

Quadruple Play Network and Education Systems: An Overview and Possibilities

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Abstract - Network is one of the important gradients in communication in several fields which includes Healthcare, Business Houses, Governmental Activities, and Educational Activities and so on. QPN or Quadruple Play Network is one of the important tools for complete development in Networking segment. QPN or Quadruple Play Network has its own significant because it is able to communication of several document and format which includes voice, audio, video, data and other running Television services. Network is one of the important name in today's age; each and every one now aware and uses networks. Mobile phone is one of the important devices which make close relationship between network literacy and human being. This paper is deals with so many aspects of Networking and particularly QPN or Quadruple Play Network and its importance in the field of education which includes higher education and university systems. Paper is also try to find out challenges and issues of QPN or Quadruple Play Network in the field of Networking works and its implementation in higher educational systems.

Keywords: QPN, Information, Networks, Quadruple Play Network, Computer Systems, Educational Systems, Challenges and Opportunities, Education Mining, Communication Systems

I.INTRODUCTION

QPN or Quadruple Play Network is one of the important Networking Systems in the field of Communication and Networking Technology. This is get priority in so many fields; just because of its quality and future to bear facilities of audio, video, data, information to the client or objects. Virtually, apart from communication of audio, video and textual context, quadruple Play Network is also helpful for television delivery [02, 03, 15]. Today many business houses adopt such Networking System to promote healthy communication systems. Like other field, Quadruple Play Network has wonderful role in the field of education and educational activities such as online education and degree programmes, E-Learning Systems and so on. Apart from faster, the Quadruple Play Network based communication is far more better and healthy many ways. Today in business or industrial academic education too, it has important role in many cases. Quadruple Play Network is provides facilities in the modern education platform which is much more advance and popular including general education systems for so many online happening [16].

II.OBJECTIVES

The main aim and objective of this paper in includes; but not limited to as follows.

1. To know basic about Quadruple Play Network and its basic features;
2. To know about the importance and value of Quadruple Play Network in the field of Information Networking;
3. To know about the stages and ways for Quadruple Play Network;
4. To know about the stages and ways for Quadruple Play Network;
5. To know about the importance of Quadruple Play Network in the field of higher educational institutions;
6. To know about the online education system and E-Learning systems.

III.QUADRUPLE PLAY NETWORK

Quadruple Play Network is basically a type of value added data network which is able to provide not only content or data but also voice, TV, and Video through the Optical Fiber Cable. There is a huge potentially to use Quadruple Play Network in several organization and institutions[16, 18]. Quadruple Play Network is helpful in the modern platform which is much more advance and popular including the online education, e- education, e-learning system, e-training and workshop, webinar and so on.

Virtually, network when is able to communication of data, voice, audio and video and Television at the some time and simultaneously called Quadruple Play Network or QPN. The Quadruple Play Network is based on Passive Optical Networks or PON architecture which is purely depends on Optical Fiber Cable [02, 06, 17]. The Quadruple Play Network is helpful in many cases as it is able in audio, video, data, TV services in the modern educational systems to provide valuable teaching and learning facility to the user and learners. Quadruple Play Network is very much fast as it is run with the help of optical fiber cable. Though, it is based on PON architecture and thus it is the point to multipoint concept. Virtually, PON architecture is able to communicated maximum number of data, audio and video at a time.

