```
// POST Accelerometer test
// Test to see if your accelorometer is working o

// Global Variables
// Low accelerometer variables
   const int ACCL_X  =  A3;
   const int ACCL_Y  =  A4;
   const int ACCL_Z = A5;
   int LX;
   int LY;
   int LZ;
   float LXmV;
   float LYmV;
   float LZmV;

// Medium accelerometer variables
   const int ACCM_X  =  A0;
   const int ACCM_Y  =  A1;
   const int ACCM_Z = A2;
   int MX;
   int MY;
   int MZ;
   float MXmV;
   float MYmV;
   float MZmV;

// High accelerometer variables
   const int ACCH_Z = A6;
   int HZ;
   float HZmV;
```

```
 void setup() {
// initialize serial communication at 9600 bits p
   Serial.begin(9600);
//Sets up the pins as inputs
   pinMode(ACCL_X,INPUT);
   pinMode(ACCL_Y,INPUT);
   pinMode(ACCL_Z,INPUT);
   pinMode(ACCM_X,INPUT);
   pinMode(ACCM_Y,INPUT);
   pinMode(ACCM_Z,INPUT);
   pinMode(ACCH_Z,INPUT);
  }

 void loop() {
//Read the accelerometer. (output is a number bet
    LX =analogRead(ACCL_X);
    LY =analogRead(ACCL_Y);
    LZ =analogRead(ACCL_Z);
    MX =analogRead(ACCM_X);
    MY =analogRead(ACCM_Y);
    MZ =analogRead(ACCM_Z);
    HZ =analogRead(ACCH_Z);

//Convert readings into millivolts
   LXmV = LX * 4.9;
   LYmV = LY * 4.9;
   LZmV = LZ * 4.9;
   MXmV = MX * 4.9;
   MYmV = MY * 4.9;
```

```
    MZmV = MZ * 4.9;
    HZmV = HZ * 4.9;

  // print out the X Accel values
    Serial.print("X ");
    Serial.print(LX);
    Serial.print("\t");
    Serial.print(LXmV,0);
    Serial.print("\t");
    Serial.print(MX);
    Serial.print("\t");
    Serial.print(MXmV,0);
    Serial.print("\t");

  //  print  out  the  Y  Accel  values
    Serial.print("Y ");
    Serial.print(LY);
    Serial.print("\t");
    Serial.print(LYmV,0);
    Serial.print("\t");
    Serial.print(MY);
    Serial.print("\t");
    Serial.print(MYmV,0);
    Serial.print("\t");

  //  print  out  the  Z  Accel  values
    Serial.print("Z ");
    Serial.print(LZ);
    Serial.print("\t");
    Serial.print(LZmV,0);
```

```
    Serial.print("\t");
    Serial.print(MZ);
    Serial.print("\t");
    Serial.print(MZmV,0);
    Serial.print("\t");
    Serial.print(HZ);
    Serial.print("\t");
    Serial.println(HZmV,0);

// delay in between reads for stability
    delay(100);
 }
```