

**Before the
Federal Communications Commission
Washington, D.C. 20554**

In the Matter of)	
)	
Protecting Against National Security)	
Threats to the Communications Supply Chain)	WC Docket No. 18-89
Through FCC Programs)	
)	FCC 21-26

**To: The Secretary
For Distribution to the Commissioners**

COMMENTS RESPONDING TO THIRD FNPRM

Triangle Communication System, Inc., a wholly owned subsidiary of Triangle Telephone Cooperative, Inc. (collectively “Triangle”), a rural, high cost USF funding recipient located in north-central Montana, by its attorney, hereby submits comments in response to the Commission’s *Third Further Notice of Proposed Rulemaking*, 86 Fed. Reg. 15165 (March 22, 2021) (FCC 21-26). In response thereto, the following is respectfully submitted:

Triangle is eligible to receive “rip and replace” funding which Congress made available in December 2020 for the purpose of replacing Triangle’s Huawei manufactured core networking and related equipment and software which has been determined to pose a national security risk.¹ The Huawei-related national security issues arose many years after Triangle had already invested significant sums of money in securing and installing Huawei-based telecommunications core and related equipment and software. The national security issues which arose regarding Huawei’s, and

¹ Triangle respectfully submits that the program is better understood as a “replace and rip” program since the goal is to provide seamless telecommunications service: the replacement network will be installed and optimized in the background while the existing network continued to operate culminating in a flash cutover to terminate service on the existing Huawei network.

other Chinese-manufactured, networking equipment is, to Triangle's knowledge, unprecedented in the history of telecom equipment suppliers.

As the Commission is aware, telecom networking equipment is currently based upon company specific signaling protocols which are particular to that manufacturing company's equipment offerings ("sole-source proprietary vendor" or "SSPV") – the CORE equipment of one manufacturer does not work with the radio equipment produced by another manufacturer. A decision to go with a particular manufacturer's equipment offering essentially locks the licensee/service company into a manufacturer-based equipment dependency over which the licensee/service company exercises no control. The Commission has recently recognized the problematic nature of this unavoidably binding dependency imposed upon licensee/service companies by equipment manufacturers and the Commission has commenced a notice of inquiry to explore whether an open architecture ("ORAN" – "Open Access Radio Network") would better serve the public interest. *See Notice of Inquiry*, FCC 21-31, released March 18, 2021; <https://docs.fcc.gov/public/attachments/FCC-21-31A1.pdf>.

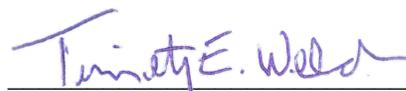
Triangle is currently investigating, and has an interest in acquiring, ORAN equipment. Triangle's research has found ORAN equipment to be competitively priced and fully functional compared to legacy vendors' equipment options which lock you into always using their equipment.

A concern in the background of Triangle's ORAN equipment investigation was that by mixing equipment suppliers, the effort to troubleshoot network issues might become problematic as differing vendors pointed the finger at other vendors as "source of the problem." However, as Triangle studied its experience in the industry over the past twenty-five years dealing with legacy SSPV, Triangle has concluded that this is not a substantial concern.

Installation of SSPV equipment necessitates interaction with various, seemingly non-interconnected, departments within the SSPV. When a network problem arises, the situation invariably devolves into intra-company, inter-divisional finger pointing as the cause of the problem is investigated. At the end of the day, Triangle chases down the various finger points to locate the cause of the problem. Triangle understands this to be the nature of the beast, the equipment and connections are immensely complex, and Triangle does not mean to imply any level of dissatisfaction with this process or with any SSPV. Triangle's point is that Triangle does not see how working with multiple ORAN vendors would differ materially in this regard.

Another concern Triangle has is that it would like to have the flexibility to replace its existing 4G fixed wireless WISP equipment with a mixture of non-4G/5G equipment and 4G/5G equipment. Triangle understands that the replacement cost cannot exceed the established 4G/5G costs with alternative solutions; however, Triangle seeks a Commission determination that non-4G/5G and WISP equipment and software is considered "comparable equipment" and that such equipment would be considered reimbursable under the "rip and replace" program. Triangle's research has disclosed such equipment allows Triangle to provide the level of service it needs to meet its service obligations and that the acquisition costs associated with non-4G/5G and WISP equipment and software are competitive.

Respectfully submitted,
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