Francielle Vargas

francielleavargas@usp.br +55 31 999685891 https://franciellevargas.github.io/

Education PhD, Computer Science and Computational Mathematics

University of São Paulo

Artificial Intelligence, Natural Language Processing, Deep Learning

2019 - 2023

MSc, Computer Science and Computational Mathematics

University of São Paulo

Thesis: Semantic Clustering of Aspects for Opinion Mining. see

Artificial Intelligence, Natural Language Processing, Machine Learning

2015 - 2017

BA, Linguistics

Federal University of Minas Gerais

BSc, Information Systems

Pontifical Catholic University of Minas Gerais

Invited speaker Leibniz Institute for the Social Sciences (GESIS), 2023

Conference on Harmful Online Communication. Cologne, Germany

Research projects 2020 - Current: Towards Explicable Factual Reasoning for Fact-Checking

University of São Paulo, Brazil

 $2022 - 2023: \ Predicting \ Hate \ Speech \ for \ Hausa \ African \ Indigenous \ Language$

Federal University of Minas Gerais, Brazil

 $2020 \hbox{ --} 2023: \ Discourse-Aware \ Computational \ Resources \ for \ Fake \ News \ Detection$

University of São Paulo, Brazil

2020 - 2022: Socially Responsible Methods and Resources for Hate Speech Detection

University of São Paulo, Brazil

2022 - 2022: Expanding Evaluation Data for the Multilingual Protest News Detection

Koç University, Turkey

2020 - 2020: Detecting Antisemitism on Social Media

Indiana University Bloomington, United States

 $2019 - 2020: \ Aspect-Based \ Sentiment \ Analysis$

University of São Paulo, Brazil

2015 - 2017: Summarization for Clever Information Access

University of São Paulo, Brazil

Organizing and program committee

Organizing Committee

- 1. Data(set) Co-chair. ICWSM 2023. see
- 2. Accessibility Chair. ICWSM 2022. see
- 3. Diversity, Equity, and Inclusion Chair. ICWSM 2021. see
- 4. Steering Committee. 7th CASE. @EACL 2024. see
- 5. Steering Committee. 6th CASE. @RANLP 2023. see
- 6. Steering Committee. 5th CASE. @EACL 2024. see

Program Committee

• ACL

Computational Social Science and Cultural Analytics Track (2023) Discourse and Pragmatics Track (2023)

• EMNLP

Computational Social Science and Cultural Analytics Track (2022) (2023) Discourse and Pragmatics Track (2022) (2023)

• NAACL

NAACL Student Research Workshop (2022)

• ICWSM

Dataset and Demo Track (2023)

• CIKM

Dataset and Demo Track (2023)

• HICSS

Digital and Social Media Track (2023)

SoCal NLP

5th Southern California Natural Language Processing Symposium (2022)

• WOAH

7th Workshop on Online Abuse and Harms (ACL 2023) 6th Workshop on Online Abuse and Harms (NAACL-HLT 2022)

• FEVER

6th Fact Extraction and VERification (EACL 2023)

• CASE

5th International Workshop Challenges and Applications of Automated Extraction of Socio-political Events from Text (EMNLP 2022)

4th International Workshop Challenges and Applications of Automated Extraction of Socio-political Events from Text (ACL-IJCNLP 2021).

CODI

4th Workshop on Computational Approaches to Discourse (ACL 2023) 3rd Workshop on Computational Approaches to Discourse (COLING 2022)

ARGMINING

9th Workshop on Argument Mining (COLING 2022) 22th Workshop on Computational Models of Natural Argument COMMA 2022) 1st Workshop on Argumentation & Machine Learning (COMMA 2022).

Awards received

- 2021: Research PhD Fellowship, SINCH Sweden see
- 2013: Academic Relevance, Federal University of Minas Gerais.see
- 2013: Honorable Mention, Federal University of Minas Gerais. see
- 2012: Academic Relevance, Federal University of Minas Gerais. see

Publications Pre-Print

Discourse Annotation Guideline for Low-Resource Languages

Vargas, F., Schmeisser-Nieto, W., Rabinovich, Z., Benevenuto, F., Pardo, T.A.S. pp.1-56. see

2023

${\bf Context-Aware\ and\ Expert\ Data\ Resources\ for\ Brazilian\ Portuguese\ Hate\ Speech\ Detection}$

Vargas, F., Carvalho, I., Pardo, T.A.S., Benevenuto, F. Natural Language Engineering Journal. pp.1-21. accepted

Socially Responsible Hate Speech Detection: Can Classifiers Reflect Social Stereotypes?

