

# ASSIGNMENT 1

```
int baselineTemp = 0;
int celsius = 0;
int fahrenheit = 0;
int pinSensor = 2;
int pinBuzzer = 7;
int pirSensor = 0;
void setup()
{
  pinMode(A0, INPUT);
  Serial.begin(9600);
  pinMode(pinSensor, INPUT);
  pinMode(pinBuzzer, OUTPUT);
  pinMode(7, OUTPUT);
}
```

```
}  
void loop()  
{  
  baselineTemp = 60;  
  pirSensor = digitalRead(pinSensor);  
  celsius = map(((analogRead(A0) - 20) * 3.04), 0, 1023, -40, 125);  
  fahrenheit = ((celsius * 9) / 5 + 32);  
  Serial.print(celsius);  
  Serial.print(" C, ");  
  Serial.print(fahrenheit);  
  Serial.println(" F");  
  if  
(celsius >= baselineTemp + 1) { tone(7, 220, 100);  
    delay(100);  
  }  
  if (pirSensor == HIGH)  
  {  
    tone(pinBuzzer, 1000, 500);  
  }  
  delay(100);  
}
```

