

## **DAFTAR PUSTAKA**

- Adami, F.Z & Budihartanti, C. (2016). Penerapan Teknologi Augmented Reality Pada Media Pembelajaran Sistem Pencernaan Berbasis Android. *Jurnal teknik komputer AMIK BSI*, 2(1), hlm. 122-131.
- Afidah, M. (2014). *Identifikasi Pola MiskONSEPSI Mahasiswa Pada Konsep Mekanisme Evolusi Menggunakan Certainty Of Response Index (CRI)*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Albercht, K. (1992). *Daya Pikir*. Semarang: Dahara Prize
- Albion, P.R. (2003). Problem Based Learning And Interactive Multimedia Development. *Journal of Technology and Teacher Education*, 11(2) hlm. 243-257
- Anita, (2007). *Model Pembelajaran Thinking Aloud Pair Problem Solving (TAPPS) Pada Topik Larutan Penyangga Untuk Meningkatkan Pemahaman Konsep Dan Kemampuan Pemecahan Masalah Siswa*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Arends, R. I. (2008). *Learning to Teach. Belajar untuk Mengajar*. Yogyakarta: Pustaka Belajar.
- Ariasdi. (2008). *Panduan Pengembangan Multimedia*. [Online]. Tersedia di: <http://www.wordpress.com> di akses 17 Maret 2017
- Arifin, M. (1995). *Pengembangan Program Pengajaran Bidang Studi Kimia*. Bandung: Erlangga
- Arikunto, S. (2008). *Dasar-dasar Evaluasi Pendidikan*. Jakarta: Bumi Aksara.
- Arsyad, A. (2004). *Media Pembelajaran*. Jakarta : PT. Raja Grafindo Persada.
- Atlewell, J (2005). *Mobile Technologies and Learning*. London: Learning and Skills Development Agency.
- Aydin, S. (2016). To What Extent do Turkish High School Students Know About Their Body Organs and Organ Systems?. *International of Human Science*. 13 (1), hlm. 1094-1106
- Bahar M, Johnstone, A.H & Hansell, M.H. (1999). Revisiting Learning Difficulties In Biology. *Journal Biology Education*, 33(2): hlm. 84-86.
- Bahriah, E.S. (2012). Pengembangan Multimedia Interaktif Kesetimbangan Kimia Untuk Meningkatkan Literasi Sains Siswa. *Prosiding Hasil Penelitian*

*Kebijakan Pendidikan Menengah, Pusat Penelitian Kebijakan Balitbang Kemdikbud, ISBN: 979-401-641-1*

- Baser, M. (2006). Promoting Conceptual Change Through Active Learning Using Open Source Software For Physics Simulations. *Australasian Journal of Educational Technology*, 22(3), hlm. 336-354.
- Berg, E.V. (1991). *MiskONSEP Fisika dan Remediasi*. Salatiga: UKSW
- Behera, A.K. (2013). M-Learning: A New Learning Paradigm. *International Journal on New Trends in Education and Their Implications*, 4(2), hlm. 24-34.
- Bhardwaj, S. Sharma, R. Chouhan, P & Sharma, P. (2013). Android Operating Systems. *International Journal of Engineering Technology & Management Research*. 1(1). hlm. 147-150
- Bromme & Stahl (2005). Is a Hypertext a Book of Space? The Impact of Different Introductory Metaphors on Hypertext Construction. *Computers and Education*. 44, hlm. 115-133.
- Boyinbode, O & Fasunon, D. (2015). Deploying an Interactive Mobile Learning System in the Classroom. *International Journal of u- and e- Service, Science and Technology*, 8(4), hlm. 321 -330
- Bustum, A.Y. (2010). Aplikasi Pembelajaran Panca Indra Pada Manusia Berbasis Android. *Jurnal Telematika* Vol. 3 No. 1 Februari 2010, hlm. 25-36
- Campbell, N.A. & Reece, J.B. (2008). *Biology 8th Ed*. San Francisco: Pearson Education Inc.
- Cerrah-Özsevgeç, L. (2007). What do Turkish Students at Different Ages Know About Their Internal Body Parts Both Visually and Verbally? *Journal of Turkish Science Education*, 4 (2), hlm. 31-44.
- Chamberlain. (2012). *Inquiry and Scientific Literacy*. [Online]. Tersedia di: [www.sagepub.com/upmdata/24393\\_chamberlain\\_chapter1.pdf](http://www.sagepub.com/upmdata/24393_chamberlain_chapter1.pdf). Di akses 7 maret 2017
- Chandrasegaran, A.L., Treagust, D.F & Mocerino, M. (2007). The Development of a Two-Tier Multiple-Choice Diagnostic Instrument for Evaluating Secondary School Student Ability to Describe and Explain Chemical Reaction Using Multiple Levels of Representation. *Chemistry Education Research*. Vol 8, hlm. 293-307.

