

USE CASE - RADIO ASTRONOMY OBSERVATORY





The Customer

A state-sponsored Radio Astronomy Observatory dedicated to scientific research by operating a Very Long Baseline Interferometry Global Observing System (VGOS) radio telescope.

The Challenge

The observatory was looking for an Antenna Remoting solution for transmitting RF signals with a frequency range from 1 to 18 GHz over fiber while maintaining low spurious levels and excellent linearity for its VGOS radio telescope.

The Solution

The 18GHz HSFDR solution from RFOptic provides broadband 18GHz fiber optic links to meet the signal conditioning requirements for avoiding signal saturation and related complications such as ALC and power range switching with attenuators or gain blocks.

The Result

The VGOS radio telescope operates smoothly at the required bandwidth. The observatory is also impressed by the solution's excellent phase noise, phase linearity, and gain flatness.

For more information, contact sales@rfoptic.com