g = nx.read\_edgelist("/content/graph\_data\_9.txt",create\_using=nx.Graph(), nodetype = int)

# check if the data has been read properly or not.

nx.info(g)

# count the number of nodes

g.number\_of\_nodes()

# number of self-nodes

g.number\_of\_edges()

/content/graph\_data\_9.txt

obj = cada(g)

print(obj.get\_anomalies\_threshold(2))

print(obj.get\_top\_anomalies())

obj.get\_anomaly\_scores()

output: [4, 2, 0]

[4, 2, 0, 7, 6, 1, 5, 3]

[(4, 4.0),

(2, 3.0),

(0, 3.0),

(7, 2.0),

(6, 2.0),

(1, 2.0),

(5, 1.0),

(3, 1.0)]

Dolphin.txt

Output:

[14, 37, 33, 29, 38, 40, 18, 50, 43, 9, 36, 15, 21, 24, 16, 6, 45, 34, 51, 41, 20, 57, 17, 52, 13, 5, 44, 1, 54, 23, 8, 61, 47, 42, 0, 30, 7, 59, 28, 27, 10]

[14, 37, 33, 29, 38, 40, 18, 50, 43, 9, 36, 15, 21, 24, 16, 6, 45, 34, 51, 41, 20, 57, 17, 52, 13, 5, 44, 1, 54, 23, 8, 61, 47, 42, 0, 30, 7, 59, 28, 27, 10, 53, 46, 39, 55, 56, 2, 19, 25, 32, 3, 26, 48, 58, 49, 60, 35, 31, 22, 12, 11, 4]

[(14, 12.0),

(37, 11.0),

(33, 10.0),

(29, 9.0),

(38, 8.0),

(40, 8.0),

(18, 7.0),

(50, 7.0),

(43, 7.0),

(9, 7.0),

(36, 7.0),

(15, 7.0),

(21, 6.0),

(24, 6.0),

(16, 6.0),

(6, 6.0),

(45, 5.5),

(34, 5.0),

(51, 5.0),

(41, 5.0),

(20, 4.5),

(57, 4.5),

(17, 4.5),

(52, 4.0),

(13, 4.0),

(5, 4.0),

(44, 4.0),

(1, 4.0),

(54, 3.5),

(23, 3.0),

(8, 3.0),

(61, 3.0),

(47, 3.0),

(42, 3.0),

(0, 3.0),

(30, 2.5),

(7, 2.5),

(59, 2.5),

(28, 2.5),

(27, 2.5),

(10, 2.5),

(53, 2.0),

(46, 2.0),

(39, 2.0),

(55, 2.0),

(56, 2.0),

(2, 2.0),

(19, 2.0),

(25, 1.5),

(32, 1.5),

(3, 1.5),

(26, 1.5),

(48, 1.0),

(58, 1.0),

(49, 1.0),

(60, 1.0),

(35, 1.0),

(31, 1.0),

(22, 1.0),

(12, 1.0),

(11, 1.0),

(4, 1.0)]

Karate.txt

Output:

[32, 2, 1, 33, 0, 3, 31, 23, 8, 13, 29, 27, 30, 7, 24, 25, 28, 4, 10, 19]

[32, 2, 1, 33, 0, 3, 31, 23, 8, 13, 29, 27, 30, 7, 24, 25, 28, 4, 10, 19, 26, 22, 20, 18, 15, 14, 9, 5, 6, 12, 17, 21, 16, 11]

[(32, 12.0),

(2, 10.0),

(1, 9.0),

(33, 8.5),

(0, 8.0),

(3, 6.0),

(31, 6.0),

(23, 5.0),

(8, 5.0),

(13, 5.0),

(29, 4.0),

(27, 4.0),

(30, 4.0),

(7, 4.0),

(24, 3.0),

(25, 3.0),

(28, 3.0),

(4, 3.0),

(10, 3.0),

(19, 3.0),

(26, 2.0),

(22, 2.0),

(20, 2.0),

(18, 2.0),

(15, 2.0),

(14, 2.0),

(9, 2.0),

(5, 2.0),

(6, 2.0),

(12, 2.0),

(17, 2.0),

(21, 2.0),

(16, 1.0),

(11, 1.0)]