

A survey about audio recording systems in the parliaments of Europe

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- Dear IPRS colleagues! My name is Niklas Varisto and I work as a parliamentary reporter at the Records Office of the Parliament of Finland. I will present a survey that me and my colleague Kalle Niemimaa made about the use of audio recording systems in the parliaments in Europe in late 2015. Let me first tell you what made us conduct the survey.

Background

- **2015:** Considering new audio recording system - not satisfied with current system
 - Problems with technical support
 - Local service provider unable to solve problems
 - Language barrier
- What do other parliaments use? What can we realistically require?
- Survey through ECPRD
- Our goal: new audio software in 2017

- In late 2015, the Records Office started looking for a new audio recording solution for the sessions at the Parliament. We have used audio recordings as the primary means of recording since the 1950's and digital audio recordings were introduced in the early 2000's.
- Digital audio has worked well generally, but lately we have not been satisfied with the current system. For example, the latest software update was delayed for a couple of years, and when it was finally completed, there were technical problems.
- The problems were not so much with the software itself as with the technical support. The local service provider could not solve the problems and we had to deal directly with the software provider, which is not from Finland. We had to communicate in English, and when both parts are speaking a foreign language, it's hard to discuss technical issues.
- The problems went on for months and even years. We became more and more frustrated and started considering a completely new digital audio software.
- Before acquiring a new recording system, we wanted to know what there is on the market and what other parliaments work with - basically what we realistically can ask from an audio software.
- To collect information, we made a survey to the fellow parliaments in Europe. We decided to send the survey through ECPRD, the European

Centre for Parliamentary Research and Documentation, because the surveys usually reach all the parliaments and they are quite promptly answered.

The survey

- November/December 2015
 - 60 parliaments in 45 countries
 - Also European Parliament and Parliamentary Assembly of the Council of Europe
- 38 answers (39 audio systems)

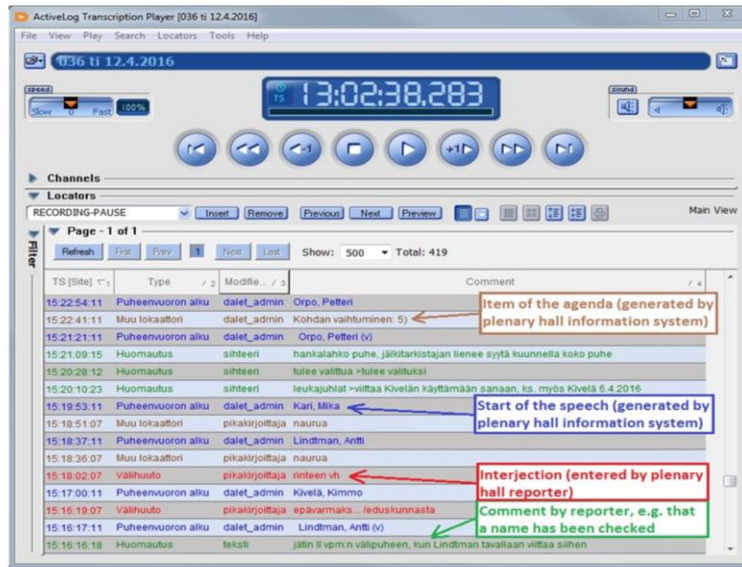
- The questions were sent out in November and the deadline was the end of the year 2015. Some of you here may have seen the survey or even answered it. If you have, we wish to thank you very much for the cooperation!
- The questionnaire was sent to 60 parliaments or chambers of parliament in 45 countries plus the European Parliament and Parliamentary Assembly of the Council of Europe. We got 38 answers. The European Parliament uses two recording systems, so there are 39 systems in all.
- We will now present the answers in short. We don't have time to discuss all the answers in detail, but if you are interested in having more information, we'll be happy to provide you with more material.

