Software Development Engineer – Search Infrastructure

Job ID: 448488 | Amazon Japan G.K.

**DESCRIPTION**

The Amazon Search Team in Amazon Japan G.K., creates powerful, customer-focused search and advertising solutions and technologies. Whenever a customer visits an Amazon site worldwide and types in a query or browses through product categories, A9 Product Search services go to work. We design, develop, and deploy high performance, fault-tolerant distributed search systems used by millions of Amazon customers every day.  
  
Our Search Infrastructure team designs, builds, and delivers large-scale distributed systems that support traffic to one of the Internet’s premier destination sites. We continuously push the limits of scalability while maintaining superb availability and cost efficiency.  
  
We are seeking experienced, talented, energetic and self-driven individuals to join our Search Infrastructure team. Search Infrastructure comprises a set of massively scaled, highly available, distributed web services utilizing, and continually evolving, the latest technologies and techniques. These services provide the Indexing and core Search Engine technologies that power Amazon's product search capabilities.  
  
In the A9 Search Team, you’ll experience the benefits of working in a dynamic, entrepreneurial environment, while leveraging the resources of Amazon.com (AMZN), one of the world's leading Internet companies. We provide a highly customer-centric, team-oriented environment in our offices located in Palo Alto, California and Tokyo, Japan..  
  
As an Infrastructure Software Engineer, you will:  
  
· Design, develop and support a world-class product search platform deployed across tens of thousands of machines serving hundreds of billions of daily requests while simultaneously handling hundreds of millions of product updates world wide  
· Immerse yourself in providing cutting edge solutions to large scale information retrieval problems  
· Have a relentless focus on scalability, latency, performance robustness, and cost trade-offs -- especially those present in highly virtualized, elastic, cloud-based environments  
· Apply scientific analysis and mathematical modeling techniques to predict, measure and evaluate the consequences of designs and the ongoing success of our platform  
· Alongside a dedicated operations team, develop and support, the smooth 24x7 operation of our world-wide service  
You are going to love this job because you will:  
· Join a great group of motivated, top-notch, people and work with them to solve interesting and useful problems in a fun, collaborative environment  
· Directly participate in setting a vision and objectives for your team's work in alignment with business and market needs  
· See the fruits of your efforts used by hundreds of millions of users within weeks  
· Have access to the vast technical tools and resources of Amazon.com

**BASIC QUALIFICATIONS**

· Bachelors Degree in Computer Engineering, Computer Science or equivalent professional experience  
· 2+ years of practical experience with fundamental algorithms, system design, and distributed systems  
· 5+ years of development experience with C/C++, Python and Perl  
· A continuous drive to explore, improve, enhance, automate and optimize distributed systems and tools  
· Ability to travel to other Amazon offices  
· Ability to work in global environment  
· Fluency in spoken and written English

**PREFERRED QUALIFICATIONS**

· Masters Degree in Computer Engineering or Computer Science  
· An ability and desire to pursue design work well-grounded in information retrieval theory and seminal principles of multi-threaded/multi-process, distributed system design  
· Conversational Japanese language ability