



**UNIVERSITAS PENDIDIKAN INDONESIA**  
**FACULTY OF MATHEMATICS AND NATURAL SCIENCES EDUCATION**  
**DEPARTMENT OF PHYSICS EDUCATION**

Jalan Dr. Setiabudhi 229 Bandung 40154  
 Tel: (022) 2004548 Fax. (022) 2004548  
 Website: fisika.upi.edu, E-mail: fisika@upi.edu

**STAFF HANDBOOK**

Name	Ida Kaniawati			
Position	Physics Education			
Academic career	<i>Initial academic appointment</i>	<i>Institution</i>	<i>Year</i>	
		<b>Associate Professor, Department of Physics Education of Universitas Pendidikan Indonesia</b>	<b>2011-Now</b>	
	<i>Habilitation [German post-doctoral qualification] (Subject)</i>	<i>Institution</i>	<i>Year</i>	
		-	-	
	<i>Doctorate (Subject)</i>	<i>Institution</i>	<i>Year</i>	
		<b>Universitas Pendidikan Indonesia</b>	<b>2005-2009</b>	
	<i>Master degree (subject)</i>	<i>Institution</i>	<i>Year</i>	
		<b>Institut Teknologi Bandung</b>	<b>1995-1998</b>	
	<i>Undergraduate degree (subject)</i>	<i>Institution</i>	<i>Year</i>	
		<b>Universitas Pendidikan Indonesia</b>	<b>1986-1991</b>	
Employment	<i>Position</i>	<i>Employer</i>	<i>Year</i>	
	<b>Lecturer</b>	<b>Dean</b>	<b>1992-Now</b>	
Research and development projects over the last 5 years	<i>Name of project or research focus</i>			
	<i>Period and any other information</i>			
	<i>Partners, if applicable</i>			
	<i>Amount of financing</i>			
	<b>No</b>	<b>Year</b>	<b>Title of Research Project</b>	<b>Financing</b>
				<b>Sources</b>
				<b>Amount (Million Rp)</b>
	1	2021	Pengembangan Pembelajaran STEM Berbasis <i>Education Sustainable Development</i> dalam Meningkatkan Kemampuan Abad 21 dan Kompetensi <i>ESD</i>	Universitas Pendidikan Indonesia 75
	2	2020	Pengembangan Model Pendidikan IPA Tingkat SMA di Indonesia dalam Upaya Membentuk Sumbardaya IPTEK Berkompetensi STEM (Science, Technology, Engineering, and Mathematics)	Kemdikbud Ristek Dikti 109,9
	3	2020	Upaya Meminimalisir Miskonsepsi Siswa SMA Melalui Pengembangan dan Penerapan Model Pembelajaran Kooperatif Berbantuan Simulasi Komputer	Kemdikbud Ristek Dikti 104



**UNIVERSITAS PENDIDIKAN INDONESIA**  
**FACULTY OF MATHEMATICS AND NATURAL SCIENCES EDUCATION**  
**DEPARTMENT OF PHYSICS EDUCATION**

Jalan Dr. Setiabudhi 229 Bandung 40154  
 Tel: (022) 2004548 Fax. (022) 2004548  
 Website: fisika.upi.edu, E-mail: fisika@upi.edu

	4	2019	Analisis Miskonsepsi Siswa SMA Melalui Pengembangan dan Penerapan Model Pembelajaran Kooperatif Berbantuan Simulasi Komputer	Universitas Pendidikan Indonesia	40
	5	2017-2018	Optimasi Pengembangan Simulasi Komputer dalam Model Pembelajaran Kooperatif untuk Meminimalisir Miskonsepsi Fisika pada Siswa SMA di Kota Bandung	Kemdikbud Ristek Dikti	135 (2018) 135 (2017)
	6	2016	Pengembangan Bahan Ajar Berorientasi Kemampuan Berpikir Tingkat Tinggi, Hibah Pascasarjana	Universitas Pendidikan Indonesia	30
Industry collaborations over the last 5 years	-				
Patents and proprietary rights	No.	Title		Type	Year
	1	Matematika, Sains, Teknologi dan Rekayasa, Transportasi: Masalah dan Keberlanjutannya di Indonesia		Proprietary rights	2020
	2	Perangkat Pembelajaran Topik Momentum Dan Impuls Kelas X SMA Dengan Menggunakan Interactive Conceptual Instruction (ICI) Dengan Bantuan Simulasi Komputer		Proprietary rights	2020
	3	Perangkat Pembelajaran Materi Alat Optik Kelas XI SMA Menggunakan Active Learning Of Optics And Photonics Berbantuan Simulasi Komputer		Proprietary rights	2019
	4	Panduan Penggunaan Simulasi Komputer Gelombang Cahaya: Bagian 1		Proprietary rights	2019
	5	Aplikasi Pembelajaran Fisika Berbasis Android Pada Topik Fluida Statis Untuk Meningkatkan Keterampilan Proses Sains Dan Keterampilan Berpikir Kritis Siswa SMA		Proprietary rights	2019
	6	Petunjuk Praktikum Model Virtual Higher Order Thinking Skills Laboratory (Virtual HOTS Lab)		Proprietary rights	2018
	7	Model Virtual Higher Order Thinking Skills Laboratory (Virtual HOTS Lab)		Proprietary rights	2018
	8	Perangkat Pembelajaran Topik Usaha Dan Energi Untuk Siswa SMA Kelas X Dengan Menggunakan Strategi PPOEW Berbantuan Simulasi Komputer		Proprietary rights	2018



