Seeking a challenging engineering position that utilizes my technical experience, strong communication and organization skills to learn and make a positive contribution to the organization.

**Education**

## Western Michigan University- Kalamazoo, MI

## Bachelor of Science in Engineering, GPA: 3.31, 04/2013

*Major: Aeronautical/ Mechanical Engineering (ABET Accredited) Minor: Mathematics*

*Senior Project Team Leader:*

* **Leadership**- Lead a team of three engineering students in the study of hydrogels and ferrogels for drug targeting applications. Made the project decisions and solved problems throughout the project.
* **Time Management**- Set up project goals and schedule. Arranged team meetings to discuss progress and execution of project plan within the allocated time.
* **Task Management**- Set project priorities and allocated tasks to each member of my team on the basis of their strengths.
* **Cost Management**- Analyzed the cost that will be accrued by the project.

**Relevant Courses:**

Mechanical and Aerospace Engineering Sciences: Statics, Dynamics, Fluid Mechanics, Machine Design, Thermodynamics and Heat Transfer, Mechanism Analysis, Control Systems, Aircraft Structure, Aircraft Design.

**Work Experience**

**Simulation Engineer-Tooling and Die Engineering,** 04/2017-Current

*Tesla (Grand Rapids, MI)*

* Designing dies used for class A surfaces and closures using Catia V5.
* Performing simulations on Tesla automotive parts and battery parts to check for manufacturing issues using AutoForm R7.
* Leading material testing studies to determine material cards accuracy, as well as to accurately predict tryout results from CAE Simulations.
* Leading continuous improvement projects such as material and springback studies.

**Simulation Engineer-New Product Development,** 02/2015-03/2017

*G-TEKT North America Corporation (Dublin, OH).*

* Designing and modeling dies to manufacture Honda automotive stamping parts using CATIA.
* Performing simulations to check for formability of automotive parts using JSTAMP/NV and working closely with the Guest Engineers to ensure customer satisfaction on Honda models.
* Leading meetings between Guest and Simulation Engineering Departments and participating in Quality Circle to streamline inter-department communication.
* Performing crash analyses for Honda MDX 2018 to establish countermeasures to increase vehicle safety-Side Impact, Frontal crash, Pole crash and roof crush using ANSA and META.
* Performing drop analysis to ensure Honda parts quality during manufacturing stacking.

**CAD Technician (contractor),** **Document Control Department,**2/2014 to 2/2015

*Stryker Instrument (Kalamazoo, MI).*

* Preparing detailed drawings and layouts of Medical instruments, such as power tools using Pro-E.
* Blueprint Reading and Geometric Dimensioning and Tolerancing (GD&T).
* Performing product lifecycle management, using Windchill, and updating and revising models and drawings.
* Transforming Attribute Charts (AC) to Electronic Attribute Charts (EAC) using Infinity QS.

**Research Assistant, Mechanical / Aerospace Engineering Department,** 6/2012 to 8/2013

*Western Michigan University (Kalamazoo, MI).*

* Designed and simulated hydrogels to study the factors affecting it such as pH, pKa, Young’s Modulus, fixed charges. Performed FEA using COMSOL Multiphysics.
* Learned fabrication of hydrogel and ferrogels in the clean room laboratory.

**Technical Skills**

**Programs:** AutoForm R7; CATIA V5; JSTAMP/NV; Forming Suite; Ansa; HyperWorks; Pro-E/ Creo; PTC PDMLink Windchill; Citrix Receiver; Infinity QS; labVIEW ; COMSOL; SolidWorks; MATLAB; AutoCAD; Abaqus; Microsoft Office Suite; Windows 98/2000/ME/XP/Vista/7; LaTex; TinyCAD; Plex.

**Honors, Clubs, Publications and volunteer**

**Honors:** WMU Diether Haenicke Scholarship, 2010-Graduation; WMU Dean’s list, 2011 and 2012; OVPR Undergraduate Research Excellence Award, 2012 and 2013; spring 2013 MAE Merit Scholarship, Toastmasters, Full Scholarship-Senior High school year, Best Chemistry Student- High school Junior year.

**Publications:** Numerical simulation of pH-sensitive Hydrogel response in different conditions (proceedings of COMSOL Conference Boston 2012, Boston Massachusetts-October 3-5, 2012) by Brian O. Asimba, Andrew K. Shigoli, Kamlesh J. Suthar, Muralidhar K. Ghantasala and Derrick. C. Mancini.

**Volunteer:** Meals on wheels-Assisting elderly people to have a meal.

**Languages:** English, Luo, Swahili.

**Hobbies:** Soccer, reading, investing.

**Portfolio:** www.brianasimba.com