1. Name   : Dr. Hiren G. Patel

2. Highest Qualifications   : Ph.D, M.E (Electrical,Control Systems)

3. Academic Performance   :

(High School to Highest Qualification)

Degree/Diploma	Division/Grade	Year	Specialization	Name of Institute
S. S. C.	First class with distinction	1995	-	Govt. School Silvassa
H. S. C.	First class with distinction	1997	-	Govt. School Silvassa
B. E./B. Tech.	First class with distinction	2001	Electrical and Electronics	UVCE, Bangalore.
M.E./M. Tech.	First class	2004	Control Systems	COEP, Pune.
Ph. D.	-	2014	Stochastic Control	SVNIT, Surat
Any Other				

4. Achievements
 (1) No. of Publications   :
International Journals   :

1) Hiren G. Patel and Shambhu N Sharma, Third-order continuous-discrete filtering for a non-linear dynamical system, *The ASME (American Society of Mechanical Engineers) Transactions*, *the Journal of Computational and Nonlinear dynamics* (An SCIE Journal), 9(3), 2014.

http://computationalnonlinear.asmedigitalcollection.asme.org/article.aspx?articleid=1783649

 (2) Hiren G. Patel, and Shambhu N Sharma, Filtering for a Duffing-van der Pol stochastic differential equation, *Applied Mathematics and Computation* (An SCIE Journal), 226, 386-397, 2014.

 http://www.sciencedirect.com/science/article/pii/S0096300313010953

(3) Hiren G. Patel and Shambhu N. Sharma, Some evolution equations for an Ornstein-Uhlenbeck process-driven dynamical system, *Fluctuation and Noise Letters* (An SCIE Journal), 11(4), 125001-20, 2012.

http://www.worldscientific.com/doi/abs/10.1142/S0219477512500204

 (4) Shambhu N. Sharma and Hiren G. Patel, The Fokker-Planck equation, *Stochastic Control* (Chris Myers, Ed.), Sycio Science publisher, Vienna, Rizeka, 1-20, 2010.

(Received impressive readership 10, 000 down loads yet)

www.intechopen.com/books/statistics/stochastic-control/the-fokker-planck-equation

5) Hiren Patel, Mihir Raval, 'Implementation of closed loop control of flow in air blower system using PLC and SCADA' , *Journal of control & Instrumentation, 7(3),* 39-43,2016

6) Bhavina J. Patel and Hiren G. Patel, 'Advanced Model Based Control Strategy for Dynamic Dose of Propofol', *International Journal of Control Theory and Applications ,International Science Press* , 9(39), pp. 55-62, 2016.

7) Bhavina Patel, Hiren Patel Pragna Vachhrajani,Divyang Shah , Alpesh Sarvaia, Adaptive smith predictor controller for total intravenous anesthesia automation, Biomedical Engineering Letters, February 2019, Volume 9, Issue 1, pp 127–144.

8. Bhavina Patel, Hiren Patel, Pragna Vachhrajani,Divyang Shah, Alpesh Sarvaia, Adaptive fractional order controller with Smith predictor-based propofol dosing in intravenous anesthesia automation, Int. J. Biomedical Engineering and Technology, ISSN online:1752-6426, ISSN print:1752-6418, DOI: 10.1504/IJBET.2018.10019664.

9. D. Y. Dube, H. G. Patel, Suppressing the Noise in Measured Signals for the Control of Helicopters, Fluctuation and Noise Letters (An SCIE Journal), vol. 18, no. 1 (2019), pp. 1950002.1-1950002.21.

International Conference.

1 Hiren G. Patel , Third-order Continuous-Discrete Filtering For a Stochastic Duffing

System, *International Conference on Industrial Instrumentation and Control (ICIC),*

Collage of Engineering, Pune, India, May 28-30,2015. **(IEEE)**

(http://ieeexplore.ieee.org/document/7150734/)

2 Y. P. Patil, H G Patel, Observer-Based Discrete-Time Sliding-Mode Control For Higher-Order Dynamic Delay-Time System, 14th International Conference on Control, Automation, Robotics & Vision Phuket, Thailand, 13-15th November, 2016. **(IEEE)**

(http://ieeexplore.ieee.org/document/7838798/)

