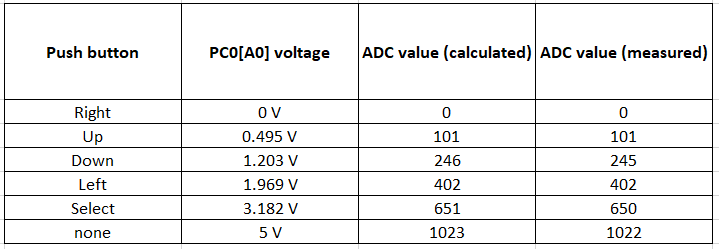
**1.**



**2.**

ISR(ADC\_vect)

{

//clear decimal and hex position

*uint16\_t* value = ADC;

char lcd\_string[8] = " ";

lcd\_gotoxy(8, 0);

lcd\_puts(lcd\_string);

//print ADC value on LCD in decimal

*itoa*(value, lcd\_string, 10);

lcd\_gotoxy(8, 0);

lcd\_puts(lcd\_string);

if (value < 700)

{

// Send data uart

uart\_puts("ADC value in decimal: ");

uart\_puts(lcd\_string);

uart\_puts("\r\n");

}

//print ADC value on LCD in hex

*itoa*(value, lcd\_string, 16);

lcd\_gotoxy(13, 0);

lcd\_puts(lcd\_string);

//clear key positions

*itoa*(value, lcd\_string, 16);

lcd\_gotoxy(8, 1);

lcd\_puts(" ");

lcd\_gotoxy(8, 1);

if (value > 1016)

{

lcd\_puts("None");

}

// od do

else if (1017 > value && value > 549)

{

lcd\_puts("Select");

}

else if (550 > value && value > 349)

{

lcd\_puts("Left");

}

else if (350 > value && value > 149)

{

lcd\_puts("Down");

}

else if (150 > value && value > 50)

{

lcd\_puts("Up");

