

# **APP DEVELOPMENT**

## **1. INTRODUCTION:**

One of the more popular forms of coding in recent times is the creation of applications, or apps, that run on mobile devices like phones and tablets. You probably use a range of different apps in your everyday life. Android apps are developed with the Java coding language and the Android Software Development Kit, which runs on Mac, PC or Linux. You also need to use an IDE such as Eclipse. There are other mobile platforms such as Windows Phone, but iOS and Android are definitely the most popular. Most training focuses on these platforms.

## **2. SERVICE & ITS APPLICATION:**

Custom mobile apps are gaining momentum - as per the reports, on an average, about 7.5 hours per employee per week are saved by using customized mobile apps, and 82% of the business owners believe that it helped them earn additional business revenues!

Custom mobile apps can be partially or fully personalized to suit your business needs. These apps are altered to address a particular audience rather than providing a solution which caters to a large group with varying requirements. This is the major reason why custom mobile app development is gaining traction and proving to be an attractive option for businesses.

## **3. DESIRED QUALIFICATIONS FOR PROMOTER:**

Promoter for this service may have higher studies in application development as well as background of sales and marketing can be a value added plus point so that it brings down the cost of building project and also make the implementation smoother and it will require less time to build with greater quality.

## **4. INDUSTRY LOOK OUT AND TRENDS**

Mobile apps have made a great contribution to a lot of businesses in a variety of different industries. It used to be considered an optional addition to one's overall marketing and business development efforts, however, it has now become a necessity as it increases usability, meeting customer's demands while building brand awareness and increasing sales. Mobile app development is on the upraise, With over 250 billion free apps downloaded in 2017 alone, an increase for these downloads is also expected to continue for many years to come. If you are in the mobile app development industry, below are some development trends that you should watch out for in 2018, as growth is expected to continue.

## **5. MARKET POTENTIAL AND MARKETING ISSUES:**

These days, businesses of all kinds, whether small, medium or large are taking advantage of the customized business apps as it helps them stay competitive and increase productivity. Here are some of the most popular advantages of custom mobile app development for businesses –

### ***1. Improves Efficiency***

Since the business apps are custom-built keeping your business requirements in mind, it acts like a comprehensive app performing diverse functions and negates the requirement of multiple apps. Also, as these apps are tailored to suit your working style, it enhances the employee productivity and in turn business ROI.

### ***2. Offers High Scalability***

Regular apps are built to handle limited number of resources and processes. In the event of your business growing, these apps may not be able to handle the load. Custom made apps, on the other hand are built keeping in mind all these parameters and can be scaled up easily when the

need arises

### **3. *Secures Your App Data***

General business apps may or may not have the specialized security features, which may put your business data to risk. Having a custom app made solely for your business can reinforce your data security system, as relevant security measures will be taken care of according to your business needs while app development

### **4. *Integrates With Existing Software***

General business apps may be able to function smoothly with your existing software. Custom made apps are built taking into consideration your current business software and hence are guaranteed to integrate well and function without any errors

## **6. REQUIREMENTS - Material/Equipment and manpower**

### **Resources**

1. Computers with latest OS and Network Infrastructure
2. Advanced Software required in application development

### **Manpower**

1. Software developers: 2 or 3 minimum, who are skilled to write code in various languages according to requirement
2. Tech-Support: 1 who can manage server data and hosting
3. Sales and marketing: 1 or 2 who can work on official documentation and can re-present project in front of client.

## 7. MANUFACTURING PROCESS:

- **Application target users**

An app should always be developed keeping in mind the target users of an application. Having a clear vision regarding the target group, enhance the success ratio of an app.

- **Mobile platforms and devices to be supported**

Mobile platforms and devices should be selected keeping in mind hardware performance, battery life, ruggedness and required peripherals. Certain factors that needs to be considered while selecting mobile platforms and devices includes coverage, device support, performance and other features.

