

CURRICULUM VITAE

A. Personal Identity

1. Full Name (with Titles) : Prof. Dr. Trihastuti Agustinah, S.T., M.T.
2. Functional Position : Professor
3. Structural Position : Secretary for Human Resources and Financing for Department of Electrical Engineering
4. NIP : 196808121994032001
5. NIDN : 0012086814
6. Office Address : Electrical Engineering Departement, Building B, C and AJ Campus
Institut Teknologi Sepuluh Nopember, Keputih, Sukolilo District,
Surabaya City, East Java 60111.
7. Phone / Fax. Number(s) : +62315947302

B. Educational Background

	Bachelor	Master	Doctoral
Name of Institution	ITS	ITS	ITS
Field of Study	Electrical Engineering	Electrical Engineering	Electrical Engineering
Year of Enrollment - Graduation	1987-1993	2003-2005	2007-2012

C. Brief Description of Research Relevant to Scientific Development in the Field of Study

Research that has been and is being carried out in the last five years is related to the application of optimal control theory, intelligent control, fault tolerant control and nonlinear control in mobile robots, AGV, UAV, USV and DC motors. The main topics of research are trajectory tracking and system stabilization, formation control for multi agents, and avoidance of system obstructions against static and dynamic objects.

D. Research Experience within the Last Five Years

No	Year	Research Title	Source of Funding
1	2019	Penghindaran rintangan pada kooperatif multi agen pencarian sumber menggunakan fungsi potensial σ -normal (<i>Obstacle Avoidance on Multi-Agent Source Finder using σ-normal Potential Function</i>)	ITS' Department of Electrical Engineering
2	2018	Formasi dan topologi pada kooperatif multi agen pencarian sumber (<i>Formation and Topology on Cooperative Multi Agent Source Finder</i>)	ITS' Department of Electrical Engineering

E. Community Service Experience within the Last Five Years

No	Year	Title of Community Service
1	2020	Pengabdian dalam kegiatan Penerbitan Jurnal JAREE Terbitan VOL.4 No.1 Tahun 2020 (<i>Partaker in the Event of the Publishing of JAREE Journal Issue Vo. 4 No. 1 Year 2020</i>)
2	2019	Penerapan automatic solar aerator dengan metode grid tied solar system dilengkapi teknologi multi sensor monitoring guna meningkatkan produktivitas tambak udang windu di kabupaten Sumenep (<i>Implementation of Automatic Solar Aerator with Grid Tied Solar System Method Equipped with Multi Sensor Monitoring Technology in Order to Increase the Productivity of Asian Tiger Prawn Pond in Sumenep District</i>)
3	2018	Magang SPMI di Departemen Teknik Elektro FTE Program Asuh menuju Prodi Unggul Tahun 2018 (<i>Internal Quality Assurance System Intern in the Department of Electrical Engineering Fostering Program Towards Excellent Study Program in 2018</i>)
4	2017	Elektro peduli desa ELEKTRODA Desa Karang Jati Pasuruan Jawa Timur (<i>Electro Care ELEKTRODA Village, Karang Jati Village, Pasuruan, East Java</i>)
5	2016	Pemberdayaan Guru SMA di Surabaya Untuk Menemukan dan Berbagi Sumber Belajar (<i>Senior High School Teacher Empowerment in Surabaya for Finding and Sharing Learning Resources</i>)
6	2015	Pemberdayaan Guru Berjaringan (Networked Teacher) Bagi Guru SMA di Surabaya (<i>Networked Teacher Empowerment for Senior High School Teachers in Surabaya</i>)

F. Experience Writing in the Journal of Scientific Articles Within the Last Five Years

No	Scientific Article Title	Vol/No/Year	Title of Journal
1	Collision Avoidance of Multi Modal Moving Objects for Mobile Robot Using Hybrid Velocity Obstacles	13/3/2020	International Journal of Intelligent Engineering and Systems
2	Real Time Implementation of Robust Observer Based Sensor and Actuator Fault Tolerant Tracking Control for a DC Motor System	11/5/2018	International Review of Automatic Control
3	Quadcopter Path Following Control Design Using Output Feedback with Command Generator Tracker LOS Based At Square Path	947/ - /2018	Journal of Physics: Conference Series

4	Tracking Control of Quadrotor Using Static Output Feedback with Modified Command-Generator Tracker	9/4/2016	International Review of Automatic Control (I.RE.A.CO.)
5	Robust observer-based fault tolerant tracking control for linear systems with simultaneous actuator and sensor faults: Application to a dc motor system	8/4/2015	International Review on Modelling and Simulations (IREMOS)
6	Robust fuzzy observer-based fault tolerant tracking control for nonlinear systems with simultaneous actuator and sensor faults: Application to a DC series motor speed drive	8/6/2015	International Review of Automatic Control
7	Reconfigurable Controller Based on Fuzzy Descriptor Observer for Nonlinear Systems with Sensor Faults	771-/2015	Applied Mechanics and Materials