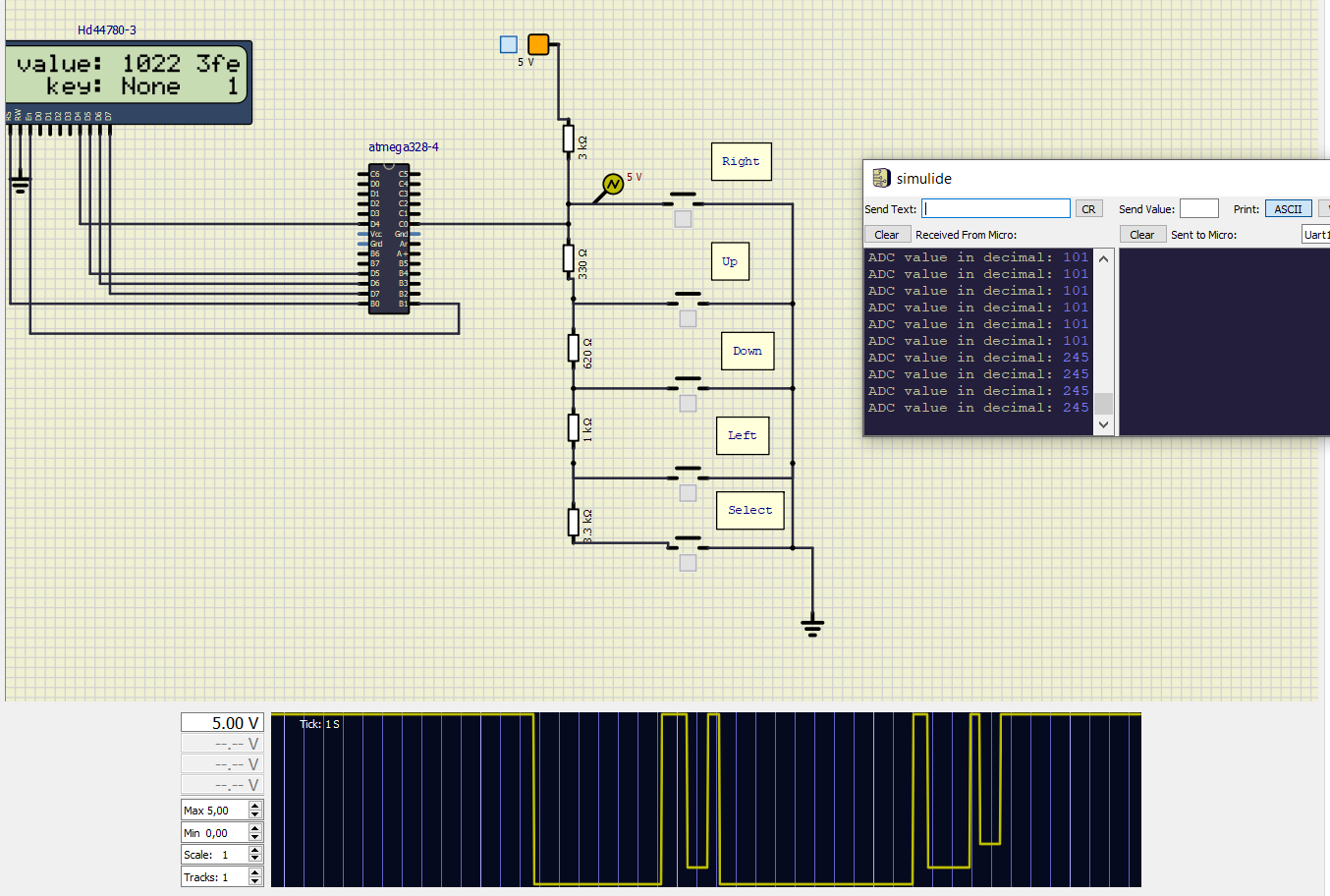
}

else

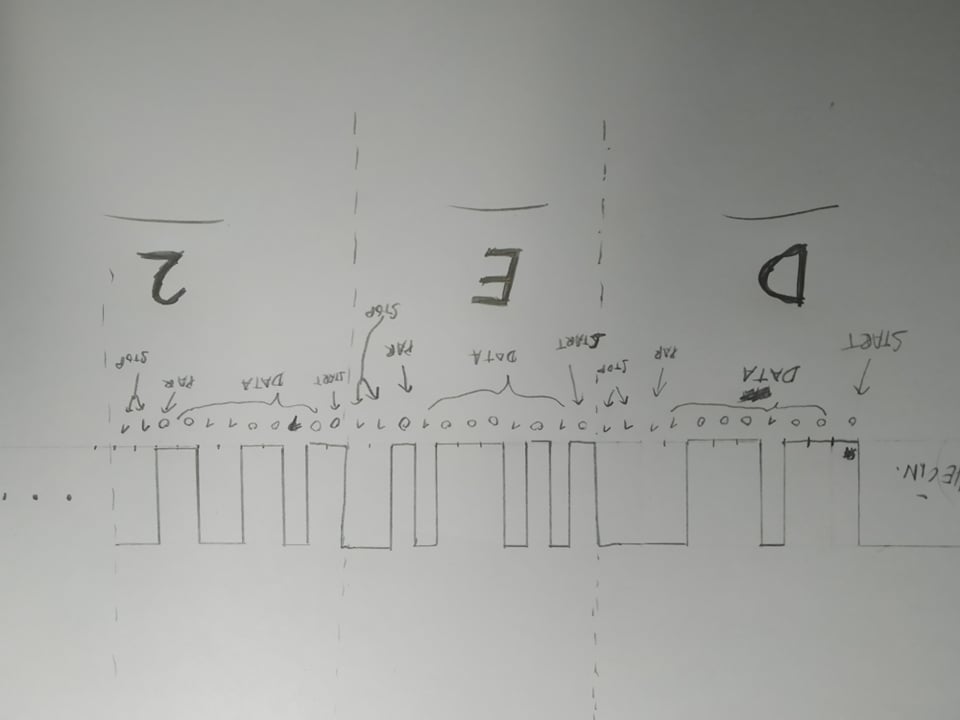
{

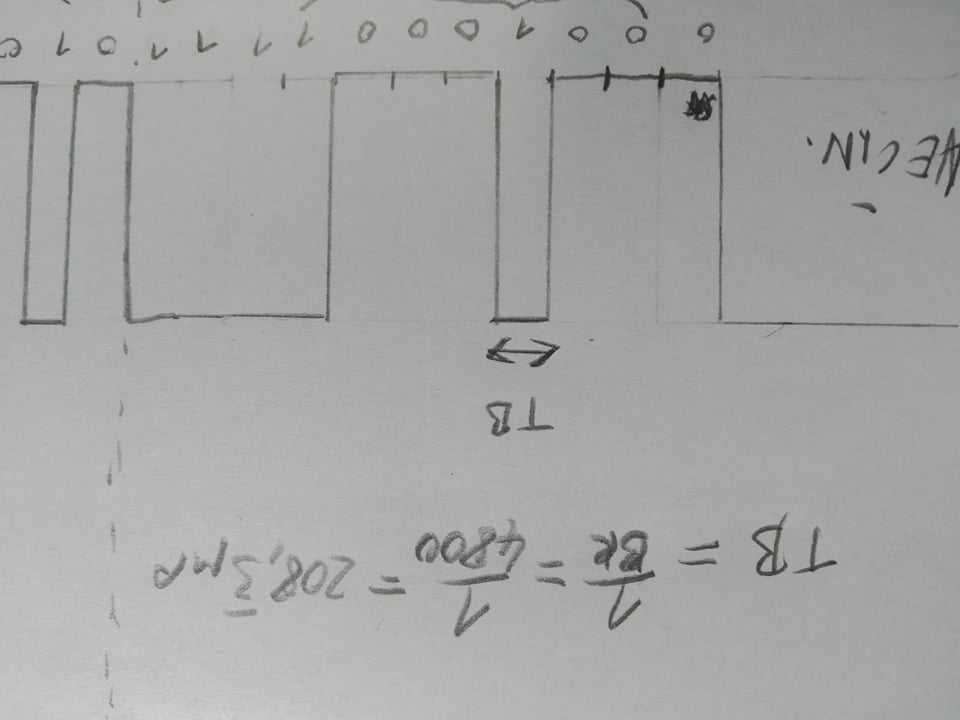
lcd\_puts("Right");

}

****}

**3.**

****

****

//par bit odd

lcd\_gotoxy(15,1);

if(value %2 == 0)

{

lcd\_puts("1");

}

else

{

lcd\_puts("0");

}