# Erdos-Renyi model

## Metrics

#### 1. Karate Club

Average Diameter is 4.6 Average Clustering coefficient is 0.12326500297088536 Average Number of connected components is 1.0

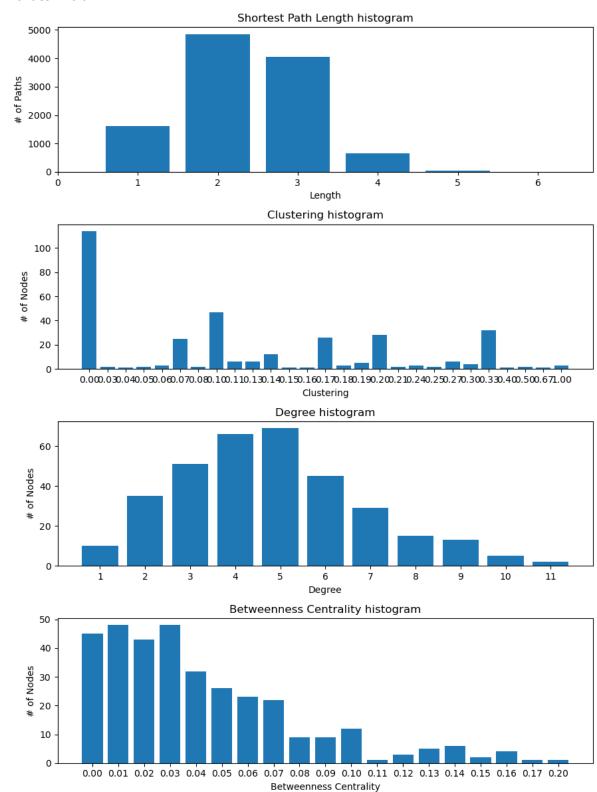
#### 2. Prison

Average Diameter is 5.2 Average Clustering coefficient is 0.08715610260386378 Average Number of connected components is 1.0

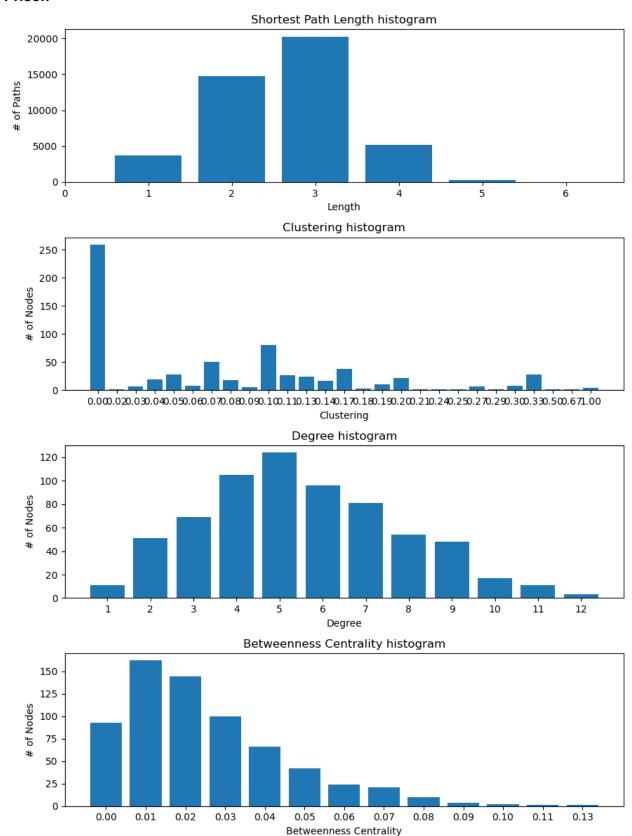
## 3. Dolphin

Average Diameter is 5.0 Average Clustering coefficient is 0.07748185479528763 Average Number of connected components is 1.0

