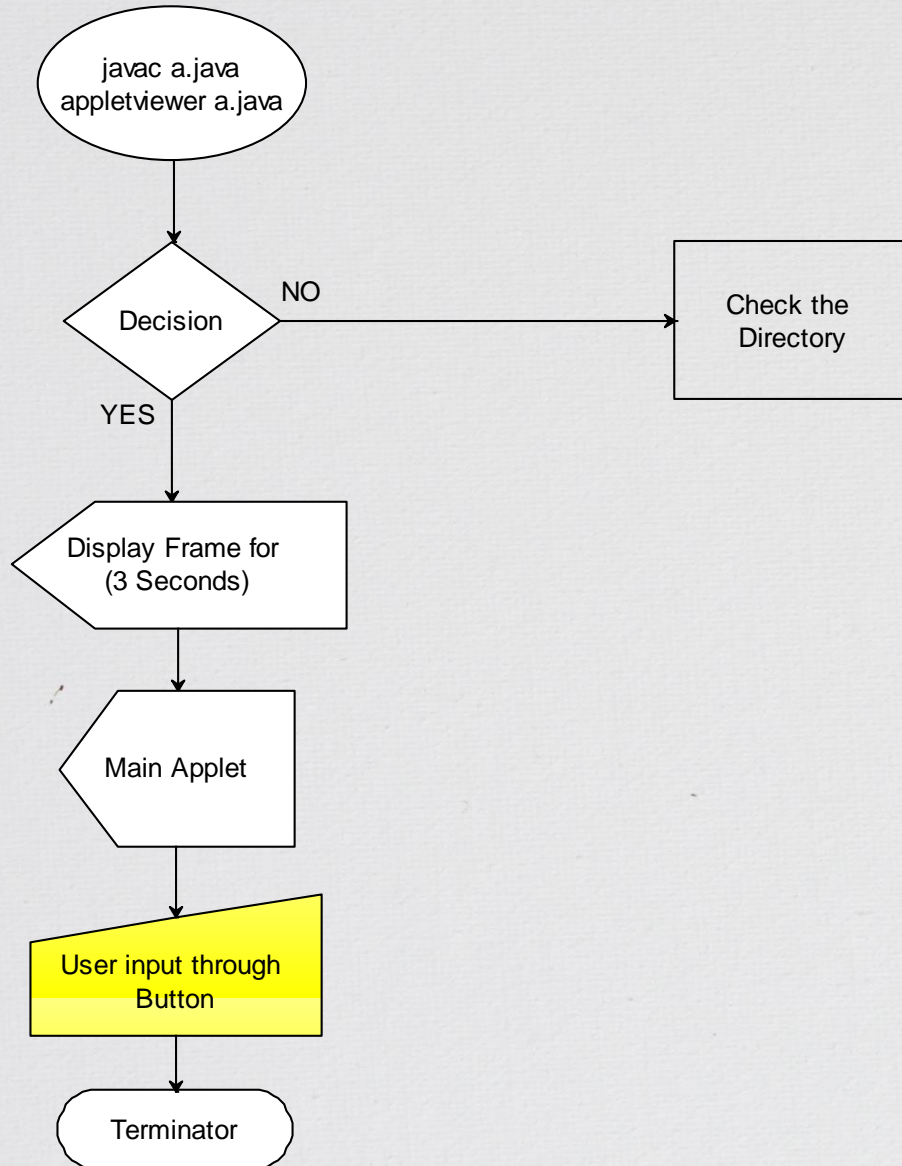# Snakes & Ladders Game

Avi

Project Details :-

Game Using GUI & Object Oriented Concepts.

➢ We have use Java language with Object Oriented Concepts.
➢ We have use GUI(Applet) to make project(Game) more interesting and enjoyable.
➢ We have made **Snakes & Ladders**.
➢ It is the game where two player can play and check their luck.
➢ Any age group can play this game there is no age restriction.
➢ Attractive complements are used to make game more enjoyable then normal.

