

PLL

Report (Stage-2)

Submitted by: Venkata Ashok Kumar

1. For input frequency (f_{in}) = 5MHz

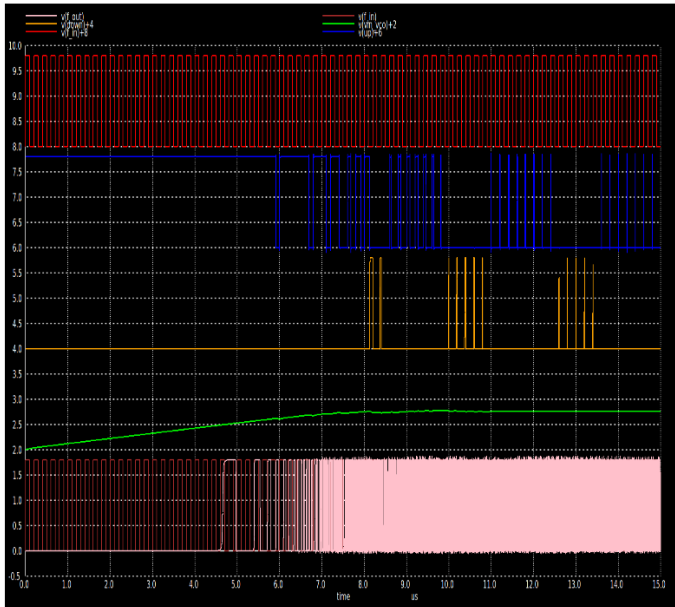


Fig: Waveforms at each node of PLL

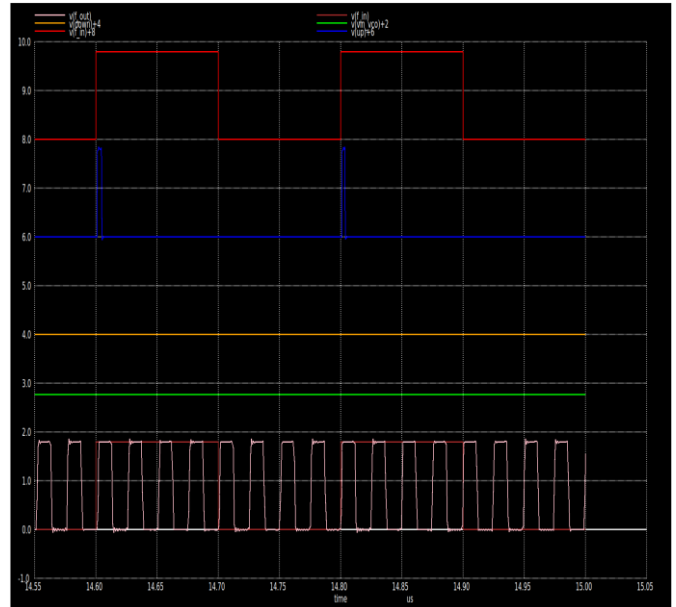


Fig: Waveforms at each node of PLL (magnified)

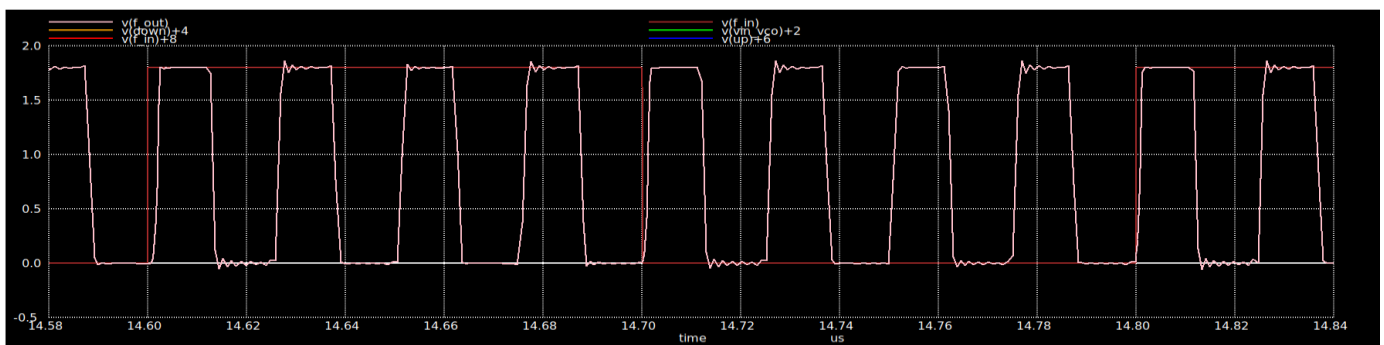


Fig: Waveform showing input and output comparison

Result:

