# RIEDEL



Solutions for Houses of Worship

# GET YOUR MESSAGE SEEN AND HEARD WITH RIEDEL COMMUNICATIONS

Riedel intelligent real-time signal transport and crystal-clear communication solutions support houses of worship of all sizes and configurations – including multi-site congregations.

Houses of Worship (HoW) have always spread messages of joy, hope and salvation, but now they are able to spread their messages through light and sound, as well as scripture. With the use of video and audio plus great communication via intercom throughout their venues, they can provide their congregations a well-choreographed and visually engaging message, reaching attendees on-site as well as parishioners at remote or distributed facilities. With these tools, Houses of Worship can cast their message to a greater audience much more efficiently, clearly, and with stunning visual representation.

An effective, well-connected intercom system paired with a flexible video, audio and data distribution system, is a must for any house of worship doing live and/or streamed video productions. These systems must be intuitive and simple to operate, as volunteers are the backbone of many houses of worship. If you want your message seen and heard, beautifully loud and clear, then Riedel has you covered.

## KEY BENEFITS OF RIEDEL SOLUTIONS

**Ease of Use** – Churches tend to not only rely on, but to thrive and delight in, the enthusiasm and help of volunteers, which is why easy-to-use, intuitive controls are so important. Any user, including volunteers, need to be able to

walk up and use the system and use it effectively. Riedel's intercom systems are very easy to use, especially after initial configuration.

**Reliability** – Riedel solutions are built with redundancy at their core for a maximum of reliability. Our MediorNet, Artist and Bolero systems support multiple redundancy schemes, so all teams can fully concentrate on running extraordinary worship productions.

**Flexibility** – To keep services engaging and fresh, the service director needs to be able to mix it up a bit, by adding new locations for speaking, having volunteers in new positions, or changing the points of interaction. Drag and drop options for easy configuration changes are key. In addition, the system must be flexible enough to follow through with the changes.

**Efficiency** – Riedel's systems are designed with efficiency in mind. Combining multiple functions, such as as encoders, transcoders, multiviewers, etc, into the video products, and walkie-talkie, intercom and phone communication into the Intercom products helps reduce equipment to buy, operate and maintain.

**Service** – Riedel is more than just a technology manufacturer – we are a technology partner. In close cooperation with technical teams and systems integrators, we can create custom solutions tailored to your needs. And a partnership doesn't just end after sale: whenever you run into a problem, we're there to help, offering the exceptional service and support we're known for.





## **PRODUCT**

## **SPOTLIGHT**

#### Riedel MediorNet combines signal transport, routing, processing, and conversion in a redundant realtime network, built for the rigors of live events large or small. With its distributed, flexible topology and its innovative app concept, the system is highly adaptable to rapidly changing production needs. This is particularly useful in dynamic environments, where MediorNet allows the addition of more devices and apps on the fly, and with minimal effort. Perfect for a dynamic house of worship. Within the MediorNet family, you'll find all the tools you need for your production whether it's SDI-centric, IP-centric, or anything in between.

#### HOW CAN A RIEDEL MEDIA BACKBONE TAKE YOUR SERVICES TO THE NEXT LEVEL?

- Seamless delivery of coordinated sessions, speakers, and worship music throughout the venue or across the campus - even across multiple event
- Easily and efficiently link multiple sites for choreographed performances across sites
- · Provide a complete signal distribution and routing solution for single site or multiple site worship facilities
- Ability to bring people together forget they are separated by hundreds or thousands of miles
- Simplify handling of audio and video distribution within and between the worship venues and their classroom areas while maintaining the best possible signal quality across the entire signal path.
- · Glue included: Built-in features such as audio embedders and deembedders, frame synchronizers, and multiviewers negate the need for extra external hardware



The ability to communicate clearly and reliably is important to the success and safety of any service or event. Riedel's wired and wireless intercom systems Artist and Bolero provide crisp, clear communication that is reliable, scalable and easy to manage by any user. With Bolero's Advanced DECT Receiver, picking up signals is not an issue, no matter where the user moves - even with high domed ceilings that can cause problems with other systems as the RF signals bounce off the curved surfaces. Bolero's ADR is constantly scanning and finding the clearest path.