- Chin, C & Chia, L. (2005). *Problem-based Learning: Using III-Structured Problems in Biology Project Work*. Wiley InterScience. [Online]. Tersedia di: <http://Interscience.Wiley.com/> diakses 10 April 2017.
- Costa, A.L. (ed). (1985). *Developing Minds, A Resource Book for Teaching Thinking*. Alexandria: ASCD
- Dahar, R. (2006). *Teori-teori Belajar*. Jakarta: Penerbit Erlangga.
- Darmawan, D. (2011). *Teknologi Pembelajaran*. Bandung: PT Remaja Rosdakarya
- Daryanto. (2010). *Media Pembelajaran*. Yogyakarta: Gava Media
- Depdiknas. (2002). *Pelatihan Terintegrasi Berbasis Kompetensi Guru Mata Pelajaran Biologi*. Jakarta: Depdiknas.
- Dewi, F.A. (2015). *Penerapan Assesment for Learning Sebagai Alternatif untuk Mendiagnistik Kesulitan Belajar Siswa SMP Pada Materi Sistem Penerimaan Manusia*. (Skripsi). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Dimyati, M. (2002). *Belajar dan Pembelajaran*. Jakarta: PT Rineka Cipta
- Duyilemi, A.N. (2005). The jets Programmes And The Attitude of Girls to Sciene and Technology in Nigeria. *Educational Thought*, 4 (1), hlm. 32-38.
- El-Hussein, M.O.M & Cronje, J.P. (2010). Defining Mobile Learning in the Higher Education Landscape. *Educational Technology & Society*, 13(3), hlm. 12–21.
- Erman, H. (2003). *Evaluasi Pembelajaran Matematika*, Bandung: JICA FPMIPA.
- Finkelstein, N.D. et al. (2005). “When Learning About The Real World is Better Done Virtually: A Study of Substituting Computer Simulaitons for Laboratory Equipment”. *Physics Education Research*. 1, hlm.1-8
- Fitria. Priatmoko, S. & Kasmui. (2016). Penggunaan Multimedia Interaktif Dalam Meminimalisasi Miskonsepsi Siswa Pada Materi Pokok Larutan Penyangga. *Jurnal Inovasi Pendidikan Kimia*, 10(1), hlm 1641 -1650
- Flavo, D. (2008). Animations and Simulations for Teaching and Learning Molecular Chemistry. *International Journal of Technology in Teaching and Learning*, 4(1), hlm. 68-77.
- Fraenkel, J.R. & Wallen, N.E. (1993). *How To Design And Evaluate Research in Education*. Singapore: Mc Graw-Hill.
- Gagne, R. M. (1975). *Essentials of Learning for Innstruction*. New York: Holt, Rinehart and Winston.

