

GENELEC®

# CASE STUDY

**Next generation  
seminar room  
configured with  
Smart IP loudspeakers**

IKEGAMI CELEBRATES  
75<sup>th</sup> ANNIVERSARY  
WITH COMPREHENSIVE  
RENOVATION



Ami Okubo - Broadcast Sales Department Team leader, Ikegami



**JAPANESE BROADCAST EQUIPMENT MANUFACTURER**  
UNDERScores COMMITMENT TO IP WORKFLOWS  
WITH SMART IP



Founded in 1946, [Ikegami Tsushinki Co., Ltd.](#) is a Japanese manufacturer of high quality professional broadcast equipment, particularly known for their television cameras. Indeed, Ikegami introduced the world's first portable hand-held TV camera which debuted in the US in 1962 when CBS used it to document the launch of NASA's Aurora 7 crewed space flight. In 2022 the

company, which is actively working on next-generation broadcasting standards with IP workflows, is celebrating its 75th anniversary — a milestone that has been marked by a comprehensive renovation of its office buildings in Tokyo including a sophisticated new seminar room equipped with [Smart IP](#) loudspeakers from [Genelec](#).

” SMART IP DELIVERS EVERYTHING OVER JUST ONE CAT CABLE, WHICH IS A HUGE ADVANTAGE.

Today the world of broadcasting is in the midst of dramatic change with the advent of Internet broadcasting with IP transmission. Ikegami is actively pursuing its development along these lines to accompany traditional terrestrial broadcast techniques. Their new seminar room equipped with Genelec's Smart IP loudspeakers underlines their commitment to developing IP workflows.

Ms. Akiko Kurazumi, manager of the General Affairs Group within Ikegami, relates that actually, Ikegami didn't have many large rooms to hold company events until now. "We used to rent nearby public facilities for training sessions or other corporate events," she recalls. "When the pandemic hit, we were obliged to move things online, but the idea was raised of having our own facility for the future. The timing was perfect as it coincided with the office renovations, so we built a new seminar room."

During the design process, Ikegami consulted long-standing business colleague Tetsushi Hirai of TXA Planning who has a deep knowledge of the latest AV equipment. Mr Hirai offered a proposal based on the theme of 'Staying focused on the seminar'.

"The seminar room is designed for both internal training purposes — possibly with an external trainer — as well as corporate events," explains Mr Hirai. "Based on my experience as a student in lecture theatres with terrible acoustics where the lecturer's voice appeared to emanate from anywhere except him, I wanted the sound in the new seminar room to be rock solid. It's unbelievably distracting when sound is coming at you from the wrong place — I eventually dropped a credit on that course because I couldn't concentrate! Consequently, I make it a rule to design sound systems that place intelligible audio exactly where it should be so that audiences and participants can concentrate on the content and get the most from their



Akiko Kurazumi - General Affairs Department Group Manager, Ikegami

# ” WHEN I LISTEN TO THESE LOUDSPEAKERS, THE CLARITY IS ASTONISHING.

experience. Ikegami's seminar room was no exception.”

Indeed, the design was developed entirely from an attendee perspective: the rectangular room has been configured with six separate audio zones and designed in such a way that the speaker's voice can be heard clearly from anywhere in the room with no interference between zones. Mr Hirai says that Genelec's Smart IP loudspeakers offered the best means to achieve this design.

“The room features a number of physical pillars, so we installed a total of six [4430s](#) in a L/C/R configuration for the front half of the room and the same for the back half, to deliver audio to each of the six zones,” notes Mr Hirai. “The speakers are angled radially towards the centre of each zone. The large display panels are also an important part of the experience, so the system has been configured in such a way that sound appears to be coming from the display where

appropriate, which is placed close to the speaker for a realistic experience. We defined the centre 4430 above the screens as the virtual sound source and calculated the time alignment for each loudspeaker position using 3D modelling software. Amazingly, once the time alignment was set, the sound output was so good, I didn't even need to calibrate the loudspeakers — they sounded amazing straight out of the box.”

Mr Hirai selected Genelec's Smart IP loudspeakers precisely because of their extraordinary sound quality. “When I listen to these loudspeakers, the clarity is astonishing,” he observes. “Their excellent linear characteristics — that I actually measured for myself — meant that I didn't have to calibrate them afterwards. System design is much easier as a result.”

Another boon for both designers and systems integrators is that the Smart IP platform manages both power and audio signals over



Tetsushi Hirai of TXA Planning - designer of the seminar room's AV system

a single CAT cable. “When installing multiple powered speakers, typically you’d need to pull both audio and power cables, which is a nuisance. Smart IP delivers everything over just one standard CAT cable, which is a huge advantage,” points out Mr Hirai.

As the Smart IP platform relies on PoE, it was important to select a high quality switch that supports PoE. Consequently, Mr Hirai selected a powerful [Luminex](#) Ethernet switch capable of exploiting the full potential of Smart IP. This was combined with a [Yamaha](#) TF-Rack 16-in/16-out mixer that acts as an AES67-to-[Dante](#) converter as well as offering mixing capability for a simple control booth set up. Naturally, as one of the premier camera manufacturers, there is also a sophisticated video broadcast set up using a cutting edge 4K camera which sends video directly to the in-house editing suite. From here, audio and video may be broadcast live to Ikegami’s five sales locations and three branch offices around Japan and international locations in the US, Germany and Singapore over IP using the SMPTE ST 2110 media transport protocol.

The other motivation for using a Smart IP solution was that the technology is a perfect fit for a hi-tech, forward-thinking company like Ikegami. “Ikegami is paving the way with the adoption of standards and technologies

like ST 2110 which enables audio, video and control data transport, and is also developing MoIP (Media over IP) which incorporates remote control capabilities,” explains Mr Hirai. “The Smart IP platform which delivers audio, power and control via a single network cable fits right into that scenario and is a future-proof solution that will be able to adapt to new generation innovations.”

The Ikegami team is thrilled with their new, next-generation seminar room. Ikegami broadcast sales team leader, Ms Ami Okubo has worked with Mr Hirai to develop AV proposals for several of her clients in the past and has always been pleased with the results. “We had the pleasure of having him on the sound system design for our seminar room. It’s so easy to run the speech, and we look forward to hosting a broadcast-related exhibition in this seminar room.”

Ms Kurazumi echoes the sentiment: “When I first heard the system, I was impressed by how comfortable it was to listen to. We had a seminar session the other day, and I realised that it sounded the same wherever I moved around the room. We could focus on the content, even though it was about rather complex management matters. On top of that, we felt less tired after attending for a long hour. This seminar room has only just opened, but we are already planning on utilising this space for a variety of purposes. It will be an excellent showcase for us at every level.”



## THE KIT

- 6 x 4430A