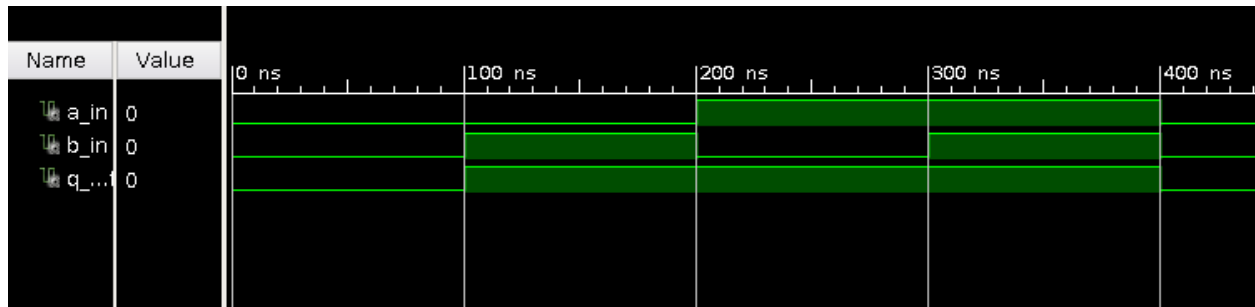


Arka Mandal(2019CS50617)
Mohit Sharma(2019CS10372)
COL215 Lab1



OR GATE Simulation

UTILIZATION REPORT

Copyright 1986-2016 Xilinx, Inc. All Rights Reserved.

```
-----
| Tool Version : Vivado v.2016.4 (lin64) Build 1756540 Mon Jan 23 19:11:19 MST 2017
| Date       : Tue Apr 26 15:51:15 2022
| Host      : teesta running 64-bit Ubuntu 16.04.7 LTS
| Command   : report_utilization -file project_test_utilization_synth.rpt -pb
              project_test_utilization_synth.pb
              | Design    : project_test
              | Device    : 7a35tcp236-1
              | Design State : Synthesized
-----
```

Utilization Design Information

Table of Contents

- ```

1. Slice Logic
1.1 Summary of Registers by Type
2. Memory
3. DSP
4. IO and GT Specific
5. Clocking
6. Specific Feature
7. Primitives
8. Black Boxes
```

## 9. Instantiated Netlists

### 1. Slice Logic

-----

| Site Type             | Used | Fixed | Available | Util% |
|-----------------------|------|-------|-----------|-------|
| Slice LUTs*           | 1    | 0     | 20800     | <0.01 |
| LUT as Logic          | 1    | 0     | 20800     | <0.01 |
| LUT as Memory         | 0    | 0     | 9600      | 0.00  |
| Slice Registers       | 0    | 0     | 41600     | 0.00  |
| Register as Flip Flop | 0    | 0     | 41600     | 0.00  |
| Register as Latch     | 0    | 0     | 41600     | 0.00  |
| F7 Muxes              | 0    | 0     | 16300     | 0.00  |
| F8 Muxes              | 0    | 0     | 8150      | 0.00  |

\* Warning! The Final LUT count, after physical optimizations and full implementation, is typically lower. Run opt\_design after synthesis, if not already completed, for a more realistic count.

### 1.1 Summary of Registers by Type

-----

| Total | Clock Enable | Synchronous | Asynchronous |
|-------|--------------|-------------|--------------|
| 0     | _            | -           | -            |
| 0     | _            | -           | Set          |
| 0     | _            | -           | Reset        |
| 0     | _            | Set         | -            |
| 0     | _            | Reset       | -            |
| 0     | Yes          | -           | -            |
| 0     | Yes          | -           | Set          |
| 0     | Yes          | -           | Reset        |
| 0     | Yes          | Set         | -            |
| 0     | Yes          | Reset       | -            |

### 2. Memory

-----

+-----+-----+-----+-----+

| Site Type      | Used | Fixed | Available | Util% |
|----------------|------|-------|-----------|-------|
| Block RAM Tile | 0    | 0     | 50        | 0.00  |
| RAMB36/FIFO*   | 0    | 0     | 50        | 0.00  |
| RAMB18         | 0    | 0     | 100       | 0.00  |

