

CURRICULUM VITAE



I. Personal Information

1. **Full Name** : TRUONG NGUYEN LUAN VU
2. **Country of Birth** : Vietnam
3. **Nationality** : Vietnamese
4. **Mailing Address** : Faculty of Mechanical Engineering, University of Technical Education of Ho Chi Minh City, #01 Vo Van Ngan Street, Thu Duc District, Ho Chi Minh City, Vietnam.
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II. Educational Background

| Period (from ~ to) | Institution | Department | Position/Degree /Diploma |
|------------------------------|--|---|---|
| Present | Ho Chi Minh City University of Technology and Education | Mechanical Engineering | Associate Professor |
| 9/2010~9/2012 | Yeungnam University, The Republic of Korea | College of Engineering | International Professor |
| 9/2009~8/2010 | Yeungnam University, The Republic of Korea | College of Engineering | Postdoctoral |
| 9/2005~8/2009 | Yeungnam University The Republic of Korea | College of Engineering | Ph.D. |
| 9/2003~8/2005 | Yeungnam University The Republic of Korea | College of Engineering | M.S. |
| 7/2002~12/2002 | Upon the invitation of the Government of the Federal Republic of Germany | Metal Technology- Maintenance and repair of Machines and Equipment | Advanced Professional Training |

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|---------------|--|------------------------|------|
| 9/1995~4/2000 | Ho Chi Minh City University of Technology- HCM City National University, Vietnam | Mechanical Engineering | B.S. |
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III. Academic Experience

1. Present: **Associate Professor**, Ho Chi Minh City University of Technology and Education, Vietnam.
2. 9/2010 ~ 9/2012: **International Professor**, College of Engineering, Yeungnam University, The Republic of Korea.
3. 9/2009 ~ 8/2010: **Postdoctoral Research Fellow**, College of Engineering, Yeungnam University, The Republic of Korea.
4. 6/2000 ~ 7/2002: **Lecturer**, Department of Mechanical Engineering, HCM City University of Technical Education, Vietnam.

IV. Research Interests

1. Process Control
2. Fractional-order Control
3. Multivariable Feedback Control
4. Robust Control
5. Systems Modeling and Automatic Control
6. Process Identification
7. Modern Control

V. Summary of Achievements

1. Marquis Who's Who in the World 2011
2. International Professor, College of Engineering, Yeungnam University, Rep. Korea (9/2010 ~ 9/2012)
3. Postdoctoral Research Fellow, College of Engineering, Yeungnam University, Rep. Korea (9/2009 ~ 08/2010)
4. Scholarship in Ph.D. Course from Yeungnam University, Rep. Korea, 2005
5. Scholarship in Master Course from Yeungnam University, Rep. Korea, 2003
6. Scholarship in Advanced Professional Training, Germany, 2002
7. Lecturer, Department of Mechanical Engineering, HCM City University of Technical Education, 2000

VI. Professional Activities

1. Member of the International Association of Engineers (**IAENG**)
2. Member of Institute of Control, Robotics and systems (**ICROS**)

VII. Award

Certificate of Merit for International Conference on Modeling, Simulation and Control, 2008, October 21-24, UC Berkeley, San Francisco, CA, USA.

Paper: Multi-loop PI/PID Controller Design Based on Direct Synthesis for Multivariable Systems.

VIII. Computer skills

1. Programming languages: Matlab, Visual C++, etc.
2. Process simulator: Hysys 2006, Aspen plus-11.1, Labview.
3. Others: AutoCAD, Adobe Acrobat Professional 8.0, Microsoft Office 2007, etc.

IX. Hobbies

1. Sports: Skiing, Soccer, Tennis.
2. Arts: Painting, Sculpture.
3. Entertainments: Classical music.

X. Languages

1. Professional level: English and Vietnamese.
2. Basic level: German and Korean.

XI. Publications

Thesis

1. Robust Multi-Loop PI/PID Controller Design for Multivariable Processes, Ph.D. thesis, **2009**
2. Optimal Tuning of Multiple-Input, Multiple-Output Processes, M.S. thesis, **2005**.

Book Chapter

3. Truong, N.L.V.; Lee, M. Analytical Design of Robust Multi-Loop PI Controller for Multivariable Processes, Advances in Machine Learning and Data Analysis, **Springer, 2009**.

