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|  | **Resume** |  |
| **Darshan D. Belanke** | BTM layout, 1st Phase, |  |
| *Embedded Trainee Engineer* | 19th Main, 4th Cross, |  |
| ***M.S. (Embedded Systems)*** | Bangalore 560 068 |  |
| ***B.E. (Electronics)*** | Karnataka, India |  |
|  | darshanbelanke@gmail.com |  |
|  | +91 – 8722599966 |  |
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**Objective*: To work in a globally competitive environment on challenging assignments, which yields the* *twin benefits of creative job satisfaction and a steady professional growth.***



* A competent professional with more than 1 and half year of experience in developing User Interface as well as drivers for embedded systems
* Developed a touch screen application without any operating system with C as programming language
* Have a good experience in preparing a 'Design document’
* Worked on Renesas Controller, Epson Controller, TI, ST Controller on their respective IDE
* Hands-on experience in handling UI as well as driver part
* Have Leadership experience of handling team without Project Manager and Team Leader
* Knowledge of Linux device drivers, Real Time Operating Systems and Microcontroller 8051.
* Good experience in programming languages C and C++
* Good knowledge of using Interrupt Service Routine
* Possess excellent analytical, problem solving, troubleshooting and debugging skills
* Working with a startup company

**CAREER FEATURES**

**From July 2012 to October 2012: Galaxy Intelligentia Pvt. Ltd., Bangalore**

**November 2012 till date: Connovate Technology Pvt. Ltd., Bangalore**

**Project – Active Dials (Touch based watch)**

Connovate Technology Pvt. Ltd. is an Embedded and Enterprise based Company - concentrating on satisfying customer needs with high quality, high utility and high technology software & hardware products through superior design, innovative development and testing processes.

**Designation**: **Embedded Trainee Engineer**

**Project Name: Active Dials Description:**

This project is to develop, test and validate ‘Smart Watch’ based on customer requirements. Unlike analog watch, Smart Watch contains various functions such as different dynamic dials, static dials, alarms, unit conversion, pedometer, stop watch, countdown timer, calculator, information storage, gallery, and

many more. This watch will automatically come out of power consumption mode detecting user activities. This feature helps to save power extensively and longer battery life of the gadget. Also the watch has a feature of ‘Free-Fall detection’ that smartly turns off the watch. The watch can be connected to PC through USB interface which enables us to configure the watch with easy and interactive PC tool and ecosystem.

**Technical Details** :

* Worked on Renesas RX62N controller
* HEW IDE for developing User Interface and drivers
* Accelerometer, Touch Screen, Data flash, Display LCD are the basic peripherals
* Accelerometer and data flash are communicated to controller with SPI protocol
* Touch screen controller is communicated to controller with IIC protocol
* LCD is directly connected to port
* Buzzer is used for alarms and reminders

**Responsibilties :**

* Developed the User Interface in C language for touch based watch
* Implemented power consumption to extend the battery life
* Implemented firmware upgrade part for the watch
* Worked on Image rotation algorithm for analog clock in watch
* Worked on Anti-Aliased font displaying
* Optimized the code as per the ROM requirement and will be easy for preparing SDK
* Worked on USB protocol document and remodeled as per requirement
* Handled and released the bug free code to client without team leader or project manager
* Troubleshooting and fixing code level and driver level issues.

**Project Name: Adventure Watch Description** :

This project is to test the Epson controller for his functionality. Epson controller is having RTC, which runs independently, also it has stepper motor driver. This watch contains Mechanical clock as well as digital clock. There is a transparent display which will come over the Mechanical clock. This watch also contains the GPS, Compass, Pressure and Temperature sensors. The purpose of watch is for the trekking, jogging, walking, etc.

**Technical Details** :

* Worked on EPSON SVT1C17W22 controller
* GNU-17 IDE for developing applications and drivers
* Accelerometer, Magnetometer, Temperature sensor, Pressure sensor, GPS are basic peripherals

**Responsibilities** :

* Done the SPI communication with magnetometer to get the North direction
* IIC communication between Pressure sensors and Temperature Sensor IC’s
* Selected good controller, magnetometer, and sensors.
* Used RL78 as main controller for same project
* Hardware designed for the watch

**Project Name: Gecko Description** :

The Gecko Tag is a Bluetooth Low Enegy (BLE), coin cell powered device which is connected to your smart phone. Perform your favorite and most common actions with a simple Gecko gesture, without taking your phone out of your pocket. iOS and Android 4.3 compatible. It has a LED light, buzzer, ambient thermometer and one standard micro USB port.