- Gerace, W.J. & Beaty, I.D. (2005). Teaching vs Learning: Changing Perspectives on Problem Solving in Physics Instruction. *Article Presented in 9<sup>th</sup> Common Conference of the Cyprus Physics Association and Greek Physics Association*, University of Massachusetts Amherst.
- Green, T & Brown, A. (2002). *Multimedia Project in The Classroom: A Guide to Development and Evaluation*. Thousand Oaks, CA: Corwin Press.
- Greenbowe, T.J, Yang, E.M., & Andre T., (2004), The Effective Use of an Interactive Software Program to Reduce Students Misconceptions in Chemistry, *Journal of Chemical Education*, 81(4).
- Gulo, W. (2002). *Strategi Belajar Mengajar*. Jakarta: Gramedia.
- Haerani, R.P. (2015). *Pengembangan Media Pembelajaran Video Game Pencemaran Air Untuk Meningkatkan Penguasaan Konsep dan Keterampilan Metakognitif Siswa*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Hake, R. (1999). *Analyzing Gain Scores*. [Online]. Tersedia di: <http://lists.asu.edu> diakses 25 Mei 2016.
- Halomoan, M. (2010). *Analisis Konsepsi Guru Mata Pelajaran Fisika Madrasah Aliyah Terhadap Konsep Gaya pada Benda Diam dan Bergerak*. [Online]. Tersedia di: [http://sumut.kemenag.go.id/file/file/TULISANPENGAJAR/flvk13438070\\_02.pdf](http://sumut.kemenag.go.id/file/file/TULISANPENGAJAR/flvk13438070_02.pdf) di akses 20 Agustus 2016
- Hamdan, A., Din, R., & Manaf, S. Z. A. (2012). Penerimaan M-Pembelajaran dalam Sistem Pendidikan di Malaysia melalui The Unified Theory of Acceptance and Use of Technology (UTAUT): Satu Analisis Literatur. *1st International Conference on Mobile Learning, Applications, and Services(mobilecase2012)*, 1, hlm. 93-97.
- Hanafi, H.F & Samsudin, K. (2012). Mobile Learning Environment System (MLES): The Case of Android-based Learning Application on Undergraduates' Learning. *International Journal of Advanced Computer Science and Applications*, 3(3), hlm. 63-66
- Halim, A *et al.*, (2016). An Analysys of Students' Skill in Applying The Problem Solving Strategy to The Physics Problem Settlement in Facing AEC as Global Competition. *Jurnal Pendidikan IPA Indonesia*, 5(1), hlm. 1-5
- Harlim, J.M. (2012). *Identifying the factors that impact on the problem solving performance of engineers*. Thesis RMIT University. [Online]. Tersedia di: <https://researchbank.rmit.edu.au/> diakses 19 Juli 2017

- Hasan, S., Bagayoko, D., & Kelley, E.L. (1999). Misconceptions and the Certainty of Response Index (CRI). *Phys. Educ.* 34
- Hewson, M.G & Hewson, P.W. (1983). Effect of Instruction Using Students' Prior Knowledge and Conceptual Change Strategies on Science Learning, *Journal of Research in Science Teaching*, 20(8).
- Hidayat, A. (2013). *Uji Statistik Metode Kolmogorov-Smirnov*. [Online]. Tersedia di:<http://statistikian.blogspot.com/2013/01/rumus-kolmogorovsmirnov.html> di akses 7 September 2016
- Higgins, S. (2012). *Does ICT Improve Learning and Teaching in School*. British Educational Research Association. Newcastle University.
- Huang, Y.-M., Hwang W-Y., & K.-E.(2010). Innovations in designing mobile learning applications. *Educational Technologies and societies*, 13(3), hlm. 1-2
- Ivers, K.S & Barron, A. (2002). *Multimedia Project in Education: Designing, Producing, and Assessing*. Wesport: Teacher Ideas Press.
- Jeng, Y.-L., Wu, T.-T., Huang, Y.-M., Tan, Q., & Yang, S. J. H. (2010). The Add-on Impact of Mobile Applications in Learning Strategies: A Review Study. *Educational Technology & Society*, 13 (3), hlm.3–11
- Jurnal Pediatri. (2009). *MUMPS atau Penyakit Gondong*. [Online]. Tersedia di: <https://jurnalpediatri.com/2009/06/11/mumps-atau-penyakit-gondong/> diakses tanggal 10 Mei 2017
- Kaltakci, D & Eryilmaz, A. (2007). Identifying pre-service physic teachers misconception with three tier test. *Ankara Turkey. Department of Secondary science/math Education at Middle East Technical University*. hlm. 1-8
- Kantowski, M.G. (1977). Processes Involved in Mathematical Problem Solving. *Journal for Research in Mathematics Education*, 8(3). hlm. 163-180.
- Karyadi, F. (2009). *Model diskusi belajar abduktif empiris untuk meningkatkan kemampuan pemecahan masalah siswa SMP pada materi bunyi*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Keller, R. (1998). *Teaching Problem-Solving Skills*. Chapel Hill: Center for Teaching and Learning.
- Kirkley, J. (2003). *Principle for Teaching Problem Solving*. PLATO Learning, Inc.
- Kose, S. (2008). Diagnosing Student Misconceptions: Using Drawing as a Research Method. *Science Journal. Vol 3.*, Hlm.283-293.