Journals/Proceeding papers

4. Truong, N.L.V.; Lee, M. Smith predictor based fractional-order PI control for time-delay processes, **Korean Journal of Chemical Engineering** 31 (8), 1321-1329, 2014
5. Truong, N.L.V. A New Analytical Design Based on the Effect of Closed-Loop Interaction In Multi-Loop, **GTSD**, 2014
6. Truong, N.L.V. Design of simplified decoupling smith control scheme for multivariable process with multiple time delays, **GTSD**, 2014

7. Truong, N.L.V. Design of simplified decoupling smith control scheme for multivariable process with multiple time delays, **GTSD**, 2014
8. TNL Vu, HG Le, TN Dang, L Le, TL Doan, TT Nguyen. Fractional-order PI controllers design based on IMC scheme for enhanced performance of dead-time processes, **ICCAS**, 2013.
9. Truong, N.L.V.; Lee, M. An Extended Method of Simplified Decoupling for Multivariable Processes with Multiple Time Delays. **Journal of Chemical Engineering of Japan** 46 (4), 279-293, 2013.
10. Truong, N.L.V.; Lee, M. Analytical Design of Fractional-Order Proportional-Integral Controllers for Time-Delay Processes. **ISA Transactions** 52 (5), 583-591, 2013.
11. Truong, N.L.V.; Lee, M., Cao. T. H. H. Industrial PI controller of a Smith predictor for optimal servo control of a FOPDT processes with output constraint, **World Academic of Science, Engineering and Technology**, 30 (1), 511-520, 2012.
12. Truong, N.L.V.; Lee, M., Enhanced Simplified Decoupling for multivariable processes with multiple time delays, **The 31st IASTED Asian Conference on Modelling, Identification, and Control**, 2012
13. Truong, N.L.V.; Lee, M. A unified approach to the design of advanced PID controllers for time-delay processes. **Korean Journal of Chemical Engineering**, 30 (3), 546-558, 2012.
14. Truong, N.L.V.; Jujuly, M.M.; Lee, M. Analytical Design of PID Controller for Improved Disturbance Rejection of Delay-free Processes. **Korean Chem. Eng. Res.**, Vol. 49, No. 5, pp. 565-570, 2011.
15. Truong, N.L.V.; Lee, M. Design of Extended Simplified Decoupling for Multivariable Processes with Multiple Time Delays, **International Conference on Control, Automation and Systems**, 2011.
16. Truong, N.L.V.; Lee, M. Analytical Tuning Rules for Fractional Order Proportional Integral controllers, **International Conference on Control, Automation and Systems**, 2011.
17. Truong, N.L.V.; Lee, M. Analytical design of IMC based PID controller for set-point tracking and enhanced disturbance rejection of processes without time delay, **International Conference on Chemical Engineering (ICChE2011)**, 2011.
18. Truong, N.L.V.; Lee, Design of Extended Simplified Decoupling for Multivariable Processes with Multiple Time Delays. M. *International Conference on Control, Automation and Systems*, in Kintex, Gyeonggi-do, Korea, 2011.
19. Truong, N.L.V.; Lee, M. Analytical Tuning Rules for Fractional Order Proportional Integral controllers. *International Conference on Control, Automation and Systems*, in Kintex, Gyeonggi-do, Korea, 2011.
20. Truong, N.L.V.; Lee, M. Independent Design of Multi-loop PID Controllers for Interacting Multivariable Processes. **Journal of Process Control**, Vol. 20, pp. 922-933, 2010.
21. Truong, N.L.V.; Lee, M. Multi-loop PI Controller Design Based on Direct Synthesis for Interacting multi-time delay Processes. **ISA Transactions**, Vol. 49, pp. 79-86, 2010.
22. Truong, N.L.V; Lee, M. Analytical Design of Multi-Loop PI Controllers for Interactive Multivariable Processes. **Journal of Chemical Engineering of Japan**, Vol. 43, No. 2, pp. 196-208, 2010.