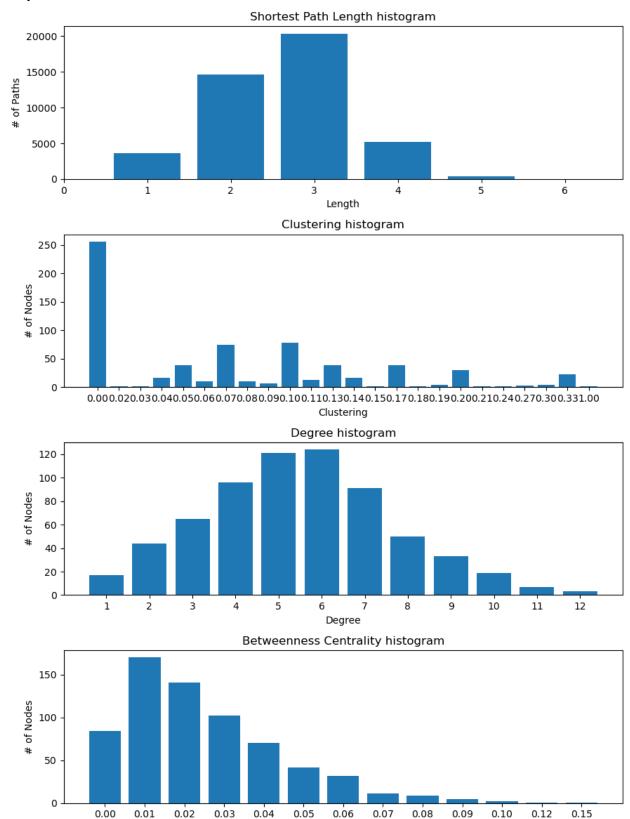
## 1. Karate Club



## 2. Prison



## 3. Dolphin



Betweenness Centrality

# Watts and Strogatz model model

## Metrics

#### - Karate Club

Average Diameter is 4.8 Average Clustering coefficient is 0.13153361344537814 Average Number of connected components is 1.0

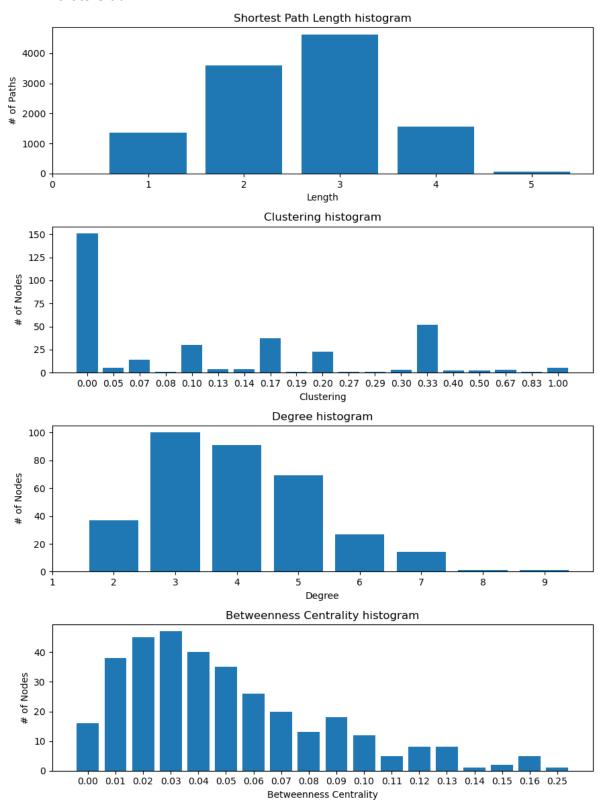
#### - Prison

Average Diameter is 5.8 Average Clustering coefficient is 0.06834399431414358 Average Number of connected components is 1.0

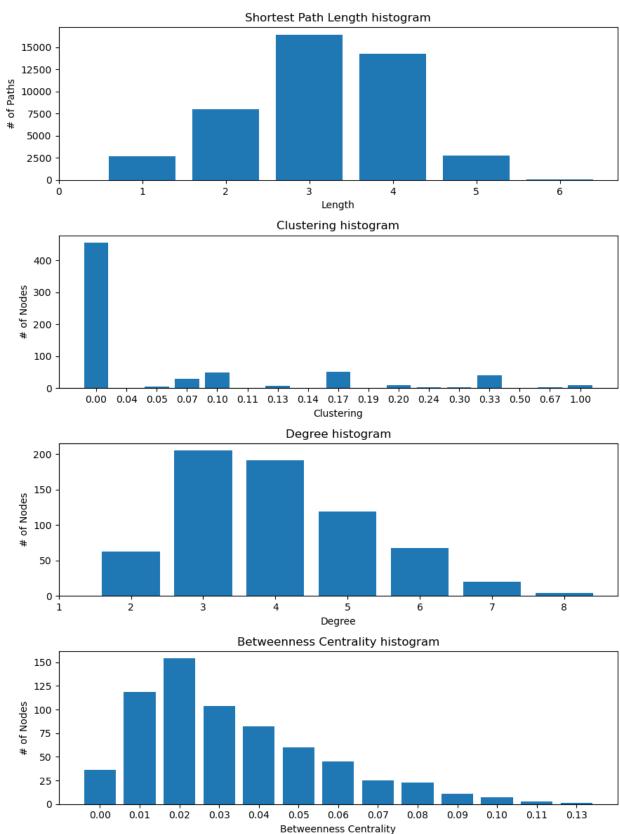
#### - Dolphin

Average Diameter is 5.7 Average Clustering coefficient is 0.06694316436251921 Average Number of connected components is 1.0

