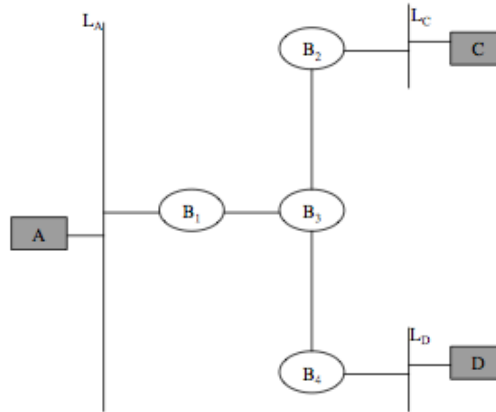**12. [12 points]:** Consider the bridge topology shown the figure below. Assuming that all of the forwarding tables are initially empty, write out the forwarding tables at each of the four bridges $B_1$ through $B_4$ at the conclusion of the following transmissions:

1. A sends to D
2. D sends to A
3. C sends to A

In the forwarding table at each node, identify the port by the unique LAN segment ($L_A$, $L_C$, or $L_D$) reachable using that port, unless there isn't one, in which case use the identifier of the neighboring bridge to identify the port.

**After A sends to D:**

| $B_1$ | | $B_2$ | | $B_3$ | | $B_4$ | |
|---|---|---|---|---|---|---|---|
| Destination | Port | Destination | Port | Destination | Port | Destination | Port |
| A | | A | | A | | A | |
| C | | C | | C | | C | |
| D | | D | | D | | D | |

**After D sends to A:**

| $B_1$ | | $B_2$ | | $B_3$ | | $B_4$ | |
|---|---|---|---|---|---|---|---|
| Destination | Port | Destination | Port | Destination | Port | Destination | Port |
| A | | A | | A | | A | |
| C | | C | | C | | C | |
| D | | D | | D | | D | |

**After C sends to A:**

| $B_1$ | | $B_2$ | | $B_3$ | | $B_4$ | |
|---|---|---|---|---|---|---|---|
| Destination | Port | Destination | Port | Destination | Port | Destination | Port |
| A | | A | | A | | A | |
| C | | C | | C | | C | |
| D | | D | | D | | D | |

**Name:**