- Krulik, S. & Reys, R.E. (1980). *Problem Solving in School Mathematics*. Reston, Virginia: NCTM
- Kukulska, A & J. Traxler. (Eds). (2005). *Mobile Learning: A Handbook For Educators and Trainers*. Oxon: Routledge
- Lin. (2004). Development and Application of Two Tier Diagnostic Test For High School Students Understanding of Flowering Plant Growth and Development. *International Journal of Science and Mathematics Education*. Vol 2. Hal 175-199
- Lyle, K.S & Robinson, W. (2001). Teaching Science Problem Solving: An Overview of Experimental Work. *Journal of Chemical Education* 78 (9) hlm. 1662-1663.
- Malone, K.L. (2006). *A Comparative Study of the Cognitive and Metacognitive Differences Between Modeling and Non-Modeling High Schoool Physics Students*. Ph.D Dissertation. Pittsburgh: Carnegie Mellon University.
- Marwan, M.E, Madar, A.R, & Fuad, N. (2013). An Overview Of Mobile Application In Learning For Student Of Kolej Poly-Tech Mara (Kptm) By Using Mobile Phone. *Journal of Asian Scientific Research*, 3(6), hlm. 527-537
- Mayer, R.E. (2001). *Multimedia learning*. New York: Cambridge University Press.
- Molaiinejad, A & Zakavati, A. (2008). Aconservative Study of Teacher Training Curriculum System in England, Japan, France, Malaysia and Iran. *Faslnameye Nonavarahaie Amouzeshi*, Vol 26.
- Muchlis, E.E. (2012). Pengaruh Pendekatan Pendidikan Matematika Realistik Indonesia (PMRI) Terhadap Perkembangan Kemampuan Pemecahan Masalah Siswa Kelas II SD Kartika 1.10 Padang. *Jurnal Exacta*, 10(2), hlm. 1-4
- Mukhtar, Samsu & Rusmini. (2002). *Pendidikan Anak Bangsa Pendidikan untuk Semua*. Jakarta: Nimas Multima
- Munajam. (2000). *Analisis Miskonsepsi Siswa pada Konsep Reaksi Redoks*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Munir. (2001). Aplikasi Teknologi Multimedia Dalam Proses Belajar Mengajar. *Mimbar Pendidikan No.3 Tahun XX*.
- Munir. (2013). *Multimedia : Konsep dan Aplikasi dalam Pendidikan*. Bandung: Alfabeta.

- Munir. (2008). *Kurikulum Berbasis Teknologi Informasi dan Komunikasi*. Bandung: ALFABETA
- Murni, D. (2013). Identifikasi Miskonsepsi Mahasiswa Pada Konsep Substansi Genetika Menggunakan *Certainty of Response Index* (CRI). *Prosiding Semirata FMIPA Universitas Lampung*.
- Mursalin. (2012). *Model Diklat Penanggulangan Miskonsepsi Guru Fisika Pada Topik Kelistrikan dan Kemagnetan Melalui Simulasi Komputer*. (Disertasi). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Mutakinati, L. (2010). *Pembelajaran Kooperatif Think Pair Square Untuk Meningkatkan Kemampuan Memecahkan Masalah Siswa Pada Materi Larutan Penyangga*. (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Mtega, W. P. Bernard, R. Msungu, A.C. & Sanare, R. (2012). Using Mobile Phones for Teaching and Learning Purposes in Higher Learning Institutions: the Case of Sokoine University of Agriculture in Tanzania. *Proceedings and report of the 5th UbuntuNet Alliance annual conference*, hlm. 118-129
- National Science Teachers Association in Collaboration with The Association for The Education of Teachers in Science* (NSTA). (2003). Standards for Science Teacher Preparation.
- Naz, A & Nasreen, A. (2013). An Exploration of Students' Misconceptions about the Concept 'Classification of Animals' at Secondary Level and Effectiveness of Inquiry Method for Conceptual Change. *Journal of Faculty of Educational Sciences*, year: 2013, 46: 2, hlm. 195-214
- Newell, A & Simon, H. (1972). *Human Problem Solving*. Englewood Cliffs, NJ: Prentice Hall.
- Nitko, A.J. & Brookhart, S.M. (2007). *Educational Assessment of Students*. New Jersey: Pearson, Merril Prentice Hall.
- Novak, J. D & Cañas, A. J. (2008). *The Theory Underlying Concept Maps and How to Construct and Use Them*. Florida: Institute for Human and Machine Cognition (IHMC). [Online]. Tersedia di: <http://cmap.ihmc.us/Publications/ResearchPapers/TheoryUnderlyingConceptMaps.pdf> di akses 20 Agustus 2016
- O'Malley, et al. (2003). *MOBllearn WP4 - Guidelines for Learning / Teaching / Tutoring in a Mobile Environment*. [Online]. Tersedia di: <http://kn.open.ac.uk/public/getfile.cfm?documentfileid=7488> di akses 21 Agustus 2016