Our questions

- **Do you use a digital audio recording software?**
- **What is it called and how long have you used it?**
- **Is it the primary means of making the records?**
- **Off-the-shelf or custom-made?**
- **Operating system**
- **Functions of the software** (bookmarks with time stamps, max. duration, customization, offline/remote work, video integration etc.)
- **Maximum number of simultaneous users**
- **Technical problems**
- **Backup recording system**
- **Technical support**
- **Future plans and interesting features of the system**

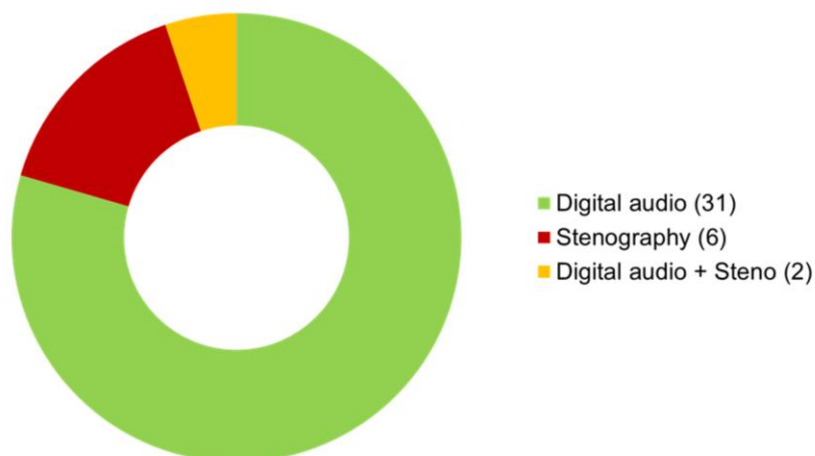
• Here are our questions. Most of them reflect our own needs and methods of work. For example, we use so called bookmarks with time stamps to make notes of what happens in the session hall. I'll show you briefly how our system works, so that you know why we asked the questions we did.

Our old software, Dalet



- Our system is called Dalet. Here you see the playback interface of the software with the time code, virtual buttons for play, stop, rewind, playback speed etc., the usual stuff.
- Below, you can see “bookmarks” of different colours with time stamps in the audio feed. They are created either automatically by the plenary hall information system or manually by a reporter.
- By clicking a bookmark, you can go straight to the actual time point in the audio feed when the event occurred. For example, if you want to listen to an interjection that an MP made, you just click the corresponding red bookmark. Or if you want to listen to the start of the speech, you click the blue bookmark.
- This is important to us, because the reporters sit in their own rooms and not in the plenary hall when the speech is given. They don't see or hear the speaker live. Only one reporter, the session hall reporter, is in the hall and makes notes in the audio feed with help of the bookmark function.
- This is how we orient ourselves in the audio recording between and within the speeches.

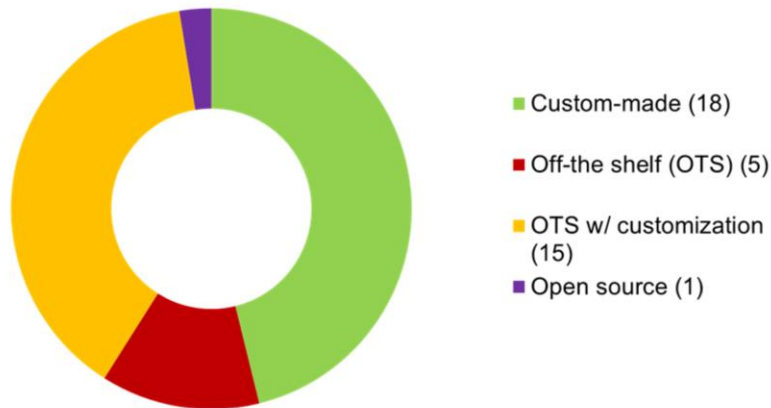
Primary means of recording



- Now let's get back to the survey.
- We wanted to know which is the primary means of making the records. It's perhaps not a surprise that most parliaments use digital audio as the primary source. Only six parliaments use stenography as the primary means, but even they have digital audio at least as a backup. Two parliaments used both stenography and digital audio as primary means of making records.
- A few more parliaments still have stenographers out of tradition, but they don't really use the shorthand in the actual making of records. Most parliaments use only digital audio for recording.
- We can conclude from the answers that all the respondents use some kind of digital audio recording, either as a primary or a secondary system.
- Now let's see what kinds of systems are used.

Degree of customization

Off-the-shelf (OTS) or custom-made?



- About half of the respondents (18) have a custom-made digital audio system. 15 of them use an off-the-shelf product – that means a software that already exists for commercial use, but with some degree of customization. Five of the respondents use a completely off-the-shelf solution without customization. Only one parliament used an open-source product.

