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| POSITION TITLE | IDP databases Web Developer |
| GENERAL INFORMATION | Date of publication: 08/11/2023 Application deadline: 10/12/2023 Location: Padova, Italy Contact: biocomp-mgmt@bio.unipd.it |
| OVERVIEW | We are seeking a Web Developer to join our team and contribute to the development of our databases in the field of <i>intrinsically disordered proteins</i> (IDPs), MobiDB, DisProt and PED web applications (https://mobidb.org/ , https://disprot.org , https://proteinsenemble.org/). The ideal candidate should have a background in JavaScript and Linux systems, with additional knowledge of the Angular and Node.js frameworks being a plus. As a Web Developer, you will be responsible for designing, implementing, and maintaining both the front-end and back-end components of the MobiDB, DisProt and PED web apps, ensuring their functionality, performance, and usability. |
| RESPONSIBILITIES | <ul style="list-style-type: none"> • Collaborate with cross-functional teams, including other developers, to understand project requirements and translate them into technical specifications. • Develop responsive and user-friendly front-end components using JavaScript, HTML, and CSS, adhering to best practices and coding standards. • Implement interactive features and functionality, such as form validation, dynamic content loading, and real-time data updates. • Optimize the performance of the web application by identifying and resolving bottlenecks, improving load times, and minimizing resource consumption. • Conduct thorough testing of web app components to ensure compatibility, functionality, and responsiveness across different browsers and devices. • Troubleshoot and debug issues, promptly addressing reported bugs and implementing effective solutions. • Stay up-to-date with emerging web development trends, technologies, and best practices, applying them to enhance the MobiDB, DisProt and PED web apps. |
| QUALIFICATIONS | <ul style="list-style-type: none"> • Proficiency in JavaScript, with a solid understanding of its core principles and concepts. • Proficiency in Linux systems, including command-line operations, server configuration, and basic system administration. • Experience working with the Angular framework is highly desirable, demonstrating the ability to build complex, modular, and scalable web applications. • Solid understanding of web technologies, including HTML5, CSS3, and responsive design principles. • Familiarity with version control systems like Git for collaborative development. |

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| | <ul style="list-style-type: none"> ● Experience with RESTful APIs and asynchronous request handling is highly desirable. ● Good knowledge of browser rendering behavior and performance optimization techniques. ● Excellent problem-solving and analytical skills, with the ability to debug and resolve complex issues. ● Strong attention to detail and a commitment to delivering high-quality, maintainable code. ● Effective communication and teamwork skills, with the ability to collaborate with individuals at various levels of technical expertise. |
| EDUCATION AND EXPERIENCE | <ul style="list-style-type: none"> ● Bachelor's and/or Master's degree in Computer Science, Software Engineering, or a related field (or equivalent work experience). ● Experience as a Web Developer, with a focus on front-end development, and/or JavaScript and Linux proficiency is highly desirable. ● Certifications or additional training in web development, JavaScript frameworks, or Linux systems will be considered advantageous. |
| CONTEXT | <p>The BioComputing UP Laboratory, led by Prof. Silvio Tosatto, is a vibrant and multidisciplinary group comprising around thirty talented individuals. Our team focuses on various aspects of protein structure and function prediction, utilizing techniques that bridge the fields of biology, medicine, chemistry, physics, and computer science. Our primary goal is to develop innovative methods and apply them to address biologically significant problems.</p> <p>We are proud to be supported by prestigious funding bodies, including the Italian Association for Cancer Research (AIRC) and the European infrastructure for bioinformatics (ELIXIR). Furthermore, we have taken the lead in coordinating two Marie Curie RISE consortia: IDPfun and REFRACT as well as a COST Action ML4NGP.</p> <p>At our lab, we leverage cutting-edge technologies to implement web applications that provide access to our software and databases. We have a dedicated team of senior software developers and a skilled systems administrator who ensure the smooth functioning of these applications. Additionally, we possess our own High-Performance Computing (HPC) cluster and enjoy unlimited access to external resources, further enhancing our research capabilities.</p> <p>Joining our lab means becoming part of a dynamic and collaborative environment, where you will have the opportunity to contribute to groundbreaking research at the intersection of multiple disciplines. You will work alongside accomplished professionals and gain exposure to state-of-the-art technologies, enabling you to thrive and make a significant impact in the field of bioinformatics.</p> |
| DURATION AND POSITION | <p>The duration of the job is initially set for one year, with the possibility of extension and/or pursuing a PhD. The extension will depend on various factors, including the candidate's performance and the progress of the MobiDB, DisProt and PED projects. Funding is available.</p> <p>The specific position offered will be tailored to the candidate's academic</p> |

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| | <p>background and expertise. There are two potential roles:</p> <ul style="list-style-type: none"> • Postgraduate / PhD candidate: Candidates with a relevant academic background will be hired as postgraduate junior researchers. As a researcher, you will actively contribute to the development and advancement of the MobiDB, DisProt and PED web applications. Your responsibilities will include designing and implementing front-end components, integrating with the backend, optimizing performance, and ensuring the functionality and usability of the application. Interested candidates can enroll in the <i>Brain Mind and Computer Science</i> (BMCS) PhD program at the University of Padua. • Researcher (PostDoc): Candidates with a strong academic background and significant research experience, particularly in web development and the relevant technologies used in the MobiDB, DisProt and PED projects, may be considered for the position of a young researcher (PostDoc). As an experienced researcher, you will play a lead role in the MobiDB, DisProt and PED projects, overseeing its development, coordinating with team members, and providing technical expertise. Additionally, you will have the opportunity to contribute to other research projects within the BioComputing UP Laboratory. <p>The final determination of the position will be based on a comprehensive evaluation of the candidate's qualifications, experience, and alignment with the objectives of the MobiDB, DisProt and PED projects. This includes assessing their proficiency in JavaScript, Linux systems, and preferably the Angular framework.</p> <p>Please note that the specific terms and conditions regarding the duration, extension, and position will be communicated during the selection and negotiation process with the successful candidate, with a focus on their contribution to the MobiDB, DisProt and PED projects.</p> |
| <p>HOW TO APPLY</p> | <p>Send your CV - motivation letter - brief description of your research background as well as the names of two (or more) references to: biocomp-mgmt@bio.unipd.it.</p> |