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# Juan David Aristizábal Cardona

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### **Profile**

Junior RoR developer willing to contribute to the creation of solutions that address unmet needs, supported by background in chemical process engineering and web technologies.

# **Education**

Make It Real <sup>1</sup>, online
Full stack RoR development bootcamp

Universidad de Antioquia, Medellín - Colombia
Project Management Postgraduate Diploma

2012-2013

Universidad EAFIT², Medellín-Colombia

2007 - 2012

Process Engineering Bachelor's Degree, specialization in chemical process design

# Languages

English - Academic IELTS (27 April 2013)

Overall Listening Reading Writing Speaking 7.0 7.5 7.0 7.0 7.0

Portuguese – Instituto de Língua Portuguesa Mandarin – Confucius Institute Jan 2014 - Dec 2014 Jan 2015 – Dec 2015

# **Work Experience**

Junior full stack RoR developer, part time Quincename 2016

https://www.quincena.me/

Support the evolution of the platform - devoted to payroll management for SMEs - using RoR, git, JS, Jquery, Bootstrap, CSS and HTML.

44 pull requests dealing with front end and back end issues like main and accountants landing pages layout reordering and creation, adding notifications to modals, tracking registries through Google Apps Script and adding migrations, JS script to calculate legal digits as user enters information, recommend rounding key payroll values for consistency purposes throughout the app and excel downloadable files, make some views responsive, create view to show companies historic for paid novelties, implement single employee mailing...

Process Engineer 2013 - 2015

Sirexa

Medellín - Colombia

www.sirexa.com

Conducted several market researches to identify leading raw materials manufacturers around the world in the fields of paints, coatings and plastics and also contacted a lot of them to begin collaborative relationships, a situation where I furthered and practiced my business writing skills.

Encouraged Colombian producers of paints and coatings to test raw materials produced by foreign suppliers in order to introduce those products in the local market. In this role I gained a deep understanding of clients motivations.

Acquired expertise using international commercial terms by preparing request of quotations as well as insights and a broad knowledge of titanium dioxide and nitrocellulose production by analyzing those productive processes, interpreting product specifications and material safe data sheets.

Participated in trade shows like Abrafati in São Paulo-Brazil to foster new ties with suppliers and clients.

<sup>&</sup>lt;sup>1</sup> RoR / Junior full-stack developer / Make it Real

<sup>&</sup>lt;sup>2</sup> Process Engineering / Bachelor´s Degree / Universidad EAFIT

2011-2012

## Project Analyst - Intern

Compañía Nacional de Chocolates - Grupo Nutresa Rionegro - Colombia www.chocolates.com.co

Evaluated strategic projects financially and technically - to enable overall costs savings for up to USD 1,15 MM and increase productivity in several productive lines - which were approved by the presidency committee to start the global USD 2,8 MM investment phase. These projects allowed me to develop a forward thinking and enhance my financial data analysis skills by generating financial statements as well as project indicators such as net present value, return on investment and payback period and providing analysis based on these measurements.

Reported the advance of eight ongoing projects to both the Engineering Director and the Manufacture Process Leader, which helped me improve abilities to prepare and give presentations in a concise and effective way.

Chosen by the Engineering Director to instruct the entering interns in project formulation and evaluation. It was a great experience as I had the opportunity to convey the knowledge gained through first-hand contact with project engineering.

Successfully planned and executed a project to replace a bucket elevator in one of the most important productive lines in the Company. It was a USD 15,000 project undertaken within the budget, which accurately met the quality and occupational requirements and also demanded me to further negotiation skills and communicate at all levels within the organization.

Redesigned the procedures to use machines stored in hangars and updated all their technical data, which enabled the Company to successfully pass an auditory conducted by the Colombian Tax and Customs Authority. In this task I broadened my ability to think critically and solved problems which emerged in planning and schedule delay by reallocating human resources and using fast-tracking.

# **Side Projects**

#### 2013

Developed a feasibility study oriented to improve the performance of the productive process for a manufacturer of liquid biodegradable detergents. In the feasibility study, we conducted studies related to technical issues, financial evaluation, risk management, market research, environmental impact and legal aspects.

### Currently

Co-founder at Sirexa, where currently I am developing a strategic study to leverage its business model and looking for new partnerships in order to support the raise of a bio-based economy.

Broadening my knowledge about agile product development.

Evaluating if it would be worthwhile to work on a couple of startup projects e.g. a project management platform for distributed teams. Saw this problem when working at a manufacturing organization and talking with local government authorities, both lacking a tool to track how well projects were advancing.

# **Bachelor's Degree Research**

### Characterization of secondary metabolites produced by Pouteria caimito in its leaves.

2011 - 2012

Presented the conclusions of the project at the annual Process Engineering fair, as well as defended the thesis in an open lecture, where my co-worker and I reported for the first time the presence of a mixture of isomeric triterpenoids, a fatty acid ester of triterpenoid along with some waxes, isolated from *Pouteria caimito* leaves collected from the Chocó forest in Colombia, a region well known for being one of the highest centers of biodiversity on earth.

### Preliminary identification of tannins compounds from the leaves of Acacia mangium.

2012

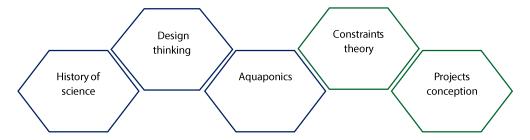
Conducted primordially scientific database research to determine the state of the art of identification techniques for tannins compounds and their occurrence in the *Acacia* genus, as well as devised a roadmap to perform some preliminary experiments and presented the procedures to the interested sponsor.

# Evaluation of the operational conditions to reduce the COD in gray water by the Photo-Fenton process. 2011

Evaluated the effect of Fe<sup>+3</sup> and  $H_2O_2$  concentration on the degradation rate of organic matter using a  $3^2$  factorial experiment design and analyzed statically the outcomes with Statgraphics Centurion. Furthermore, the best treatment was selected and a kinetic behavior was reported for 3 hours of reaction achieving a 69% of organic matter degradation.

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# **Interests**



# Some tools

STATGRAPHICS Analyzed statically the results from sets of experiments to determine

significance of variables and identify optimal conditions of processes.

MS PROJECT Planned projects while working at Compañía Nacional de Chocolates and

scheduled activities for feasibility studies.

MS VISIO Designed PFD and P&ID of chemical processes based on the ISO 10628

and ISA-S5-1 standards.

MATLAB Programmed codes to solve mathematical algorithms in the fields of

thermodynamics.

**POLYMATH** Solved differential equations in the area of reactors design and

graphically interpreted the advances of reactions.

HYSYS Simulated chemical processes under several scenarios and interpreted the

relations among different variables.

MS EXCEL Used it to evaluate projects with financial models.

Juan David Aristizábal Cardona February 2017