

# DIGITAL DIARY

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## **COCOMO:**

### **Product attributes**

The complexity of the product (Nominal) = 1.00

Required software reliability extent (Nominal) = 1.00

Size of the application database (Low) = .94

### **Hardware attributes**

The volatility of the virtual machine environment (low) = .87

Run-time performance constraints (high) = 1.11

Memory constraints (high) = 1.06

Required turnabout time (Low) = .94

## Personnel attributes

Analyst capability (High) = .86

Software engineering capability(High) = .91

Applications experience(High) = .86

Virtual machine experience(Nominal) = 1.00

Programming language experience(High) = .95

## Project attributes

Required development schedule(High) = 1.10

Use of software tools(High) = .82

Application of software engineering methods(High) = .83

## Multiply

$EAF = 1.00 \times .94 \times 1.00 \times 1.11 \times 1.06 \times .87 \times .94 \times .86 \times .91 \times .86 \times 1.00 \times .95 \times .82 \times .83 \times 1.10$   
 $= .43$

$E = (a(KLOC)^b) * EAF$

KLOC = 10,000, and the project is organic

Software Projects	a	b
Organic	3.2	1.05
Semi Detached	3.0.1.12	
Embedded	2.8.1.20	

$E = (a(KLOC)^b) * EAF$

$= (3.2 \times (10000/1000)^{1.05}) \times .43$

$= (3.2 \times (10)^{1.05}) \times .43$

$= 15.44 \sim 16 \text{ man-months}$

Software Projects	a	b	c	d
Embedded	3.6 1.20	2.5	0.32	
Organic	2.4	1.05	2.5	0.38
Semi Detached	3.0 1.12	2.5	0.35	

Time =  $c(\text{Effort})^d$

$$= 2.5 \times (16)^{.38}$$

$$= 7.17 \sim 7$$

Persons = Effort/Time

$$= 16/7$$

$$= 2.22 \sim 2$$

## **WBS:**

No.	Module Name	Weightage
1	login	3
2	signup	5
3	Change Password	3
4	Create event	1
5	Modify event	3
6	event description	1
7	Reminder module	1
8	Added Picture and video	5
9	Delete event	3
10	Reminder	1

Our project team has estimated defined per Function Points of **5 hours/points**.

**Total Effort = Total Function Points \* Estimate defined per Function Points**

	Weightage	Function Points	Total
<b>Complex</b>	5	2	10
<b>Medium</b>	3	4	12
<b>Simple</b>	1	4	4
<b>Function Total Points</b>			26
<b>Estimate define per point</b>			5
<b>Total Estimated Effort (Person Hours)</b>			130