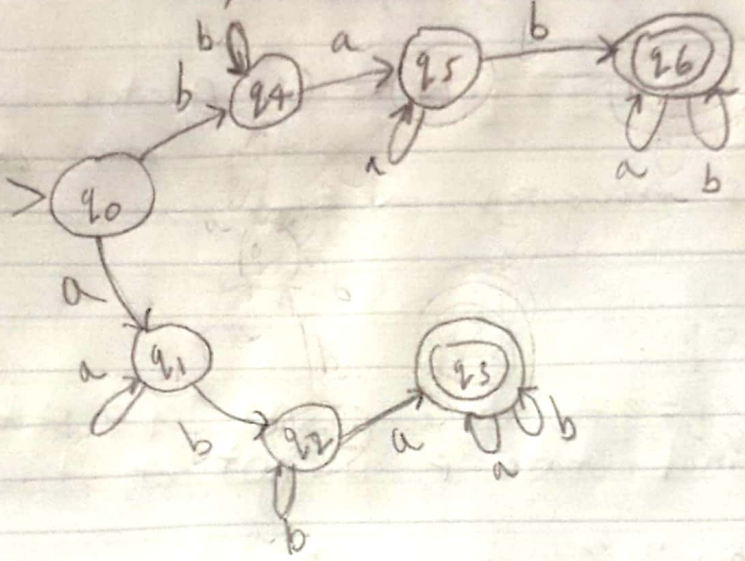
MO2-HW3 Jeremiah Webb

1.

Let $\Sigma = (a, b)$ $\quad L = (aba)^* + (bab)^*$

M:



2.

M:

$Q = \{q_0, q_1, q_2, q_3, q_4, q_5, q_6\}$

$\Sigma = \{a, b\}$

$q_0 = q_0$

$F = \{q_3, q_6\}$

$\delta =$

	a	b
0	1	4
1	1	2
2	3	2
3	3	3
4	5	4
5	5	6
6	6	6

CamScanner

3. $u = ababab$

States visited: q_1, q_2, q_3

$q_1 \xrightarrow{a} q_2 \xrightarrow{b} q_3$ is repeated to obtain other characters.

String is accepted, $u \in L$.

4.

1. For $q_0 = q_7$, there is no q_7 stated.
2. The final state, F, is not q_4, it is q_5.
3. On row "4" you cannot have a n/a.
4. On row "1" you cannot have 0 or 1, it must be only one state.