- **Revenue model**

The app market is booming like never before. To ensure this resource and generate revenue app developer need to select appropriate approach in accordance with the app. There are different models of generating revenue from mobile applications which include paid applications, separate app and in-app freemiums, advertisements, subscription and pay per download. These techniques can be employed to generate revenue. However, the developer's approach has to be in accordance with the application. It is highly essential for the developer to attract the user and spend money on the various aspects of the application. Testing, collecting feedbacks and fixing bugs: Although testing is something that's done throughout the development process as well, there will always be bugs left. And we're not only talking about software bugs. Even a design can be buggy. So after giving the final touch the site will be ready to go live!

## 8. MANPOWER REQUIREMENT:

| Sr. No. | Designation of Employees | Number of Employees | Monthly Salary ₹ | Total Amount |
|---------|--------------------------|---------------------|------------------|--------------|
| 1       | App Developer            | 3                   | 15,000           | 45,000       |
| 2       | Tech Support             | 1                   | 8,000            | 8,000        |

|   |                           |   |              |          |
|---|---------------------------|---|--------------|----------|
| 3 | Marketing Support         | 2 | 10,000       | 20,000   |
| 4 | Quality testing person    | 1 | 15,000       | 15,000   |
| 5 | Accounts/Stores Assistant | 1 | 12,500       | 12,500   |
| 6 | Office Boy                | 1 | 9,000        | 9,000    |
|   |                           |   | <b>Total</b> | 1,09,500 |

## 9. IMPLEMENTATION SCHEDULE:

The project can be implemented in 4 months' time as detailed below:

| Sr. No. | Activity   | Time Required<br>(in months) |
|---------|--|------------------------------|
| 1       | Acquisition of premises                                      | 1.00                         |
| 2       | Construction (if applicable)                                 | 1.00                         |
| 3       | Procurement & installation of Plant & Machinery              | 1.00                         |
| 4       | Arrangement of Finance                                       | 2.00                         |
| 5       | Recruitment of required manpower                             | 1.00                         |
|         | Total time required (some activities shall run concurrently) | 4.00                         |

## 10. COST OF PROJECT:

| Sr. No   | Description   | Qty | Amount (Rs) | Total (Rs)              |
|----------|---|-----|-------------|-------------------------|
| 1        | Building Application for service Centre                                     | 1   | ₹ 20,000.00 | ₹ 20,000.00             |
| 2        | Computers - with all necessary hardware and installed Windows and MS Office | 5   | ₹ 27,000.00 | ₹ 1,35,000.00           |
| 3        | Purchas bulk hosting services   | 1   | ₹20,000.00  | ₹20,000.00              |
| 3        | Software licensing  | 1   | ₹ 16,000.00 | ₹ 16,000.00             |
| 3        | Network Installation  | 1   | ₹ 10,000.00 | ₹ 10,000.00             |
| 4        | Office Furniture  | 1   | ₹ 50,000.00 | ₹ 50,000.00             |
| <b>A</b> | <b>Total</b>  |     |             | ₹<br><b>2,51,000.00</b> |

| Sr. No. | Particulars   | ₹ in Lacs   |
|---------|---|-------------|
| 1       | Land  | 0.00        |
| 2       | Building  | 0.00        |
| 3       | Plant & Machinery   | 2.00        |
| 4       | Furniture, Electrical Installations                         | 0.50        |
| 5       | Other Assets including Preliminary / Pre-operative expenses | 0.50        |
| 6       | Working Capital   | 1.69        |
|         | <b>Total</b>  | <b>4.69</b> |

## 11. MEANS OF FINANCE:

Bank term loans are assumed @ 75 % of fixed assets. The proposed funding pattern is as under:

| Sr. No. | Particulars             | ₹ in Lacs   |
|---------|-------------------------|-------------|
| 1       | Promoter's contribution | 1.17        |
| 2       | Bank Finance            | 3.52        |
|         | <b>Total</b>            | <b>4.69</b> |

