Interview Process @ Bolt

During our interviewing process, we will be continuously trying to understand and assess your skills and growth potential in the key areas highlighted below via a unified interview process.

Data scientists in Bolt face a diverse and complex set of challenges in their day-to-day work. In order to be successful, you'll have to:

- Collaborate closely with the product and business stakeholders to identify the areas where data science can help
- Work on designing, prototyping, and testing solutions, documenting potential approaches and trade-offs
- Implement and scale real-life solutions on the data platforms that our data engineers have been building
- Collaborate with back-end engineers to integrate the data science solutions with the app logic

What does a unified interview process mean?

- Every candidate (regardless of your seniority level) goes through the same interview stages and process;
- At each interview stage, we are continuously evaluating your seniority level according to our team's expectations and requirements;
- Simultaneously, while **taking into consideration your experience, interests,** and **background**, the team would try to find the most suitable product team and challenge you to work on.

The interviewing process usually consists of these interview stages:

1. Experience Validation Interview

In this round, you will get to hear more about Data Science in Bolt. Our interviewer will tell you about our projects, teams, tech stack, a general sharing of our product lines, and how data science supports the growth of each product.

During this call we would dive into your past experience, with a focus on the technical

projects where you have contributed the most. In this experience validation interview, we would also try to identify the data science domains within Bolt that might align best with your experience, skill set, and personal growth plan.

This call will take up to 30 mins.

2. Home Task

The home-task consists of a problem that is similar to our day-to-day work. We will share the task description and a synthetic dataset with you and the task description. The goal is for you to submit a rendered notebook as your solution. We will evaluate:

- The quality of your exploratory data analysis
- The coherence and structure of your ideas and code
- Your modeling approach, training, and validation methodology
- The applicability of your modeling technique to the real-life task you are trying to solve
- Your take on how the impact of the model should be evaluated in real-world interactions with our user base

Please be aware that home task email may appear in junk or spam folders.

You will have 1 week to submit the home task solution.

3. Technical Interview

We will cover a few technical topics that are directly relevant to our work as data scientists in Bolt. Thinking out loud and asking clarifying questions are strongly encouraged. If some concepts are new to you, or if you feel stuck at any point, feel free to ask for hints or extra explanations; the interviewers will assess how you are adapting to new areas.

This interview will consist of a set of questions in these areas:

Programming

- Generic software engineering concepts (e.g basic Git, coding practices, usage and optimization of Python data APIs such as Pandas)
- o Algorithms (e.g sorting, searching) and data structures (e.g trees, maps)

SQL (query understanding, query design)

Machine learning and optimization

- Modelling techniques (e.g linear/logistic regression, gradient boosted trees, neural nets)
- Generic machine learning methodology (e.g training and testing models, metrics, machine learning explainability, implementing and scaling real-life models)
- Basic optimization methods (e.g gradient-based methods, mixed integer linear programming)

Probability and statistics

- Distributions and probabilities of discrete/continuous events (e.g Bernoulli, Gaussian, Laplace, Poisson)
- Basic probabilistic calculus (e.g conditional probabilities, Bayes rule, computing expectations)
- o Basic statistics (e.g statistical tests, experimentation, causal inference)

This interview will take up to 60 mins.

4. Product Interview

In this interview, you will be presented with an open-ended product case study. It will be held in an open-ended discussion format, which is similar to a typical brainstorming session that happens within our data science team. The interview will include understanding the problem at hand, proposing a data-driven solution, describing its system design, and discussing how your approach could be tested. We expect successful candidates to be able to contribute proactively to the discussion.

An example of a problem you may face is the following:

In the Rentals Business, we are deploying scooters in the cities where we operate in the mornings and collect them at night for maintenance and recharging. During the day, our clients can unlock the available, functional scooters with the Bolt app, ride to their destination, and then park them in designated areas.

So far, we have been using manual work based on the local knowledge to understand where and how many scooters to deploy. We would like to take a more structured approach and generate the morning deployment configurations algorithmically.

