

### Education

- 2011–2016 **Integrated Master in Informatics and Computing Engineering (300 ECTS)**  
(B.Sc. and M.Sc.) *Faculty of Engineering, University of Porto, Portugal*  
**Master Thesis: ArgMine: Argumentation Mining from Text**  
Advisors: Prof. Henrique Lopes Cardoso and Jorge Teixeira
- 2015–2016 **Erasmus+ Programme, 1st semester 2015/2016**  
*Barcelona School of Informatics, Technical University of Catalonia and Faculty of Mathematics, University of Barcelona, Spain*
- 2017–2021 **Doctoral Program in Informatics Engineering (ProDEI)**  
(expected) *Faculty of Engineering, University of Porto, Portugal*  
Title: Argumentation Mining from Text Using Semantic Approaches, Advisor: Prof. Henrique Lopes Cardoso

### Work Experience

- 09/2014–08/2015 **Web Development JCRSOFT** *Paços de Ferreira, Porto, Portugal*  
JCRSoft is a software company responsible for the IT sector of some companies from different industrial sectors. I was responsible for the full development of the commercial websites for some of these companies.
- 10/2016–Current **Research Assistant Artificial Intelligence and Computer Science Laboratory, LIACC/FEUP, Portugal**  
LIACC is recognized as one the leading Portuguese research institutes on Artificial Intelligence. I have been working in the project entitled “ArgMine: Argumentation Mining from Text” which aims to develop a system able to automatic detect, identify and structure the argumentative content from textual resources written in Portuguese.
- 04/2018–06/2018 **Visiting Researcher Ubiquitous Knowledge Processing (UKP) Lab** *Department of Computer Science, Technische Universität Darmstadt, Germany*  
Research visit partially supported by an Erasmus+ (Work) grant. During this period, I collaborated with the UKP lab on the topic of Argumentation Mining, under the supervision of Dr. Christian Stab and Prof. Iryna Gurevych.

### Academic & Research Experience

#### Research Projects

- 11/2014–09/2015 **ArgMine: Argumentation Mining from Text**, ARTIFICIAL INTELLIGENCE AND COMPUTER SCIENCE LABORATORY (LIACC/FEUP) & SAPO LABS, Porto, Portugal, .
- 07/2017–Current **ARGH: Argumentation Hub**, UNIVERSITY OF PORTO MEDIA INNOVATION LABS, Porto, Portugal.
- 05/2018–10/2019 **IA.SAE: Artificial Intelligence in Economic and Food Safety**, *National Digital Skills Initiatives (INCoDe.2030)*, LIACC/FEUP, PORTUGUESE ECONOMIC AND FOOD SAFETY AUTHORITY (ASAE), .
- 10/2018–09/2021 **DARGMINTS: Discourse Analysis and Argumentation Mining from Text Sources**, *FCT POCI-01-0145-FEDER-031460*, LIACC/FEUP, FLUP, INESC-ID LISBOA, .

#### Teaching

- 03/2015–06/2015 **Supervisor of Artificial Intelligence undergraduate course**, *FACULTY OF ENGINEERING, UNIVERSITY OF PORTO, Portugal.*
- 09/2019–02/2020 **Invited Assistant Lecturer - Integrated Master in Informatics and Computing Engineering**, *DEPARTMENT OF INFORMATICS ENGINEERING (DEI), FACULTY OF ENGINEERING, UNIVERSITY OF PORTO (FEUP), Portugal.*  
Invited Assistant Lecturer on Agents and Distributed Artificial Intelligence

09/2016–**Supervision of MSc Students**, DEPARTMENT OF INFORMATICS ENGINEERING (DEI), FACULTY OF ENGINEERING, UNIVERSITY OF PORTO (FEUP), Portugal.

Current Supervision of >10 students in topics related to: Artificial Intelligence, Natural Language Processing, and Machine Learning.

### Scientific Events

#### Member of Programme Committees and Reviewer:

ISMIS 2017; WI 2017; IEEE S3C 2017; NAACL 2019; ACL 2019, 2020; EMNLP 2020; AACL-IJCNLP 2020; Elsevier ESWA International Journal.