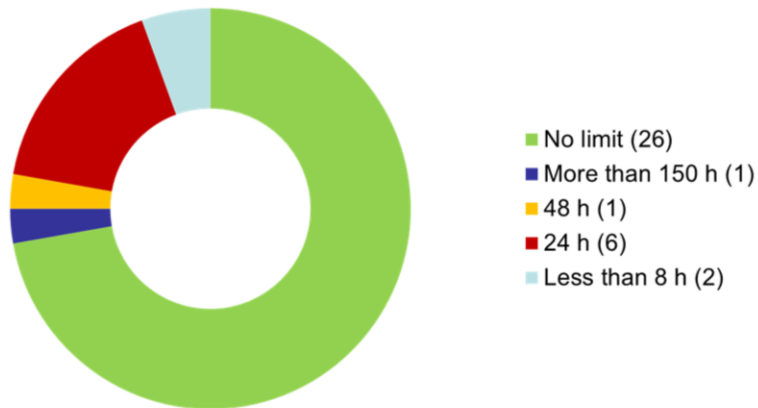
Software

- 38 clients (parliaments/chambers)
- 25 different software companies
- 1 company (Arbor): 5 clients
- 6 companies: 2 clients each
- 18 companies: 1 client each
- Operating system: Windows

- The software field is quite diverse. The 38 respondents used approximately 25 different digital audio recording systems.
- Only a few software companies have more than one parliament as clients. The Dutch company Arbor Media has five clients and SLIQ, Dalet, Media Box, Verbalix, Olympus and NCH Software have two each. So you could say that Arbor is kind of a market leader.
- There were as many as 18 recording systems with only one client. Most of the custom-made systems naturally belong to this category, and often they are made by local companies.
- Digital audio is quite a new field and most parliaments have acquired their current software in the 2000's, many of them 2010 or later. Only three parliaments have been using the same software since the 1990's.
- Windows is the dominant operating system. Only one parliament used Linux.

Recording time

Maximum duration without breaks

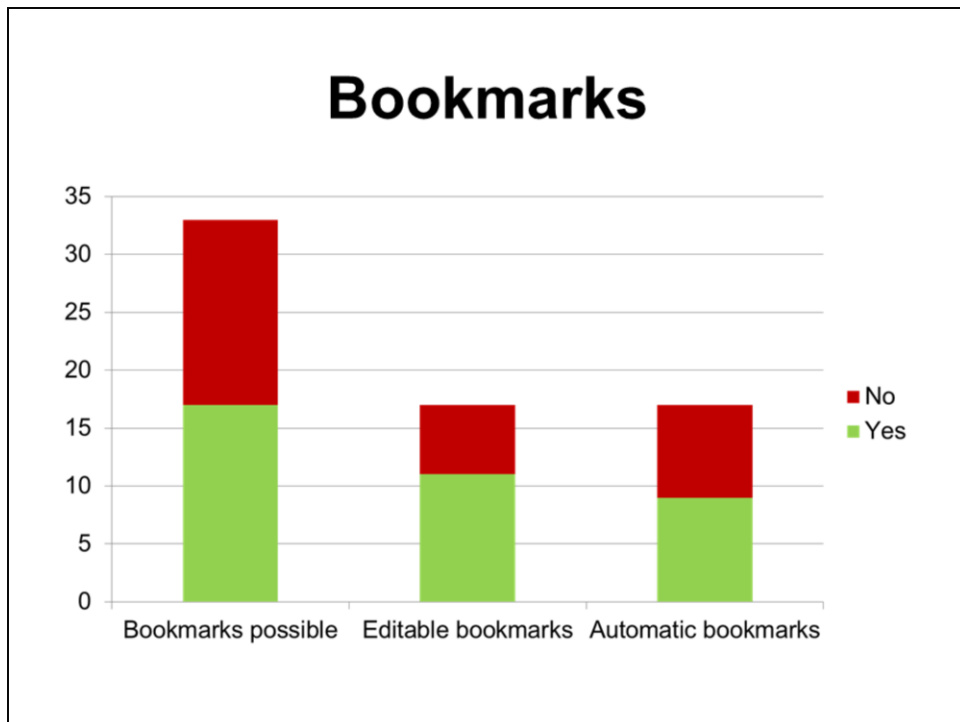


- We wanted to know how long can you record without breaks, because you don't want the recording to stop during a very long session. We have 24 hours maximum duration now.
- In most parliaments, the software has unlimited recording time. It means that only the space on the server sets the limit for how long you can record without breaks, so in theory you can record endlessly as long as you have space available on the server.
- Six parliaments reported a 24 hour limit and a few had other limits.