Project Flowchart :

```
         ┌─────────────────┐
         │   javac a.java   │
         │ appletviewer a.java │
         └─────────────────┘
                  │
                  ▼
              ◇ Decision ◇ ──── NO ──────────────►  ┌──────────────┐
                  │                                   │  Check the   │
                  │                                   │  Directory   │
                 YES                                  └──────────────┘
                  │
                  ▼
         ┌─────────────────┐
         │ Display Frame for │
         │   (3 Seconds)    │
         └─────────────────┘
                  │
                  ▼
         ┌─────────────────┐
         │   Main Applet   │
         └─────────────────┘
                  │
                  ▼
         ┌─────────────────┐
         │ User input through │
         │     Button       │
         └─────────────────┘
                  │
                  ▼
         ┌─────────────────┐
         │   Terminator    │
         └─────────────────┘
```

Implementation Details :-

➢ First of all, Player need to execute and compile the Program with following code.

      D:\>javac a.java

      D:\>appletviewer a.java

➢ Directory of the program may change according to users.

➢ After, the successful execution applet window will open.

➢ Welcome Frame will pop-up and Game will start after 3 Seconds.

➢ Player can see main applet window.

➢ It has a Snake & Ladders board**(.jpg file)** that show position of snakes and ladders.

➢ It has two different **Button** for 2 players and also has two textfields to show real time score.

➢ It has one **text field** that show dice value.