- Oldham, V. (2003). Effective use of ICT in Secondary Science: Guidelines and Case Studies. *School Science Review*, Vol.84, No.309, hlm. 53-60.
- Oliveras, B., Márquez, C., & Sanmartí, N. (2013). The use of Newpaper Article as a Tool to Develop Critical Thinking in Science Classes. *International Journal of Science*. 35(6), hlm. 885-905
- Orr, Golas & Yao. (1994). Storyboard Development for Interactive Multimedia Training. *Journal of Interactive Instruction Development*, Winter, hlm 18-31.
- Ozcan, N (2003). *A Group of Students' and Teachers' Perceptions with Respect to Biology Education at High School Level*, MA Dissertation, Middle East Technical University, Ankara, Turkey.
- Oztas, H. (2015). First-Year University Students' Misconceptions about Digestive Tract and it's Functions. *TIIKM Journal of Education*, Vol. 1 No. 1, hlm. 119-123.
- Pang, L. (2014). Form 4 Biology Students' Drawings and Misconception of the Human Digestive System. Research Paper. Universitas Malaysia Sarawak.
- Phillips, R.(1997). *The Developer's Handbook to Interactive Multimedia: A Practical Guide for Educational Applications*. London: Kogan Page Ltd.
- Polya, G. (1957). *How to Solve it: A New Aspect of Mathematics Method*. Princeton, New Jersey: Princeton University Press.
- Pramono, G. (2006). Interaktivitas dan Learner Control pada Multimedia Interaktif. *Jurnal Teknodi* 19 (10): hlm. 39-55.
- Pranasiwi. et al., (2015). Pengembangan Aplikasi Kunci Determinasi Berbasis Android Pokok Bahasan Mamalia di SMA/MA. *Artikel Ilmiah Mahasiswa*, II (1): hlm.1-7
- Prokop, P & Fančovičova, J. (2006). Student's Idea About The Human Body: Do They Really Draw What They Know. *Journal of Basic Science Education*, 2(10), hlm. 86-95
- Pujianto & Purwaningsih, D. (2009). Pemanfaatan ICT sebagai Sumber Belajar Sains (*Current Science Issue References*) dalam Penerapan Problem Based Learning di Sekolah. *Seminar Nasional UNY*.
- Purba, J. P. (2003). Pengembangan dan Implementasi Model Pembelajaran Fisika Menggunakan Pendekatan Pemecahan Masalah. *Konvensi Nasional Pendidikan V*

- Purba J.P & Depari, G. (2008). Penulusuran Miskonsepsi Mahasiswa Tentang Konsep Dalam Rangkaian Listrik Menggunakan Certainty Of Response Index dan Interview. *Jurusan Pendidikan Teknik Elektro*, UPI
- Rahayuningrum, R. H. (2011). Penggunaan Media Pembelajaran Multimedia Interaktif Berbantuan Komputer untuk Meningkatkan Motivasi Belajar dan Kemampuan Pemecahan Masalah Matematika Siswa Kelas VIIIF di SMP Negeri 2 Imogiri. *Makalah seminar*. [Online]. Tersedia di: <http://eprints.uny.ac.id> diakses 9 Juni 2017
- Riyana, C. (2007). *Pedoman Pengembangan Media Video*. Jakarta: P3AI UPI
- Riyanto. Y. (2014). *Paradigma Baru Pembelajaran: Sebagai Referensi Bagi Pendidik dalam Implementasi Pembelajaran yang Efektif dan Berkualitas*. Jakarta: Kencana Media Pranada.
- Roswita, W. (2005). *Pengaruh Pemberian Tugas Secara Individual dan Kelompok Melalui Lembaran Kerja Terhadap Hasil Belajar Siswa pada Materi Lingkungan dan Pencemaran di SMA*. (Tesis). Sekolah Pascasarjana. Universitas Pendidikan Indonesia, Bandung.
- Ruseffendi, E. T. (2006). *Pengantar kepada membantu guru mengembangkan kompetensinya dalam pengajaran matematika untuk meningkatkan CBSA*. Bandung: Tarsito
- Rusman, et al., (2012). *Pembelajaran Berbasis Tekhnologi Informasi dan Komunikasi: mengembangkan Profesionalisme Guru*. Jakarta: Raja Grafindo Persada.
- Rustaman, N. et al.,( 2005). *Strategi Belajar Mengajar Biologi*. Bandung: FPMIPA UPI
- Sadiman, A. et al., (2008). *Media Pendidikan: Pengertian, Pengembangan, dan Pemanfaatannya*. Jakarta: Rajawali Press.
- Salmiyati, Tapillow F., & Setiawan W. (2007). Implementasi Teknologi Multimedia Interaktif dalam Pembelajaran Konsep Sistem Saraf untuk meningkatkan Pemahaman dan Retensi siswa". *Jurnal Penelitian Pendidikan IPA*, 1(3).
- Sanjaya, W. (2009). *Strategi Pembelajaran Berorientasi Standar Proses Pendidikan*. Jakarta: Kencana Prenada Group.
- Sanjaya, W. (2012). *Media Komunikasi Pembelajaran*. Jakarta: Kencana Prenda Group.
- Sani, R.A. (2014). *Pembelajaran Saintifik untuk Implementasi Kurikulum 2013*. Jakarta: Bumi Aksara