Input Frequency (f_{in})	5MHz
Output Frequency (f_{out})	41.1MHz

2.For input frequency (f_in) = 10MHz

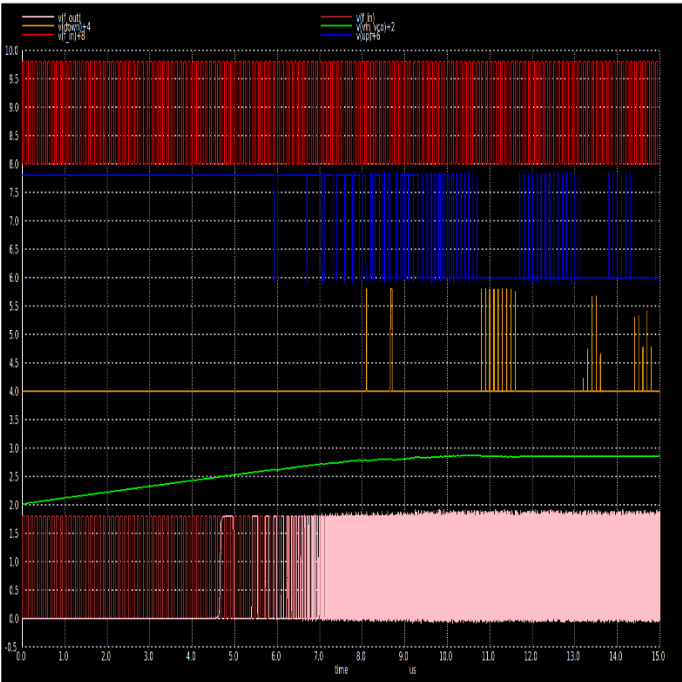


Fig:Waveforms at each node of PLL

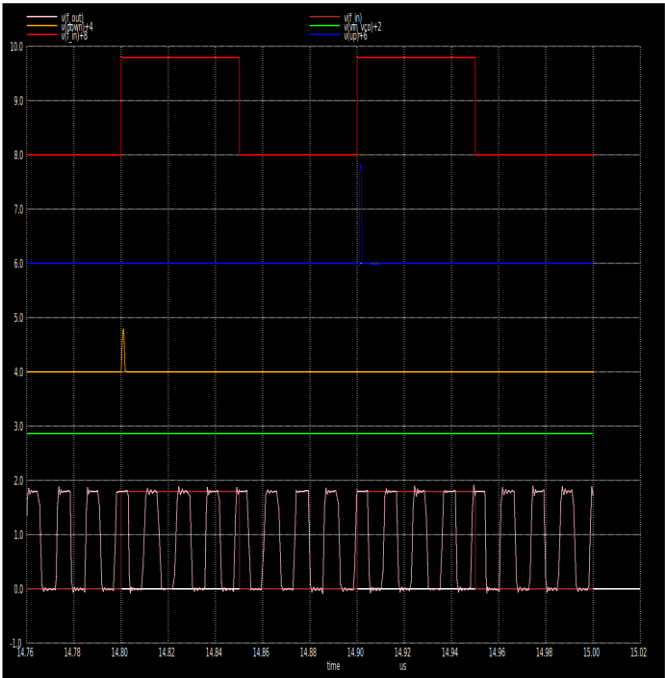


Fig: Waveforms at each node of PLL(magnified)

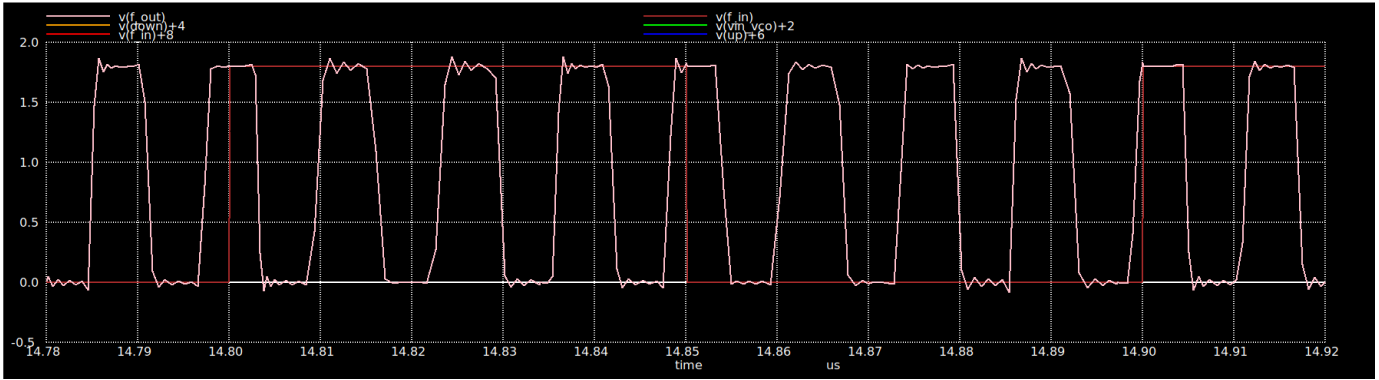


Fig:Waveform showing input and output comparison

Result:

