# ISAAC P. LYAUTEY

# **OBJECTIVE**

A technical engineering position starting in or after April 2021.

#### WORK EXPERIENCE

Period	January 2019 — August 2019	Period	January 2020 — August 2020
Employer	Quest Global	Employer	Howmet Aerospace
Location	Windsor Locks, Connecticut	Location	Niles, Ohio
Job Title	Industrial Engineer	Job Title	Process Engineer

# • Labor Variance & Capacity

Collected the production demand, clock hours and part routings to map predicted vs actual labor times across all operations in all cells. Data was collected and compiled into a SQL database and through various manipulations produced a view for PowerBi interaction.

#### · Part Tracking

Identified cells in which improved part tracking could be implemented. Then implemented an automated framework for part tracking and progression using SQL, C# and VB.NET.

#### Rate Board

Rate Board interface displayed the priority for specific part numbers, stage in the process, and how long in WIP. This was implemented with a scanner & touchscreen interface.

## Playbook & Task Scheduling

Facilitated factory-wide events to analyze the production-pacing process and find ways to improve productivity. Improvements included ergonomic adjustments, improved fixtures, layout adjustments and per-shift scheduling.

# • In Process Checks

Grind process featured high dimensional variability causing out of tolerance conditions. Created and implemented Standard Work Procedure in previously uncontrolled process to reduce said variability.

#### · Operator Training

Replaced in-process engineering checks with SWP defining expectations of the process, common defect scenarios and defined escalation paths when tolerance is endangered.

# • Automated Engineering Diagrams

Reduce engineering overhead by automating drawing creation which was originally done with drawing PowerPoint. A C# & WPF tool was created which drew saw cutting diagrams using user input dimensions. The charts were then output to PowerPoint/.PDF files for printing.

## Automated Inspection Data Collection

Work with dimensional inspection operators to create a streamlined data entry interface which reduced input error and increased readability over the old system both on the operator's end and engineering's. This app incorporated WPF, EF, and Share-Point.

Period August 2015 — October 2018
Employer Delmonico's Italian Steakhouse

Rochester, New York

## Notable Projects

Inclusivity

RETRACTABLE GAME NET

- Design a production ready handicapped assistive device in a structured team environment.
- Interface with customer for use cases, design requirements and necessary standards to adhere to.
- Rapid prototyping of CAD models through use of 3D printed plastics entailing unique dimensional tolerancing.

## EDUCATION

Period	August 2018 — Present		Gra	Graduation March 2021		
Degree	Bachelor of Science in Mechanical Engineering		GPA	GPA <b>3.14</b>		
School	Rochester Institute of Technology		Roc	Rochester, New York		
Classes	Fluid Mechanics I\II	Classical Control	;	Senior Design	Thermo	dynamics
	Heat Transfer I	Mechanical Design & Prototy	oing	Engineering Applica	tions Design Lab	Excel
	Material Science	Mechanics of Materials	Statics	Dynamics	Probability & Stat	istics I\II
Period	August 2015 — May 2018		GPA	GPA <b>3.25</b>		
Degree	Associates in Engineering Science		Scho	School Monroe Community College		

## SKILLS

Prototyping	3D Printing, CNC Programming, Ar-	Manufacturing	Ultrasonic Non-Distructive Testing, Di-
	duino Microcontroller, RPi, Water Jet,	_	mensional Inspection, Grinding, Lathe,
	Welding, Soldering		Mill, Paint Application
Tools	Excel, Matlab, PowerBi, SAP, SharePoint	CAD	Solidworks, AutoCAD, PTC Creo, On-
			shape
Computer Languages	C#, VB/A, Python, SQL, Java	Other	Linux, Git