**UNIVERSITAS PENDIDIKAN INDONESIA**  
**FACULTY OF MATHEMATICS AND NATURAL SCIENCES EDUCATION**  
**DEPARTMENT OF PHYSICS EDUCATION**

Jalan Dr. Setiabudhi 229 Bandung 40154  
 Tel: (022) 2004548 Fax. (022) 2004548  
 Website: fisika.upi.edu, E-mail: fisika@upi.edu

	9	Interaksi Cahaya dengan Organisme Berorientasi pada Keterampilan Berpikir Kritis dan Literasi Informasi untuk SMP/ MTs Kelas VIII	Proprietary rights	2018															
	10	Perangkat Pembelajaran Materi Hukum Newton untuk Siswa Kelas X dengan Menggunakan Dual Situated Learning Model (DSLML) Berbantuan Simulasi Komputer	Proprietary rights	2017															
	11	Petunjuk Project Based Learning pada Engineering Class kelas VII semester I	Proprietary rights	2016															
Important publications over the last 5 years	<p><i>Selected recent publications from a total of approx. (give total number): 8 Publications (Scopus Indexed)</i></p> <p><i>Author(s)</i></p> <p><i>Title</i></p> <p><i>Any other information</i></p> <p><i>Publisher, place of publication, date of publication or name of periodical, volume, issue, page numbers</i></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr style="background-color: #4a86e8; color: white;"> <th style="width: 10%;">No</th> <th style="width: 60%;">Publication</th> <th style="width: 30%;">Author (s)</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">1</td> <td>Implementation of Interactive Conceptual Instruction (ICI) With Computer Simulation: Impact of Students' Misconceptions on Momentum and Impulse Material  Jurnal Ilmiah Pendidikan Fisika Al-BiRuNi <a href="https://ejournal.radenintan.ac.id/index.php/al-biruni/index">https://ejournal.radenintan.ac.id/index.php/al-biruni/index</a> DOI: 10.24042/jipfalbiruni.v10i1.8375 P-ISSN: 2303-1832 e-ISSN: 2503-023X</td> <td><b>Ida Kaniawati</b> , Grace Triyani , Agus Danawan , Lyon Suyana , Achmad Samsudin , Endi Suhendi</td> </tr> <tr> <td style="text-align: center;">2</td> <td>An Analysis of Students' Misconceptions About the Implementation of Active Learning of Optics and Photonics Approach Assisted by Computer Simulation  <i>International Journal of Emerging Technologies in Learning</i>, 2020, 15.9.</td> <td><b>Ida Kaniawati</b>, Sri Rahmadani, Nuzulira Janeusse Fratiwi, Lyon Suyana, Agus Danawan, Achmad Samsudin, Endi Suhendi</td> </tr> <tr> <td style="text-align: center;">3</td> <td>Exploring Science Teachers' Lesson Plans by the Implementation of Intelligent Tutoring Systems in Blended Learning Environments  <i>Universal Journal of Educational Research</i>, 2020, 8.10: 4776-4783</td> <td>KDH Gunawan, S Liliyasi, <b>Ida Kaniawati</b>, Wawan Setiawan</td> </tr> <tr> <td style="text-align: center;">4</td> <td>Teaching Electrical Resistance of a Conductor Concept Using the CD-CCOI Model Supported by Dynamic Model and Dynamic Analogy in Improving the Mental Model  <i>Journal of Engineering Science and Technology, Special Issue on AASEC2019</i>, 2020, 39-47.</td> <td>Hutnal Basori, Andi Suhandi, Achmad Samsudin, <b>I Kaniawati</b>, Dadi Rusdiana</td> </tr> </tbody> </table>				No	Publication	Author (s)	1	Implementation of Interactive Conceptual Instruction (ICI) With Computer Simulation: Impact of Students' Misconceptions on Momentum and Impulse Material  Jurnal Ilmiah Pendidikan Fisika Al-BiRuNi <a href="https://ejournal.radenintan.ac.id/index.php/al-biruni/index">https://ejournal.radenintan.ac.id/index.php/al-biruni/index</a> DOI: 10.24042/jipfalbiruni.v10i1.8375 P-ISSN: 2303-1832 e-ISSN: 2503-023X	<b>Ida Kaniawati</b> , Grace Triyani , Agus Danawan , Lyon Suyana , Achmad Samsudin , Endi Suhendi	2	An Analysis of Students' Misconceptions About the Implementation of Active Learning of Optics and Photonics Approach Assisted by Computer Simulation  <i>International Journal of Emerging Technologies in Learning</i> , 2020, 15.9.	<b>Ida Kaniawati</b> , Sri Rahmadani, Nuzulira Janeusse Fratiwi, Lyon Suyana, Agus Danawan, Achmad Samsudin, Endi Suhendi	3	Exploring Science Teachers' Lesson Plans by the Implementation of Intelligent Tutoring Systems in Blended Learning Environments  <i>Universal Journal of Educational Research</i> , 2020, 8.10: 4776-4783	KDH Gunawan, S Liliyasi, <b>Ida Kaniawati</b> , Wawan Setiawan	4	Teaching Electrical Resistance of a Conductor Concept Using the CD-CCOI Model Supported by Dynamic Model and Dynamic Analogy in Improving the Mental Model  <i>Journal of Engineering Science and Technology, Special Issue on AASEC2019</i> , 2020, 39-47.	Hutnal Basori, Andi Suhandi, Achmad Samsudin, <b>I Kaniawati</b> , Dadi Rusdiana
No	Publication	Author (s)																	
1	Implementation of Interactive Conceptual Instruction (ICI) With Computer Simulation: Impact of Students' Misconceptions on Momentum and Impulse Material  Jurnal Ilmiah Pendidikan Fisika Al-BiRuNi <a href="https://ejournal.radenintan.ac.id/index.php/al-biruni/index">https://ejournal.radenintan.ac.id/index.php/al-biruni/index</a> DOI: 10.24042/jipfalbiruni.v10i1.8375 P-ISSN: 2303-1832 e-ISSN: 2503-023X	<b>Ida Kaniawati</b> , Grace Triyani , Agus Danawan , Lyon Suyana , Achmad Samsudin , Endi Suhendi																	
2	An Analysis of Students' Misconceptions About the Implementation of Active Learning of Optics and Photonics Approach Assisted by Computer Simulation  <i>International Journal of Emerging Technologies in Learning</i> , 2020, 15.9.	<b>Ida Kaniawati</b> , Sri Rahmadani, Nuzulira Janeusse Fratiwi, Lyon Suyana, Agus Danawan, Achmad Samsudin, Endi Suhendi																	
3	Exploring Science Teachers' Lesson Plans by the Implementation of Intelligent Tutoring Systems in Blended Learning Environments  <i>Universal Journal of Educational Research</i> , 2020, 8.10: 4776-4783	KDH Gunawan, S Liliyasi, <b>Ida Kaniawati</b> , Wawan Setiawan																	
4	Teaching Electrical Resistance of a Conductor Concept Using the CD-CCOI Model Supported by Dynamic Model and Dynamic Analogy in Improving the Mental Model  <i>Journal of Engineering Science and Technology, Special Issue on AASEC2019</i> , 2020, 39-47.	Hutnal Basori, Andi Suhandi, Achmad Samsudin, <b>I Kaniawati</b> , Dadi Rusdiana																	