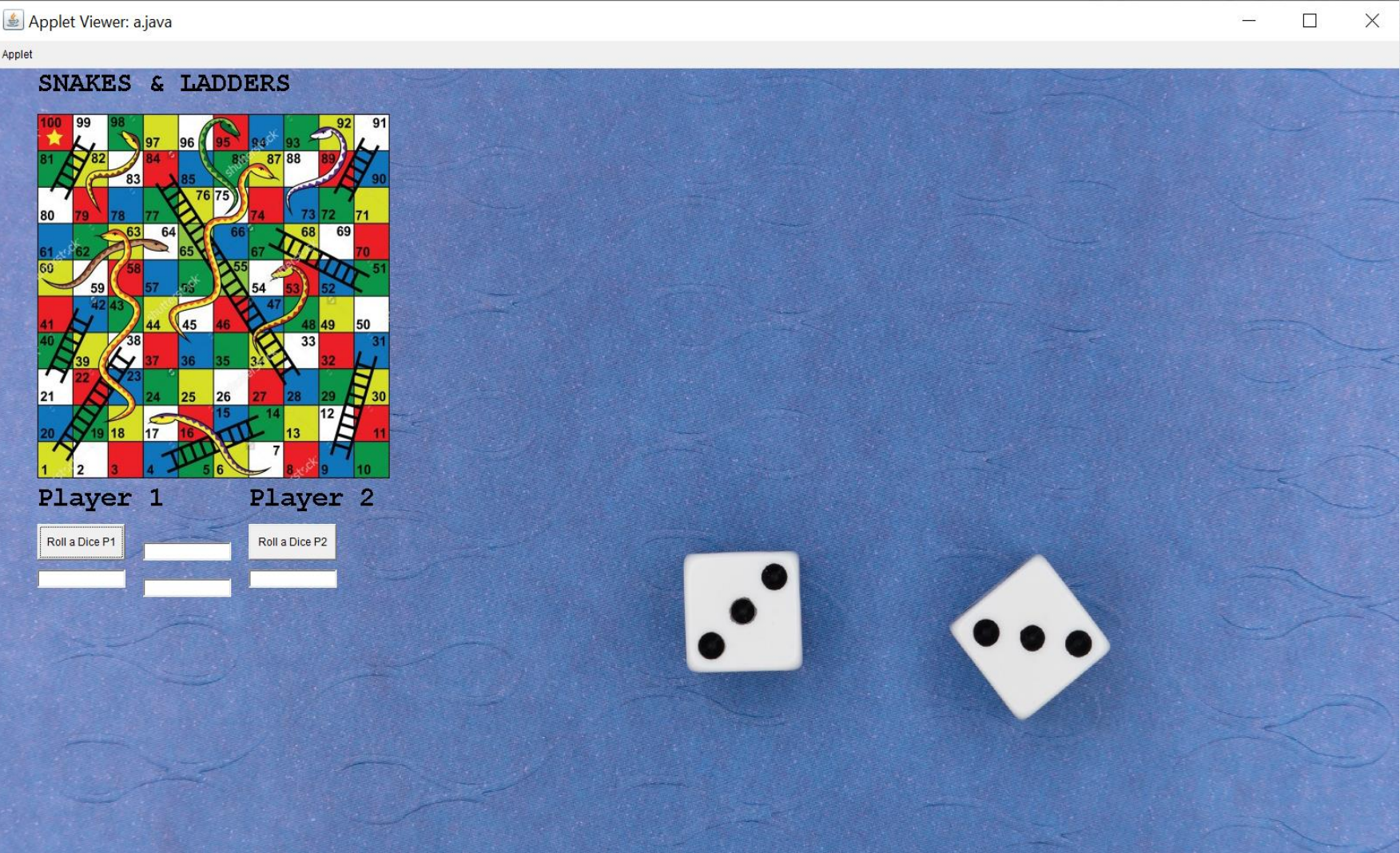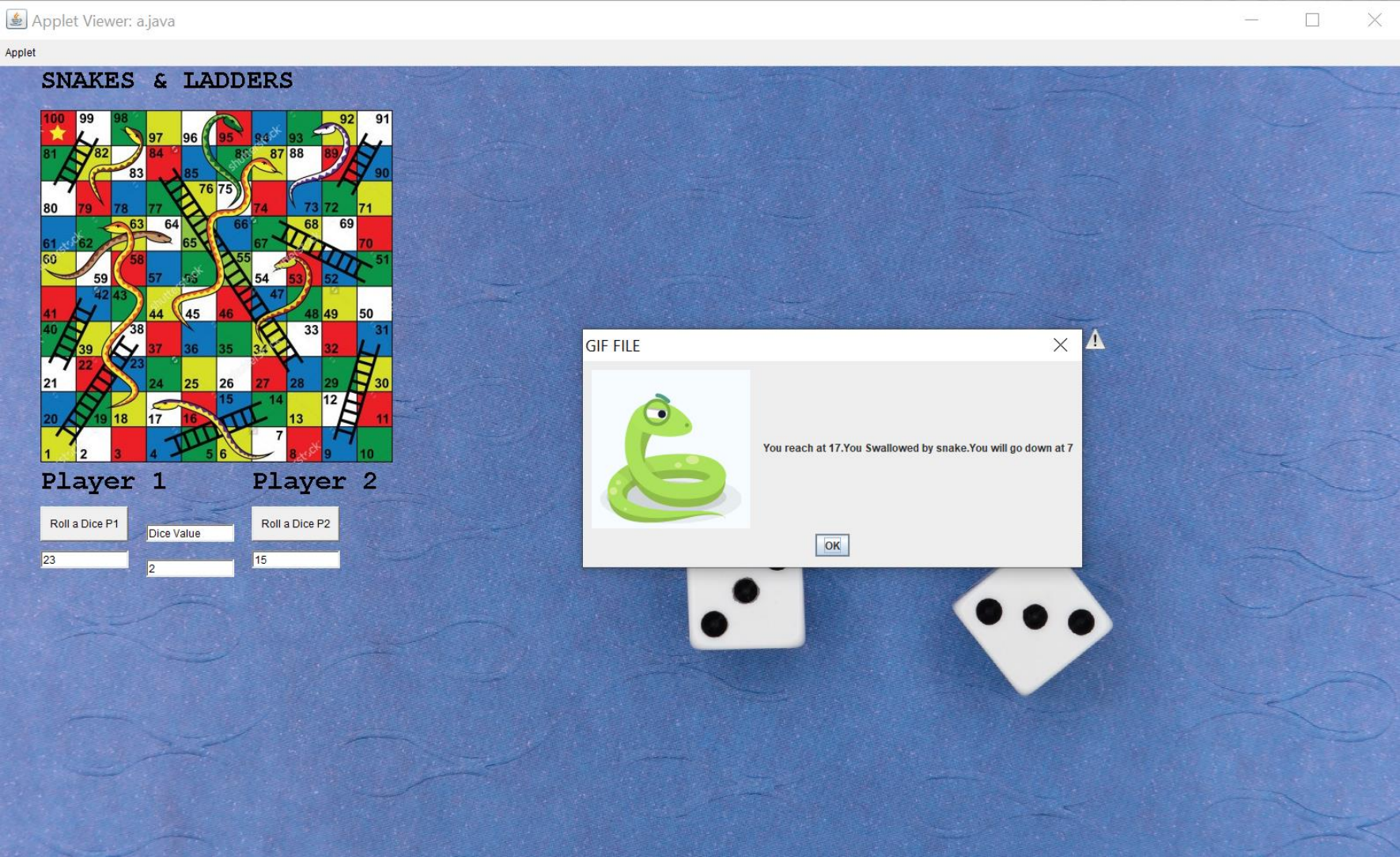➢ We have also used **thread concepts and exception Handling** for showing the frame for 3 seconds.