Input Frequency (f_in)	10MHz
Output Frequency(f_out)	80.64MHz

2.For input frequency (f_in) = 12MHz

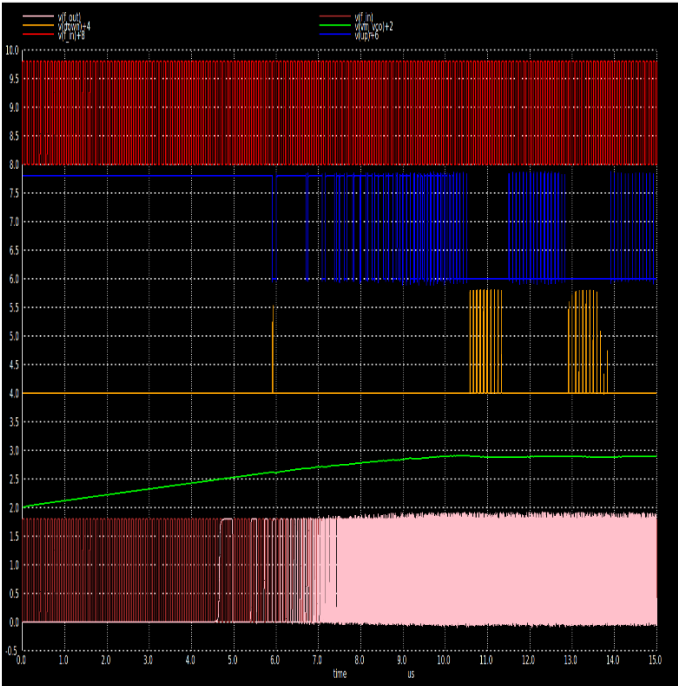


Fig:Waveforms at each node of PLL

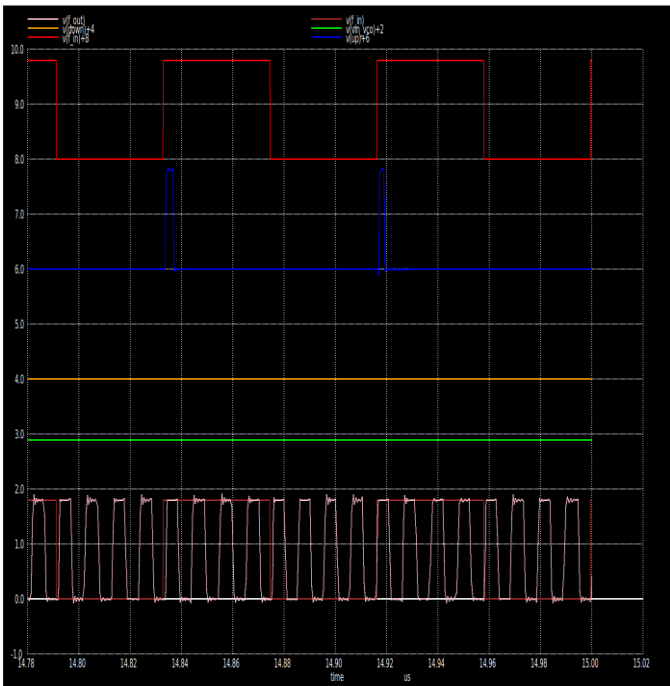


Fig: Waveforms at each node of PLL(magnified)

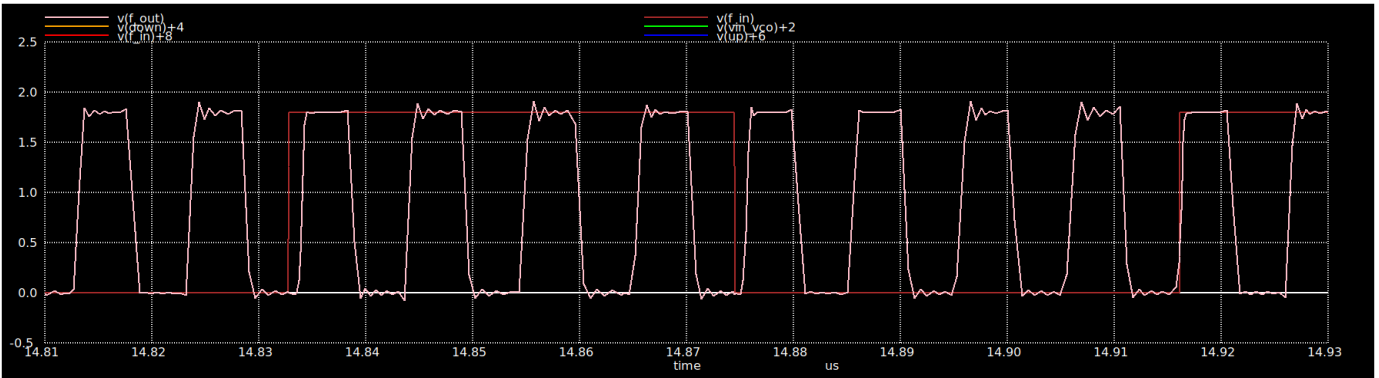


Fig:Waveform showing input and output comparison

Result:

Input Frequency (f_in)	12MHz
Output Frequency(f_out)	96.153MHz