# Leap year

```
In [12]:
```

```
year=int(input("Enter the year from 1900 and 2100 = "))
if(year>1900 and year<2100):
    if(year%4==0 and year%100!=0):
        print("Leap year")
    else:
        print("Not a leap year")
else:
    print("Enter within range")</pre>
```

Enter the year = 2024 Leap year

## Calender

```
In [20]:
```

Enter month in MM = 06 June 30

### **Discount calculator**

```
In [24]:
```

```
purchase=int(input("Total amount purchased = "))
if(purchase < 100):
    print("No discount")
elif(purchase >= 100 and purchase <=150):
    print("Discount is 10%")
elif(purchase >= 150 and purchase <=200):
    print("Discount is 15%")
elif(purchase >= 200 and purchase <=250):
    print("Discount is 20%")
else:
    print("Discount is 25%")</pre>
```

Total amount purchased = 111 Discount is 10%

```
In [ ]:
```

## **Maths Quiz**

```
In [32]:
```

```
lose=True
won1=False
won2=False
won3=False
while(lose):
    if(won1==False):
         a1=int(input("What is 5 times 5 ? = "))
        if(a1==25):
            print("Correct!")
            won1=True
        else:
            print("Incorrect Try again")
    if(won2==False):
        a2=int(input("What is 19 - 6 ? = "))
        if(a2==13):
            print("Correct!")
            won2=True
        else:
            print("Incorrect Try again")
            continue
    if(won3==False):
        a3=int(input("What is 55 + 45 ? ="))
        if(a3==100):
            print("Correct!")
            print("Thanks for playing!")
            lose=False
        else:
            print("Incorrect Try again")
            continue
```

```
What is 5 times 5 ? = 25
Correct!
What is 19 - 6 ? = 13
Correct!
What is 55 + 45 ? =99
Incorrect Try again
What is 55 + 45 ? =47
Incorrect Try again
What is 55 + 45 ? =100
Correct!
Thanks for playing!
```

# **Rock Paper Scissors Game**

#### In [33]:

```
player1=input("= ")
player2=input("= ")
if(player1=="rock" and player2=="scissors"):
    print("Player 1 wins!")
elif(player1=="rock" and player2=="paper"):
    print("Player 2 wins!")
elif(player1=="scissors" and player2=="rock"):
    print("Player 2 wins!")
elif(player1=="scissors" and player2=="paper"):
    print("Player 1 wins!")
elif(player1=="paper" and player2=="rock"):
    print("Player 1 wins!")
elif(player1=="paper" and player2=="scissors"):
    print("Player 2 wins!")
else:
    print("It's a tie")
```

```
= rock
= scissors
Player 1 wins!
```