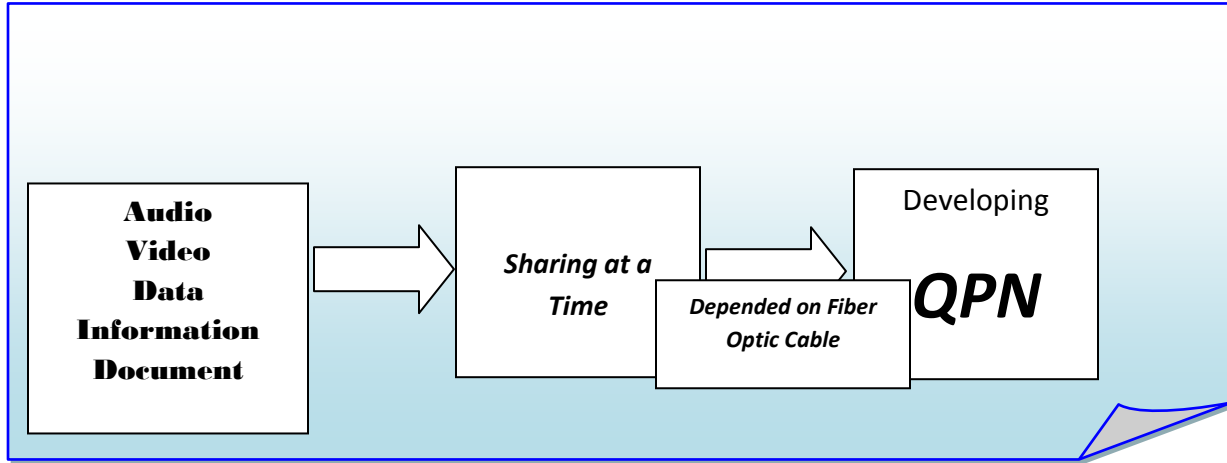


Fig.1 The basic and fundamentals of Quadruple Play Network

This is the single, shared, optical fiber that uses a passive optical splitter to divide the signal to the specific user [04, 08].

IV. QUADRUPLE PLAY NETWORK AND ITS IMPORTANCE IN TODAY'S AGE

Quadruple Play Network has several importances in the field of networking and communication technology. There are several reason for which it is getting better recognition. Now lets see such benefits one by one.

- a. It is prefer direct communication to the user and the content may be include voice, video, TV and data;
- b. Quadruple Play Network provides wide bandwidth and thus able to communicate or transfer large amount of data[09, 10];
- c. As it provides so many so many services at a same time and with several format thus promote resource allocation many ways;
- d. Due to online content delivery and audio-video features in a same time it saves money many ways;
- e. As Quadruple Play Network is based on passive optical network and thus it is simple and cost effective in many cases;
- f. Quadruple Play Network is stored optical fiber and hence it helps the individual subscriber in many cases;
- g. In Quadruple Play Network, Networking services and designing is possible to future too, due to its elasticity in services[11, 12];
- h. Quadruple Play Network is able to run in many topologies which includes tries, bus and ring.

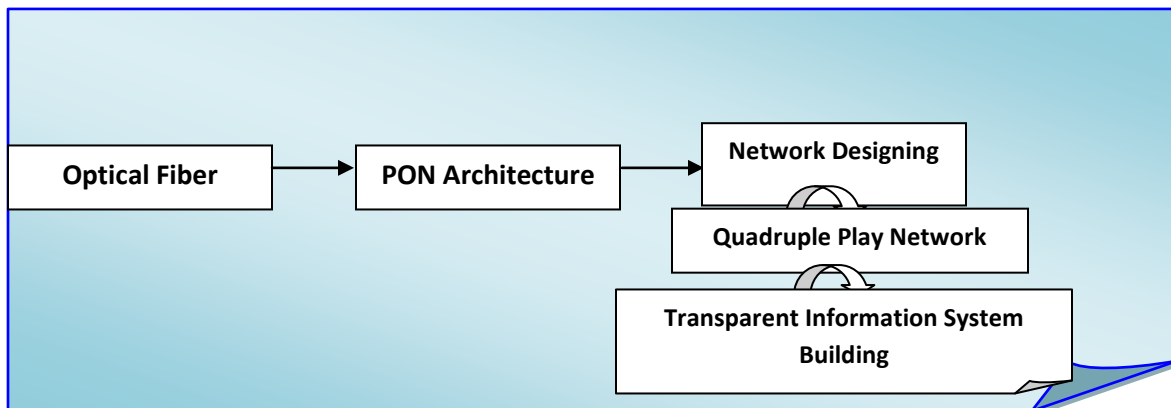


Fig.2 Depicted the background and back up of QPN Based Network

In Quadruple Play Network based PON, line is basically brought to user and then split into multi user. The PON may be based on Tree, bus and ring topology in many cases. For

better Quadruple Play Network, we need to follow steps such as:

1. FTTH or Fiber to the Home or Fiber to Terminal is helpful to distribute data. The client elasticity and helpful in many cases;
2. Wi-Fi Networks may be used for the long distance of the Network. In Quadruple Play Network mesh Network in enough to communicated data and moves down until the Network connection is found;
3. Here wireless IP Phone installation is needed for home to home or point to point connection;
4. The faster solution may be useful to view television.

V. QUADRUPLE PLAY NETWORK IN KNOWLEDGE MANAGEMENT

Quadruple Play Network is needed and helpful in many educational systems such as:-

- The university may adopt Quadruple Play Network for direct audio-video communication between one department to another or multi campus communication;
- To help the regular education of the universities by recording of such classes and workshop and seminar and future use and here Quadruple Play Network may be implemented;

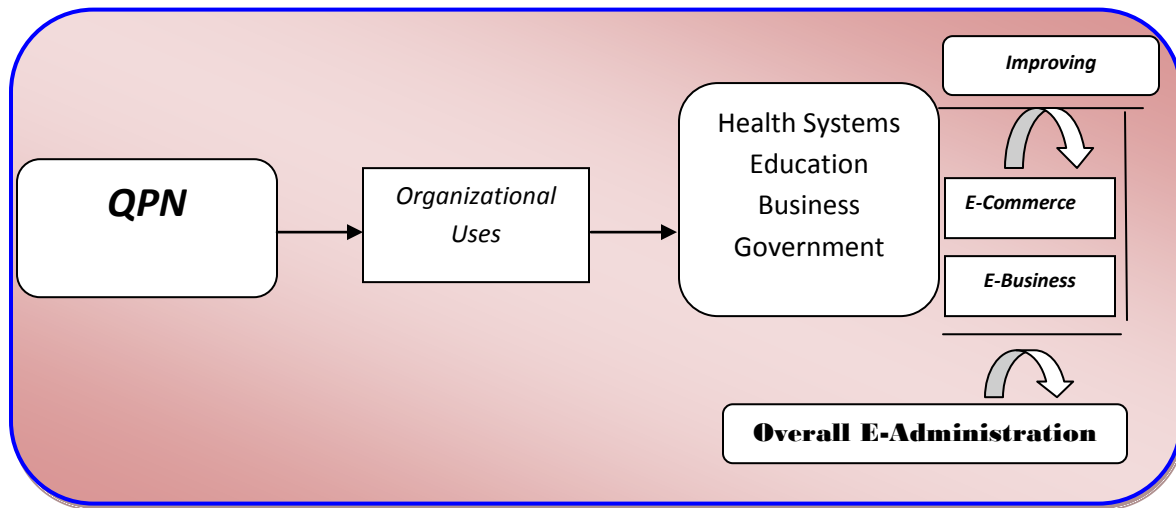


Fig. 3 Depicted Overall Electronic System development through QPN based Systems

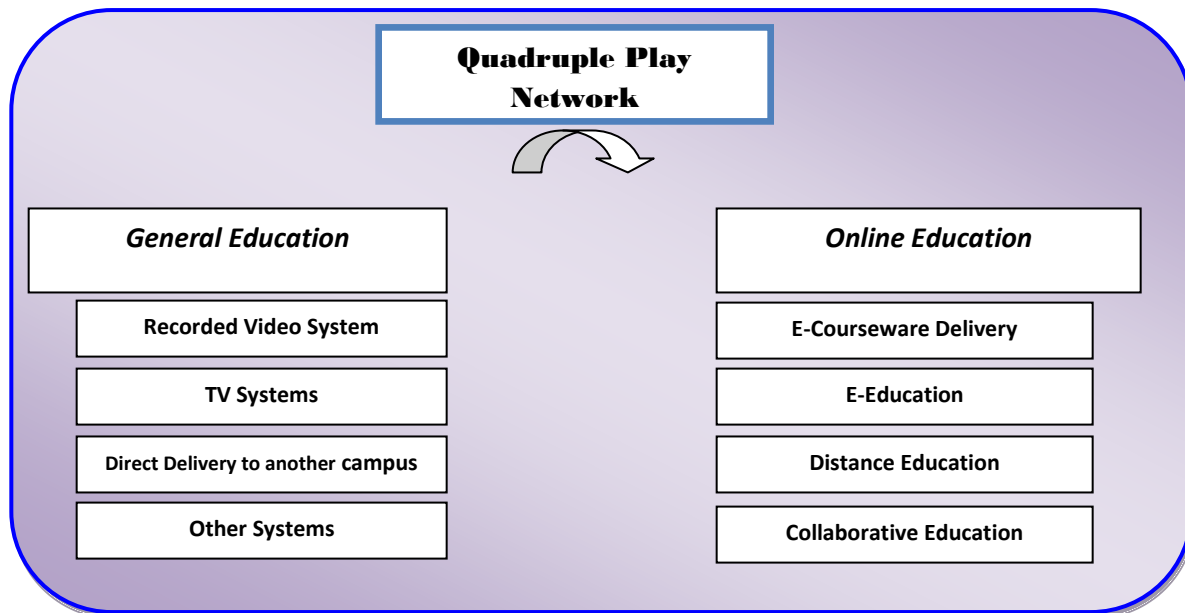


Fig: 4 Application of QPN to wider sector of education and knowledge delivery at a glance

- Quadruple Play Network may be include in the mobile service and thus such mobile may be helpful for mobile communication of teaching and learning activities;
- In E-Commerce, E-Commerce too, it is possible to utilize[18, 19].
- Campus wide Tele Vision facilities like in administrative section, recreation centers, hostel and apartments and so on, is today most popular and possible to use;
- For online education such as Online Degree and Diploma and training programme such as kind of technique is very much important[16, 17];
- Apart from this, in corporate schools also Quadruple Play Network may be helpful as through Quadruple Play Network industrial and academic unit communication is possible. Thus it helps in Learn While One Earn or Vice Versa. Hence it is also possible in module and paper delivery in many cases;