"As longtime Artist users for our intercoms, we're well familiar with the flexibility and reliability of Riedel systems. That flexibility carries over to the MediorNet MicroNs, which allow us to add signal paths at the last minute as needed. And we've been completely amazed with MediorNet fiber multiplexing capabilities, which have allowed us to transport all of our signals over a single fiber. Also, we only had only three days' notice to get our drive-up ministry up and running in time for weekend services. The Riedel support team was incredibly helpful, and they were able to show us via remote conferencing just how fast and easy it is to set up MediorNet with its simple dragand-drop configuration."

**Chris Thomas**, **Technical Arts Director, Cherry Hills Community Church** 

#### **Customer Spotlight**

#### NORTH POINT MINISTRIFS

Since its founding more than 25 years ago, North Point Ministries has grown and extended from its central location in Alpharetta, Georgia, like spokes on a wheel. Today, the church's eight campuses spread out from the main worship center at distances ranging from 20 to 40 miles. Whether in-person or online, more than 50,000 people attend services and sermons to receive leadership messages each week.

#### Challenge

As the number of locations and services grew, the need to communicate and transfer audio and video across multiple locations became far more essential. While North Point Ministries employs about 30 production staff members, Sunday services require hundreds of people — mostly volunteers — to work across all locations. To support their wide range of events, North Point needed to connect its remote campuses with a single reliable system that would support both independent and combined services at each site.

#### Solution

To address this challenge, North Point implemented a comprehensive intercom and signal distribution solution from Riedel Communications. Replacing an older analog system, the new Riedel intercom system including four Artist frames spread across three campuses, 26 2300 Series SmartPanels, six 1200 Series Hybrid Lever Key SmartPanels, 56 Bolero wireless beltpacks, 11 antennas, and a Performer digital partyline brought an immediate improvement in audio quality. Riedel ConnectIP VoIP interfaces connect the remaining campuses back to the central Artist node. The solution gives users precise control over who they are talking to and allows them to reach anyone on the production team, working anywhere.

During the pandemic, North Point leveraged the flexibility of its new intercom system to hold outdoor services and events. By simply bringing a network switch outside, engineers were able to expand the installed intercom system to a temporary outdoor venue, where church members could safely meet and maintain connection.

The **Riedel MediorNet system**, which incorporates processing such as audio embedding and de-embedding, frame sync, frame delay, and multiviewing, serves as the main bridge between audio and video systems at each campus. Audio and video are distributed between campuses over dark fiber on a SMPTE ST 2110 routing network. In order to manage this network, the North Point engineering team converted three control rooms to sit natively in

that SMPTE ST 2110 environment. **Eight FusioN IP converters** at the edge convert IP signals to/from SDI and HDMI, enabling easy access to sources and displays. **Twenty-one MuoN devices inside a VirtU 32 frame, and other COTS switches**, handle other signal conversion and processing, including the up/down/cross-conversion of HD and UHD. **MicroN signal interfaces** support MADI for easy audio channel management, and critically for North Point, they facilitate the delay and frame sync needed to keep signals timed in unison across campuses during concurrent services and events. This combination of signal processing and distribution enables North Point to synchronize and deliver audio and video for services across multiple sites.

#### Result

Overall, the Riedel Communications signal distribution and intercom system has enabled North Point Ministries to enhance its communication, connectivity, and production capabilities, ensuring a seamless experience for the congregation across multiple campuses and venues. As the ministry continues to grow, North Point can easily scale its Riedel systems to accommodate additional campuses.

