self-Concept Student's of MTs.S Ulumuddin. *American Journal of Educational Research*. 2017. Vol. 5, No. 10, 1080-1086. DOI:10.12691/education-5-10-9

