COMMENTS BY DEN NETWORKS LIMITED ON THE CONSULTATION PAPER ON-

"INFRASTRUCTURE SHARING IN BROADCASTING TV DISTRIBUTION SECTOR"

1. **Preamble**

At the outset we wish to express our sincere thanks to the Telecom Regulatory Authority of India (the Authority) for its kind support and cooperation in the establishment and growth of Broadcasting & Cable TV industry in India and also resolving various issues, which have arisen from time to time. The Authority has also been kind enough to consider the interest of all the stakeholders, be it a Broadcaster, Multi System Operator (MSO), Local Cable Operator (LCO) or Consumer and also has always been proactive in regulating the sector and have also been keeping the balance by showing its willingness to address the concerns of various market participants thereby also acting like a solution oriented Regulator while keeping the ground realities in mind. In the current situation the focus of the entire Cable TV industry at present is to achieve 100% digitization across the country in its true sense and in letter and spirit. This is especially from the perspective of getting over the current analogue mindset. Needless to mention that process has already involved lots of planning, manpower, funds and includes support from the Government including the Authority.

We at **DEN Networks Limited ("DEN")** also would like to thank the Authority for providing us an opportunity to submit our comments/ response on the Consultation Paper on **"Infrastructure Sharing in Broadcasting TV distribution sector**" dated 21st September, 2016 as issued by the Authority. We hope that the Authority will surely consider the comments made by us and will accommodate the same while implementing the new regulatory regime in this regard.

In our view, post digitalization, the cost of running the network especially on the part of the MSO's has gone up substantially. Introduction of the concept on Infrastructure sharing will surely result in economies of scale and in optimum utilization of the investment made in establishing humungous network. Infrastructure sharing will be not only help us in achieving the Government of India highly ambitious project of Digitization PAN India but also would curb the problems faced by MSO's with regard to their survival. Moreover this will result in healthy competition and the end subscriber will be benefitted as MSO's and DTH will compete among themselves to provide better content at reasonable subscription. Additionally, it will also become an extra source of revenue for the companies who have and are investing heavily in Infrastructure so that consumers get the best quality services.

2. **DENs Response w.r.t to this Consultation Paper**

(1)   Is there a need to enable infrastructure sharing among MSOs and HITS operators, or among MSOs? It is important to note that no mandate for such infrastructure sharing is being proposed.

DEN recommends that Infrastructure Sharing between MSO's and MSO's and MSO'S and HITS operators. In our view, this will not only decrease the capital cost of the MSO's / HITS Operators as their will be no repetition of infrastructure but

will also result in increased competition. Decrease in capital cost will help MSO's / HITS Operators to invest in better technologies. Increased competition will result in better services and more choice to the subscribers. Additionally it will help in standardization of the networks thus reducing conflicts between service providers.

(2)   Which model is preferred for sharing of infrastructure among MSOs and HITS operators, or among MSOs? Kindly elucidate with justification.

DEN will prefer Model No. 1 where all TV channels are down-linked at single point (As per DEN it can be head-end of either HITS operator or MSO). In case Model No. 2 is implemented, then all the benefits of infrastructure sharing cannot be derived. All MSO's will maintain their individual dish farms, Head-ends, CAS and SMS thus resulting in duplication of cost. Moreover separate bandwidth will be required for delivering feeds of multiple MSO's. In case of Model No. 1 a single dish farm, head-end, CAS and SMS can be used by multiple MSO's resulting in lower capital expenditure and will also lead to standardization of the networks.

Infrastructure sharing among DTH operators

(3)   Is there a need to enable infrastructure sharing among DTH operators?

DEN is only operating as a MSO and does not have any interest in DTH, thus will prefer not to comment on DTH.

Relevant issues in sharing of infrastructure

(4)   What specific amendments are required in the cable TV Act and the Rules made there under to enable sharing of infrastructure among MSOs themselves? Kindly elucidate with justification.

Cable TV act does not permit sharing of Head-end, CAS, Call Centre and SMS. Additionally as per Licensing conditions a MSO need to have independent head-end, CAS and SMS.

DEN recommends amendments in the same so as to enable MSO's to share Head-end, CAS, SMS and Call Centre. Network Operator can get the SMS and CAS configured in a way that the separate reports / logs can be generated for every MSO separately.

(5)   What specific amendments are required in the MSO registration conditions and HITS licensing guidelines in order to enable sharing of infrastructure among MSOs and HITS operators? Kindly elucidate with justification.

As per clause 7 & 9 of License conditions, it is mandatory for MSO to have independent head-end, CAS and SMS for registration. Same needs to be amended for infrastructure sharing.

(6)   What specific amendments are required in the guidelines for obtaining license for providing DTH broadcasting service to enable sharing of infrastructure among DTH operators? Kindly elucidate with justification.

DEN is operating only as a MSO, thus DEN prefers not to comment on the same.

(7)   Do you envisage any requirement for amendment in the policy framework for satellite communication in India to enable sharing of infrastructure among MSOs and HITS operators, and among DTH operators? If yes, then what specific amendments would be required? Kindly elucidate with justification.

As per licensing conditions, it is mandatory for MSO to have independent head-end, CAS and SMS for registration. Same needs to be amended for infrastructure sharing.