## Turnover

| Sr No        | Description | Cost/Unit | Quantity /Month | Sales/month | Revenue/year Rs. In lakhs |
|--------------|-------------|-----------|-----------------|-------------|---------------------------|
| 1            | Native App  | ₹60,000   | 2               | 1,20,000    | <b>14.40</b>              |
| 2            | Web App     | ₹50,000   | 4               | 2,00,000    | <b>24.00</b>              |
| 3            | Hybrid App  | ₹1,00,000 | 2               | 2,00,000    | <b>24.00</b>              |
| <b>Total</b> |             |           |                 |             | <b>62.40</b>              |

## 12. WORKING CAPITAL CALCULATION:

The project requires working capital of 1.69 lakhs as detailed below:

| Sr. No. | Particulars  | Gross Amt | Margin % | Margin Amt | Bank Finance |
|---------|--------------|-----------|----------|------------|--------------|
| 1       | Inventories  | 0.00      | 0.25     | 0.00       | 0.00         |
| 2       | Receivables  | 0.00      | 0.25     | 0.00       | 0.00         |
| 3       | Overheads    | 1.69      | 100%     | 1.69       | 0.00         |
| 4       | Creditors    | -         |          | 0.00       | 0.00         |
|         | <b>Total</b> | 1.69      |          | 1.69       | 0.00         |

## 13. LIST OF MACHINERY REQUIRED

| Sr. No. | Description   | Qty | Amount   | Total      |
|---------|---|-----|----------|------------|
| 1       | Computers - with all necessary hardware and installed Windows and MS Office | 2   | ₹ 27,000 | ₹ 54,000   |
| 2       | Vehicle   | 4   | ₹ 40,000 | ₹ 1,60,000 |
| 3       | Network Installation devices  | 1   | ₹ 5,000  | ₹ 5,000    |

All the Computers, its peripherals and other equipments are available from local manufacturers. The entrepreneur needs to ensure proper selection of product mix and proper type of equipments and accessories to have modern and flexible designs. Some of the suppliers of computers and accessories are as below:

- 1 Impressive Computers  
Hasan Ali House No. 4/41-A,  
Noor Baug, Umerkhadi,  
Mumbai - 400009,  
Maharashtra, India
  
- 2 Computer Planet  
Shop No. 1, Shaniwar Peth-53,  
Opposite Amruteshwar Mandir,  
Amruteshwar Co Operative Housing Society,  
Near Shaniwar Wada,  
Pune - 411030,  
Maharashtra, India
  
- 3 Visicube Technologies Private limited  
Door No. 1-8-315,  
Begumpet, Opposite US Consulate,  
Hyderabad - 500016,  
Telangana, India
  
- 4 Micon Automation Systems Private Limited  
A-814, Siddhi Vinayak Towers,  
Behind DCP Office, Makarba,

Ahmedabad - 380051,  
Gujarat, India

5 Adaptek Automation Technology  
No. 13, F- 3, 2<sup>nd</sup> Floor,  
Main Road, Adyar Nehru Nagar,  
Near H.D.F.C. Bank A.T.M.,  
Chennai - 600020,  
Tamil Nadu, India

#### 14. PROFITABILITY CALCULATIONS:

| Sr. No. | Particulars                         | UOM        | Year-1       | Year-2       | Year-3       | Year-4       | Year-5       |
|---------|-------------------------------------|------------|--------------|--------------|--------------|--------------|--------------|
| 1       | Capacity Utilization                | %          | 60%          | 70%          | 80%          | 90%          | 100%         |
| 2       | Sales                               | ₹. In Lacs | 37.44        | 43.68        | 49.92        | 56.16        | 62.40        |
| 3       | Raw Materials & Other direct inputs | ₹. In Lacs | 6.25         | 7.29         | 8.33         | 9.37         | 10.41        |
| 4       | Gross Margin                        | ₹. In Lacs | 31.19        | 36.39        | 41.59        | 46.79        | 51.99        |
| 5       | Overheads except interest           | ₹. In Lacs | 4.26         | 4.52         | 5.05         | 5.21         | 5.32         |
| 6       | Interest                            | ₹. In Lacs | 0.35         | 0.35         | 0.23         | 0.18         | 0.14         |
| 7       | Depreciation                        | ₹. In Lacs | 4.34         | 3.10         | 2.17         | 1.55         | 1.40         |
| 8       | <b>Net Profit before tax</b>        | ₹. In Lacs | <b>22.25</b> | <b>28.42</b> | <b>34.13</b> | <b>39.85</b> | <b>45.13</b> |

