

```
#include <AccelStepper.h>
```

```
#define HALFSTEP 8
```

```
#define motorPin1 3
```

```
#define motorPin2 4
```

```
#define motorPin3 5
```

```
#define motorPin4 6
```

```
AccelStepper stepper1(HALFSTEP, motorPin1, motorPin3, motorPin2, motorPin4);
```

```
int rotation;
```

```
void setup() {
```

```
  Serial.begin(9600);
```

```
  stepper1.setMaxSpeed(5000.0);
```

```
  stepper1.setAcceleration(500.0);
```

```
}
```

```
void loop() {
```

```
  while (Serial.available() == 0) {}
```

```
rotation = Serial.parseInt();
rotation = rotation * 4076;
Serial.println(rotation);
if (rotation > 0) {
  while (stepper1.currentPosition() < rotation) {
    stepper1.moveTo(rotation);
    stepper1.run();
    Serial.println(stepper1.currentPosition());
  }
} else if (rotation < 0) {
  while (stepper1.currentPosition() > rotation) {
    stepper1.moveTo(rotation);
    stepper1.run();
    Serial.println(stepper1.currentPosition());
  }
}
stepper1.setCurrentPosition(0);
}
```