- Santoso, S. (2010). *Mastering SPSS 18*. Jakarta: PT Elex Media Komputindo.
- Seng, C. B. (2011). *Android: Dasar Pengoperasian, Optimasi sampai Modifikasi*. Jakarta: Jasakom.
- Shaw, K.R.M., Home, K.V., Zhang, H., and Boughman, J. (2007). Genetic education innovation in teaching and learning genetics. *The Genetic Society of America*. Vol 178, hlm. 1157-1168
- Shen, R., Wang, M. & Pan, X. (2008). Increasing interactivity in blended classrooms through a cutting-edge mobile learning system. *British Journal of Educational Technology* 39(6), hlm. 1073-1086.
- Sherwood, L. (2009). *Fisiologi Manusia dari Sel ke Sistem*. Edisi ke 6. Jakarta: EGC
- Sidauruk, S. (1999). Miskonsepsi siswa SMU Negeri Kotamadya Palangkaraya terhadap Konsep Materi, Hukum kekelan Massa, dan Sistem Periodik. *Jurnal Kependidikan*, Lembaga Penelitian Universitas Negeri Malang.
- Smaldino, S. E., Lowther, D. L., & Russel, J. D. (2011). *Teknologi Pembelajaran dan Media untuk Belajar*. (Alih Bahasa: Arif Rahman). Jakarta: KENCANA
- Soenarto, S.S. (2011). Vaksin Rotarovirus untuk Pencegahan Diare. *Buletin Jendela Data & Informasi Kesehatan*. Vol 2 hlm. 1-38
- Solikhatun, I, Santosa, S., & Maridi. (2015). Pengaruh Penerapan Reality Based Learning Terhadap Hasil Belajar Biologi Siswa Kelas X SMA Negeri 5 Surakarta Tahun Pelajaran 2012/2013. *Jurnal Pendidikan Biologi*, 7(3), hlm. 49-60
- Sopian, H. (2015). Deskripsi Penyebab Kesulitan Belajar Siswa Kelas XI SMA Pada Materi Sistem Hormon. *Seminar Nasional XII Pendidikan Biologi FKIP UNS*, hlm. 392-395
- Steck, T. R., DiBiase, W., Wang, C., & Boukhtiarov, A. (2012). The use of Open-Ended Problem Based Learning Scenarios in Interdisciplinary Biotechnology Class: Evaluation of a Problem Based learning Course Scross Three Year. *Journal of Microbiology & Biology Educational*. 13(1), hlm. 2-10.
- Stenberg, R. J & Ben, Z. (1996). *The Nature of Mathematical Thinking*. Mahwah, NJ: Lawrence Erlbaum Associates, Inc.
- Sudjana, N. (1996). *Penilaian Hasil Proses Belajar Mengajar*. Bandung: PT. Remaja Rosdakarya.
- Sudjoko. (2001). *Membantu Siswa Belajar IPA*. Yogyakarta: FPMIPA UNY

