R&R Managed Telecom Services (“R&R”) enables carriers to expand their network reach and grow traffic—all without adding infrastructure, OSS/BSS applications, or internal resources. R&R’s Cloud Voice service product fully leverages economy of scale and reduces CapEx in a carrier’s vocabulary. More than a decade ago, R&R made a commitment to Sonus Networks technology, selecting the GSX 9000 high-density media gateway as the foundation for its secure, hosted SS7 & VoIP switching services.

R&R has bet its future on the cloud and IP-based communications. R&R founder Ilya Belov saw the future when there would be a marked shift among carriers toward the cloud, particularly as they look to minimize costs while maintaining high-quality communications. “In the past,” Belov notes, “reliability was synonymous with system uptime. Today’s carriers define reliability more broadly as an end-to-end experience: authentication, routing, transcoding, accounting, and invoicing. The ability to use a single vendor that can address all of those needs is a big cost and time saver for our customers.” Belov believes that cloud services can be a significant boon for carriers, provided they don’t sacrifice quality in return. “We see more carriers entering into exclusive peer agreements in order to grow their traffic and maintain their margins;” he says. “But with exclusive relationships come detailed service level agreements and increased requirements for quality of service.”

For R&R, All Bets Are on Ribbon

Despite its legacy of success with Sonus, now part of Ribbon Communications, when the time came to extend its cloud platform, R&R looked at a variety of open-source systems and commercial products. Factors in the decision included the ease of SBC configuration, quality of support, cost per port, and transcoding capabilities. Ultimately, that decision led R&R back to its beginnings and their choice of the Ribbon Session Border Controller 7000. “Ribbon offered a much better fit than the alternatives,” Belov concedes, ”being virtually unmatched in the simplicity of its geo-redundant configurations, intuitive interface, and self-service capabilities. The SBC 7000’s high session density and dedicated transcoding subsystem were icing on the cake for us.”

Ribbon’s SBC 7000 will allow R&R to offer cloud services at a higher level of quality than its competitors, with features such as:

• Extreme scalability—up to 120,000 concurrent, transcoded sessions in a single appliance;
• Superior call routing, including no-loss least-cost routing (LCR), quality weighted LCR, and customized routing plans with a virtually unlimited number of routes/rules;
• Geo-redundant deployments with centralized routing and single-point provisioning;
• Real-time quality metrics on every call to improve and enforce quality of service; and
• Automated rate management, billing, invoicing, and call detail record (CDR) reconciliation/verification

Another key factor in Ribbon’s favor was its seamless integration with R&R’s existing network infrastructure. Because the SBC 7000 shared the same CDR structure, policy engine (the Ribbon PSX centralized policy and routing server), and element management system (the Ribbon EMS) R&R already had in place, the company was able to shave months off its deployment timetable. “We were very lucky choosing Ribbon products in the early days of VoIP,” Belov notes. “Being able to continually update our network over the last 12 years without changing the core has been a godsend—especially when you consider all of the VoIP equipment vendors that have disappeared since then.”
Customer Satisfaction as a Cornerstone for the Cloud

Today, R&R sees the cloud as a partnership as well as a platform. "The cloud service model aligns our revenue with our customers’ success," Belov points out. "A single security breach not only results in lost business for them, but for us as well." The SBC 7000 will ensure that R&R can meet the highest requirements for security, quality, reliability, and scalability.

The addition of the SBC 7000 provides a magnitude of improvement in performance and operational efficiency in R&R's network including:

- 500% higher call capacity;
- 500% faster provisioning changes; and
- 20X increase in the number of SIP trunk groups supported.

Network scalability was a key consideration in choosing the SBC 7000, as R&R expects its traffic requirements to grow significantly in the coming years. "Carriers need to keep growing their traffic volume to stay relevant," Belov notes. "Therefore our scale has to increase so that carriers of any size can move traffic into our Cloud."

Equally important, the SBC 7000 brings new capabilities into the network, such as native support for high-definition voice, video, and unified communications. And R&R will be able to enforce and improve the quality of those communications through the SBC 7000’s support for realtime analytics, including per-call Mean Opinion Scores.

Future plans for the managed services provider include the integration of virtualized SBC technology to increase its market presence, something they can easily do today as the SBC 7000 and Ribbon's SBC Software Edition (SBC SWe), share the same codebase. "We plan to take full advantage of virtualized SBCs on standard servers as we expand into Asia and other regions," Belov says. "Because the Ribbon SBC 7000 and Ribbon SBC SWe share the same code, we can deploy a plug-and-play solution that allows us to easily and cost-effectively build out our presence in new markets."