"While our intercom upgrade with Riedel systems had a significant and positive impact on the many people involved in services and events, MediorNet really allowed us to pull our campuses together on a single connected system. As a routing solution, MediorNet TDM proved to be the most flexible and cost-effective perchannel solution for interfacing video signals with a large number of audio sources in a single venue, while being able to connect multiple venues within a single campus. Moreover, it provided the processing capabilities we needed to align multiple signals at each site to the same message."

Matthew Drury, Production Systems
Engineer, North Point Ministries





#### **Customer Spotlight**

### THE BELONGING COMPANY

The Belonging Co is a home-grown Tennessee house of worship with a unique founding story. In 2014, Henry and Alex Seeley held the first services in their home with just four people at the meeting. Today, The Belonging Co. has 6,000 attendees, who gather for services at their facility in Nashville and their second site in Columbia, TN, 50 miles away.

#### Challenge

To enable the introduction of concurrent services at a theater in Columbia, a 45-minute drive south, The Belonging Co began streaming live audio and video from its Nashville service over IP to the new satellite site. For the Columbia services to flow smoothly and in sync, robust communications between worship leaders in Nashville and the production teams at both sites are essential.

The Belonging Co is known for dynamic live experiences, and the production team frequently must pivot to respond to impromptu shifts as services take place. In establishing a communications system for production teams — primarily made up of non-technical volunteers — at and across the Nashville and Columbia sites, The Belonging Co required an intercom system that allows people to hear and speak with the right people, free from distracting chatter, so that they can focus on the message and on their role in the production. To allow for continued growth and for special events or venue rentals, the facility also needed a system that could scale, integrate with infrastructure, and interconnect with ease.

#### Solution

Working with systems integrator Diversified, The Belonging Co deployed a Riedel Communications solution built on the company's **Artist and Bolero intercom systems**, **a dozen Bolero beltpacks** and **fifteen 2300 Series SmartPanels**. The IP-based pipeline developed by the house of worship in collaboration with Diversified and Riedel has allowed The Belonging Co to establish communications between team members at the Nashville and Columbia sites to support coordination of services. With preconfigured settings ensuring that every user is connected to just the right sources and groups, people at different sites can speak to one another with confidence and ease. Rather than use cell phones and text messages, or even a partyline crowded with unwanted noise, they enjoy a dedicated system that allows

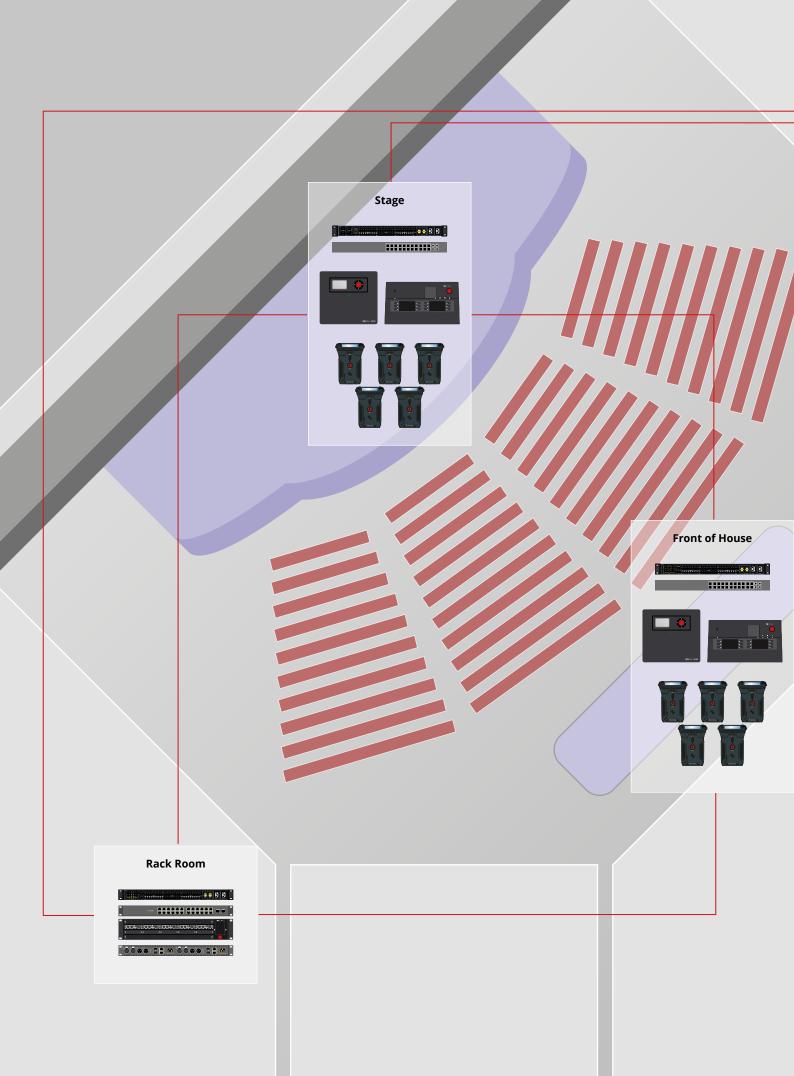
them to adapt on the fly and work together to create a unique live experience. The Riedel solution even feeds clicks and counts and cue tracks along with the Nashville music director's mic so that the lyrics director in Columbia can hear it all in real time. Rushing says that having access to these sources has been transformative to the experience of everyone in Columbia who isn't part of the band and that they no longer feel as though they are playing catch-up.

