


Purva Tendulkar

 www.linkedin.com/in/purvaten

 www.github.com/purvaten

 purva@gatech.edu

 purvaten.github.io

RESEARCH INTERESTS	<i>Deep Learning, Computer Vision, Natural Language Creative AI, Music Information Retrieval</i>	
EDUCATION	School of Interactive Computing, Georgia Tech <i>M.S. in Computer Science</i> Advised by Prof. Devi Parikh CGPA : 4.0/4.0	2018-2020
	College of Engineering Pune (COEP) <i>B.Tech. in Computer Science</i> CGPA : 9.14/10.0	2014-2018
PUBLICATIONS	SOrT-ing VQA Models: Improving Consistency via Gradient Alignment <i>Preprint (under review)</i> S. Dharur, <u>P. Tendulkar</u> , D. Batra, D. Parikh, R. Selvaraju	
	Feel The Music: Automatically Generating A Dance For An Input Song <i>International Conference on Computational Creativity (ICCC) 2020 (Oral)</i> <u>P. Tendulkar</u> , A. Das, A. Kembhavi, D. Parikh	
	SQuINTing at VQA Models: Interrogating VQA Models with Sub-Questions <i>IEEE Conference on Computer Vision and Pattern Recognition (CVPR) 2020 (Oral)</i> R. Selvaraju, <u>P. Tendulkar</u> , D. Parikh, E. Horvitz, M. Ribeiro, B. Nushi, E. Kamar	
	Trick or TReAT: Thematic Reinforcement for Artistic Typography <i>International Conference on Computational Creativity (ICCC) 2019 (Oral)</i> <u>P. Tendulkar</u> , K. Krishna, R. Selvaraju, D. Parikh	
AWARDS & RECOGNITION	Finalist: Microsoft AI Residency Program & Facebook AI Residency Program (2020) (cancelled due to COVID-19)	
	Winner: Best Presentation Award at ICCV'19	
	Recipient: Pratibha Eaton Excellence Award for women engineering students (2017)	
	Finalist: Computer and Science Quiz organized by Computer Society of India (2011)	
	Recipient: Maharashtra Talent Search Award (2009)	
TECHNICAL SKILLS	Programming Languages: Python, C, C++, HTML, CSS, PHP, JavaScript Deep Learning Frameworks: PyTorch, TensorFlow	
RELEVANT COURSES	Graduate Coursework <ul style="list-style-type: none">• Deep Learning • Machine Learning • Natural Language Processing• Computer Vision • Introduction to Graduate Algorithms	
	Selected Undergraduate Coursework <ul style="list-style-type: none">• Natural Language Processing • Linear Algebra• Experimental Design and Data Analysis • Data Structures• Design and Analysis of Algorithms • Discrete Structures and Graph Theory• Computer Algorithms in Signal Processing • Advanced Unix Programming	

EXPERIENCE	University of California, San Diego <i>Research Staff, mentored by Xiaolong Wang</i> Exploring ideas in test-time training and self-supervised learning.	Aug 2020-ongoing
	Visual Intelligence Lab, Georgia Tech <i>Research Assistant, mentored by Devi Parikh</i> Worked on developing personable AI that humans can like, trust, teach and learn from – including creative AI, vision & language and reinforcement learning.	Aug 2018-Aug 2020
	AiBee Corp, Palo Alto <i>Research Intern, mentored by Chunhui Gu and Juan Carlos Niebles</i> Worked on using recurrent neural networks to analyse trajectories of people in a shopping mall in order to detect events and perform intentions classification.	May 2019-Aug 2019
	CPS Research Group, NTU <i>Research Assistant, mentored by Arvind Easwaran</i> Worked on analysing notorious security attacks on Cyber Physical Systems (CPSs) and performed extensive vulnerability analysis in order to improve system design.	May 2017-Aug 2017
	IIT, Bombay <i>Software Developer, mentored by Varsha Apte</i> Worked on EvalPro, a Django webapp being used in the CSE Department of IIT Bombay for handling computer related tests, assignments and automated evaluation.	May 2016-Aug 2016
SELECTED PROJECTS	Blind Image Dehazing <i>Mentored by Yuval Bahat and Kalpesh Krishna</i> Implemented the ICCP 2016 paper Blind Image Dehazing Using Internal Patch Recurrence. Improved the method for selecting pairs of image patches for blind dehazing as compared to the original brute force method. Achieved approximately 20x better speed for optimization in PyTorch as compared to the original MATLAB implementation.	
	Punny Captions Implemented the NAACL 2018 paper Punny Captions : Witty Wordplay in Image Descriptions which generates punny captions for a boring image.	
REFERENCES	<ul style="list-style-type: none"> • Prof. Devi Parikh, Georgia Tech (email: parikh@gatech.edu) • Prof. Xiaolong Wang, UC San Diego (email: xiw012@ucsd.edu) • Dr. Aniruddha Kembhavi, AI2 (email: anik@allenai.org) • Dr. Chunhui Gu, AiBee Corp. (email: chgu@aibee.com) • Dr. Juan Carlos Niebles, Stanford University (email: jniebles@cs.stanford.edu) • Prof. Arvind Easwaran, NTU (email: arvinde@ntu.edu.sg) 	