Vargas, F., Carvalho, I., Hürriyetoğlu, A., Pardo, T.A.S., Benevenuto, F. Recent Advances in Natural Language Processing (RANLP). pp.1-10. Varna, Bulgaria. accepted

Predicting Sentence-Level Factuality of News and Bias of Media Outlets

Vargas, F., Jaidka, K., Pardo, T.A.S., Benevenuto, F.

Recent Advances in Natural Language Processing (RANLP). pp.1-10. Varna, Bulgaria. accepted

NoHateBrazil: A Brazilian Portuguese Text Offensiveness Analysis System

Vargas, F., Carvalho, I., Schmeisser-Nieto, W., Benevenuto, F., Pardo, T.A.S. Recent Advances in Natural Language Processing (RANLP). pp.1-7. Varna, Bulgaria. accepted

Multimodal Hate Speech Detection

Thapa, S., Jafr, F. A., Hürriyetoğlu, A., **Vargas, F.**, Lee, R. K., Naseem, U. 6th International Workshop Challenges and Applications of Automated Extraction of Socio-Political Events from Text (RANLP). pp.1-9. Varna, Bulgaria. accepted

2022

Rhetorical Structure Approach for Online Deception Detection: A Survey

Vargas, F., D'Alessandro, J., Rabinovich, Z., Benevenuto, F., Pardo, T.A.S. 13th Conference on Language Resources and Evaluation (LREC). pp.5906-5915. Marseille, France. see

HateBR: A Large Expert Annotated Corpus of Brazilian Instagram Comments for Abusive Language Detection

Vargas, F., Carvalho, I., Góes, F.R., Pardo, T.A.S., Benevenuto, F. 13th Conference on Language Resources and Evaluation (LREC). pp.7174–7183. Marseille, France. see

Studying Dishonest Intentions in Brazilian Portuguese Texts

Vargas, F., Pardo, T.A.S.

Deceptive AI. Springer, vol 1296. pp.166–178. see

Extended Multilingual Protest News Detection

Hurriyetoglu, A., Mutlu, O., San, F. D., Uca, O., Gurel, A. S., Radford, B., Dai, Y., Hettiarachchi, H., Stoehr, N., Nomoto, T., Slavcheva, M., Vargas, F., Javid, A., Beyhan, F., Yoruk, E.

5th International Workshop Challenges and Applications of Automated Extraction of Socio-Political Events from Text (EMNLP). pp.223–228. Abu Dhabi, Arab Emirates. see

2021

Contextual-Lexicon Approach for Abusive Language Detection

Vargas, F., Góes, F.R., Carvalho, I., Pardo, T.A.S., Benevenuto, F.

Recent Advances in Natural Language Processing (RANLP), pp.1442-1451. Held Online.see

Towards Discourse-Aware Models for Multilingual Fake News Detection Vargas, F., Benevenuto, F., Pardo, T.A.S.

Recent Advances in Natural Language Processing (RANLP), pp.210-218. Held Online, see

Implicit Opinion Aspect Clues in Portuguese Texts: Analysis and Categorization Machado, M. T., Pardo, T.A.S., Ruiz, E. E. S., Di Felippo, A., Vargas, F.

15th International Conference on the Computational Processing of Portuguese (PROPOR). pp.68-78. Fortaleza, Brazil. see

2020

Linguistic Rules for Fine-Grained Opinion Extraction

Vargas, F., Pardo, T.A.S.

5th International Workshop on Social Sensing: Special Edition on Narrative Analysis on Social Media (ICWSM). pp.1-6. Held Online. see

Identifying Fine-Grained Opinion and Classifying Polarity on Coronavirus Pandemic

Vargas, F., Santos, R.S.S., F., Rocha, P.R.

9th Brazilian Conference on Intelligent Systems (BRACIS). pp.511-520. Rio Grande, Brazil. see

2019 and before

Aspect Clustering Methods for Sentiment Analysis

Vargas, F., Pardo, T.A.S.