- Sugiyono, 2002. *Metode Penelitian Administrasi*. Bandung : Alfabeta
- Suhatri, Rusdi & Sugesti, E. (2016). Pengaruh Pemberian Sari Wortel (*Daucus carota L.*) terhadap Tukak Lambung Pada Tikus Putih Jantan. *Jurnal Sains Farmasi & Klinis*, 2(1), hlm. 99-103
- Sukmawati. F. (2014). Pengembangan Aplikasi Pembelajaran Biologi SMP Berbasis Android Untuk Bekal Menghadapi UAN Di SMP Islam Bakti 1 Surakarta. [Online]. Tersedia di: <http://journal.respati.ac.id> diakses 20 Agustus 2016
- Suniyati, N.M & Sadia, W. & Suandana, A. (2013). Pengaruh Implementasi Pembelajaran Kontekstual Berbantuan Multimedia Interaktif Terhadap Penurunan MiskONSEPSI (Studi Kuasi Eksperimen dalam Pembelajaran Cahaya dan Alat Optik di SMP Negeri 2 Amlapura). *E-Journal Program Pascasarjana Universitas Pendidikan Ganesha Program Studi Administrasi Pendidikan*, Vol 4
- Suparno, P. (2013). *MiskONSEPSI dan Perubahan Konsep dalam Pendidikan Fisika*. Jakarta: Grasindo
- Suparno, P. (2005). *MiskONSEPSI dan Perubahan Konsep Pendidikan Fisika*. Jakarta: Agrasindo.
- Suparyana, D. F. (2014). *Analisis Penguasaan Konsep Dan MiskONSEPSI Siswa Sma Pada Materi Genetika*. S2 (Tesis). Sekolah Pascasarjana. Universitas Pendidikan Indonesia, Bandung.
- Suryanto, A & Hewindawati, Y. (2004). Pemahaman Murid Sekolah Dasar Terhadap Konsep IPA Berbasis Biologi: Suatu Diagnosis Adanya MiskONSEPSI. *Jurnal Pendidikan*, 5(1) hlm. 61-72
- Susanto, A. (2013). *Teori Belajar dan Pembelajaran di Sekolah Dasar*. Jakarta: Kencana.
- Susilawati, D. (2010). *Cara Tepat Atasi Sembelit*. [Online]. Tersedia di: [http://ftp.unpad.ac.id/koran/republika/2010-11-30/republika\\_2010-11-30\\_023.pdf](http://ftp.unpad.ac.id/koran/republika/2010-11-30/republika_2010-11-30_023.pdf) diakses 29 Mei 2017
- Sutopo. A. H. (2003). *Multimedia Interaktif dengan Flash*. Yogyakarta: PT. Graha Ilmu.
- Takwim, B. (2006). *Mengajar Anak Berpikir Kritis*. [Online]. Tersedia di: [www.kompas.-com/-kesehatan/news/0605/05/093521.htm](http://www.kompas.-com/-kesehatan/news/0605/05/093521.htm) diakses 25 Mei 2016.

- Tamimuddin, M. (2007). *Pemrograman Berorientasi Objek dengan Java 2 Platform Micro Edition (J2ME)*. Bandung: Java Competency Center Institut Teknologi Bandung.
- Tamimuddin, M. (2010). *Mengenal Mobile Learning (M-Learning)*. [Online]. Tersedia di: [https://mtamim.files.wordpress.com/2008/12/mlearn\\_tamim.pdf](https://mtamim.files.wordpress.com/2008/12/mlearn_tamim.pdf) diakses 25 Mei 2016.
- Tamir, P. (2011). Some Issues Related to The Justification to Multiple-Choice Answer. *Journal of Biology Education*, 23(4), hlm, 285-292.
- Tayubi, Y. (2005). Identifikasi Miskonsepsi Pada Konsep-Konsep Fisika Menggunakan Certainty of Response Index (CRI). *Jurnal Mimbar Pendidikan*. No.3 hlm. 4-9
- Tekkaya, C., Sungur, S., & Ozkan, (2001), Biology Concepts Perceived As Difficult By Turkish High School Students, *Hacettepe Universitesi Egitim Fakiultesi Dergisi* 21: hlm. 145-150.
- Tekkaya, C. (2002). Misconceptions as Barrier To Understanding Biology. *Journal of Hacettepe University Education Faculty* 23, hlm. 259-266.
- Thohari, H.K. (2011). *Peningkatan Kemampuan Problem Solving Melalui Peningkatan Kemampuan Metakognisi*. [Online] Tersedia di: [http://karinakiki.files.wordpress.com/2012/06/metakognisi.pdf/](http://karinakiki.files.wordpress.com/2012/06/metakognisi.pdf) diakses 7 September 2016
- Thomas, G.A., Lahunduitan, I & Tangkilisan, A. (2016). Angka kejadian appendisitis di RSUP Prof. Dr. R. D. Kandou Manado periode Oktober 2012 – September 2015. *Jurnal e-Clinic (eCl)*, Volume 4, Nomor 1, hlm. 231-236
- Thompson, F., & Logue, S. (2006) An Exploration Of Common Student Misconceptions In Science, *International Education Journal*, Vol. 7, Edisi (4), hlm. 553-559.
- Thompson, T. (1994). “*Budget CD Recording*”, byte 145-147
- Traxler, J. (2005). Defining Mobile Learning. *IADIS International Conference Mobile Learning*. hlm. 261-266
- Treagust, D.F. (2006). Diagnostic Assesement in Science as a Means to Improving Teaching, Learning and Retention. *Journal of Science and Mathematics Education Centre, Curtin University of Technology, Australia*.
- Tresnawati, S. N. (2012). *Identifikasi Miskonsepsi Siswa SMA Berdasarkan Cluster Sekolah dengan Menggunakan Tes Pilihan Ganda Beralasan pada*