**UNIVERSITAS PENDIDIKAN INDONESIA**  
**FACULTY OF MATHEMATICS AND NATURAL SCIENCES EDUCATION**  
**DEPARTMENT OF PHYSICS EDUCATION**

Jalan Dr. Setiabudhi 229 Bandung 40154  
 Tel: (022) 2004548 Fax. (022) 2004548  
 Website: fisika.upi.edu, E-mail: fisika@upi.edu

	5	Quality of learning community and presentations task: investigating student's discourse of the celestial objects coordinates in astronomy to construct scientific reasoning  <i>Journal of Physics: Conference Series</i> . IOP Publishing, 2019. p. 022030	<b>I Kaniawati</b> , TR Ramalis, D Rusdiana	
	6	Designing learning apparatus to promote twelfth grade students' understanding of digital technology concept: A preliminary studies  <i>Journal of Physics: Conference Series</i> . IOP Publishing, 2018. p. 012033	<b>I Kaniawati</b> , S Feranie	
	7	Improving secondary school students' scientific literacy ability through the design of better science textbooks  <i>Journal of Turkish Science Education</i> , 2017, 14.4: 92-107.	Parlindungan Sinaga, <b>Ida Kaniawati</b> , Andhy Setiawan	
	8	Role of integrated sciences teaching materials on pressure topic to improve student's critical thinking skills in junior  <i>Asian Journal of Education and e-Learning</i> , 2017, 5.2	Any Fitriani Rahmania, <b>Ida Kaniawati</b>	
Activities in specialist bodies over the last 5 years	<b>Organization</b>		<b>Role</b>	<b>Periods</b>
	Physical Society of Indonesia		Member	2015 - Now
* <i>Membership without a specific role need not be mentioned</i>				