Various Functionality implemented into your project :

➢ Applet
➢ Frame
➢ Text Fields
➢ Button
➢ ActionListener
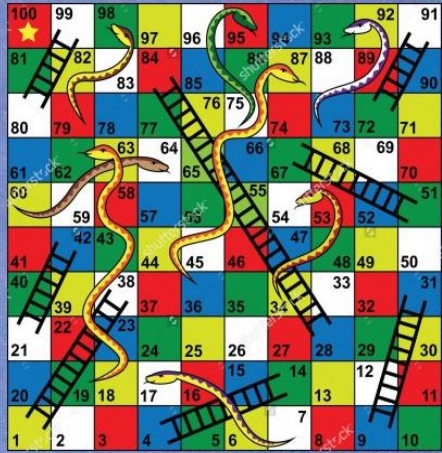➢ Joptionpane to display small messages
➢ Images
➢ GIFs

Screenshots :

SNAKES & LADDERS

```
100  99  98        97  96  95  94  93        92  91
81   82      84      85          87  88  89        90
80   79  78  77      76  75      74  73  72  71
61   62      63  64      66      67          68  69  70
60           59  58      57      55  54      52  51
      42  43      44  45      47      48  49  50
41
40   39  38  37  36          34  33        32  31
21   22  23      24  25  26  27  28  29        30
20   19  18  17  16  15      14  13          11
1    2       4   5   6       8       7   9   10
```

