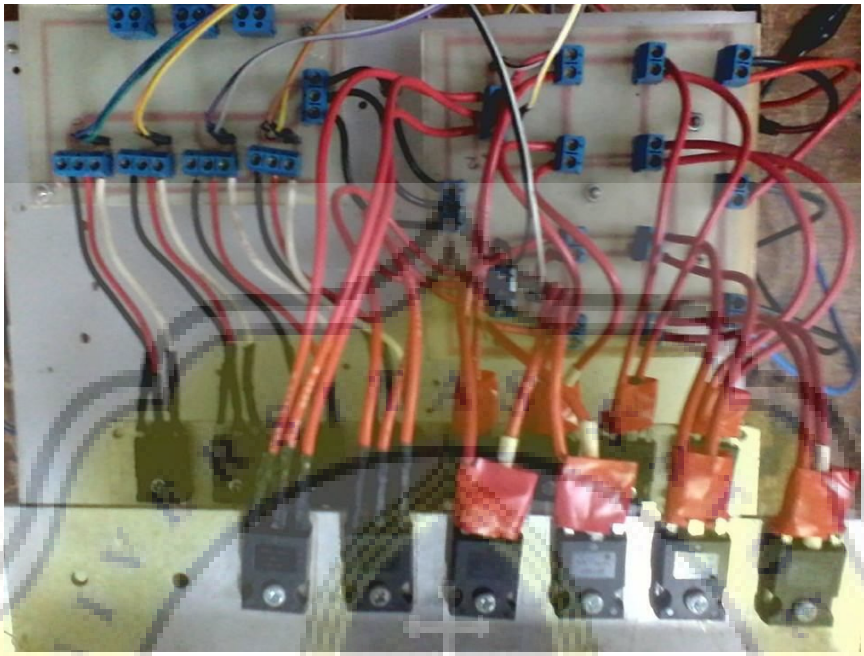
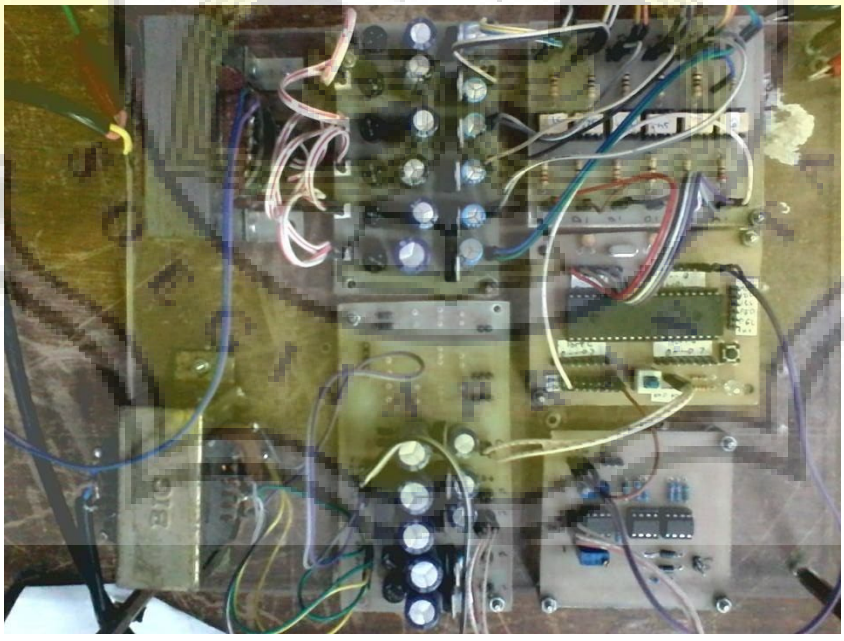
Lampiran



Hardware Inverter Tujuh Level Berbasis Modulasi Lebar Pulsa Sinusoidal dengan PIC18F4550 (bagian atas)



Hardware Inverter Tujuh Level Berbasis Modulasi Lebar Pulsa Sinusoidal dengan PIC18F4550 (bagian bawah)

```
unsigned  bil1,bil2,bil3,gnd,in21,in22,in23,in24;
unsigned  AD0,AD1;
unsigned  jumlah1,jumlah2;

void main()
{
  CMCON|=7;
  TRISB = 0;              // PORTB is output
  PORTB = 0xFF;           // Initialize PORTB
  TRISD = 0;              // PORTD is output
  PORTD = 0xFF;           // Initialize PORTD
  ADCON1 = 0b00001101;
  T0CON = 0b11000000;
  ADC_init();
  //TMR0L  = 0;             // Timer0 initial value
while(1)
{
     bil1=TMR0L/3;
     bil2=bil1+85;
     bil3=bil2+85;
     gnd=1;


     AD0=ADC_get_sample(0)/4;        //sefasa dengan jala"
     AD1=ADC_get_sample(1)/4;        //berbalik fasa dengan jala"

//SAKLAR

//s1

jumlah1=in21+in24;
PORTD.F0=jumlah1;

//s2

jumlah2=in22+in23;
PORTD.F1=jumlah2;

//s3
if(AD0>=bil3)
{
PORTD.F2=1;
}

if(AD0<=bil3)
{
PORTD.F2=0;
}
```

```
//S4
if(AD1>=bil3)
{
PORTD.F3=1;
}

if(AD1<=bil3)
{
PORTD.F3=0;
}

//s5

if(AD1>=gnd)
{
PORTD.F4=1;
}

if(AD1<gnd)
{
PORTD.F4=0;
}

//S6
if(AD0>gnd)
{
PORTD.F5=1;
}

if(AD0<=gnd)
{
PORTD.F5=0;
}

//s21
if(AD0>bil2)
{
in21=1;
}

if(AD0<bil2)
{
in21=0;
}

//s22
if(AD0>bil1)
```

```
{
in22=1;
}

if(AD0<bil1)
{
in22=0;
}


//S23
if(AD1>bil2)
{
in23=1;
}

if(AD1<bil2)
{
in23=0;
}

//S24
if(AD1>bil1)
{
in24=1;
}

if(AD1<bil1)
{
in24=0;
}

}
}
```