

Python Developer/System Analyst Python Developer/System Analyst With 14+ years Experience, Python Developer/System Analyst - General Motors. Erie, PA Dedicated technical professional having 14+ years of Informational Technology experience, committed to maintaining cutting edge technical skills and up-to-date industry knowledge. Extensive experience with multiple technologies - Python, C++, C++ with MFC, C#.NET, SAL ATG, Cygwin, IBM Rational Rose product suite, Crystal Reports, MS Direct X, OOPS and Design patterns,.Experience in Developing and testing in Python. Experience in System Level Testing of sensors, Execution and experience in DFMEA(Design Failure Mode and Effect Analysis). Good exposure to all phases of software development lifecycle. Excellent communication and problem solving skills, logical and analytical abilities and self-learning attitude. Major Key projects involved: Space Research: Space Craft Thermal Analysis, ISRO(Indian Space Research Organization) Health Care: MRI Scanner, Thoshiba Corporation, Japan Consumer Electronics: Television Monitoring System, TOM Corporation,UK Automotive: PLC Modeling tool development, Automatic Test Case Generation Tool, Test case Coverage Tool, Algorithm development for System Level Diagnostics. All these four projects for General Motors Corporation USA and General Motors Technical Center R&D India. Finance: Production Cost calculation Tool using BOM for Lakshmi Automatic Loom works Ltd(Leading Textile Machine Manufactures and Exporters) Excellent Team player and self-Starter with communication, analytical, interpersonal, and presentation skills and expertise in customer interfacing. Excellent in Team Building Activities and also given team's effective deliverables. Received 'Star of the Quarter - Valuable Contribution' award for developing the knowledge sharing platform as it improved sharing of ideas and assets between teams. Authorized to work in the US for any employer Work Experience Python Developer/System Analyst General Motors, USA (Onsite) July 2012 to Present Comprehensive Safety and Adaptive Vehicle (SuperCurise) One of the world's leading Passenger Vehicle Manufacturer involved in the development of Comprehensive Safety and Adaptive Vehicle 2 (CSAV2) which is a second generation set of active safety features for future production vehicle programs. Responsibilities: Conducting and analyzing functional and user requirements for Embedded Software dev. Analyzing development related problems, planning and

breakdown of tasks    Development of the Algorithm Behavioral Models using Matlab/ Simulink.

Developing algorithms to implement new safety features.    Developing python code to search models to do path coverage and implementation of test generation tools for different System level diagnostics (Radars, Cameras and vehicle dynamics).    Enhancement of existing models using Matlab/ Simulink from previous versions of the project    Environment: Python, Python programming, Matlab/Simulink modeling tools Test bench, Test Vehicles Python Developer/Technical Lead General Motors Technical Center - Bangalore, Karnataka May 2010 to June 2012 Automatic Test Case Generator tool Tools for Generating Test case from Simulink model and Measuring Test case coverage. Automatic Test Case Generator tool: This module will read the annotated requirement from word document and converts it into Microsoft Excel sheet. The Python and SAL has been used to generate the test cases. The GUI developed using C#.Net which will be used to select the appropriate the excel file to generate the test cases. Simulink model Test Case Coverage Tool: In project the system will read the given Matlab Simulink model and generate test cases. Simulate the model and generate coverage report automatically.    Responsibilities:    Independent contribution right from Design to Module delivery.    Environment: Python 2.6, SAL, C++, Cygwin, SAL, CPP unit, Microsoft Windows XP professional, Test bench, C#.NET, Matlab and Simulink Python Developer/Technical Lead DRI Corporation June 2009 to April 2010 DRI Vehicle Monitoring System This project will provide location information of a vehicle and the communication between vehicles to Control center using GPS based on Client server technology. All vehicle reports to the center by generate periodic signals and it will be monitored by this Monitoring System. All the monitored signals recorded into Database with complement information about Vehicle and its Operator. If the Vehicle met with any type of accident or vehicle deviate the prerecorded route then the monitors system will alarm control center. Corresponding incident report will be generated and vehicle will be identified with different color in MAP displayed in the system and took control of the system by the Control center operator.    Responsibilities:    Independent contribution right from Design to Module delivery    Environment: Python, C++ with MFC, SQL 5.0, Crystal Reports 11.0, Microsoft Windows XP professional, Oracle DB, Networking hardware's, Rhapsody Team Leader TMON Infrastructure,

