# MANUAL ON

CALC++



## ANDROID BASED SOFTWARE

TEAM:-

## A.)INTRODUCTION:

Android is a Linux-based operating system for phones and other mobile devices (tablets, e-readers, media players, etc).

## **B.) DESCRIPTION AND TECHNOLOGY:**

Calc++ is an android based application that performs scientific calculations and also performs conversion between units (length,volume,weight,online currency converter etc.)

#### Technology:-

- 1.Based on Android Operating System.
- 2. Coding in java.

## C.)IMPLEMENTATION:

Calc++ is an android based application that performs scientific calculations and also performs conversion between units like(length,mass,weight etc.) . In this application online currency converter also implemented that uses a web service.

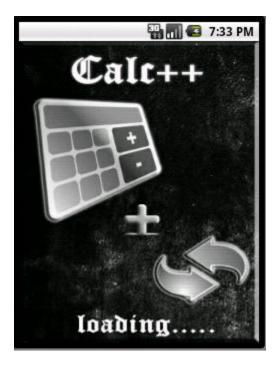
#### Calculator

- \* Basic function like Multiply, Divide
- \* Add to Memory , subtract to memory, read memory
- \* ANS function to calculate equation and used for further calculation
- \* +/- to change the sign of result
- \* Trigonometric functions in degrees, radians
- \* Percentages , Modulus , Reciprocal
- \* Power functions like Cube ,Square and General power
- \* Root Functions like Cube root , Square root , and General root
- \* Factorial
- \* Combination and Permutation
- \* Scientific, engineering and fixed-point display modes
- \* Constants like pi, e
- \* Logarithmic Function
- \* Determinant and Inverse of Matrix in "Menu->Extras"

#### Converter

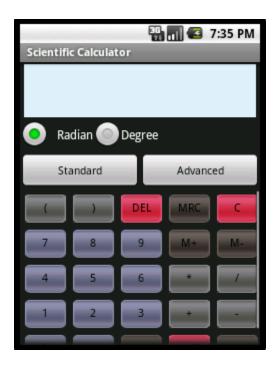
- \* Binary, octal, and hexadecimal
- \*Convert Unit like mass, length, volume area...etc
- \*Online Currency converter

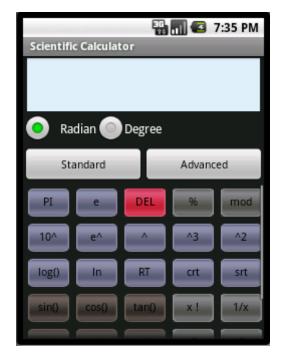
1.) Firstly splash screen will be shown for 3 secs. After that Next Screen shows two buttons. First one for calculator and another one for Converter.





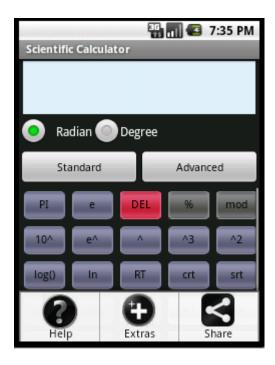
2.) After clicking on calculator it shows calculator in standard mode. And by clicking on Advanced it shows advanced mode with scientific functions and constants.





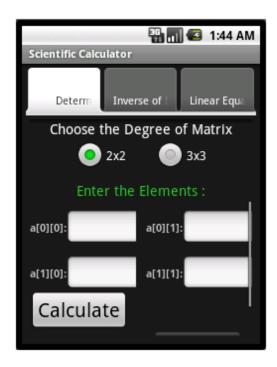
## 3.) Click on Menu button there are following options:

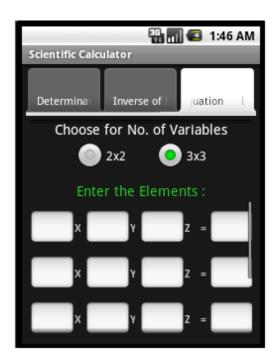
Help  $\rightarrow$  which provide information to use this application.





Extras → In this option some extra features like Determinant and inverse of matrix are implemented.





Share  $\rightarrow$  User can share the application on Gmail, Facebook , Twitter , and other social networking sites with friends.

4.) After clicking on converter it shows converter screen. Now select one of the button of which quantity you want to convert.





Here we have shown for Binary converter





This one is the online currency converter.firstly it check for internet connection.If connection is available then it redirects to Next Screen otherwise shows a toast message.





In this two bottons in bottom for backward and forward respectively. By click on forward it redirects to share screen.

## D.)TECHNICAL ASPECTS:

Memory Requirements: 552 KB

Requires Android : Android 1.6 and above.

Permissions : Access Network State ,Internet .

User Friendly : It is more reliable in use.

Efficiency : Application is fully compatible on android 1.6 and higher

Versions and also support for multiple screens

(QVGA, HVGA, WVGA 800, WVGA 854).

E.)PURPOSE: As the mobile phones of today are replacing the magnificence what computers used to have some years before, the popularity of android applications is increasing day by day.

The purpose of this application is to make such type of application for android device also.

## D.)INNOVATIONS:

- On Android market (market.android.com) there are no such type of application that can performs both scientific calculation and conversion between units.
- We have implemented these things in our application.
- We have also implement Online Currency Converter that used a web service.

## E.)BENEFICIAL FOR GENERAL PUBLIC:

- A single application for calculator and unit converter with currency converter.
- User can share the result with others via social networking sites(facebook,twitter),Gmail,Messaging.
- User can also share the application with friends.

## D.)OTHER:

We have used online currency converter that perform conversion between different currency(more than 100) . we have used webservice for it . The link that I have used for webservice is :-

http://www.webservicex.net/CurrencyConvertor.asmx