Player 1   Player 2

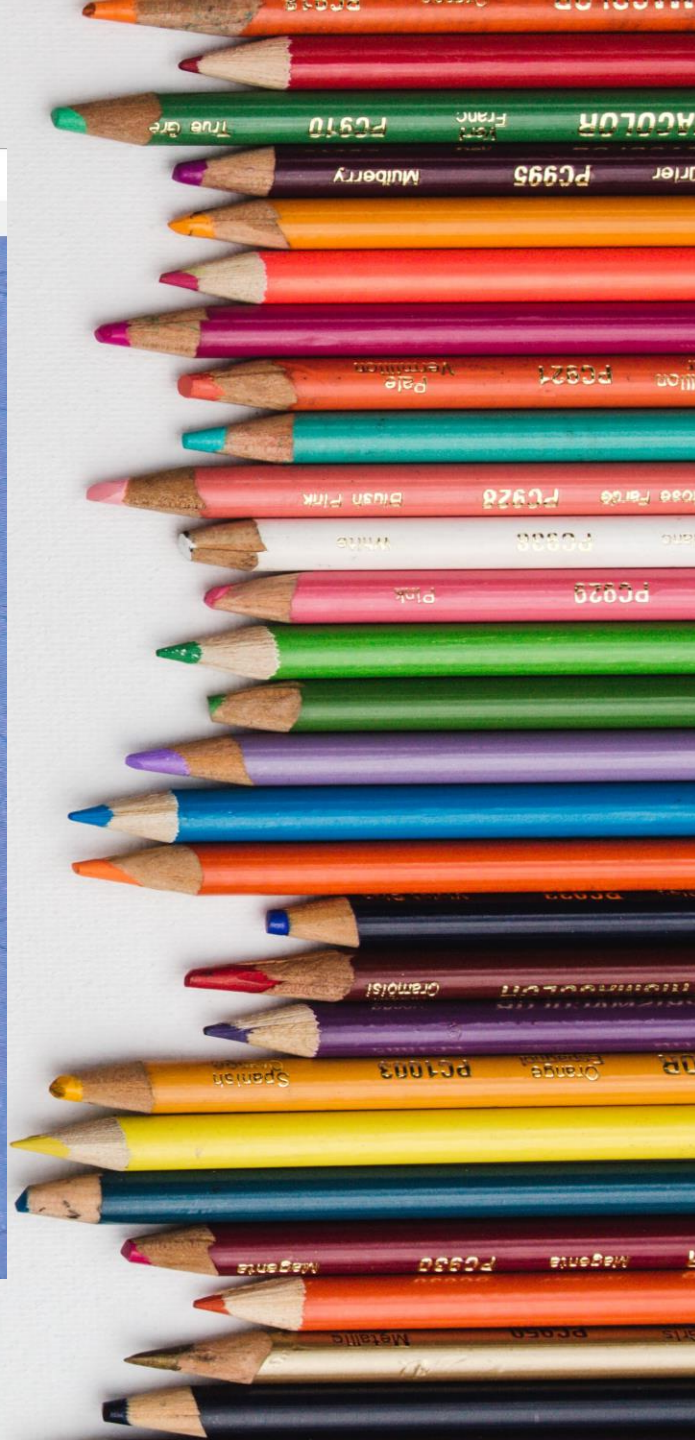| Roll a Dice P1	Dice Value	Roll a Dice P2
19	3	25

GIF FILE

You reach at 28.You can climb up the ladder: You will reach at 84

OK

SNAKES & LADDERS

100	99	98	97	96	95	94	93	92	91
81	82	83	84	85	86	87	88	89	90
80	79	78	77	76	75	74	73	72	71
61	62	63	64	65	66	67	68	69	70
60	59	58	57	56	55	54	53	52	51
41	42	43	44	45	46	47	48	49	50
40	39	38	37	36	35	34	33	32	31
21	22	23	24	25	26	27	28	29	30
20	19	18	17	16	15	14	13	12	11
1	2	3	4	5	6	7	8	9	10

Player 1   Player 2

Roll a Dice P1	Dice Value	Roll a Dice P2
19	3	97

GIF FILE

Congratulations! You won.