#### Member of Organization Committees:

DSIE'17 (January 31, 2017); Workshop ArgHumantation – Research and Practice(s) of Argumentation, Argumentation Hub (ARGH), Media Innovation Labs (MIL), University of Porto (May 3, 2018);

### Invited Talks

10/2017 **Challenges in Natural Language Processing: From Semantic Tasks to Argumentation Mining.** *Faculty of Letters, University of Porto, Portugal. JADIS VII / MEMITA*

06/2018 **Argumentation Mining from Text.** *Smart Data Analytics (SDA), University of Bonn, Germany.*

11/2017, **ArgMine: Argumentation Mining from Text.** *Faculty of Engineering, University of Porto, Portugal.*  
10/2018

11/2019 **Learning Text Representations.** *Faculty of Engineering, University of Porto, Portugal.*

## Selected Publications

1. Gil Rocha and Henrique Lopes Cardoso. **Towards a Relation-based Argument Extraction Model for Argumentation Mining.** 5th Int. Conf. on Statistical Language and Speech Processing, Springer. 2017.
2. Gil Rocha and Henrique Lopes Cardoso. **Recognizing Textual Entailment: Challenges in the Portuguese Language.** *Information* 2018, 9(4):76.
3. Gil Rocha, Christian Stab, Henrique Lopes Cardoso and Iryna Gurevych. **Cross-Lingual Argumentative Relation Identification: from English to Portuguese.** 5th Workshop on Argumentation Mining, EMNLP, ACL. 2018.
4. Gil Rocha and Henrique Lopes Cardoso. **A Comparative Analysis of Unsupervised Language Adaptation Methods.** 2nd Workshop on Deep Learning Approaches for Low-Resource NLP, EMNLP-IJCNLP, ACL. 2019
5. André Cruz, Gil Rocha and Henrique Lopes Cardoso. **On Document Representations for Detection of Biased News Articles.** 35th ACM/SIGAPP Symposium on Applied Computing, KLP-SAC, ACM. 2020
6. André Cruz, Gil Rocha and Henrique Lopes Cardoso. **Coreference Resolution: Toward End-to-End and Cross-Lingual Systems.** *Information.* 2020; 11(2):74

## Honors and Awards

10/2019 **EurNLP Travel grant**, EURNLP, FACEBOOK LONDON, London, UK.

09/2018 **PhD Scholarship**, FUNDAÇÃO PARA A CIÊNCIA E TECNOLOGIA (FCT), SFRH/BD/140125/2018, Portugal.

09/2018 **ProDEI PhD Scholarship**, DOCTORAL PROGRAM IN INFORMATICS ENGINEERING (PRODEI), Department of Informatics Engineering (DEI), Faculty of Engineering, University of Porto (FEUP), Portugal.

07/2017 **29th European Summer School in Logic, Language and Information (ESSLLI)**, France.

02/2016 **9th Young Researchers Meeting of the University of Porto (IJUP)**, Porto, Portugal.

07/2015 **5th Lisbon Machine Learning School (LxMLS) - Travel grant**, Lisbon, Portugal.

03/2013 **EBEC Porto (Team Design category) - First Place**, BEST PORTO, Portugal.

04/2013 **EBEC Portugal (Team Design category) - First Place**, BEST PORTUGAL, Portugal.

08/2013 **EBEC Final (Team Design category) - Second Place**, BEST WARSAW, Poland.

## Skills and Languages

General	Computer Science, Mathematics, Software Engineering, Artificial Intelligence, Multi-Agent Systems, Machine Learning, Natural Language Processing.
Programming	Java, Python, SQL, MongoDB, JADE, Prolog, scikit-learn, NumPy, SciPy, Pandas, CRFsuite, PyStruct, CRF++, TensorFlow, Keras, PyTorch
Languages	Portuguese (Native), English (Fluent), French (Fluent), Spanish (Advanced)

## Research Interests

*Machine Learning, Natural Language Processing, Argumentation Mining, Computational Semantics, Transfer Learning, Cross-Language Learning, Knowledge Representation and Reasoning, and Multi-Agent Systems.*