

INU PESH

Pg# 01

Name : Javid

ID : 13151

Programme : Bs (Telecom)

Subject : QoS

Exam : Final Term

Submitted to : Mam. Sanaa Jehan

Q# 1 → Explain the whole process of Analysis in QoS in your own words. Pg# 02

Is it comprised of one or many processes?

Explain the steps involved with the help of flow chart diagram also described each step?

Answer → The process by which analysis comprises measurement and Evaluation.

— Formulation — Data Handling — Evaluation

⇒ Formulation is the process during which the requirements, decisions supported etc. are clarified and used as the basis for determining and specifying measurement requirement.

⇒ Data-Handling: is the process of ensuring that research data is stored, disposed off in safe and secure manners during and after the conclusion of a research project.

⇒ Evaluation: Whether the service will be attractive in in case of costly overbuilding, to achieve resiliency to transient surges,

e.g: Network mobility in case of traffic overload in private network.

⇒ Analysis of QoS :-

- Audience : - Utility
- Concerns - Objectives.

Q#2:- What are the problem of QoS over Heterogeneous Networks? Difference between vertical QoS mapping and horizontal.

Explain in detail w.r.t Architecture, Frame, format.

Answer:- The Problem of QoS over Heterogeneous networks may be divided into different steps:

1. QoS requests (SLSs) should traverse the overall network from the source to the destination through portions that implement different technology (e.g. Cable, Wireless, Satellite) and different protocols (e.g. TCP/IP stack, ATM stack and DVB stack).
2. QoS request should be received and understood by a specific portion (QoS may have a different meaning and interpretation depending on the used protocol and network).
3. SLS request should be mapped on the specific technology stack of a portion by activating control mechanisms suited for the aim.
4. Each single stack is composed of layered architectures.

Q# 2 ⇒ Differentiate between Vertical QoS mapping and Horizontal.

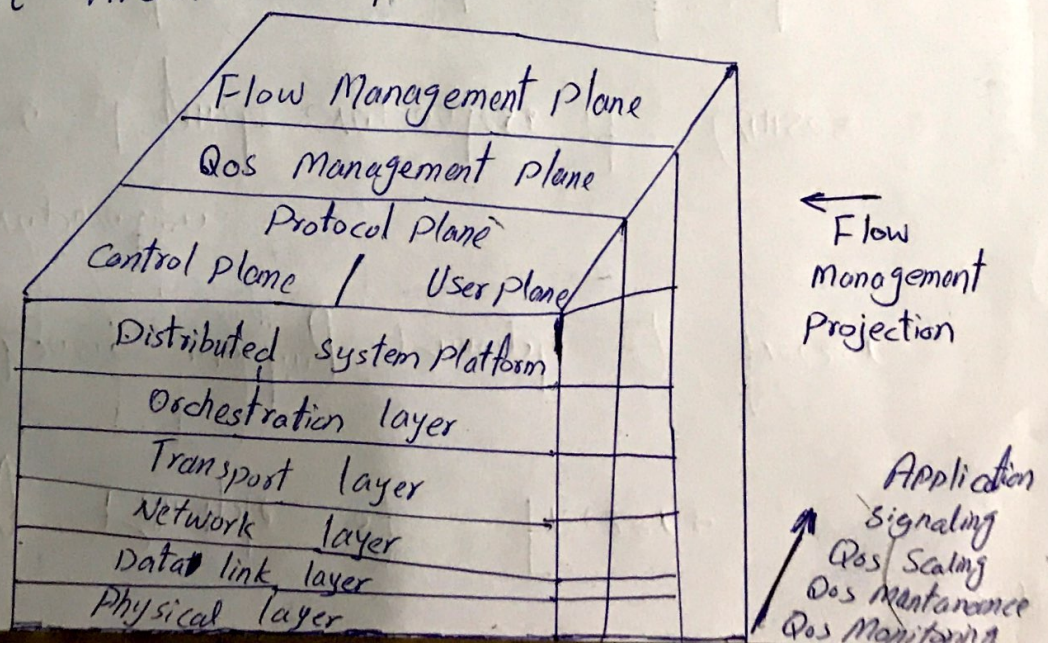
Answer ⇒

Differentiate between Vertical QoS mapping and Horizontal.

Vertical QoS mapping	Horizontal QoS mapping
The vertical interaction between layers in a Cas - cade is defined as vertical QoS mapping	Heavily linked to Signaling and is beyond the scope of this article.

Therefore vertical QoS mapping is better than Horizontal QoS mapping.

⇒ W.r.t Architecture, Frame, Format :



Q# 3. Explain Integrated vs Differentiated Services
W.r.t key features and Call ~~set~~ setup?

Answer - Integrated Services refer to an architecture that specifies the elements to guarantee Quality of Service (QoS) on a network while differentiated Services is a computer networking architecture that specifies a simple and scalable mechanism for classifying and managing network traffic and providing QoS on modern IP.

Integrated Vs Differentiated Services

Integrated Services	Differentiated Services
Architecture that specifies the elements to guarantee Quality of service on network.	Architecture that specifies a simple and Scalable mechanism for classifying and managing network traffic and providing Qos on modern IP networks.
Involve prior reservation of resources before sending to achieve the required Quality of Service	Mark the packets with Priority and send it to the network and do not require prior reservation
Also called Intserv	Also called Diff Ser
Not Scalable	Scalable
Involve per flow setup	Involve in long term setup
Involve end to end Service Scope	Involve domain service scope

Q# 3 :-

Two key features lie at the heart of Intserv :

- **Reserved resources** : A router is supposed to know what amounts of its resources (buffers, link b/w) are already reserved for ongoing sessions.
- **Call Setup** : A session requiring QoS guarantees must first be able to reserve sufficient resources at each network router on its source-to-destination path to ensure that its end-to-end QoS requirement is met.