23. Truong, N.L.V.; Lee, M. Design of Advanced Multi-Loop PI Controller for Multi-Delay Processes. **Journal of Institute of Control, Robotics and Systems**, Vol. 16, No. 1, pp. 77-82, **2010**.
24. Truong, N.L.V.; Lee, M. Independent Design of Multi-loop PI/PID Controllers for Multi-delay Processes, **International Conference on Computer, Electrical, and Systems Science, and Engineering**, 2009.
25. Truong, N.L.V.; Lee, M. Analytical Design of Robust Multi-loop PI Controller for Multivariable Process, **ICROS-SICE International Joint Conference**, 2009.
26. Truong, N.L.V.; Lee, M. Robust Multi-loop PID Controller Design for Interacting Multivariable Processes, **Korea Institute of Chemical Engineering**, 2009.
27. Truong, N.L.V.; Lee, M. Robust Multi-loop PI Controller Design for Multivariable Processes, **Korea Automatic Control Conference**, 2009.
28. Truong, N.L.V.; Lee, M. Robust Multi-loop IMC-PID Controller Design for Multi-delay Processes, **Korea Institute of Chemical Engineering**, 2009.
29. Truong, N.L.V.; Lee, M. Independent Design of Multi-loop PI/PID Controllers for Multi-delay Processes. International Conference on Computer, Electrical, and Systems Science, and Engineering, **Bangkok, Thailand, 2009**.
30. Truong, N.L.V.; Hong, S.; Lee, M. Analytical Design of Robust Multi-loop PI Controller for Multivariable Process. ICROS-SICE International Joint Conference, **in Fukuoka International Congress Center, Fukuoka, Japan, 2009**.
31. Truong, N.L.V.; Lee, M. Robust Multi-loop PI Controller Design for Multivariable Processes, **KACC, Korea, 2009**.
32. Truong, N.L.V.; Lee, M. Robust Multi-loop PID Design for Interacting Multivariable Processes, **KIChE, Korea, 2009**.
33. Truong, N.L.V.; Lee, M. IMC-PID Approach: An effective way to get an analytical design of robust PID, **International Conference on Control, Automation and Systems**, 2008.
34. Truong, N.L.V.; Lee, M. Multi-loop PI Controller Design for Enhanced Disturbance Rejection in Multi-delay Processes. **International Journal of Mathematics and Computers in Simulation**. Vol. 2, No. 1, pp. 89-94, **2008**.
35. Truong, N.L.V.; Lee, M. Analytical Design of Multi-loop PI Controllers Based on the Direct Synthesis for Multi-delay Processes, **Korea Institute of Chemical Engineering**, 2008.
36. Truong, N.L.V.; Lee, M. Multi-loop PI/PID Controller Design Based on Direct Synthesis for Multivariable Systems, International Conference on modeling, Simulation and Control, **UC Berkeley, San Francisco, CA, USA, 2008**.
37. Truong, N.L.V.; Shamsuzzoha, M.; Moonyong Lee. IMC-PID Approach: An effective way to get an analytical design of robust PID controller. International Conference on Control, Automation and Systems (ICCAS), **COEX, Seoul, South Korea, 2008**.
38. Truong, N.L.V.; Lee, M. Analytical Design of Multi-loop PI Controllers Based on the Direct Synthesis for Multi-delay Processes. **KIChE, 26(2), Korea, 2008**.
39. Truong, N.L.V.; Lee, J.; Lee, M. Design of Multi-Loop PID Controllers Based on the Generalized IMC-PID Method with Mp Criterion. **International Journal of Control**,

- Automation, and Systems**, Vol. 5, No. 2, pp. 112-117, **2007**.
40. Truong, N.L.V; Lee, J.; Lee, M. Design of Robust PID Controllers for MIMO Systems, **Theories and Application of Chemical Engineering**, **2007**.
 41. Truong, N.L.V.; Lee, M. Optimal Design of Multi-loop PI Controllers for Enhanced Disturbance Rejection in Multivariable Processes. International Conference on Dynamical Systems and Control, **Arachon, France, 2007**.
 42. Truong, N.L.V.; Lee, M. Design of Decentralized PID Controller for Enhanced Robust Stability of Multivariable Control Systems. **Proc. AIChE, Utah, USA, 2007**.
 43. Truong, N.L.V; Lee. J.; Lee, M. Analytical Design of Multi-loop PI Controller for Disturbance Rejection in Multivariable Processes. **Journal of Control, Automation, and Systems Engineering**, Vol. 12, No. 5, pp. 505-508, **2006**.
 44. Truong, N.L.V.; Lee, M. Design of Multi-loop PI Controller for Disturbance Rejection in Multivariable Processes. **Theories and Application of Chem. Eng.**, Vol. 12, No. 1, pp. 116-119, **2006**.
 45. Truong, N.L.V.; Lee, M. Multi-loop PI Controller Design Based on Disturbance Rejection of Multivariable Processes using Ms Criterion. **Theories and Application of Chem. Eng.**, Vol. 12, No. 2, pp. 1470-1473, **2006**.
 46. Truong, N.L.V.; Lee, M. Optimal Design Method Based on Mp criteria for multi-loop PID Controllers. **Theories and Application of Chem. Eng.**, Vol. 11, No. 1, pp. 190-193, **2005**.
 47. Truong, N.L.V.; Lee, M. Comparison of Multi-loop PID controller Tuning Methods. **Theories and Application of Chem. Eng.**, Vol. 11, No. 2, pp. 1793-1796, **2005**.
 48. Truong, N.L.V; Lee, K. H; Lee, M. Optimal Tuning Combined with BLT and Mp Criteria for Multi-loop PID Controllers. **Theories and Application of Chem. Eng.**, Vol. 10, No. 2, pp. 1293-1296, **2004**.