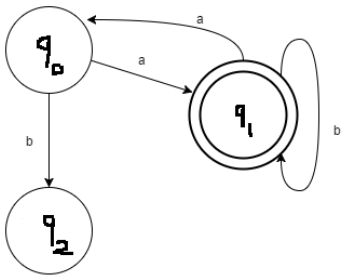
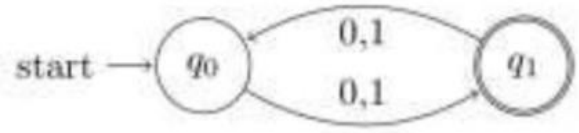
PART – A (10 * 1= 10 Marks)

Answer All

Q. No	Question	Marks	BL	CO	PO	PI Code
1	Identify the correct syntax from the following A. pydatalog.create_terms('X,Y') B. pyDatalog.create_term('X,Y') C. **pyDatalog.create_terms('X','Y')** **D.pyDatalog.create_terms('X,Y')**	**1**	**2**	**4**	**2**	**2.8.2**
2	Predict the output of the following from pyDatalog import pyDatalog pyDatalog.create_terms('X, Y') X = 'pyDatalog' print((Y=='Hello ' + X)) a. Y --- pyDatalog Hello b. X --- pyDatalog Hello c. X --- Hello pyDatalog d. Y --- Hello pyDatalog Ans (D)	**1**	**4**	**4**	**2**	**2.8.2**
3	Bind() needs for binding with socket **a) IP Address and Port number** b) IP version and Port number c) Socket family and port number d) Socket type and port number	**1**	**4**	**4**	**2**	**2.8.2**
4	What is AF_INET in the below code segment? s = socket.scoket(socket.AF_INET, socket.SOCK_STREAM) a. Socket type b. Port number c. **Socket family** d. IP address	**1**	**2**	**4**	**2**	**2.8.2**
5	The ---------- are assigned by automated substitutions, the values in those variables are ---------- variables **a. Most Generic unifiers, Logical** b. Unifier, imperative c. First order logic, sequence d. First order, symbolic	**1**	**1**	**5**	**2**	**2.8.2**
6.	Find the output of the following import sympy as sym sym.simplify((x + x * y) / x) a. X+2 b. X+1 c. Y+2 **d. Y+1**	**1**	**3**	**5**	**2**	**2.8.2**
7.	Find the correct syntax for the expression 2cos(2x) a. sym.diff(sym.tan(2 * x), x) b. sym.diff(sym.cos(2 * x), x) **c. sym.diff(sym.sin(2 * x), x)** d. sym.diff(sym.limit(2 * x), x)	**1**	**4**	**5**	**2**	**2.8.2**
8.	Which of the following is not a part of 5-tuple finite automata? a) Input alphabet b) Transition function c) Initial State d**) Output Alphabet**	**1**	**2**	**5**	**2**	**2.8.2**
9.	Which of the following will not be accepted by the following DFA?  **a) ababaaba** b) abbbaa c) abbbaabb d) abbaabbaa	**1**	**3**	**5**	**2**	**2.8.2**
10.	Which of the following language is accepted the given DFA?	**1**	**2**	**5**	**2**	**2.8.2**

	 A. All binary strings of even length. B. All binary strings with odd difference between number of 0 and number of 1. C. **All binary strings of odd length.** D. All binary strings with odd difference					