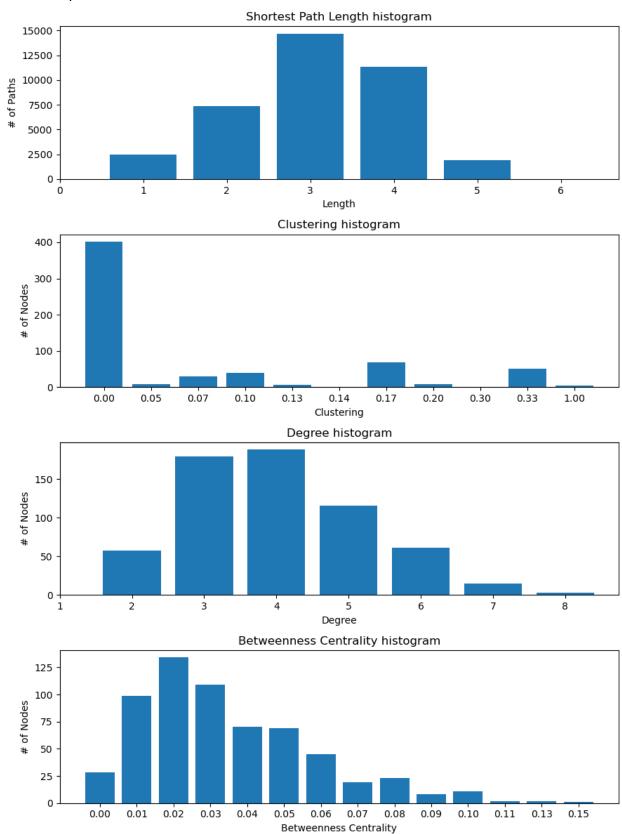
## - Karate Club



#### - Prison



## - Dolphin



# Configuration model

## Metrics

#### - Karate Club

Average Diameter is 5.1 Average Clustering coefficient is 0.17444601150483502 Average Number of connected components is 1.0

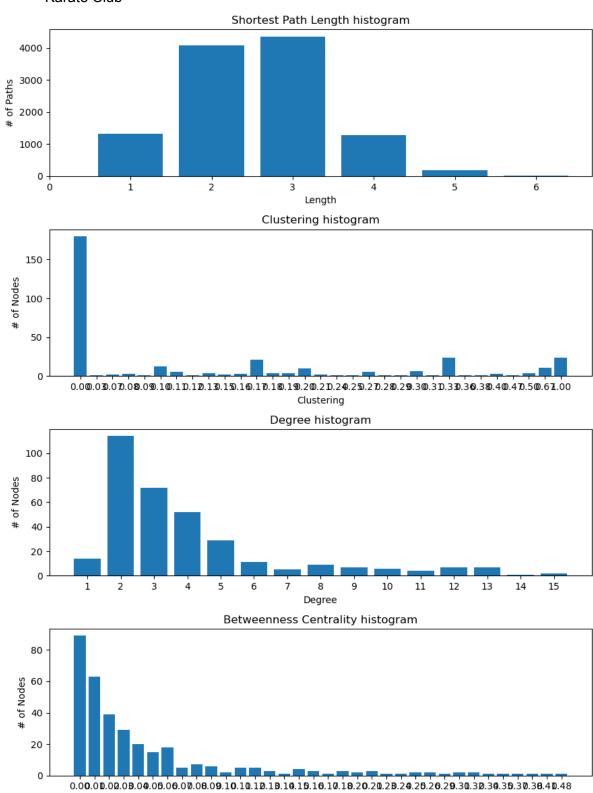
#### - Prison

Average Diameter is 5.5 Average Clustering coefficient is 0.0738600205764385 Average Number of connected components is 1.0

## - Dolphin

Average Diameter is 5.8 Average Clustering coefficient is 0.08403668016571242 Average Number of connected components is 1.1