UK October 2008 to May 2009 TMON Infrastructure Project This project will be responsible in the areas of capturing the audio/video broadcast from TV Tuner Card and video signals from DVD / Camcorder and storing them into database. It will also investigate distributed computing architecture. Console development will be part of the scope for this project. This project will integrate the library/component developed by algorithm project to process TV/DVD broadcast against reference clips by pattern matching or metadata comparisons. A Captured broadcast database would be used for storing the capture and processed A/V data. TMON will support up to 8 channels of broadcast data capture. Responsibilities: Leading team 3 members team. Design Leading development Team Coding Environment: Rational Rose XDE, C, C++ with MFC, Microsoft Direct X9.0, SQL 5.0, Microsoft Windows XP professional, Networking hardware, Rack Server, Television Broad cast capturing card, Oracle DB Individual Contributor General Motors Technical Center - Bangalore, Karnataka June 2007 to April 2008 PLC Modeling Tool This tool will be used for verification of the code written for Programmable Logic Controllers (PLC), called ladder logic against a set of specifications. Programmable Logic Controllers are special purpose computers designed for plant floor control. They are used for controlling assembly automation in automotive industry. The control algorithm is provided to the PLC in the form of ladder logic, which is a graphical programming language originally based on relay logic circuits. A Specification is a text file with a defined syntax, which describes the expected behavior of the ladder logic (and the underlying control algorithm). This software is to be designed as a black box tool, where user provides the ladder logic and a list of specifications and the software carries out the verification and stores the results in a systematic manner. Responsibilities: Independent contribution right from Design to Module delivery Environment: VC.NET using STL's (C#.NET and C++ with MFC), Altova, Microsoft Windows XP Professional Analyst Symbol Inc December 2006 to December 2006 Barcode Reader Device development using TWAIN Driver This is the POC project and involved in writing code to call SNAPI (Symbol Native Application Programming Interface) API's by using SNAPI.dll. This Implementation of SNAPI uses SNAPI protocol to communicate with an SNAPI device over USB. The SNAPI DLL implements USB HID communications, reader and writer threads,

SNAPI message building, and the SNAPI protocol handling needed to provide a communications link between Symbol Technologies decoders and a Windows host. Responsibilities: Analyse the requirement and prepare the Design document Environment: C++ with MFC , SNAPI Interface, Bar Code reader Sr. Software Engineer Camron Healthcare Inc September 2006 to November 2006

Code Review & DAT Project Review of C++ code developed by client as per the checklist provided by them. Unit test cases will be developed to have 100% statement coverage and a test harness to execute these test cases. DAT test cases will focus on interface testing and will use Unit Test infrastructure. OS and EVC validation per instruction given by client. Responsibilities: Lead Code Review team and Document reviews. Report to Client about the reviews. Environment: VC.NET for embedded systems, Microsoft Windows XP Sr. Software Engineer Hologic Inc April 2006 to July 2006

QDR Unicode Conversion Project The existing QDRXP modules/system does not support UNICODE. Each QDRXP module has a fixed GUI resource, UI elements are statically laid out and the string formatting, text handling and conversions are scattered out and used as and where required. This project is for the complete internationalization support requires the following in the presentation layer Textual messages such as errors, warnings, information to be displayed in the required language. Facility to enter and view data in the required language Static labels on the GUI to be displayed in the required language Responsibilities: Converting the Client source code to Unicode compellability. Configuration Management using VSS Defect fixing Environment: C++ with MFC, DICOM, Microsoft Windows XP Professional Sr. Software Engineer Toshiba - JP January 2006 to March 2006

MRI PQM IPC PQM basically deals with the management of the protocol information and is a part of Acquisition and Scan Parameter Management. Selection and management of the scan conditions for the selected patient are performed in the PQM. Various functionalities are available to edit, add, select, reorder, copy and delete scans from the sequences for a particular patient. PQM IPC does the internal handling required for these functions. Protocol Queue Manager is a part of acquisition sub system. The acquisition system can be divided into three subsections as below: Patient Information management. Acquisition and scan parameter Management. Data Acquisition management. Responsibilities: Requirements and Analysis:

Understanding the requirements of the client    Interacting with the client and clarify any queries regarding the functionality etc.    Design using JUDE tool.    Coding    Writing Unit Test Cases and Unit testing    Environment: C++ with MFC, VC++, Microsoft Windows XP Professional Programmer

Indian Space Research Organization (ISRO) - Bangalore, Karnataka November 2004 to October 2005 ISSTA (Integrated Software for Spacecraft Thermal Analysis) The ISSTA software deals with the thermal analysis of the constructed spacecraft model. It aims at helping the thermal engineers to arrive at the best spacecraft configuration model through iterations within a short span of time. Thermal analysis starts with the geometry generation-visualization, followed by mesh generation-visualization, assignment-visualization and ends with the Solver and Results Processing. Visualization takes care of providing the user a visual aspect of the status of the spacecraft configuration at any stage during the course of analysis and thereby giving a good support in building the desired model. An object-oriented approach on a client-server architecture incorporating OOAD is implemented    Responsibilities:    Requirement collection    Design using Rational Rose and Implementation based on the design(OOAD)    Technical document preparation like SRS, SND, Sequence Diagram, CRC, IMI etc.,    Coding in VC++    Code Review and bug fixing, Identifying Memory Leaks and fixing    Database Design (Includes writing Triggers wherever required) & DB Turning    Mapping code and Functionality with Design    Environment: Window 2000, VSS 6.0, VC++ 6.0, MSSQL 7, Crystal Report 8.5, Rational Rose Enterprise Edition 2002    Lakshmi Automatic Loom Works Ltd, In house project 4 Months    Programmer    Export Invoice Module