(8)   Do you envisage any requirement for amendments in the NOCC guidelines and WPC license conditions relating to satellite communications to enable sharing of infrastructure among MSOs and HITS operators, and among DTH operators? If yes, then what specific amendments would be required? Kindly elucidate with justification.

DEN is only operating as an MSO and in the case of MSO's no such requirements are stipulated.

(9)   Do you envisage any requirement for amendments in any other policy guidelines to enable sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? Kindly elucidate with justification.

Except for the amendments as mentioned in point no. 8, DEN recommends no other amendments.

(10)   What mechanisms could be put in place for disconnection of signals of TV channels of defaulting operator without affecting the operations of the other associated operators with that network after implementation of sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? Kindly elucidate.

DEN recommends installation of head-end, CAS and SMS with Network provider and control should be with Network provider. A tripartite agreement can be signed between Network Provider, Service Provider and Broadcaster and in case of dispute the responsibility for switching off services of particular Service Provider should lie with the Network Provider. In case Network Provider also defaults then penalization / license cancellation should be applicable.

(11)   Is there any requirement for tripartite agreement to enable sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? Kindly elucidate with justification.

DEN recommends installation of head-end, CAS and SMS with Network provider and control should be with Network provider. A tripartite agreement can be signed between Network Provider, Service Provider and Broadcaster and in case of dispute the responsibility for switching off services of particular Service Provider should lie

with the Network Provider. In case Network Provider also defaults then penalization / license cancellation should be applicable.

(12) What techniques could be put in place for identification of pirates after implementation of sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? Kindly elucidate.

All network providers should get the network audited from BECIL on yearly basis. Audit report of BECIL should be on public domain and Broadcaster should have right to access the same. Additionally, Broadcaster should be permitted to do the audit on yearly basis. Further, all Network Providers should provide online access of their SMS and CAS to BECIL. This will help in controlling Pirates.

(13) Is there any need for further strengthening of anti-piracy measures already in place to enable sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? Kindly elucidate with justification.

Regulations to cub piracy are already strong. Additionally any Service Provider engaging in piracy should be barred from operating for next six months in that particular location along with penalization. This will act as a deterrent and Service Provider will refrain from doing piracy.

(14) Is there a requirement to ensure geographically targeted advertisements in the distribution networks? If yes, then what could be the possible methods for enabling geographically targeted advertisements in shared infrastructure set up?

Geographical targeted advertisements can be enabled on the EPG of the STB's. The Service Provider can book the advertisement and Network Provider can enable the same on those particular STB's. Additionally, the broadcaster and service providers can work out a methodology for geographically target advertisement by enabling the same on EPG of STB.

(15) Whether it is possible for the network operator to run the scrolls and logo on the specific STBs population on request of either the broadcaster or the service delivery operator after implementation of sharing of infrastructure among MSOs and HITS operators, among MSOs, and among DTH operators? If yes, kindly elucidate the techniques.

Geographical targeted scrolls can be enabled on the EPG of the STB's.

(16) Whether implementation of infrastructure sharing affects the differentiation and personalization of the TV broadcasting services and EPG? If yes, then how those constraints can be addressed? Kindly elucidate with justification.

As per DEN there will be no impact on differentiation and personalization of the TV broadcasting services and EPG. With new technology and small investment LCN numbers, EPG and channel mapping can be managed at local level.

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(17) Whether, in your opinion, satellite capacity is a limiting factor for sharing of infrastructure? If yes, then what could be the solutions to address the issue?

DEN is operating only as a MSO, thus DEN prefers not to comment on the same.

Sharing of CAS and SMS

(18) Is there a need to permit sharing of SMS and CAS?

DEN has always favored sharing of SMS and CAS. Setting up of the CAS and SMS require huge investment. With availability of cloud services, SMS ad CAS installed at remote locations are equally effective. Shared CAS and SMS will help in standardizing processes and even small MSO's can avail benefits of high end CAS and SMS. This will also result in more transparency.

(19) If yes, then what additional measures need to taken to ensure that SMS data remain accessible to the tax assessment authorities and Authorized officers as defined in the Cable TV Act for the purpose of monitoring the compliance with relevant the Rules and the Regulations?

It should be responsibility of the Network Operator to get the SMS and CAS configured in a way that the separate reports / logs can be generated for every MSO. All network operators should get the network audited from BECIL on yearly basis. Audit report of BECIL should be on public domain and Tax Authorities should have right to access the same.

(20) Whether sharing of CAS can in any way compromise the requirement of encryption as envisaged in the Cable TV Act and The rules and the regulations.

As per DEN, sharing of CAS will not compromise the requirement of encryption as envisaged in the Cable TV Act.

(21) *In addition to the issues mentioned above, comments of stakeholders are also invited on any other issue relevant to the present consultation paper.*

As per DEN no more issues needs to be highlighted as of now.

Additionally, in case of any queries or clarification required by the Authority, we further request the Authority to contact Mr. Ashish Yadav- Deputy General Manager- Legal @ ashish.yadav@denonline.in or Ms. Ritika Arora-Officer- Legal @ ritika.arora@denonline.in .