#### Result

Because Riedel gear is widely available, and easy to interconnect, The Belonging Co can easily augment its communications infrastructure and equipment on an as-needed basis, renting to scale up capacity on a temporary basis or investing in further gear as the church's future growth demands.

"Riedel has a tremendous reputation in the house of worship market, and our experience with the company has been fantastic," added Rushing. "While the intercom solution has played a vital role in enabling us to expand, ultimately, we have been most happy with the fact that communication is no longer getting in the way. People are what make the experience at The Belonging Co great, and Riedel's Artist and Bolero systems eliminate barriers so they can make it happen."

Andy Rushing, Technical Systems
Director, The Belonging Co



# Control Room



#### **PRODUCT LINES**

#### **MEDIORNET**

The Real-Time Media Network



- Unified network infrastructure for broadcast and entertainment
- Integration of all video, audio, data and communication signals
- Distributed routing, processing and multiviewing capabilities for SDI/TDM, hybrid or IP environments
- Intuitive real-time configuration

#### **ARTIST**

#### The Digital Matrix Intercom



- Distributed masterless system architecture for reduced wiring and installation costs
- Up to 1,024 x 1,024 non-blocking ports per system
- Seamless integration of VoIP SIP PABX and mobile HF radio (conventional and TETRA)
- Easy and intuitive programming for reduced training and service
- Future-proof scalable and expandable

#### **BOLERO**

#### The Wireless Intercom



- Up to 10 beltpacks per antenna; 100 antenna, 250 beltpack system capacity
- High-clarity voice codec, ADR technology for multipath mitigation
- 6-channel beltpack plus dedicated REPLY button
- Decentralized AES67 IP networked antennas
- Seamless integration into Riedel's Artist intercom matrix
- Two standalone network modes: Standalone Link & Standalone 2110 (AES67)

#### **SMARTPANEL**

#### The Multifunctional User Interface



- High quality digital audio: no noise, no hum
- Remote Mic-Kill
- 2-channel intercom operation plus additional program sound on standard XLR cables
- Real plug-and-play installation
- $\bullet$  Supports multiple applications; intercom, control and audio monitoring



Riedel Communications Inc.
25702A Rye Canyon Road | Santa Clarita, CA 91355 | USA
Phone: 818 559 6900 | SALES-LIS(attriedel net

Riedel Communications GmbH & Co. KG Uellendahler Str. 353 | 42109 Wuppertal | Germany Phone +49 (0) 202 292-90∣info@riedel.net | www.riedel.ne