Working Party No. 2 on Competition and Regulation

FINANCING OF THE ROLL-OUT OF BROADBAND NETWORKS

-- Note by Lithuania --

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1. In Lithuania the roll-out of new generation access networks is left exclusively to the market forces. Due to the economics of the field, the coverage of new generation access broadband services is by far insufficient. Since the market does not deliver an efficient outcome, there is a need of public intervention in order to achieve positive objectives inherent in availability of new generation access broadband services. However, at this stage only deployment of the basic broadband infrastructure in the whole country has taken place and is nearly finished. This first step is to be followed by the consequent roll-out of new generation access networks in the period of 2014-2020, which in terms of state intervention will be largely based on the same principles. Therefore, in this contribution the way of financing of the roll-out of the basic broadband infrastructure in Lithuania is presented.

2. The public sector has been involved in the financing of the roll-out of the basic broadband network in Lithuania from 2005 onwards. The deployment of the broadband network infrastructure by the public sector has been conducted implementing the measure "Development of Rural Area Information Technology Network" (hereafter: "RAIN").

3. Prior to the start of the implementation of the RAIN project, broadband services had been available in more densely populated locations where investments were sufficiently attractive for private operators, whereas in rural areas the roll-out of broadband connections had been lagging behind. Thus, in 2008 in comparison with 100% broadband coverage in cities, this figure reached only 39% in villages and only 10% in villages with less than 500 residents. Two main reasons were identified for an underinvestment in rural parts of the country. Firstly, rural areas are geographically scattered rendering the necessary initial investments costs much higher than in the areas with dense population. Secondly, the inhabitants of rural areas have generally lower incomes and thus are unable to pay for the actual costs of the service.

4. Demand-side measures in favour of broadband services (such as tax incentives for residential users) as well as measures to increase computer literacy and development of e-Government services had been in place in Lithuania for several years prior to the start of the RAIN project. However, these measures had not solved problems on the supply side (absence of adequate broadband network infrastructure in rural areas). Although ex ante regulation had facilitated broadband deployment in urban and more densely populated areas, it was unlikely to lead to sufficient investments for the provision of broadband services to underserved areas as it presupposes the existence of broadband access infrastructure.

5. Despite efforts from alternative instruments initiated by the Lithuanian authorities, limited private investments had taken place in the targeted areas prior to the start of the RAIN project (offering only narrowband, voice and expensive satellite solutions). It was concluded that without public intervention in the form of public funding, reduction of the "digital divide" between rural and urban areas would not be possible. Lithuanian authorities aiming at reducing a “digital divide” between the availability of broadband connection in the urban and the peripheral areas have undertaken the RAIN project, which is to be completed by 31 December 2014. The RAIN project have been initiated and implemented at the national level.

6. The RAIN project consists of creation of backhaul (i.e. middle-mile) network in not served areas, thereby reducing the entry barriers (by lowering investment costs) for commercial operators who will be able to add their access infrastructures (i.e. the last mile network segment) and deliver broadband services to end-users. The RAIN project will make it economically feasible for the commercial operators to invest in the last mile solutions and to provide retail services to the end users in rural areas.

Public sector intervention took place only in areas where no adequate broadband infrastructure was available. A detailed mapping and broadband coverage analysis was exercised in order to ensure that the target areas require state intervention.
7. Lithuanian authorities conducted a public consultation with major stakeholders on the public intervention plans. In particular, information on the measure, including the routes of planned optical fibre lines, was provided to the private operators. When an operator expressed its concern about possible duplication of its existing lines, the optical fibre line routes were adjusted.

8. The newly created RAIN network will remain in the ownership of the state. The constructions works of infrastructure have been carried out by private operators selected by means of an open tender in line with the public procurement rules. The maintenance and support of the RAIN network is to be carried out also by private operators selected by an open tender. The management of the RAIN network and offering of wholesale services to the third party service providers will be carried out by a state-owned non-profit enterprise. Public intervention has taken the form of the subsidy (direct grant) to the state-owned wholesale operator which has managed the deployment of the middle-mile broadband network in targeted areas.

9. The RAIN network will offer wholesale access to middle-mile infrastructure on an open, transparent, non-discriminatory basis to electronic communication operators wishing to connect end-users. The chosen network topology ensures the technological neutrality: infrastructure developed during the project excludes the last mile access network segment and enables several alternative platforms (such as wireline, wireless, mobile solutions) to utilise the current infrastructure to offer its own services to end users. Therefore, the RAIN project does not favour any particular technology or network platform leaving it to commercial operators to come up with the most appropriate technological solutions to provide retail broadband services to end users. By allowing different broadband technology platforms to obtain open access to the new state funded network, the project has the potential of stimulating infrastructure-based competition in the targeted areas, similarly to adequately covered areas. End-users will have the opportunity to choose the last mile technology and the retail operator according to their needs.

10. The wholesale operator of the network will not offer retail services; hence, it will have strong incentives to attract third party operators to use the network, thereby strengthening choice and competition in the areas concerned. The prohibition imposed on the wholesale operator to offer retail services on the subsidized network will exclude the provision of undue advantage for any operators.

11. Any potential surplus generated by the wholesale operator through the operation of the network will be used to maintain the network or for rural broadband development. This mechanism of reinvestment will ensure that the wholesale operator will not gain undue competitive advantage by means of overcompensation.

12. As a result of the new broadband infrastructure deployed during the RAIN project, the broadband network coverage is to be extended from the 80% in 2009 to approximately 98% of the Lithuanian population, thus allowing approximately additional 750,000 residents living in rural areas (around 22% of the Lithuanian population) to gain access to broadband services.

13. In the light of the above, several main principles of the public intervention were guiding in terms of addressing market failure and preserving undistorted competition. Firstly, public intervention only has taken place in areas without adequate broadband networks available (public consultations with stakeholders have been an effective way to avoid duplication of broadband infrastructure). Secondly, open and non-discriminatory access to the newly created infrastructure has been ensured. Thirdly, the technological neutrality has enabled platform competition between different technologies. These main principles of public intervention will remain relevant in the process of the roll-out of new generation access networks in Lithuania and the experience gained should be conducive to the proper development of new generation access networks coverage.