G. Experience on Oral Delivery of Paper on a Conference/Seminar within the Last Five Years

No	Name of Conference	Scientific Article Title	Time and Place
1	International Seminar on Intelligent Technology and Its Applications (ISITIA)	Autonomous Indoor Vehicle Navigation Using Modified Steering Velocity Obstacles	22-23 July 2020, Surabaya Indonesia
2	International Seminar on Intelligent Technology and Its Applications (ISITIA)	Obstacle Avoidance with Energy Efficiency and Distance Deviation Using KNN Algorithm for Quadcopter	22-23 July 2020, Surabaya Indonesia
3	International Seminar on Intelligent Technology and Its Applications (ISITIA)	Trajectory Tracking of Multi-Robot System Using a Singularity Approach	22-23 July 2020, Surabaya Indonesia
4	Sustainable Island Development Initiatives (SIDI) 2019	Design of autopilot control system on unmanned surface vehicle type monohull LSS-01 using model reference adaptive control-state feedback in waypoint control	September 2019, Surabaya Indonesia
5	International Conference of Artificial Intelligence and Information Technology	Reinforcement Point and Fuzzy Input Design of Fuzzy Q-Learning for Mobile Robot Navigation System	March 2019, Yogyakarta Indonesia
6	International Conference of Artificial Intelligence and Information Technology	Switching Formation and Topology in Cooperative Multi-Agent Source Seeking Using Gradient Estimation	March 2019, Yogyakarta Indonesia
7	International Conference of Artificial Intelligence and Information Technology	Trajectory Tracking Automated Guided Vehicle Using Fuzzy Controller	March 2019, Yogyakarta Indonesia
8	International Conference on Information and Communications Technology (ICOIACT)	Disturbance Compensation Using CTC with NDOB for Formation Control of Mobile Robots 978-1-5386-0954-5	March 2018; Yogyakarta, Indonesia
9	International Seminar on Intelligent Technology and Its Applications (ISITIA)	Quadcopter path following control design using output feedback with command generator tracker based on LOS	August 2017; Surabaya, Indonesia

10	International Seminar on Intelligent Technology and Its Applications (ISITIA)	Design of actuator fault compensation with MRC in 2 DOF manipulator based on PID CTC	August 2017; Surabaya, Indonesia
11	International Conference on Advanced Mechatronics, Intelligent Manufacture, and Industrial Automation	Virtual Laboratory Design for Pendulum-Cart Control System	October 2015; Surabaya Indonesia
12	International Seminar on Intelligent Technology and Its Applications	Design of Decoupling and Nonlinear PD Controller for Cruise Control of a Quadrotor	May 2015; Surabaya, Indonesia

H. Experience on Book-Writing within the Last Five Years (Modul in soft form – My classroom)

No	Book Title	Year	No. of Pages	Publisher
1	Sistem Pengaturan Nonlinear (<i>Non-Linear Control System</i>)	2019		MyClassroom
2	Sistem Pengaturan Cerdas (<i>Intelligent Control System</i>)	2018		Share ITS
3	Probabilitas dan Proses Stokastik (<i>Probability and Stochastic Processes</i>)	2016		Share ITS
4	Teknik Numerik Sistem Linier (<i>Numeric Technique for Linear System</i>)	2017		Share ITS

I. Experience on Training Program

No	Name of Training Program	Time and Place	Organizer
1	Pelatihan Pengadaan Barang/Jasa Pemerintah (Government Procurement) (<i>Government Procurement Training of Goods / Services</i>)	19-21 February 2020	National Public Procurement Agency (LKPP)
2	Pelatihan dan Ujian Sertifikasi PBJ Tingkat Dasar (e-Learning) (<i>Goods and Services Procurement Training and Exams – Basic Level (e-Learning)</i>)	10-20 February 2020	Ministry of Research and Technology's Education and Training Centre (Pusdiklat Kemenristek RI)
3	Workshop Penyusunan Kurikulum dan Implementasi Pelaksanaan Outcome Based Education (OBE) (<i>Outcome Based Education (OBE) Implementation and Curriculum Compilation</i>)	24-25 July 2019	Indonesia's Electrical Engineering as Higher Education Forum (FORTEI)
4	Workshop on Intelligent Systems and Assistive Technology	6-15 August 2018	CCU Taiwan
5	Pelatihan Auditor SPMI ITS (<i>Auditor Training for ITS' Internal Quality Assurance System</i>)	27 - 28 April 2016; Surabaya	ITS
6	Pelatihan tentang Pengadaan Barang dan Jasa Pemerintah (<i>Government Procurement Training</i>)	10 - 12 December 2015; Surabaya	East Java's Procurement Association of Indonesia (IAPD DPD Jawa Timur)

J. Acquisition of Intellectual Property Rights within the Last Five to Ten Years

No	Title/Theme of Intellectual Property Rights	Year	Type	Registration Number
1				
2				

K. Experience in Formulating Other Public Policy/Social Engineering within the Last Five Years

No	Title/Theme/Type of Already Implemented Social Engineering	Year	Place of Implementation	Public Response
1				
2				

L. Awards within the Last Ten Years (from the Government, Associations, or other Institutions)

No	Type of Awards	Awarding Institution	Year
1	Satyalancana Karya Satya XX tahun (20 Years of Civil Service Award)	President of the Republic of Indonesia	2017

All of the filled data dan written in the personal identity are true and can be accounted legally. If in the future, a discrepancy occurs, I will accept the risk.

Surabaya, 9 September 2020

DR. TRIHASTUTI AGUSTINAH, S.T., M.T.