The basis of profitability calculation:

The growth of selling capacity will be increased 10% per year. (This is assumed by various analysis and study; it can be increased according to the selling strategy.)

Energy Costs are considered at Rs 7 per Kwh and fuel cost is considered at Rs. 65 per litre. The depreciation of plant is taken at 10-12 % and Interest costs are taken at 14 -15 % depending on type of industry.

#### 15. BREAKEVEN ANALYSIS:

| Sr. No. | Particulars            | UOM        | Value |
|---------|------------------------|------------|-------|
| 1       | Sales at full capacity | ₹. In Lacs | 62.40 |
| 2       | Variable costs         | ₹. In Lacs | 10.41 |



|   |                               |               |            |
|---|-------------------------------|---------------|------------|
| 3 | Fixed costs incl. interest    | ₹. In Lacs    | 5.46       |
| 4 | $BEP = FC/(SR-VC) \times 100$ | % of capacity | 10.50<br>% |

## **16. STATUTORY / GOVERNMENT APPROVALS**

Bureau of Indian Standards (BIS) is operating Compulsory Registration Scheme (CRS) for Electronics & IT Goods as per the provision of Chapter IVA of THE BUREAU OF INDIAN STANDARDS RULES, 1987 for the product categories notified by MeitY. Visit official government website (Bureau of Indian Standards) for notice about products on: <http://crsbis.in/BIS/>

Entrepreneur may contact State Pollution Control Board where ever it is applicable.

## **17. BACKWARD AND FORWARD INTEGRATIONS**

It is assumed that the unit will be viable at 75% efficiency on single shift basis considering 5 working days or as per demand of area per week.

The rate of interest in the scheme is taken at 11.5 % for both fixed and working capital. Due to liberalization and competition among banks, lower rate of interest is possible in future.

The prices of machinery and equipment are approximate which are ruling locally at the time of preparation of the project. When a tailor-cut project is prepared the necessary changes are to be made at the local level.

The cost of staff and labour is approximate which is ruling locally at the time of preparation of the profile. When a tailor-cut project is prepared the necessary changes are to be made.

## **18. TRAINING CENTERS AND COURSES**

There is no specific course in repairing and assembling services, but the most authorized center is government authorized "ITI" available in all the cities across the country.

India Training institute of computer technology conducts various technical courses in different cities to enable students to make a bright career. Most of our vocational programs are job-oriented with which students can start earning the day they finish their training or can learn them as a hobby. Students can join for any of these in vacations as all these are short-term certificate courses.

Udyamimitra portal (link : [www.udyamimitra.in](http://www.udyamimitra.in) ) can also be accessed for hand-holding services viz. application filling / project report preparation, EDP, financial Training, Skill Development, mentoring etc.

Entrepreneurship program helps to run business successfully is also available from Institutes like Entrepreneurship Development Institute of India (EDII) and its affiliates all over India.

**Disclaimer:**

Only few machine manufacturers are mentioned in the profile, although many machine manufacturers are available in the market. The addresses given for machinery manufacturers have been taken from reliable sources, to the best of knowledge and contacts. However, no responsibility is admitted, in case any inadvertent error or incorrectness is noticed therein. Further the same have been given by way of information only and do not carry any recommendation.

Source:- Udyami Mitra/Sidbi