## - Karate Club



Betweenness Centrality

#### Prison

0

0.01

0.02

0.03

0.04

0.05

0.06

0.07

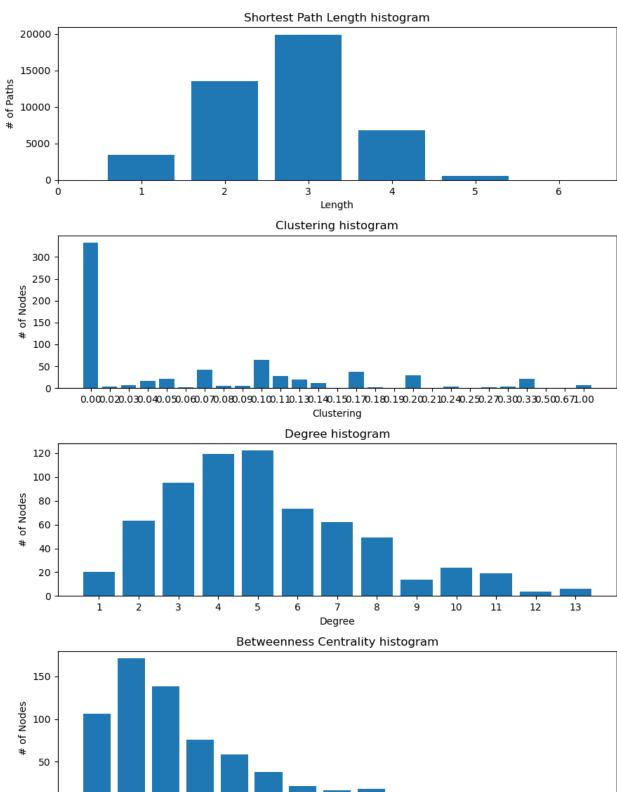
Betweenness Centrality

0.08

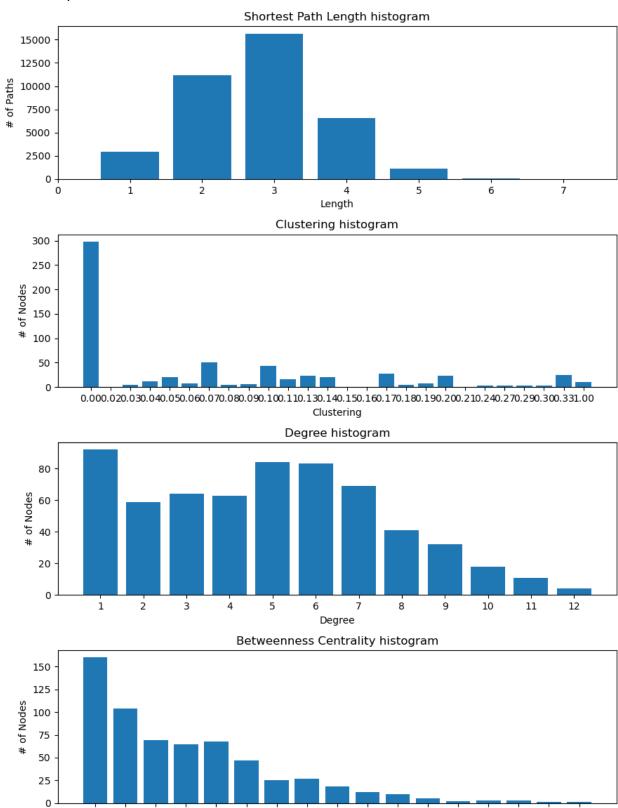
0.09

0.10

0.11



## - Dolphin



0.00 0.01 0.02 0.03 0.04 0.05 0.06 0.07 0.08 0.09 0.10 0.11 0.12 0.13 0.14 0.15 0.16 Betweenness Centrality

## Barabasi-Albert preferential attachment model

## Metrics

#### - Karate Club

Average Diameter is 3.9 Average Clustering coefficient is 0.28815354597748516 Average Number of connected components is 1.0

#### - Prison

Average Diameter is 3.3

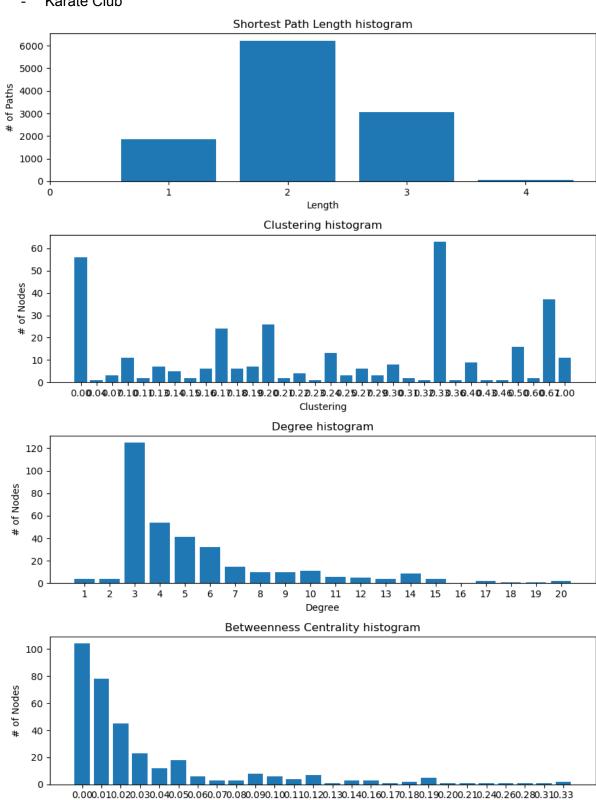
Average Clustering coefficient is 0.24784004206727622