3 D. Y. Dube, H. G. Patel, Control Design of 3 DOF Helicopter System, 11th International Conference on Industrial & information Systems, IIT, Roorkee, 3-4 December, 2016. **(IEEE)**

(http://ieeexplore.ieee.org/stamp/stamp.jsp?tp=&arnumber=8262945)

4 Y.P. Patil, H.G. Patel and B.B. Musmade, Robust Control Design using Discrete Sliding Mode Control for Uncertain Systems, 11th IEEE International Conference on Intelligent Systems and Controls (ISCO 2017), Coimbatore, Tamilnadu, India, 5th - 6th January 2017. **(IEEE)**
(**http://ieeexplore.ieee.org/document/7855978/**)

5 Hiren Patel, Mihir Raval, Closed Loop Control Of Flow Under The Influence Of Varying Temperature In Air Blower System Using PLC And VFD, Proceeding of International conference on Intelligent system and signal processing, Vallabh Vidyanagar,   23-25 March 2017. **(Springer)**

(http://www.springer.com/in/book/9789811069765)

6 D. Y. Dube, H. G. Patel, Estimation of the Helicopter system dynamics, 14 IEEE India council International conference (INDICON), IIT, Roorkee, 15-17 December, 2017. **(IEEE)**

7   B. Patel, H.G.Patel, Intravenous Anesthesia Automation with Internal and Instrumental Delay, 2017 IEEE 12th International conference on Industrial and Information systems (ICIIS), University of Peradeniya, Sri-lanka, 13-16 December 2017. **(IEEE)**

8. D. Y. Dube, H. G. Patel, Discrete Time Minimum Variance Control of Satellite System, 2018 Int. Conf. on Mathematical Modelling and Scientific Computing ICMMSC IIT (Indore), 19-21 Jul 2018. **(IEEE)**

9. D. Y. Dube, H. G. Patel, Adaptive Control of Satellite System using Kalman Estimates in the presence of Disturbance, 6th International Conference on Control, Dynamic Systems, and Robotics (CDSR'19) Ottawa, Canada, 6-7, June, 2019 – Paper No. CDSR 116 DOI: 10.11159/cdsr19.116 (scopus)

National Conference

Bhavina J. Patel and Hiren G. Patel, 'Advanced Model Based Control Strategy for Dynamic Dose of Propofol', Proceedings of XIII Control Instrumentation System Conference, Manipal, 17-18 October, 2016.

Hiren Patel, Mihir Raval, 'Implementation of closed loop control of flow in air blower system using PLC and SCADA', Proceedings of XIII Control Instrumentation System Conference, Manipal, 17-18 October, 2016.

Book Chapter
- S. N. Sharma and H. G. Patel, The Fokker-Planck equation, *Stochastic Control*   (Chris Myers, Ed.), Sycio Science publisher, Vienna, Rizeka, August 2010, pp. 1-20.

5. Area of Specialization
- Control Systems, Stochastic Control, Sliding mode control, Adaptive control and Industrial automation with PLC programing.

6. **Departmental and Institutional Responsibilities:**

At present
- Associate Dean (Student Welfare)/ Co-chairman(Cows)
- Member – (Implementation of Raj Bhasha (Hindi Cell) (Committee)
- Chairman, Hostel mess and tender preparation comittee , 2019-20
- Member, Institute Medical advisory.
- Member, Group Medical Policy for Students of SVNIT, 2019-20
- Member –Secretory, The SVP School committee
- Coordinato of Control System laboratory
- Faculty Advisor, B.Tech III (Electrical)
- TEQIP-III Departmental Coordinator

In past

- Co-chairman, (Electrical Engineering Society EES)
- Member, Registration and Distribution of Tablet.
- Member –Local Purchase committee of student council
- Member (Student and Hostel Council Election 2018-19)
- Chief –Warden, Gajjar bhavan.
- Chief Warden, Bhabha Bhavan during July 2012- June 2014.
- Chief Warden, Sardar Bhavan from October 2011 to July, 2012.
- Member, Department Time Table Committee, from December 2009 to July 2013.
- Member, Department Purchase committee from July 2011 to October 2013.

(Dr. Hiren G Patel)