

## **Summary: "Creative Sound Solutions" – Meeting #09**

The working Group meeting #09 took place on Tuesday, August 30, 2022, 14:00 – 15:00

#### Agenda:

- 1. Webinars:
  - a. Follow-up on proposals and ideas from meeting # 06 including additional comments and proposals.
  - b. Proposals for possible speakers
- 2. Physical events during 2022
  - a. Meetings? Workshops? Others?
- 3. Collaborative projects, update of proposals, indication of possible project consortia
- 4. Other ideas for Danish Sound Cluster activities
- 5. A.O.B.



### Ad 1 Proposals for Webinars

#	Subject	Background
1	'Sound in virtual/augmented reality' (VR/AR)	Workshop – completed February 24 <sup>th</sup> , 2022
2	Dubbing challenges	Completed March 29 <sup>th</sup> , 2022
4	Al-based solutions	Postponed.
5a	Across boundary solutions, i.e. involve artistic perspectives in audio technical solutions. (the border region of sound of art and technical facilitation)	Postponed until late H2, 2022  Potential contributors:  Jenny Gräf Sheppard, Kunstakademiet, Stephen Mcevoy, Kunstakademiet, Yann Coppier.  Stine Lyngedall (contact Finn Agerkvist, DTU) Nicolas Becker, Academy Award for Best Sound ("Sound of Metal") Bjørn Jacobsen, Cujo Sound Morten Breinbjerg, Audio Design, AU mbrein@cc.au.dk Det Jyske Musikkonservatorium  What technical challenges do artists face in relation to sound? Can content bring thoughts back into the technical environment, e.g. new types of needs to support developing sound art?  Postponed to next meeting.  Stine will try to get more hold of substance before next meeting in October.
5b	Bringing creativity into your engineering work	Completed April 26 <sup>th</sup> , 2022

#### 'Creative sound solutions'



#	Subject	Background
5c	Mapping of current Danish status of multidimensional sound in education, research, movie generation, theater production, etc.	A preliminary list of organizations in the Danish multidimensional domain of sound is now available, see Meeting Summary of May 24, 2022. The list should be transformed into a "Worksite" on the DSC Web-site.  The aim of using a worksite is to overcome a situation of frequent changes in the organizations involved, e.g. contact data, additional info, etc.  Focus of the worksite is to facilitate more transparency of the domain for parties such as companies, students, other interest organizations, etc.  The "worksite" should include:  Details of the organization involved (see detailed list in the summary of 'Creative Sound Solutions', Meeting #08, May 24, 2022, page 3)  Links to the websites of the individual organization  5-8 lines summary of each organization.  Based on the contact details, DSC secretariat should contact each of the listed organization and have them provide the additional info, i.e. links to websites, short summary of the organization, etc. Furthermore, it is seen as important to also include contact persons including contact data such as Emails and phone number. For this approval must be obtains in order not to violate GDPR requirements.  At a later stage, we may want to arrange a meeting, physical or on the web, allowing all the parties in question to promote their individual organization. For such an event to take place, we need to discuss further, who the target audience for such an event is, and how we ensure that the target audience gets involved. We will take this
		discussion at a later point in time
		The first action is to have the "worksite" included necessary details, created.
6	Intelligent microphones	Webinar completed February 23 <sup>rd</sup> , 2022
7	Multichannel headphones	Webinar completed January 11 <sup>th</sup> 2022



