

# ALL IN ONE CALCULATOR

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## ABSTRACT

Calculators are small, portable electronic devices used to perform simple as well as complex calculations in a fraction of second. The idea of a calculator came from Abacus used long back in 2000 BC; after that there were various inventions and mechanical calculators came in use. Scientific calculators were made to solve the scientific calculations. But in the 21<sup>st</sup> century where people have started using laptops, tablets, smartphones etc. then why would they carry such calculators.

So in this research paper I am introducing an android application known as the All in one calculator, where in all sorts of calculations from simple arithmetic calculations to long scientific calculations can be done in just a click on the smartphone screen. The users of this application will have a tool to do all sorts of calculations with ease.

**Keywords:** *Android, Calculator, Application, Smartphones.*

## I. INTRODUCTION

Android powers hundreds of millions of mobile devices in more than 190 countries around the world. It's the largest installed base of any mobile platform and growing fast—every day another million users power up their Android devices for the first time and start looking for apps, games, and other digital content. Android gives you a world-class platform for creating apps and games for Android users everywhere, as well as an open marketplace for distributing to them instantly.

This android application provides useful tools for arithmetic calculation, scientific calculation and conversions. It would be of great use especially for the students as they hold the majority percentage of the smartphone users in today's time and they need some tools for the long calculations they have to do in their academics.

The All in one calculator application consist of the following:

- **Simple Calculator :**

In the simple calculator basic calculations involving addition, subtraction, multiplication and division can be performed.

- **Scientific Calculator :**

In the scientific calculator calculations involving sine, cosine, tangent, logs, Square roots, Cube roots etc can be performed.

- **Conversions:**

This is further divided into sections as follows:

- ✓ **Speed Conversion:**

It helps in converting speed from m/s to km/hr and vice versa.

✓ **Number Conversion:**

It helps in converting a number from one base to another.

✓ **Unit Conversion:**

It helps in converting values in one unit to another for example metre in centimetres.

✓ **Temperature Conversion:**

It helps in converting temperature values in Celsius in Fahrenheit.

## II. TECHNOLOGY USED

The introduction to software requirements specification states the goals and objectives of the software, describing it in the context of the computer based system. The Information Description provides a detailed description of the problem that the software must solve. Information content, flow and structure are documented. A description of each function required to solve the problem is presented in the Functional Description.

### Software Requirement Specification

- WINDOWS-7
- NETBEANS IDE 7.3
- ANDROID SDK

## III. FUTURE SCOPE

It is an android application which would be easily available. As we all know Google Android is an open source platform, allowing developers to customize application according to the client's requirements. While purchasing a latest device, you will find pre-installed applications that are provided for use. But, not only pre-installed applications are best for doing all the operations. These applications are helpful for doing things like playing media, emailing, browsing, etc. So, if you want to expand the capability of your device, you have to add some applications in your Smartphone.

My research paper focusses on a student's requirement of an efficient calculator which is easy to use and is easily available and since today's student have knowledge of android so I thought it would be a better option to develop this application on android.

## IV. CONCLUSION

All in one calculator is an android application which is a combination of simple calculator, scientific calculator and also serves as a converter too. It will be very useful for the students who need to do long calculations thus saving their time. The smartphones are used by 76% students so it would be easily available for their use. The advantages of using this android application are:

- ✓ Time is saved.
- ✓ Easy to use.
- ✓ Reliable
- ✓ Compatible with smartphones
- ✓ Helps to do long calculations

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