13th International Conference on the Computational Processing of Portuguese (PROPOR). pp.365-374. Canela, Brazil. see

The Coreference Annotation of the CSTNews Corpus

Pardo, T.A.S., Baptista, J., Duran, M.S., Nunes, M.G.V., Nóbrega, F.A.A., Aluísio, S.M., Di Felippo, A., Seno, E.R.M., Silva, R.R., Anchieta, R.T., Brum, H.B., Dias, M.S., Martins, R.S.O., Maziero, E.G., Souza, J.W.C., **Vargas, F.**

2nd Workshop on Evaluation of Human Language Technologies for Iberian Language (SE-PLN). pp.102-112. Murcia, Spain. see

Book published / organized

Por que amo Llansol?

Bittencourt, A.; Costa, F. A.; Vargas, F. A.

Publicações Viva Voz, FALE/UFMG: Belo Horizonte: 34p. ISBN 978-85-7758-227-3. pdf

Previous positions

Academic position

2019/2023: Graduate Research Assistant - Dept. of Computer Science.

University of São Paulo. see

2021/2021:Graduate Teaching Assistant in Neural Networks and Deep Learning.

University of São Paulo. see

2020/2020: Graduate Teaching Assistant - Computing Theory and Compilers.

University of São Paulo. see

2016/2016: Graduate Teaching Assistant in Computer Seminars.

University of São Paulo. see.

2015/2017: Graduate Research Assistant - Dept. of Computer Science.

University of São Paulo. see

2011/2014: Undergraduate Research Assistant - Dept. of Linguistics.

Federal University of Minas Gerais. see

Industry position

2021/2023 Doctoral Researcher. Sinch. 2021/2022 Data Scientist. Webex-Cisco 2014/2015: System Analyst. Unisys.

Conference participation

2023: Recent Advances in Natural Language Processing (RANLP). to appear

2023: 61st Annual Meeting of the Association for Computational Linguistics (ACL). see

2022: 13th International Conference on Language Resources and Evaluation (LREC). see

2021: Recent Advances in Natural Language Processing (RANLP). see

 $2021\colon\,15\mathrm{th}$ International AAAI Conference on Web and Social Media (ICWSM). see

2020: 2022 Empirical Methods in Natural Language Processing (EMNLP). see

2020: 12th International Conference on Language Resources and Evaluation (LREC). see

Mentoring

Computer Science Undergraduate Student: Lucas Sobral Fontes Cardoso

Web resources for an aspect identification and clustering tool in fine-grained opinion mining.

University of São Paulo, 2020. see

Summer school and short courses

2023: 2nd Summer School on Deep Learning in NLP, Varna, Bulgaria. see

 $2022:\ 2nd\ Advanced\ Language\ Processing\ School,\ Universit\'e\ Grenoble\ Alpes,\ France.\ see$

2021: 4th Brazilian Advanced School in Big Data Analysis, USP, São Paulo, Brazil. see

2020: 10th Lisbon Machine Learning School, INESC Lisboa, Portugal. see

2019: Introduction on the Stars - Astrophysics, USP, São Paulo, Brazil. see

Technical-scientific resources

Technical-scientific FACTual: Automated fact-checking and news credibility. web system

OpCluster: Fine-grained opinion extraction and clustering tool. web system

NoHateBrazil: A Brazilian Portuguese text offensiveness analysis system. web system OPCovidBR: Aspect-based sentiment analysis dataset of Covid-19 Tweets. dataset AspectPRO: Aspect-based annotated corpus of web consumer reviews dataset.

HateBR: Large-scale abusive language dataset of Brazilian Instagram comments. dataset Deceiver: Multilingual discourse-annotated corpus of fake and truth news. dataset

FactNews: Sentence-level annotated dataset to predict factually and media bias. dataset

PRO: Taxonomies for aspect-based sentiment analysis in Portuguese. lexicon

MOL: Multilingual offensive lexicon. lexicon

Recommendation Letters

Prof. Dr. Fabricio Benevenuto. Computer Science Department, Federal University of Minas Gerais. letter

 ${\bf Dra.\ Norah\ Abokhodair.}\ {\it Microsoft\ Research.\ letter}$

Prof. Dra. Roseli Romero. Institute of Mathematics and Computer Sciences, University of São Paulo, letter

Prof. Dr. Carlos Ramisch. Laboratoire d'Informatique et Systèmes - LIS - UMR CNRS

Languages

 $Python,\,SQL,\,RDF(s),\,OWL,\,XML,\,JSON,\,Unix/Bash.$