resume\_3@gmail.com  
(438).752.1860

LTS Software Engineer Computational Lithography - IBM Corporation  
Bolton VT - Email me on Indeed: indeed.com/r/Albert-Nemethy/a21b1e4ebf733793  
In 1981 started as an equipment technician responsible for maintaining IBM's proprietary device test systems took an instant liking to developing tester applications written in basic. I a steady and productive climb into equipment engineering developing many software systems and applications along the way. From 87C52 device microcode for high speed servo applications to multi-process multi-threaded desktop graphical applications I have to hone my skills building industrial strength software for the global market. My most recent project involved developing blob analysis applications for wafer map processes using MS Visual C#. I continue to development my own products maintaining my software skills using the latest leading edge technology.  
WORK EXPERIENCE  
LTS Software Engineer Computational Lithography  
IBM Corporation - September 2011 to Present  
Re-engineering of unit test processes that guarentee functionality of all Perl based applications used for IBM's Computational Lithography Processes. The goal of this work is to automatically generate test files which will verify that all applications are coded to their functional specifications.  
Contractor for IBM. Software Engineer  
CTG INC - September 2010 to Present  
Computational Lithography  
Developer of Perl based applications that preprocess mask data for IBM's Computational Lithography Processes. These applications incorporate the use of Mentor Graphics - Calibre - products to provide Optical Proximity Correction for IBM's 200 - 300mm wafer fab mask operations.  
Customer Engineer  
APPLIED MATERIALS INC - February 2007 to March 2010  
Developed C# based application to graphically analyze wafer maps in an attempt to isolate hotspots on 300 mm wafers which would allow repositioning for optimum process operation. These programs used blob analysis to identify key areas of the wafer that indicated xy corrections direction and theta rotation.  
Materials Coordinator  
NSTAR GLOBAL SERVICES - April 2004 to February 2007  
Materials coordinator. Handled spare parts for Applied Materials operations in Fishkill NY  
Software Engineer  
IBM Corporation - Burlington VT - May 1997 to September 2003  
Developed a real time multithreaded Java based SAS command processor for wafer final test use. Using AWT I built a multi-window real time based Process scheduler that was run on an AIX platform. All code was in Java. FailData Analysis System. I Developed logic diagnostic applications for semiconductor device support at wafer final test. The purpose of one of these applications is to automatically pinpoint final test failures on all chips tested. The AIX/C/Motif based application FAST (Faildata Analysis SysTem) was an integral part. Version 2.x was developed using Java and swing for the GUI.  
IBM Corporation - Poughkeepsie NY - March 1981 to September 2003  
   
Software Engineer/Scientist  
IBM Corporation - Boca Raton FL - April 1992 to May 1997  
High Speed Serial Prober. Tester interfaces. Built software interfaces for measurement devices like:SMU DMM Capacitance meter etc. Developed code in C to interface a 40 inch 8 axis Anorad gantry to drive our device measurement systems. Developed diagnostic code for all systems as well.  
Board Display Program. I Developed the Board Display Program. This was a 20000 line program written in C using OS2's presentation engine which allowed the user to graphically display the part under test and manipulate it to produce alignment and height mapping points. It also allowed an off-line method of optimizing a test sequence.  
Visual Test Generator. I invented an offline OS/2 graphical application to generate a test file from the device's net list called the Visual Test Generator. This required many optimization algorithms and enabled the test engineer to graphically refine a test program for maximum optimization.  
Programming Technician  
IBM Corporation - July 1983 to June 1986  
PC Chip In Place Test Automation. Our team transformed an existing tester into a fully automatic functional chip tester. Utilizing ARTIC technology and Intel 87C51 embedded microcontrollers we developed multitasking real time software to control various pieces of the tester using C and PLM.  
CIPT Automatic Alignment. Automatic alignment of test probe to pads was accomplished using Cognex machine vision and custom application code that we developed using C. This project also required us to develop a pre Windows GUI screen management system.  
Module Assembly Tool Diagnostics. Developed maintenance diagnostic programs for automatic second generation module assembly tool. This was an Instron based servo driven compression tool that was used to compress the various pieces of a TCM together as it was being built. This was the first use of the C programming language at this site.  
Equipment Maintenance Technician  
IBM Corporation - March 1981 to July 1983  
Responsible for repair of all LT-1280 and LT-128 Test equipment.  
ANN v2.3 01202013  
EDUCATION  
Bachelor of Science in Electrical Engineering  
Kennedy Western University  
Engineering  
State University of NY  
Associates of Applied Science in Electrical Technology  
State University of NY  
LINKS http://users.gmavt.net/anemethy  
ADDITIONAL INFORMATION  
TECHNICAL SKILLS:  
Environments: MS Windows/Office AIX/Unix/Linux MSVisual C++ MSVisual C# Languages: C/C++/C# Java JavaScript Perl HTML XML Basic and Assembler Development Tools: Orcad Visual Age VC++ VC#  
Hardware: Motion control Anorad Kensington Ormac  
Measurement: Keithly HP NI Data Acquisition. IEEE Equipment Microcontrollers: Atmel 328 Arduino 80x51 family of  
System Controllers: IBM HP Industrial PCs  
Test Systems: Teradyne [...] Advantest 66xx