Simultaneous users

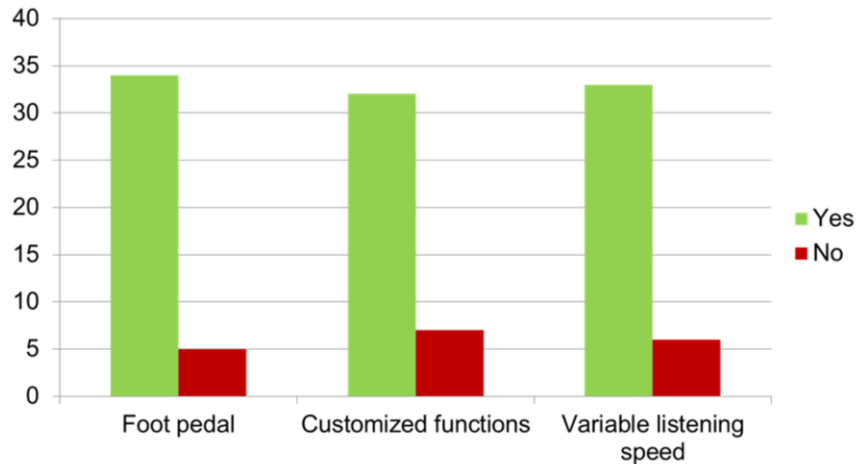


- We also wanted to know how many users can listen to the recording at the same time.
- The answers to this question were everything from about 10 users to no limit at all. All systems usually have a user limit somewhere, but maybe such a limit had never been set or reached during work. On the other hand, it's good news that the system feels like it has no limits, because it means that it operates well within its capacity.



- Back to our favourite, the bookmarks. It seems that maybe they are not as important for everybody as they are for us. Roughly half of the parliaments have a system that allows making bookmarks in the audio feed, while almost equally many don't have this feature. In two parliaments, bookmarks are possible but not in use.
- 11 parliaments said that they can edit the text in the bookmarks and that they use this function.
- 9 parliaments said that their software makes automatic bookmarks, for example the name of the speaker.

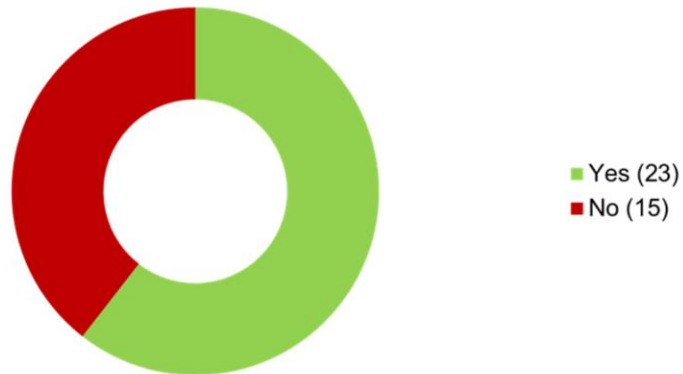
Common features



- Although there are many different systems, some functions are very common, almost universal.
- Almost all of the systems (34) can be used with a foot pedal for common commands like play, stop, rewind and forward, which is very handy if you are writing at the same time.
- Most systems allow functions to be customized for different users. Only a few systems did not allow any customization at all.
- Raising or lowering the listening speed was also a very common function. Just like foot pedals, this is a useful tool when you are writing or listening to a speech.

Listening to external audio

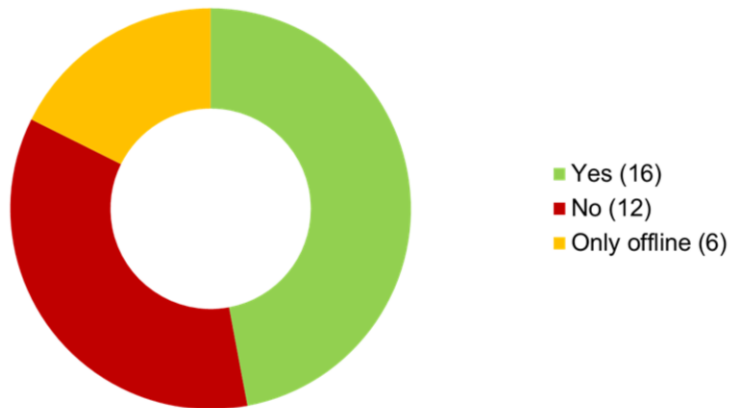
Can the system be used for offline audio listening?



