







# Carlo Sulzbach Sartori

Junior researcher

-  August 2<sup>nd</sup>, 1994
-  Brazilian
-  <https://cssartori.github.io>
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## Languages

-  Portuguese
-  English (iBT:113, 2018)
-  French
-  Dutch

## Skills

### Programming languages:

- C, C++
- Java, Python
- R
- Javascript




### Computer environments:

- Linux (Ubuntu), Bash/shell, Emacs, CMake, Git,  $\LaTeX$

### Optimization:

- Gurobi, CPLEX, GLPK, irace
- Metaheuristics, Integer Programming, Branch and bound, Dynamic Programming, Greedy Algorithms, Constraint Satisfaction

## Achievements

-  Best paper award at ALGO/ATMOS 21
-  Best M.Sc. thesis on Operations Research in Brazil (SBPO, 2020)
-  Nominated for best B.Sc. project on Operations Research in Brazil (5 finalists at SBPO, 2017)

## Working Experience

- 2019 – now **Junior researcher** KU Leuven, Belgium  
Working at the Combinatorial Optimisation and Decision Support (CODES) group at KU Leuven. Research focus includes vehicle routing, driver scheduling and workload balancing with complex side constraints.
- 2019 – 2019 **Operations research consultant** uMov.me Tecnologia, Brazil  
Developed a vehicle routing package for uMov.me and provided assistance to embed the tool within their software platform.
- 2018 – 2019 **Temporary lecturer** UFRGS, Brazil  
I taught algorithms and C programming courses for engineering students. My classes were well rated by the students, achieving averages of 4.8 (2018) and 4.9 (2019) out of 5.
- 2017 – 2019 **Junior researcher** UFRGS, Brazil  
Worked at the Algorithms and Optimization group at UFRGS. My focus was on developing efficient metaheuristics for vehicle routing problems with time windows and other constraints.
- 2014 – 2016 **Research and teaching assistant** UFRGS, Brazil  
As an undergraduate student, I assisted postgraduate researchers in developing efficient (meta)heuristic algorithms for optimization problems including nurse rostering and vehicle routing. Additionally, I assisted professors during weekly laboratory classes for both Combinatorial Optimization and Data Structure courses.

## Education

- 2019 – now **Ph.D. in Engineering Technology** KU Leuven, Belgium  
**Topic:** Vehicle Routing and Driver Scheduling  
**Supervisors:** Prof. Dr. Greet Vanden Berghe and Dr. Pieter Smet  
**Publications:** One journal paper (international); two conference papers (international).
- 2017 – 2019 **M.Sc. in Computer Science** UFRGS, Brazil  
**Title:** The pickup and delivery problem with time windows: algorithms, instances, and solutions  
**Supervisor:** Prof. Dr. Luciana S. Buriol  
**Publications:** Two journal papers (international and national); one conference paper (international).
- 2012 – 2016 **B.Sc. in Computer Science** UFRGS, Brazil  
**Title:** Optimizing solutions for the pickup and delivery problem  
**Supervisors:** Prof. Dr. Luciana S. Buriol and Dr. Marcelo W. Friske  
**Publication:** One conference paper (national).

## References

Under request.