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How to Connect SensorTag and PC

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Abstract: Connecting SensorTag to your PC is itself a difficult task. In this paper we will discuss how to connect SensorTag to Pc? Which version you should specifically download according to your windows requirement? What all we should download in CCS to connect to your SensorTag? Which project we should import to run your first program? Keywords: CCS, TI.

I. INTRODUCTION

What is IOT? Connecting Various amount of sensors to the internet for increased connectivity and control is IOT. IOT has captured huge market with Alexa and AWS. Any thing which u see on physical world when it is to the cloud or internet is internet of things. In this we TI Sensor Tag, which is a ARM Cortex processor, with temperature, pressure, humidity, accelerometer sensor on it. IOT is moving forward with number of computers connected

II. CODE COMPOSER STUDIO

TI CCS is a IDE for writing a software code to program your device, and connecting your any type of TI device to the computer. CCS easily connects your TI device to the computer, making it easy to program and run on your device. It has code editor, debugging, profiling also many other features.

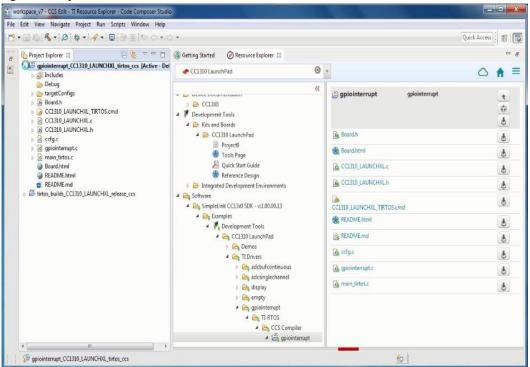


Fig 1: CCS Snippet

There are many version of CCS available on the internet. You can try many versions available. But if you are trying to connect Texas Instruments Sensor Tag to your laptop u have to specifically use CCS Version 9.3.0 only then there will be no debugging error in your official project. Else it will always display some error in your official project when the code will be compiled with other versions of CCS. It is one of the major problems of making connection with hardware and computer. Trial and Error of trying to debug the official code in other versions of CCS will consume lot of time in your projects. Therefore, if you are using Windows 10 along with Texas Instruments Sensor Tag CCS version 9.3.0 is the most suitable to work with.

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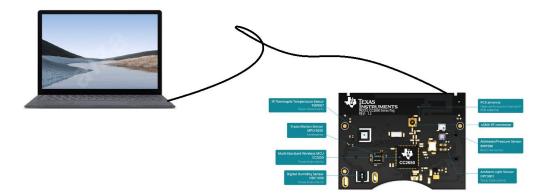


Fig 2: Connection

III.CONCLUSION

We should use CCS Version 9.3.0 for application usages of TI Sensor Tag, so that we can easily debug the constructed code on your TI Sensor Tag, and run it easily on your device without any errors. Specifically, its for Windows 10 along with TI Sensor Tag. If you compile your official code with windows 10 along with other versions of CCS, u will be getting compilation errors and u will be not be able to make appropriate changes in your code. Below RSSI value of BLE is 19.4 % higher than Bluetooth Classic.

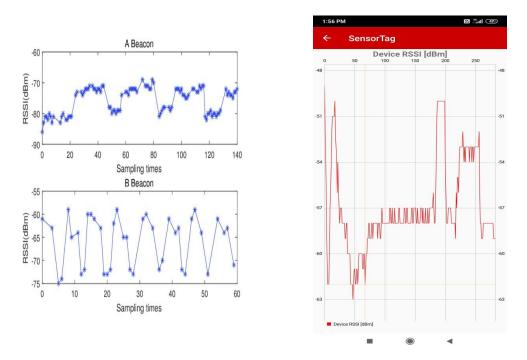


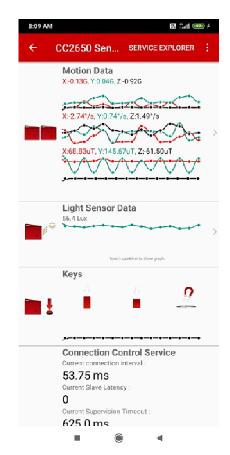
Fig 3: Graphs of RSSI of Bluetooth Classic vs RSSI of BLE



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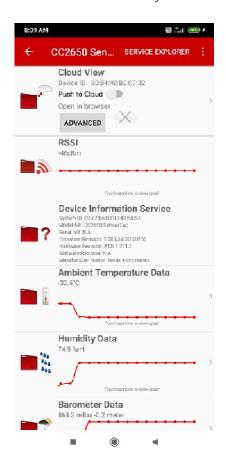


Fig 4: Sensor tag data on mobile

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