OK
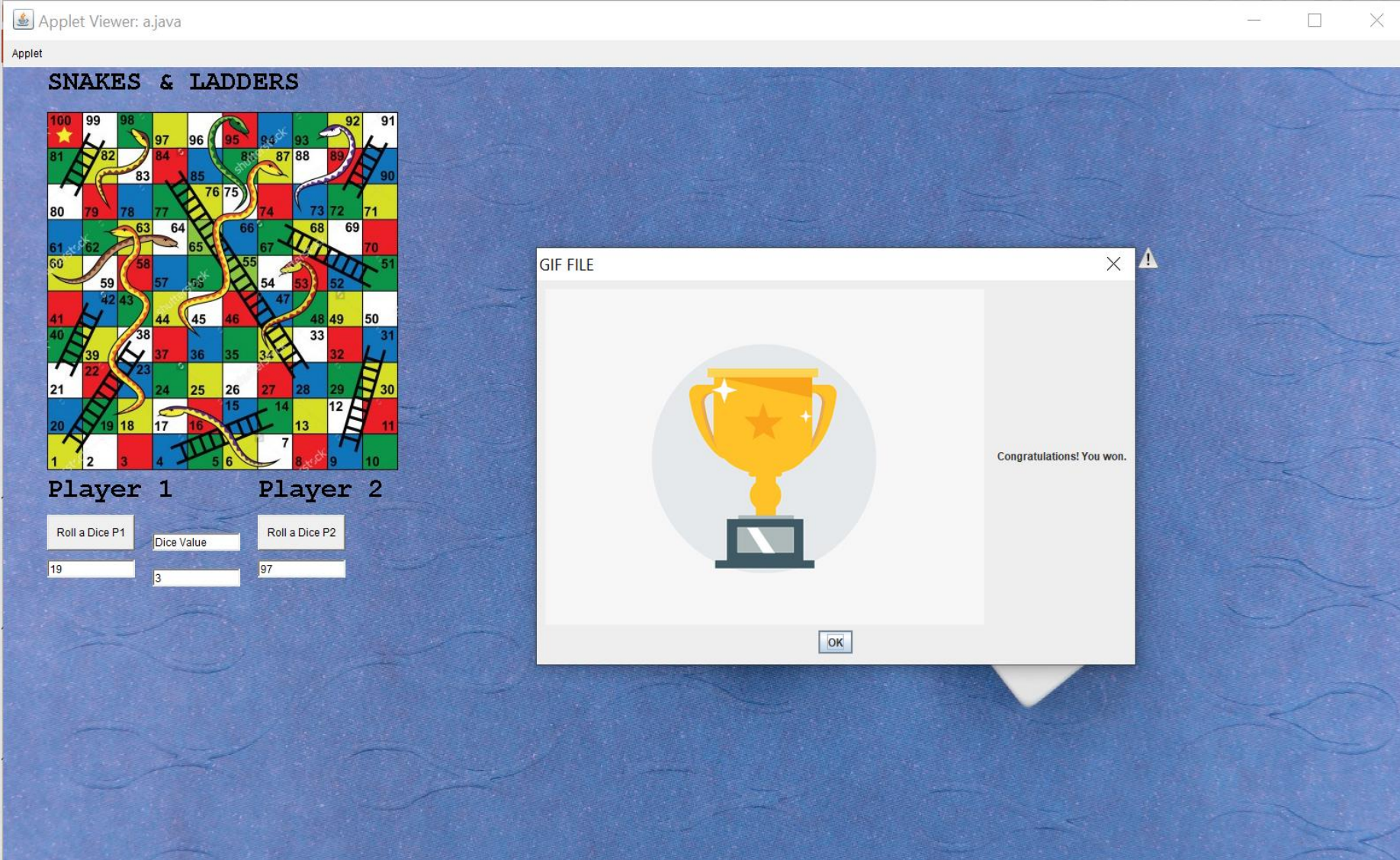
Guideline for players as shown using video representation:
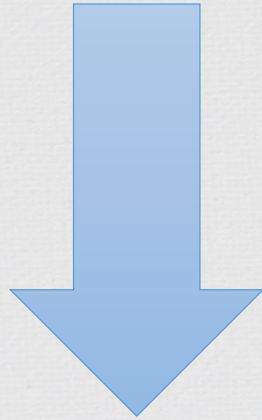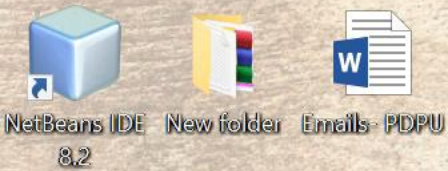
Application of Project :

➢Entertainment