# **BYRON WALL**

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Chemical Engineer with 10+ years in Process, Operations and Research. Improves processes and solves problems by designing experiments, analyzing data, and implementing change with others.

## Allison Transmission / Indianapolis, IN

## **Hydraulic and Fluid Systems Engineer**

November 2017 - Present

Responsible for all technical aspects of transmission fluid at Allison globally

- Created the TES 668 fluid specification which covers a Next Generation Transmission Fluid
- Tested and validated the initial TES 668 factory fill candidate, leading to \$10MM+ in annual savings
- Reviewing Aftermarket TES 668 fluid approvals from 10+ oil marketers to grow fluid royalty revenue
- Support Hydraulic development of a new 9 speed transmission with advanced data analysis techniques

## **TDA Research /** Denver, CO

### **Research and Project Engineer**

August 2015 – October 2017

Supported the design, construction, and operation of a  $$2MM+CO_2$$  capture pilot plant.

- Modeled 2 process skids and completed layout of 21 vessels and associated piping with SolidWorks.
- Specified and purchased components including vessels, relief valves, heat exchangers, and pipe fittings.
- Managed the 6 month off-site construction with TDA technicians and outside insulators and electricians.
- Programmed the data pipeline to support remote operation and provide automated analysis and charting.
- Built an automated quoting tool using Excel/VBA, reducing engineer time from hours to minutes.
- Designed, specified, and overseeing fabrication of a \$1.5MM natural gas desulfurization unit.

## **Continental Technologies /** Boulder, CO

**Process Engineer** 

November 2014 – July 2015

Supported design of a refinery pilot plant for an industrial client.

• Simulated client refinery processes with VMGSim, creating stream summaries and process diagrams.

## **Chevron Phillips Chemical Company /** Pasadena, TX

#### **Operations Engineer**

July 2012 – July 2014

Supported day-to-day operations of a 2 MMlb/day polyethylene unit.

- Completed troubleshooting for process and equipment issues, solving several long-standing problems.
- Directed shift supervisors and union operators, ensuring unit operated at target conditions.
- Communicated daily with the production scheduler, aligning Operations to customer needs.
- Managed 20+ small projects through the MOC process, upgrading equipment and documentation.
- Built SPC charts and action plans for 30+ resins, identifying and correcting product quality issues.

## **Operations Maintenance Coordinator**

March 2012 – June 2012

Coordinated the decommissioning of the polypropylene units for demolition.

Managed the air gapping and blinding of 60+ lines, minimizing the impact on other units.

#### **Operations Engineer**

August 2011 - February 2012

Supported day-to-day operations of a 900 Mlb/day polypropylene unit.

• Developed shutdown plan, preparing unit for decommissioning without an environmental event.

#### **Process Engineer**

June 2010 - July 2011

Supported the polypropylene and K-Resin units from the Process Support Group.

#### **ConocoPhillips /** Terre Haute, IN

May 2009 – July 2009

**Process Engineering Intern** 

## Purdue University / West Lafayette, IN

Bachelor of Science in Chemical Engineering (GPA: 3.97/4.00)

August 2006 - May 2010

Statistics, Data Analysis, Excel and VBA, PI / Process Book

Access, Aspen Plus, Microsoft Project, PowerPoint, SAP, SolidWorks, VMGSim, Word

ASME Spreadsheet Power, Aspen Plus Process Modeling, Project Development and Execution, Root Cause Analysis (Why-Tree), Solids Handling, Distillation Technology

**Certification** | Engineer Intern (EI, EIT), State of Indiana (#ET31011772)