- Private educational mode is another mode where student is mainly responsible to prepare their self in education and other thing and hence in such educational sector it may be helpful;

VII.FINDINGS

- a. Quadruple Play Network is most important and urgent technologies which is helpful to modernize education technology too;
- b. Quadruple Play Network is based on PON or Passive Optical Networks and provide healthy and sophisticated communication;
- c. Fiver to Home and Fiber to Terminal Communication is possible with PON baed Quadruple Play Network;
- d. In educational sector, still; this technology is not utilizing but huge potentiality is there into it.

VII.SUGGESTION AND RECOMMENDATION

- a. In work Integrated Learning Programme, Quadruple Play Network based system may be utilized for better result and healthy Corporate Educational Development[20, 21];
- b. In general education too, Quadruple Play Network may be implemented for regular education supplementary with direct communication and visual material;
- c. In online education, Distance education and corporate education, Quadruple Play Network utilization becomes easy and helpful.

VIII.CONCLUSION

Technologies are always changing; networking is one of the important key and object for overall development of the society as it is needed in several organization and institutions. Quadruple Play Network as support audio, video, TV, voice and thus getting wide acceptance world wide [22, 23]. However, it is also deals with some problem

like security and regular modification and maintenance the system and so on. Today many universities around the world are moving towards Quadruple Play Network benefits; thus Indian universities are need to move on such way for better technology enable educational development.

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