- Konsep Sistem Reproduksi Tumbuhan Biji.* (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Tresnawati, N. (2013). *Pemanfaatan Internet dalam Pembelajaran Pencermaraan Air Berbasis Masalah dan Manfaatnya Terhadap Peningkatan Kemampuan Pemecahan Masalah Siswa.* (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Trianto. (2009). *Mendesain Model Pembelajaran Inovatif-Progresif. Konsep, Landasan, dan Implementasinya pada Kurikulum Tingkat Satuan Pendidikan (KTSP).* Jakarta: Kencana.
- Trilling, B. & Hood, P. (1999). *Learning, Technology, and Education Reform in the Knowledge Age ("We're Wired, Webbed, and Windowed, Now What?".* [Online]. Tersedia di: [www.wested.org/cs/we/view/rs/654](http://www.wested.org/cs/we/view/rs/654), diakses 17 Juli 2016.
- Tung, C-A & Chang, S-Y. (2009). Developing Critical Thinking through Literature Reading. *Feng Chia Journal of Humanities and Social Sciences*, No.19. hlm. 287-317.
- Ulfarina. (2010). *Penggunaan Pendekatan Multi Representasi Pada Pembelajaran Konsep Gerak Untuk Meningkatkan Pemahaman Konsep Dan Memperkecil Kuantitas Miskonsepsi Siswa SMP.* (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- Utulu, S & Alonge, A. (2012). Use of Mobile Phones For Project Based Learning By Undergraduate Students of Nigerian Private Universities. *International Journal of Education and Development using Information and Communication Technology (IJEDICT)*, 2012, Vol. 8, Issue 1, hlm. 4-15.
- Ürey, M. & Çalik, M. (2008). Combining Different Conceptual Change Methods Within 5E Model: A Sample Teaching Design Of 'Cell' Concept Dan Its Organelles. *Asia-Pacific Forum on Science Learning and Teaching*, 9 [2] article 12.
- Verina. (2014). *Pengembangan Model Pembelajaran Investigasi Kelompok pada Materi Sifat Koligatif Larutan untuk Meningkatkan Kemampuan Pemecahan Masalah.* (Tesis). Sekolah Pascasarjana, Universitas Pendidikan Indonesia, Bandung.
- White, R.T. & Mitchell, I.J. (1994). Metacognition and The Quality of Learning. *Studies in Science Education*, 23, hlm. 21-37
- Wiyono, K. & Liliyansari (2012). Critical Thinking Skills Enhancement Prospective Student Teachers Model With IMM-ISSP. *Forum MIPA (Majalah Ilmiah Jurusan PMIPA FKIP Unsri)*, 14(1), hlm. 10-16

- Wood, D. (2007). *Kiat Mengatasi Gangguan Belajar*. Yogyakarta: Ar-Ruz Media Group.
- Yeh, C. L., Huei, Y. C., & Hong, Y. C. (2001). Development and Evaluation of a life sciences multimedia learning system. *International Journal of The Computer, The Internet and Management*, 9(1)
- Yuliati, L. & Zulaika, S. (2013). Penagruh Integrative Learning terhadap Penguasaan Konsep Kemampuan Pemecahan Masalah Fisika Siswa kelas X. *Proceeding Seminar Nasional IPA V*. Semarang : UNNES
- Zhang D, Zhou L, Briggs R.O & Nunamaker J.F. 2006. Instructional Video in Elearning: Assessing the Impact of Interactive Video on Learning Effectiveness. *Information and Management* 43(1): hlm. 15-27.