- In more than half of the systems, the software is able to play audio files recorded outside the system, for example from USB sticks. This can be useful if some meetings are held outside the normal premises or for remote work. In 23 cases this is possible, while 15 reported that the function is not available.

Remote work

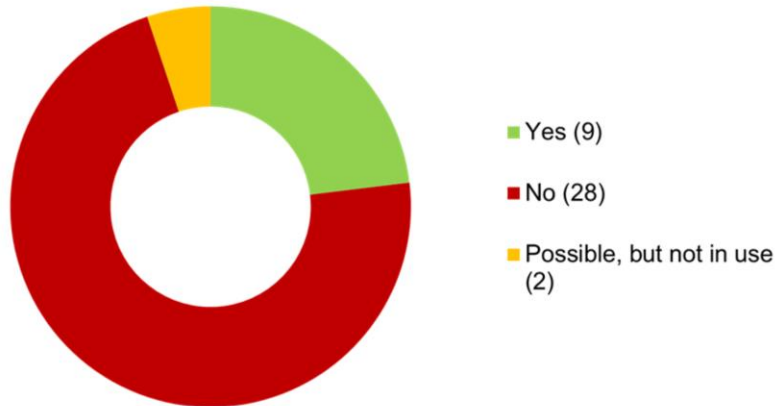
Can the system be used for remote work?



- Remote work is a rising trend as internet connections get faster and better. 16 parliaments have the option to do remote work. In 6 cases remote work was only possible offline and in 12 parliaments it's not possible at all.
- In some cases, this function had not been tested or was possible but not in use. There was quite a big variation in the answers and that could indicate that a change is happening in this area, but also big differences in the way parliaments work.

Video integration

Is video integrated in the system?



- Video integration is not very common, at least yet. Only 9 parliaments had video integrated in the audio recording, while 28 don't have this feature. In a few cases, video integration was possible in theory but currently not in use. But the trend seems to be rising, and a few parliaments reported this among their future plans.

Technical problems

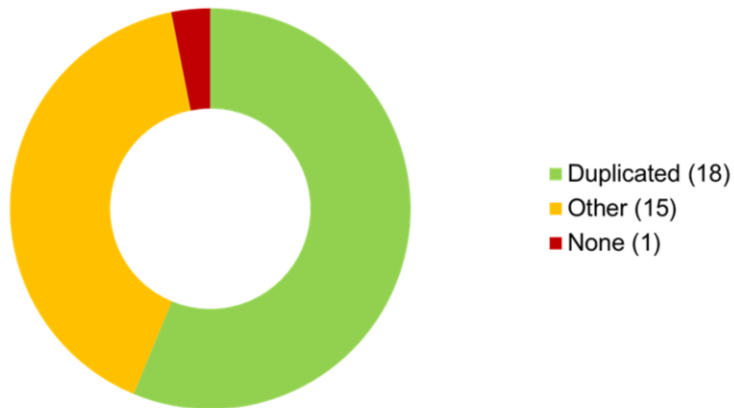


- No technical problems: 12
- Others: Mostly occasional problems
- Connections, hardware, virtualization

- 12 parliaments out of 38 reported that they have not had any technical problems with the audio recordings. To me, it sounds like quite a good percentage. People may have different tolerances, but if you can honestly say that you have not experienced any technical issues at all, that's very good. Our office has had so many problems that no matter who you ask, we could never, ever have claimed that we had no technical problems.
- While the technical issues are hard to put into strictly defined categories, most parliaments seem to have only occasional problems. And if there are problems, they may also be related to connections, hardware or virtualization, so the audio software is not always the root of the problem.