I was working on IR based remote control to trigger the camera operation. Also using IR we can control the TV or STB(Set Top Box). Different TV uses their own protocol for IR receiver.

**Technical Details** :

* Worked on TI CC2541 controller
* IAR IDE for developing applications and drivers
* Accelerometer is the basic peripherals

**Responsibilities** :

* Worked on different protocols of IR remote control
* Triggering of camera through IR blaster
* Handled Alarm section of the Gecko by timer
* Hardware designed for the IR blaster

**ACADEMIC PROJECT**

• **Running Light Using IC-555, a mini project in 2008**  – This is used for decorating. One can change the sequence of glowing light, just by changing the variable resistor.

• **Audio Index In Library for Blind people, in 2010** – This project is basically for the blind people. Blind people can access the library. This project is based on Microcontroller 8051, RFID tags, RFID reader, wireless i.e. Bluetooth transmission and reception of the audio signals. Blind people can wear the Bluetooth enabled headphone, which is controlled by the database (here we used PC). The RFID reader is placed on the blind person’s hand. As soon as the tag is read by the reader, an audio is heard by the person. This audio will tell him about the name of the book or CD etc., with some more information’s.

• **Intelligent Traffic control using RFID technology, in 2011** – This Project is based on RFID. As RFID is the ongoing technology, we can use this technology to control the traffic. Based on the number of vehicles on the road, traffic is controlled. There is provision of VIP cars, Ambulance etc. As soon as the Ambulance is arrived, the road will get open automatically. All the tag ID’s are registered into database, which will differentiate between these cars.

• **Sun tracking Solar system, in 2012** – This Project will rotate the solar panel in the direction of Sun, which will increase the efficiency of solar system. The stepper motor is used to rotate the panel. Microcontroller 8051 is used to do so. The Solar sensitivity is acquired from LDR.

• **3 phase Motor control using mobile, in 2012** – This project is used in agriculture. One can switch off the motor in farms by using his mobile. Also we can avoid bursting of motor, due to single phase. There will be SIM card in the motor which will tell us about the single phase and other faults. This information is send to the registered number. User can switch OFF the motor, just by replying to that message. Here Microcontroller 8051 is used with GSM module.

**TECHNICAL SKILLS**

* **Programming Language:** C , C++, Embedded C
* **Tools:** MS-Visual Studio 6.0, Eclipse, XILINX, Keil µVision, GDB Debugger, HEW, IAR
* **Platform:** Windows, Linux
* **Scripting Language:** Shell(Basics), Perl(Basics)
* **HDL’s:** Verilog (Basics)
* Device Drivers, System Software and 8051 Microcontroller Programming

**ACADEMIC CREDENTIAL**

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| **Qualification** | **University/ Board** | **College / School** | **Year** | **Marks** |
| **M.S. (Embedded System)** | Manipal University | Manipal Centre for Information Science, Manipal | Apr-13 | 8.94  (CGPA Out of 10) |
| **B.E. (Electronics Engineering)** | Shivaji University, Kolhapur | Dr. J. J. Magdum College of Engineering, Jaysingpur | Jun-10 | 69.07 %  (Distinction) |
| **H. S. C.** | Kolhapur Board | Balwantrao Zele Jr. College, Jaysingpur | Feb-06 | 82.83 %  (Distinction) |
| **S. S. C.** | Kolhapur Board | New English Medium School, Jaysingpur | Mar-04 | 70.93 %  (First Class) |

**PERSONAL DETAILS**

**Date of Birth** : 28thAugust, 1988

**Gender** : Male

**Marital Status** : Single

**Nationality** :Indian

**Current location** : Bangalore

**Languages Known** : English, Marathi, Hindi, Kannada.

**Passport Number** :H370983

**Notice Period** :1 and Half month

**Permanent Address :** Shantinagar Colony,

Behind Herwade colony,

Jaysingpur - 416101

Tal- Shirol, Dist- Kolhapur

Maharashtra, India

I hereby declare that the information provided above is true to the best of my knowledge and I agree to provide any necessary documents in support of the same if required.

Darshan D. Belanke