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Vehicle to Vehicle Communication of Content Downloader in Mobile

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Abstract- The content downloading is internet based service and the expectation of this services are highly popular in wireless communication it will be supporting for road side communication. We are focusing in content downloading system for both infrastructure-to-vehicle and vehicle-to-vehicle communication. The goal to improving system throughput and formulating a max-flow problem including the channel contention and data transfer paradigm. A system communication while transferring the files or downloading some application in road side environment there is the possibility of getting disconnected. The purpose of this study used to avoid the in conventional connection at the road side environment while using system or mobile based internet connection used for content or file downloader using MILP(Mixed Integer Linear programming) for max flow problem. The bounding box technique will be used to get the proper signal from base station. To avoid the traffic and access the quick response from the server the bounding box will used. The mail goal of the mobility management service is to trace the location where the subscribers are, allowing calls, SMS and other mobile phone services to be delivered to them. First we can analysing the data and select for correct location.. It will be provide challenging in vehicular networks, that is the transmission speed of the nodes will even more efficient though the area surrounded of buildings and many other architectural infrastructures of the radio signal.

Keywords: Infrastructure-to-vehicle, Vehicle-to-vehicle, Max flow problem, Internet based services.

I. INTRODUCTION

The impact of the internet based services may be affect users in such cases of downloading fact as above while transfer the files and downloading the applications there is the chances to be aboard the signal or communication due to the network problem. When the dissemination gets interrupt due to the lake of network problem the signal will be adopted from another user not from the base station. In the case of travelling by vehicle or moving from one place to another place while using the internet services to download or making a calls, the signal will temporarily disconnected. But later case, the signal will be retrieving from another base station meanwhile the connection will be disconnected. To overcome the problem in this paper the Bounding box mechanism will be used. It will act intermediate between user and base station. The same process will be applicable while moving in vehicle. The important concept of data communication is widely used and Meaningful it as spreading some amount of data across a distributed wireless network communication. The exchanging of data in road side infrastructure is becoming more interesting, because the number of the vehicles is furnished with computer technologies and wireless communication devices will be increased. The communication will be either direct communication in this case of dissemination the signal will be provide from the Access Points or indirect communication between the user and Access points based on some internet.

II. RELATED WORKS:

Our related work is the bounding box will be using the content downloader when the people are travelling by vehicle.The environment of vehicular network has been operate ultimately change from one place to another place mostly travelling in highways, at the speed of up to 350 km/h the capacity of the files may have get slow, Because motion of the vehicles, the connectivity between the multiple nodes may lost only for few seconds, in some cases the signal gets fail in unpredictable infrastructure ways..

2.1 Delay Tolerant Networks (DTNs):

In the vehicular cooperation an epitome of consider relates our work to DTNs [1]. The uses to content communication of adding different numbers of base station such as two nodes called mesh and relay nodes to a DTNs, which is also similar to the time-expanded graph [2].such a graph is also used for define the nodes and the storage limits of the network.

2.2 Dynamic Network Topology Graph (DNTG):

The main goal of DTNGs is the paradigm helps the user whom can flow the data from the Aps to the downloaders through relays. From this approach the mobility can easily find the contact events between set of nodes such as vehicle to vehicle or AP to vehicle. The events will be

(i)**The accuracy link between two nodes:** Check the specific links for relay transmission. The data rate will achieve by the network layer

(ii)**Contact event starting time:** This will denoted the starting time between the two links it will be considering based on the established time of the relay or already exist the new value of quality level.

(iii)**Contact event ending time:** This will denoted when the link will remove or quality level will change.

2.3 Max flow & MILP algorithm:

The before case max flow algorithm and MILP algorithms are used for improve the capacity and provide the efficiency to user whom using the neighbouring signal. Both are used for capturing the problem of relay those algorithms also used define the flow of source to destination.

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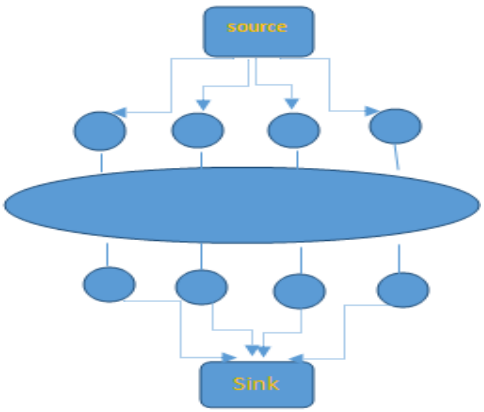


Figure 2.1 Links among multi source and multi sink

2.4Carry the data and forward:

If the relaying data of one or more vehicle will deliver the result to either expected downloader or to another downloader. So the data will carry from the APs and forward the data to Multi-hop paradigms which means the data will carry and forward inherently. The two nodes of the network will communicate at a given time limits.

III. METHODOLOGY

This scenario allows us to examine the collision in different criteria such as vehicle-to-vehicle communication, road side infrastructure deployment, Infiltration of dissemination technology. When the user using web search page for downloading content, transferring the data or seeking for some result, that particular time the connection may get disconnected due to the insufficient signal in this case the signal will be adopted from the Bounding box not from the base station. Probably the base station has collection of tower.

3.1 Bounding box:

If number of persons will be searching for same page in google, the chances are there to be either disconnect the web page or get slow downloading because of traffic. In this cases the vehicle1 can get the signal from neighbour vehicle2 who is being very closer to the bounding box. If he is also using the same web page. Even though the nearby user close their web page the signal will be adopted from the Bounding box not from the base station.

