**ITP 357 - Homework 04**

**Deadline:**

1 minute before the next class.

**Submission:**

1. Answer the questions at the end of this file, and name the document hw04.docx
2. Download the instructor’s GPG key from the following location:

<https://sites.google.com/a/usc.edu/chiso/files>

GPG encrypt the \*.docx with the instructor’s **and** your own GPG key.

1. Place the encrypted document into the repo and push to changes GitHub

**Question:**

1. How many subnets and hosts per subnet can you get from the network 192.168.100.0/30?
2. What is the last valid host on the subnetwork 172.17.67.224/27?
3. What valid host range is the IP address 172.28.19.115 255.255.254.0 a part of?
4. What is the last valid host on the subnetwork 172.29.113.64/26?
5. What is the last valid host on the subnetwork 192.168.158.64/26?
6. How many subnets and hosts per subnet can you get from the network 10.0.0.0 255.255.240.0?
7. What is the first valid host on the subnetwork that the node 192.168.2.233 255.255.255.240 belongs to?
8. What is the last valid host on the subnetwork 192.168.40.0/28?
9. What valid host range is the IP address 192.168.79.112 255.255.255.224 a part of?
10. What is the broadcast address of the network 172.31.170.0/23?
11. What is the first valid host on the subnetwork that the node 192.168.218.189/27 belongs to?
12. What valid host range is the IP address 172.25.247.167 255.255.254.0 a part of?