\* Note: Each Block RAM Tile only has one FIFO logic available and therefore can accommodate only one FIFO36E1 or one FIFO18E1. However, if a FIFO18E1 occupies a Block RAM Tile, that tile can still accommodate a RAMB18E1

### 3. DSP

| Site Type | Used | Fixed | Available | Util% |
|-----------|------|-------|-----------|-------|
| DSPs      | 0    | 0     | 90        | 0.00  |

### 4. IO and GT Specific

| Site Type                   | Used | Fixed | Available | Util% |
|-----------------------------|------|-------|-----------|-------|
| Bonded IOB                  | 3    | 0     | 106       | 2.83  |
| Bonded IPADs                | 0    | 0     | 10        | 0.00  |
| Bonded OPADs                | 0    | 0     | 4         | 0.00  |
| PHY_CONTROL                 | 0    | 0     | 5         | 0.00  |
| PHASER_REF                  | 0    | 0     | 5         | 0.00  |
| OUT_FIFO                    | 0    | 0     | 20        | 0.00  |
| IN_FIFO                     | 0    | 0     | 20        | 0.00  |
| IDELAYCTRL                  | 0    | 0     | 5         | 0.00  |
| IBUFDS                      | 0    | 0     | 104       | 0.00  |
| GTPE2_CHANNEL               | 0    | 0     | 2         | 0.00  |
| PHASER_OUT/PHASER_OUT_PHY   | 0    | 0     | 20        | 0.00  |
| PHASER_IN/PHASER_IN_PHY     | 0    | 0     | 20        | 0.00  |
| IDELAYE2/IDELAYE2_FINEDELAY | 0    | 0     | 250       | 0.00  |
| IBUFDS_GTE2                 | 0    | 0     | 2         | 0.00  |
| ILOGIC                      | 0    | 0     | 106       | 0.00  |
| OLOGIC                      | 0    | 0     | 106       | 0.00  |

## 5. Clocking

-----

| Site Type  | Used | Fixed | Available | Util% |
|------------|------|-------|-----------|-------|
| BUFGCTRL   | 0    | 0     | 32        | 0.00  |
| BUFIO      | 0    | 0     | 20        | 0.00  |
| MMCME2_ADV | 0    | 0     | 5         | 0.00  |
| PLLE2_ADV  | 0    | 0     | 5         | 0.00  |
| BUFMRCE    | 0    | 0     | 10        | 0.00  |
| BUFHCE     | 0    | 0     | 72        | 0.00  |
| BUFR       | 0    | 0     | 20        | 0.00  |

## 6. Specific Feature

-----

| Site Type   | Used | Fixed | Available | Util% |
|-------------|------|-------|-----------|-------|
| BSCANE2     | 0    | 0     | 4         | 0.00  |
| CAPTUREE2   | 0    | 0     | 1         | 0.00  |
| DNA_PORT    | 0    | 0     | 1         | 0.00  |
| EFUSE_USR   | 0    | 0     | 1         | 0.00  |
| FRAME_ECCE2 | 0    | 0     | 1         | 0.00  |
| ICAPE2      | 0    | 0     | 2         | 0.00  |
| PCIE_2_1    | 0    | 0     | 1         | 0.00  |
| STARTUPE2   | 0    | 0     | 1         | 0.00  |
| XADC        | 0    | 0     | 1         | 0.00  |

## 7. Primitives

-----

| Ref Name | Used | Functional Category |
|----------|------|---------------------|
| IBUF     | 2    | IO                  |
| OBUF     | 1    | IO                  |

|               |   |     |
|---------------|---|-----|
| LUT2          | 1 | LUT |
| +-----+-----+ |   |     |

## 8. Black Boxes

-----

|               |      |
|---------------|------|
| +-----+-----+ |      |
| Ref Name      | Used |
| +-----+-----+ |      |

## 9. Instantiated Netlists

-----

|               |      |
|---------------|------|
| +-----+-----+ |      |
| Ref Name      | Used |
| +-----+-----+ |      |