Average Number of connected components is 1.0

#### - Dolphin

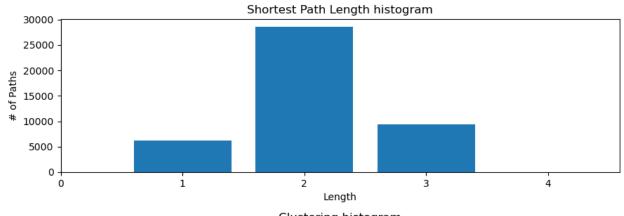
Average Diameter is 4.0 Average Clustering coefficient is 0.2289561279016795 Average Number of connected components is 1.0

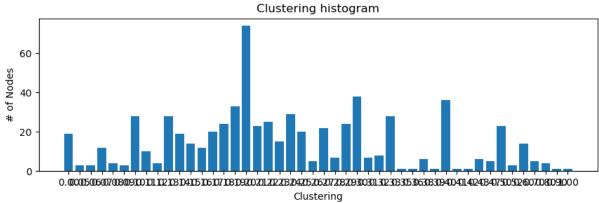
## - Karate Club

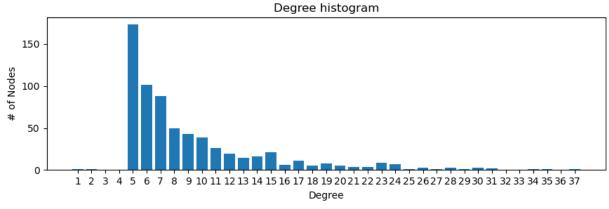


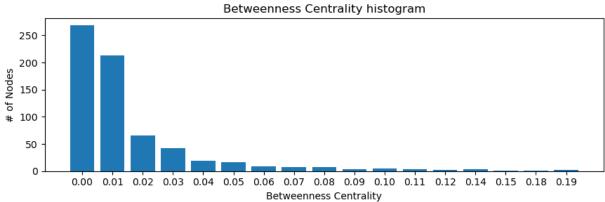
Betweenness Centrality

#### Prison

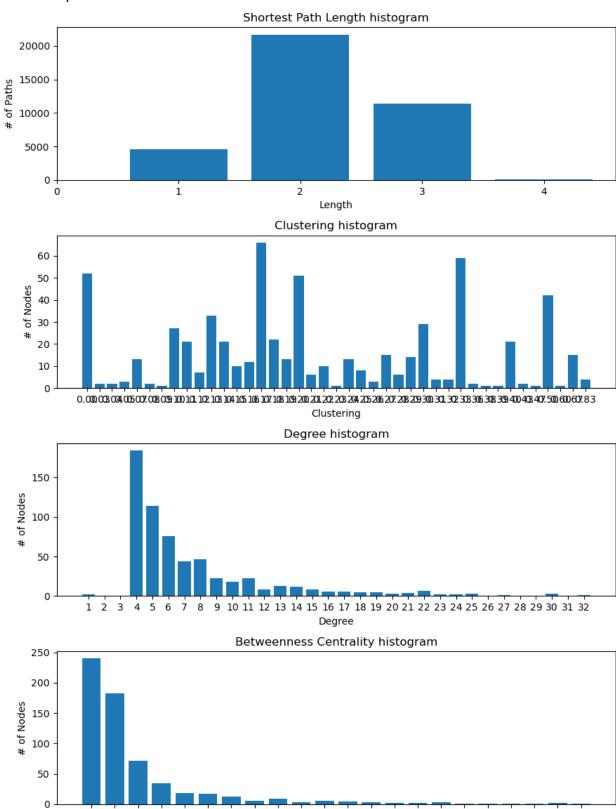








## - Dolphins



0.00 0.01 0.02 0.03 0.04 0.05 0.06 0.07 0.08 0.09 0.10 0.11 0.12 0.13 0.14 0.16 0.17 0.18 0.20 0.21 0.22 0.26 Betweenness Centrality