A successful candidate should be able to bring up the important aspects of the presented case study. Some examples of possible case-study topics:

- The business metrics to optimize through the deployment configuration
 The important variables that can affect these business metrics / our scooter marketplace
- A data-driven approach to generate the deployment configuration of our scooters
- Testing / validating the data-driven approach
- Design of the underlying ML / data-driven system to produce the deployment configuration
- Rolling out the approach, monitoring it, and planning potential improvements
- Generally, a successful candidate will be able to:
- Identify and understand the main problem to be solved (why is it important to us, what are the main metrics to track and improve, etc)
- Propose a data-driven solution and ways to evaluate it
- Identify potential caveats and trade-offs that their solution entails Ask
 relevant questions to clarify the scope of the problem and have open
 discussions with the interviewers, same as what happens in the daily work at
 Bolt
- Think and express ideas in a structured, coherent manner
- Break down the big problem into smaller pieces
- Work on top of realistic assumptions: be explicit about why adding certain assumptions to the problem at hand would help and how to make sure that those are realistic
- Describe the system design that their proposed solution would entail OPTIONAL

This interview will take up to 60 mins.

5. Final Interview

Congratulations, you've made it till the very last round!

This is a Final Interview with your Direct Manager and the Head of Data Science.

The goal of this interview is to:

- For you to meet and get to know your soon to be manager
- For you to understand what are potential project opportunities and align expectations

- For your manager to understand what drives you as a person and what could be your potential path in Bolt
- Answer any questions you might have from the interviews or about the job or data science at Bolt generally
- Identify the best fit for you in data science teams
- What kind of experiences and competencies are you seeking in your professional career?

This interview will take up to 60 mins.

General Recommendations on the Interview Performance

Don't rush your answers!

Feel free to make notes or take a minute or two to think so you can provide structured, clear, and concise answers.

Ask questions!

We designed this process so that you can get acquainted with different teams and products. At the end of every call, there's usually time left for a Q&A session, so don't hesitate to interview us as well.

Be yourself!

No need to be super formal as we're curious to see what it's going to be like to work with you in the same team one day!

Frequently Asked Questions

Where's the role located? Do you provide relocation assistance?

Ideally, we'd like to see you join our HQ in Tallinn. Since our industry is very different from most other tech companies, it's much easier to pick up on all the new context when you're next to your team and peers. And our HQ is where the real magic happens, as 90% of the product team and entire C-level management are located here.

Meanwhile, we also have several hubs across Europe — in Warsaw, Bucharest, and Berlin. But the possibility of joining any of them depends on the presence of the team

representative(s) in the respective hub.

Please note that relocation assistance can only be provided to our HQ in Tallinn, Estonia. Feel free to check these <u>useful links</u> about work and life in Estonia — it is indeed a nice place to be! :)

What's the salary range for this role?

The salary range depends on seniority and is assessed during the interview process. So, we can't provide a specific salary range at this point. If you'd like to share an estimate of your expectations, we can check if we're able to meet them before we begin the process!

Is it possible to work remotely?

We are not a remote-first company, but once you join and relocate closer to one of our hubs, you'll choose your preferred working format (remote from home, when needed, hybrid or five days from the office). It will also be possible to travel and work from different locations from time to time.

How long will the process take?

On average, it takes approximately a month from the moment of application to receiving an offer. We provide 7 days for the home task implementation, while interview stages can take 2-3 weeks.

Is it possible to choose the team I want to be a part of?

To allocate the team, we really need to see you in action. Sometimes, a candidate's level becomes clear after the home task or technical round. But there are cases when we need a product interview as well to identify the level. This is what makes it tricky to tell right away which team we can consider you for (as every team is looking for specialists of a slightly different skill-set and level)

However, we'll be glad to hear your preferences during the whole process to find a perfect match.

Now you're all set and ready to start the process that could lead you to Bolt's Data Science team.

I'm here to help you! Your recruiter, **Merily**