Participated in the development of the above project which is a Client / Server based system. The front end was coded in Visual Basic and the database used was Access7. The export invoices prepared based on the Dispatch advice and packing list from the factory. Here the forms are Invoice preparation form, Item master maintenance, Order maintenance form, Agreement maintenance form etc., The reports are Invoice, Invoice-packing list, Invoice-Bank etc.,    Responsibilities:    Involved in Design and Coding    Analyzing the bug report and corrective    Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server    Lakshmi Automatic Loom Works Ltd, In house project 3 Months    Programmer    Cost Calculation Module    The functional specification of the above Client /

Server based project as follows. The front end was coded in VB 6.0 and the database used was Access 7. This system pertains to the processing of cost involved in the production and fixing the final rates for the spares. The system pertains to the effective calculation of the cost involved in the production process. It is used to calculate cost that involved in Cost center, Workmen, Idle hour, M/C Break down etc., Based on the efficiency of the above it will calculate the cost involved in the production process and finalizing the cost of final product. This module takes the references of operations involved in the production from Process card issued by the planning department. The forms used in this project is Utilization form for Cost center wise, M/c break down entry, Idle Hour processing etc., The reports are Item wise cost report, Operations wise cost report, Cost center wise report, Final product cost etc., Responsibilities: Involved in Design and Coding Analyzing the bug report and corrective Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server Lakshmi Automatic Loom Works Ltd, In house project 3 Months Programmer Centralized Purchase Order System The Development of the above project which is a Client / Server based system. The front end was coded in Visual Basic 6.0 and the database used was Access 7. The purpose of this system is to prepare the purchase orders in corporate office for the three units. This system contains forms like purchase order creation, purchase order modification, Supplier maintenance form, Items maintenance form etc., The purchase order creation has been categorized into three, one is below four item order form, second is above four item purchase order form and third is enclosed list purchase order. The reports are below four purchase order, above four purchase order, enclosed list purchase order, Supplier list, Item list, Pending purchase orders etc., Responsibilities: Involved in Design and Coding Analyzing the bug report and corrective Analyzing the bug report and corrective action Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server Lakshmi Automatic Loom Works Ltd, In house project 3 Months Programmer Sales Invoicing System (Spares) Made an effort to develop the above project which is a Client / Server based system. The front end was coded in Visual Basic 6.0 and the database used was Access 7. This system pertains to the processing of spares invoices. Spares invoices are prepared based on the packing list which is provided by the dispatch department, the spares

invoices are categorized as Manufacturing, Bought out modvat, Bought Non-modvat, Miscellaneous, Cash. This module contains the forms like Preparation of Invoices, Client master maintenance, Client order maintenance, Proforma invoice preparation etc., The reports are Invoice, proforma invoice, Age wise client order list customer wise, Age wise sales analysis etc., Responsibilities: Involved in Design and Coding Analyzing the bug report and corrective Analyzing the bug report and corrective action Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server

Lakshmi Automatic Loom Works Ltd, In house project 3 Months Programmer Inventory System Participated in the development of the above project which is a Client / Server based system. The front end was coded in Visual Basic 6.0 and the database used was Access 7. The system provides the effective maintenance of stores in the factory. The system has the forms like Inward, Outward, Stock maintenance, Supplier master maintenance, Item master maintenance etc. The Inward form contains MIN preparations, Outward form contains Issue entries, Stock maintenance form used to maintains the addition of stock based on the MIN entries and it helps to maintain the CT3 stocks, ED stocks, ED nil stocks and old stocks, WIP stocks etc. The Item master maintenance form used to addition and modification or deletion of items. The Supplier master maintenance also maintains the supplier's details. In reports section preparation of DC, MIR, Age wise pending MIN's and Job order DC's, Stores ledger, Stock ledger, Scrap analysis report for Central Excise for payment of duty etc

Responsibilities: Involved in Design and Coding Analyzing the bug report and corrective Analyzing the bug report and corrective action Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server

Lakshmi Automatic Loom Works Ltd, In house project 2 Months Programmer Production Planning & Raw Material Procurement Involved in the development of the above project which is a Client / Server based system. The front end was coded in VC 6.0 and the database used was Access 7. This system pertains to the effective planning of all resources of a manufacturing company. Origin of this system is Production Planning Control Department (PPC). This system gives the planning information about Material procurement, Time required to produce final product and Operations involved in the production process. This PPC contains two modules one is Material requirement plan based on the ordered quantity and delivery date of the customer's

order. Production follow up using back scheduling process. This system contains the forms like Order maintenance form, Order scheduling form, Single Level BOM, BOM mass replace form, Job work dispatch advice form, Product process form etc., The reports are Back scheduling, Back log report, Process card, Material card, Job work advice, Alternate routing report (Work center), Suppliers list based on grading. Responsibilities: Involved in Design and Coding Analyzing the bug report and corrective Analyzing the bug report and corrective action Environment: VB 6.0, Access 7, Crystal reports 7, Windows NT 4.0 Server Education MS in Information Technologies Bharathidasan University 2002 Bachlore of Computer Science Bharathiar University 1999

Name: Janice Williams

Email: bberry@example.net

Phone: (752)619-4567