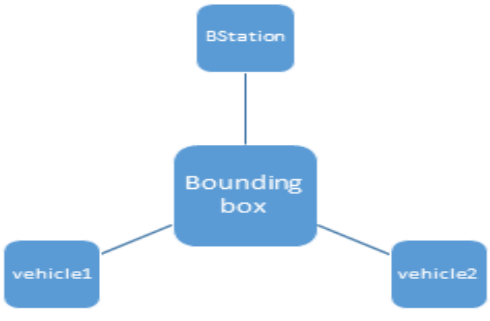


Figure 3.1 Flow diagrams.

In this diagram the flow will consist the base station relay from the access point. The data will be also stored into bounding box. If the user sends the request to server the relay will be adopting from the bounding box. The vehicle will transmit the relay to the neighbouring vehicle. Neighbouring vehicle receives the relay. An access point AP transmits to any vehicle. In the time of results, lot of people will search for the same link, so they could not have the proper connection. When the person send the request to the server, then the request will hit and retrieve the response from the server for each people. Probably in this case link will be getting slow or denied. To overcome this problem here bounding box will used. So the request and response will store in common place called bounding box.

3.2 IMPLEMENTATION

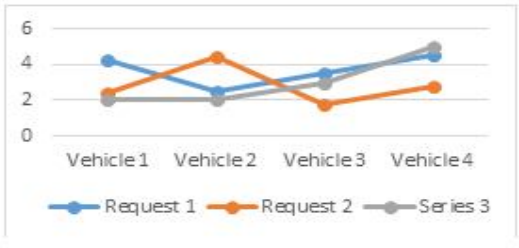
The bounding box algorithm simply known as enclosing algorithm. There most exists two neighbouring vehicles of the enclosing box which both restrain the edges of the convex hull of the point set. The enclosing box will contain the particular circle.

3.2.1 Bounding box algorithm:

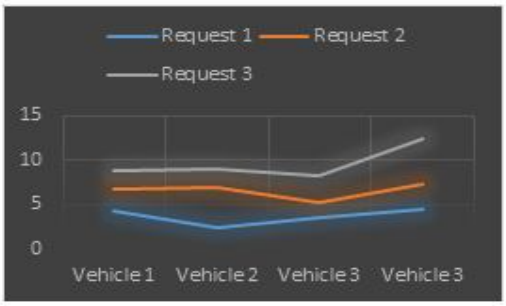
Step 1: Consider the vehicle 1 is X.

Step 2: Consider the vehicle 2 is Y.

Step 3: Search for the nearest location of vehicle.
Step 4: Adopt the signal from bounding box
To nearest vehicle or APs.
Step 5: If the nearest vehicle closes the page signal can directly retrieve from bounding box.
6: End.
Initially the user mobile have to find the nearest location of the connection or else search for the neighbours signal .if the location will find then signal can adopted from nearest station. The access points also provide the signal to expect mobile.



a)Without using bounding box



b)with using bounding box.

Figure 3.2 Average of Relaying frequencies

In figure (a) the request will send from the vehicles but the requested data have met traffic at the same time the target downloader whom first access the request will not get the

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response based on priority. But in figure (b) the downloader who rise the request at first will get the response as soon as others by using the bounding box.

IV. CONCLUSION

In this thesis focused of efficient communication and transmission of the vehicular network. To achieve the goal in a wireless network infrastructure is usually faces a lot of challenging issues because the characteristics of the medium such as nodes and routers and the lack of synchronization and organization among nodes. So The frequency range of the signal will be high while using Bounding box algorithm in vehicle to vehicle communication. The accuracy will not affect while the signal will adapt from one vehicle to another. The relay could be efficient while using bounding box technology. Particularlly the mobile computing working for two purposes in vehicle to vehicle communication which they are downloading for files and searching for the nearest location of the base station

REFERENCES

[1] Francesco Malandrino, Student Member, IEEE, Claudio Casetti, Member, IEEE,Carla-Fabiana Chiasserini, Senior Member, IEEE, and Marco Fiore, Member, IEEE
[2] D. Hay, P. Giacomo, "Optimal routing and scheduling for deterministic Delay tolerant networks," IEEE WONS, Snowbird, UT, Feb. 2009.
[3] U. Paul, A.P. Subramanian, M.M. Buddhikot, S.R. Das, "Understanding Traffic dynamics in cellular data networks," IEEE INFOCOM, Shanghai,China, Apr. 2011.
[4] Z. Zheng, P. Sinha, S. Kumar, "Alpha coverage: bounding the interconnection gap for vehicular Internet access," IEEE INFOCOM, Rio deJaneiro, Brazil, Apr. 2009.
[5] Z. Zheng, Z. Lu, P. Sinha, S. Kumar, "Maximizing the contact opportunity for vehicular Internet access," IEEE INFOCOM, San Diego, CA, Mar. 2010.
[6] M. Fiore, J. M. Barcelo-Ordinas, "Cooperative download in urban Vehicular networks," IEEE MASS, Macau, China, Oct. 2009.
[7] D. Hadaller, S. Keshav, T. Brecht, S. Agarwal, "Vehicular opportunistic Communication under the microscope," ACM MobySys, San Juan, Puerto Rico, June 2007.
[8] B. B. Chen, M. C. Chan, "MobTorrent: A framework for mobile Internet access from vehicles," IEEE INFOCOM, Rio de Janeiro, Brasil, Apr. 2009.