HW 3   Due: 08 sep 2017
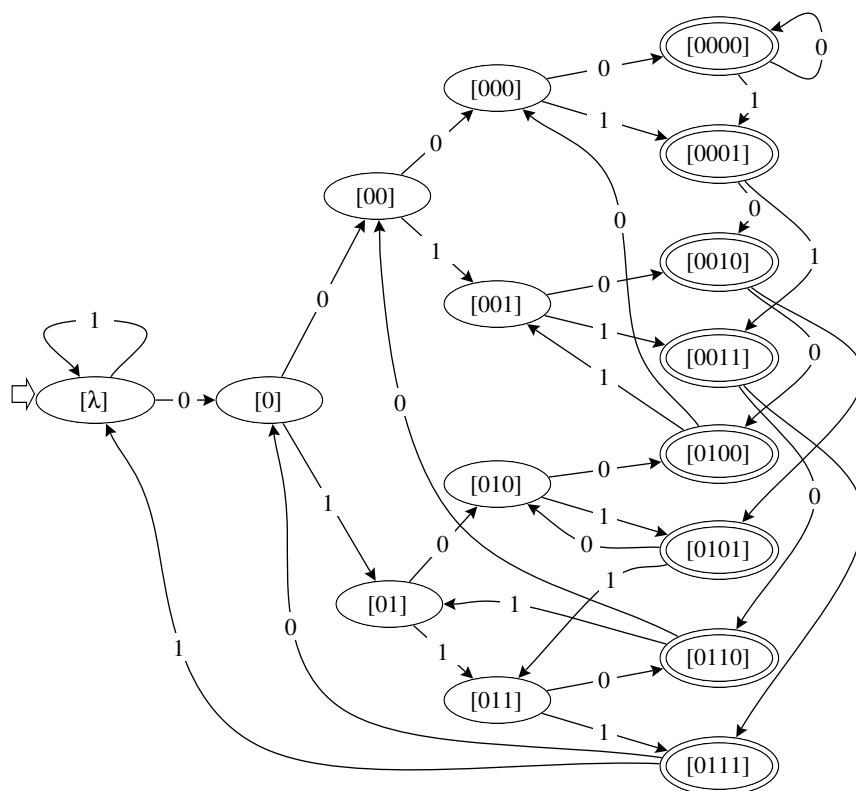
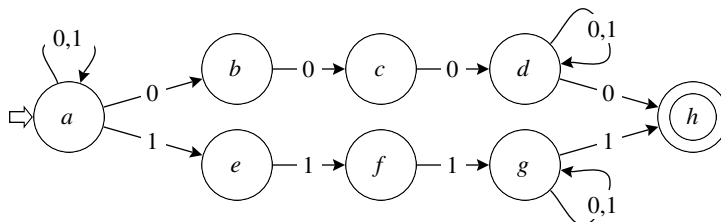1. Define a DFA, simplified to the best of your abilities, to recognize the language $L = \{a^i b^j : (i + j) \bmod 3 = 0\}$.   50

2. Describe in a short English sentence the language accepted by the following DFA, and give a regular expression for it (hint: the "names" of the states reflect their meaning). Then, define a 5-state NFA that accepts the same language.

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3. Define a DFA equivalent to the following NFA.

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