

# CURRICULUM VITAE of Francesco Battistoni

## Personal Information

Address: Dipartimento di Matematica, Università degli Studi di Milano, Via Saldini 50, I-20133 Milano (Italy)

Phone Number: (+39) 02 503 16188

e-mail: francesco.battistoni@unimi.it, francesco.battistoni@hotmail.com

Date and place of birth: September 30, 1992, Treviglio (Italy)

## Doctoral Position

October 2016-September 2019: Ph.D. student in Mathematics, *Università degli Studi di Milano* (Supervisor: Prof. Giuseppe Molteni)

Ph.D. Thesis: *Applications of prime densities in Number Theory and classification of number fields with bounded invariants*, defended on 28/01/2020.

## Education

Università degli Studi di Milano  
Bachelor Degree in Mathematics (105/110), 2014

Università degli Studi di Milano  
Master Degree in Mathematics (110/110 cum laude), 2016  
Subject: Dedekind Zeta functions and arithmetical equivalence: analytic and algebraic approaches  
Supervisor: Prof. Giuseppe Molteni

## Teaching Activities

September 2019-January 2020: Teaching assistant for the course *Mathematical Analysis 1*, Bachelor Degree in Industrial and Information Engineering, Politecnico di Milano.

2017/2018: Tutor for the course *Mathematical Analysis 3* for the Bachelor Degree in Mathematics, Università degli Studi di Milano.

25/09/2017-29/09/2017: Lecturer of the course *Basics Mathematics* for the Bachelor Degree in Physics,

Università degli Studi di Milano.

2016/2017: Tutor for the course *Mathematical Analysis 2* for the Bachelor Degree in Physics, Università degli Studi di Milano.

2015/2016: Tutor for the course *Algebra 1* for the Bachelor Degree in Mathematics, Università degli Studi di Milano.

## Visiting Positions

28/04/2019-31/05/2019: Institut de Mathématiques de Bordeaux (part of Ph.D. project, under the supervision of Karim Belabas and Bill Allombert)

1/05/2018-31/05/2018: Institut de Mathématiques de Bordeaux (part of Ph.D. project, under the supervision of Guillaume Ricotta and Karim Belabas)

## Seminars and Congresses Attended

20/01/2020-24/01/2020, *Atelier PARI/GP 2020*, Grenoble (France)

8/07/2019-12/07/2019, *Second Symposium on Analytic Number Theory*, Cetraro (Italy)

24/06/2019-28/06/2019, *CMI-HIMR Summer School in Computational Number Theory*, Bristol (United Kingdom)

28/05/2019, *LFANT Seminars*, Bordeaux (France), **Invited Speaker**

10-12/04/2019, *Fifth Mini Symposium of the Roman Number Theory Association*, Roma (Italy), **Contributed Talk**

14-19/01/2019, *Atelier PARI/GP 2019*, Bordeaux (France)

15-16/10/2018, *3rd Meeting in Number Theory*, Torino (Italy)

25-29/06/2018: *Hausdorff School "L-functions: Open Problems and Current Methods"*, Bonn (Germany)

3/05/2018: *LFANT Seminars*, Bordeaux (France), **Invited Speaker**

18-20/04/2018: *The fourth mini symposium of the Roman Number Theory Association*, Roma (Italy)

16-17/04/2018: *Atelier PARI/GP 2018b*, Roma (Italy)

18-19/12/2017: *INDAM Days in Number Theory*, Genova (Italy), **Invited Speaker**

26-27/10/2017: *2nd Number Theory Meeting*, Torino (Italy), **Invited Speaker**

04-08/09/2017: *Number Theory Week 2017*, Poznan (Poland)

03-08/07/2017: *Journées Arithmétiques 2017*, Caen (France)

23/03/2017: *1st Ph.D. Students in Number Theory Day*, Parma (Italy)

04/11/2016: *1st Number Theory Meeting*, Torino (Italy)

31/08/2015-04/09/2015: *Summer School on Perfectoid Spaces*, Brixen (Italy)

## Preprints

[BatPre2], *A conjectural improvement for inequalities related to regulators of number fields*, ArXiv, <https://arxiv.org/pdf/1912.08512.pdf>

[BatPre1], *On small discriminants of number fields of degree 8 and 9*, ArXiv, <https://arxiv.org/pdf/1910.07208.pdf>

## Publications

[Bat3] F. Battistoni, *On Locally GCD Equivalent Number Fields*, Graduate Journal of Mathematics, Volume 5, Issue 1 (2020), pp. 28-37, online version available at <https://www.gradmath.org/issue/issue1-2020/>

[Bat2] F. Battistoni, *Discriminants of number fields and surjectivity of trace homomorphism on rings of integers*, accepted for publication on Rendiconti del Seminario Matematico di Torino (2019)

[Bat1] F. Battistoni, *The minimum discriminant of number fields of degree 8 and signature (2,3)*, Journal of Number Theory, Volume 198, May 2019, pp. 386-395, DOI : 10.1016/j.jnt.2018.09.007