Kutter Aaron

Jacob Circua

Will Townsend

Program 2 Report

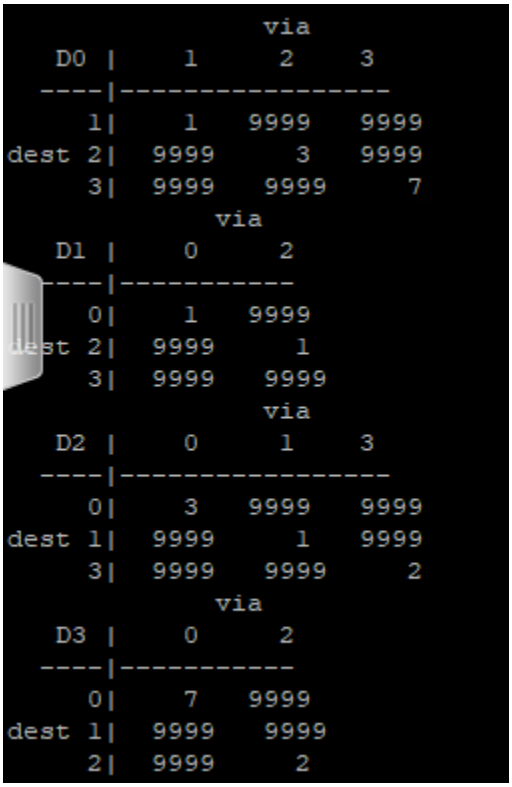
Our group finished all the assigned tasks. We implemented the code that we needed to for the rtinit0, rtinit1, rtinit2, rtinit3, and for rtupdate0, rtupdate1, rtupdate0, rtupdate1. The only help we got was the base code that came with the assignment, and obviously the portion of the book that went over the distance vector routing protocol. We only met once, which was on Monday, April 26th, from 7:30-9:30PM. For the most part, we individually worked on the program and then came together on the 26th to make sure we all had working code. We then just combined what he had and made it as optimized as possible. It took each of us individually about 3-5 hours to do, and we spent the extra 2 hours together on the 26th to combine it all into one functioning program.

We commented out the lines of code that printed the time when certain functions were called (or when the table is updated) just so the demo looked cleaner, so you will have to comment those out to see that portion of the code. Also, when you run it you will notice that it prints out the tables over and over again, until they can no longer update with new information. The last time a table was printed (say dt0), is the last iteration of that table, meaning it is the final table result.

In order to compile this program we did this command on the HPCL terminal:

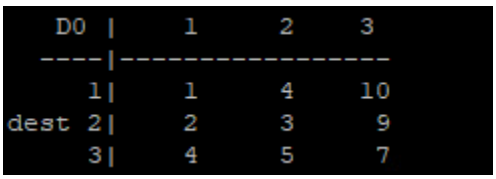
gcc -std=c99 prog3.c node0.c node1.c node2.c node3.c

Below are the initial results of each table:

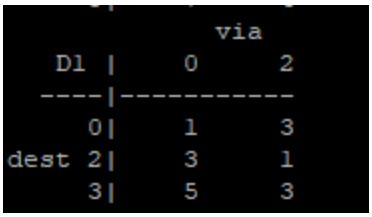


```
                via
   D0 |    1     2    3
  ----|-----------------
     1|    1   9999   9999
dest 2| 9999     3   9999
     3| 9999   9999     7
           via
   D1 |    0     2
  ----|-----------
     0|    1   9999
dest 2| 9999     1
     3| 9999   9999
                via
   D2 |    0     1    3
  ----|-----------------
     0|    3   9999   9999
dest 1| 9999     1   9999
     3| 9999   9999     2
           via
   D3 |    0     2
  ----|-----------
     0|    7   9999
dest 1| 9999   9999
     2| 9999     2
```

And the final results are:



```
   D0 |    1     2    3
  ----|-----------------
     1|    1     4   10
dest 2|    2     3    9
     3|    4     5    7
```



```
           via
   D1 |    0     2
  ----|-----------
     0|    1     3
dest 2|    3     1
     3|    5     3
```

		via	
D2	0	1	3
dest 0	3	2	6
dest 1	4	1	5
dest 3	7	4	2

	via	
D3	0	2
dest 0	7	4
dest 1	8	3
dest 2	9	2

References:

No references other than our textbook (Chapter 5 pgs 384-391)