Backup system

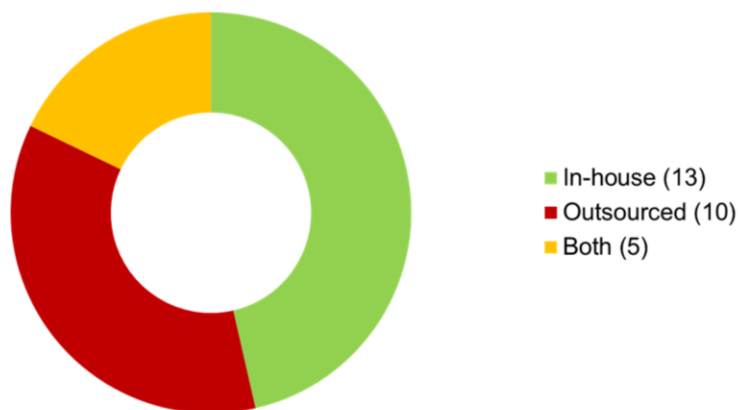
What kind of backup system do you use?



- We also wanted to know what kind of backup systems the parliaments use.
- Roughly half (16) of the respondents use a duplicated backup system. By that, we mean that the audio software makes a second, identical recording, but on another server.
- There are a lot of other backup systems too, for example mp3-recorders, audio cassettes, SD or CF cards, etc.
- Only one parliament reported that they have no backup system.

Technical support

How is your support implemented?



- If and when you should run into technical problems, you need technical support. We asked how this is implemented.
- 13 respondents reported that their technical support is completely in-house and located in the parliament. 10 had their support completely outsourced and five reported a combination of outsourced and in-house support.

Future plans

- Future plans: Video integration (6), voice recognition (3), remote work (2)
- Some have or will have video synchronized with the official, public records

- We also asked if the parliaments have any future plans for their audio software and got a lot of different answers depending on the situation. 11 parliaments said that they have no plans for now and many did not comment this at all.
- A few trends can still be identified: six parliaments are considering integration of video with the audio recording system, and three are interested in voice recognition in making the records. A few are also planning to change to another audio software, and a couple want to develop their remote work.
- We didn't ask about voice recognition, but I know from before that at least Denmark is already using voice recognition with the re-speaking method since 2007. They were not able to recruit good enough typists, so they moved on to voice recognition and the remaining typists were then re-educated to reporters.
- We also asked about other interesting features. The point was that you could add something that you find useful but we didn't ask about. One of the mentioned points was that video is or will shortly be linked or even synchronized to the official records. I thought perhaps we might discuss these after this presentation.

The process of a new software

- Many standards: security, ITIL, legal
- Finnish and EU legislation
- Open for companies within EU
- Application in Finnish
- Only three companies applied: Audico (FI), Studiotec (FI)+Dalet (FR)
- Only Audico made an offer
- Contract signed in August

- Before we discuss, you might ask what we did with all this information, and did we choose any of the softwares mentioned here?
- It was not a simple procedure to acquire a new software. It has gotten more and more complicated over the years. The software must meet many standards, for example security and ITIL (Information Technology Infrastructure Library) and legal standards in order to follow the laws of Finland and the European Union.
- The project was open for offers within the European Union. That means companies from any country in the Union could have applied for it.
- In the end, very few companies applied - maybe because we required that the software provider can communicate in Finnish and the application had to be in Finnish. For example, we had an inquiry from Arbor Media about the project, but they never applied for it.
- Only three companies applied and entered the negotiation procedure. There was one offer by the Finnish company Audico, which offered a mostly custom-built platform, and a joint offer by our current service providers Studiotec from Finland and Dalet from France for a new version of the software.
- Finally, only Audico made an actual offer, and a contract was signed in

August this year. The other two left the procedure because of the high security and language standards.

- From our point of view, the outcome feels right. Audico was very much up to date with both the security and legal standards, we can speak Finnish to them and have a great degree of customization. Audico is also familiar to us because they are already involved in the plenary hall information system.
- While new systems are never perfect “straight out of the box”, we are confident that we will have better support and a more reliable work flow.
- Although we did not acquire any of the software mentioned in this survey, I think it gave us a certain knowledge of the field and confidence to know what to look for in a system. For example, if a country of the same size and same resources as Finland can have a tailored audio recording system with certain features, why could we not? Or if a country has successfully implemented new solutions, like video integration or remote work, this can encourage other countries to make similar developments or ask colleagues about their experiences with these systems.
- Thank you for listening! Please feel free to ask questions if you have any.