#	Subject	Background
8	Optimal sound environments for "large room offices"	Eddy has been in contact with several people that are willing to participate in an event. The event can be either a physical event (half day event, 3 hours) or an extended webinar (2 hours) with a good panel discussion due to many interesting parties. Panel discussion duration 40-60 minutes.
		Eddy has been in contact with the following:
		Marianne Lykkesfelt, architect
		<ul> <li>Ander Jørgensen, Stormgaard (Meyer Sound, acoustical zones offering privacy using a 'sound carpet' to separate acoustically)</li> </ul>
		Morten Roar, Saint-Gobain (involved in standardization in the area)
		<ul> <li>Lars Back, Jabara (intelligent headsets that increase sound level, when one raises own voice during conversation, controls one's voice level)</li> </ul>
		"Arbejdstilsynet" (not yet contacted)
		<ul> <li>Plans also to include some large companies (HR or facility management) that are in the process of planning large office environments, e.g. Ole Abildgaard, Novo.</li> </ul>
		Sonic College ?
		If we go for a physical event, it is encouraged to include video streaming to people that cannot participate. A physical event has the advantage of networking but reduces participation more broadly.
		Challenges in webinars are:
		Too much 'talking heads'
		Too much text in PowerPoint slides
		Too much narrow mindedness by a single presenter
		For webinars: "Short & sweet", better two focused events than one long event.
		The aim of the event is to confront the two schools of thought
		Solve problems acoustically
		Solve problems electronically
		And how can the two schools of thought be combines. May be some of the illustrations could be solved using short videos with sound examples. Suppliers could be invited to provide such material.
		Time planning: January, February 2023
		Audience: Usual crowd but also "architects", "Dansk Arkitektforening", etc.
9	Use of sound in	Focus: Use of sound in 'story telling' at museums.
	museums	Time schedule: Webinar in H2 of 2022, and "theme day" later, possibly 2023.
		For details see meting summary of meeting #05, 2021-11-24.
		Lars Tirsbæk and Birgitte Folmann will work with DSC in setting up the events.
		Awaits feedback from Lars.
10a	NGA ADM Immersive delivery	Completed on February 8 <sup>th</sup> 2022
10b	ADM Technology	Completed on February 15 <sup>th</sup> , 2022



#	Subject	Background
11a	"Women for sound engineering"	Challenge. DSC have problems financially in supporting events, where the focus is students. DSC can support SMEs but not students.  Background for theme:
	Electronic sound & music, focus on females	General challenge that we have a poor gender balance in audio areas, i.e. too few females.
		Events will be inclusive/open to everyone but have an all-female focus/i.e. those who identify as female program. Include female students.
		Possible themes: music and sound production, spatial audio concert performances/formats
		Could possibly be hosted at <b>AAU</b> (for spatial concert event), one of the music schools for production. Or AirLab at <b>ITU</b> .
		Strong interest from <b>Sonic College</b> to be included. Have the same challenge (contact Lars Tirsbæk)
		"Scenekunstskolen" is also a possible contributor. Currently 3 very active females (contact Eddy for names).
		Other possible contributors/interested parties:
		<ul> <li>"Det jyske Musikkonservatorium", DJM in Aalborg, <u>www.musikkons.dk</u>,</li> </ul>
		<ul> <li>Syddansk Musikkonservatorium Esbjerg, <u>www.sdmk.dk</u>,</li> </ul>
		Lesly Gaston-Bird, new 'President elect' for AES
		Also look at https://risewib.com
		The topic will be postponed until Shelley is back from maternal leave. For financing, we will need to find financing from other sources than DEB and UFS.
11b	Podcast tools, approaches, and support with special emphasis on females	Given that a significant part of podcast production today is delivered by females, and where a deeper lack of sound production sometimes lack, it seems an obvious strategy to bring focus on improved production methodology and tools, to some degree also sound engineering support and not least point to bottlenecks, where tools lack, or emerging tools may fill the gap.
		Sonic College recently had two former female student that were awarded
		The '2022 Sound Designer Prize'
		The '2022 talent prize in Podcast'
		They could be useful to include in the activities.
		Lars Tirsbæk to provide names.
		Awaits discussion at next meeting.
12a	Game audio (for game applications)	<b>Focus:</b> A webinar or a workshop on game audio, including the involvement of game audio companies.
		Time schedule: 2023 H1 (when the DSC secretariat overcomes current workload)
		Be clear on the objectives. Focus on the technical side of game audio or the creative side of game audio?
		Proposed speakers:
		Rob Bridgett, Senior Audio Director, Canada,
		Bjørn Jacobsen
		Kristian Rømer @ IO Interactive
		Simon Stevnhoved Rasmussen – Massive
		<ul> <li>Eddy's contact to a game audio company (Viborg &amp; Copenhagen) that makes game audio in mono (for use in mobile phones)</li> </ul>
		Awaits discussion in next meeting, when 'Topic key persons' are present.



#	Subject	Background
12b	Using game audio engine in other applications than gaming	Time schedule: H2 of 2022 or H1 of 2023
		Gaming engines are extremely powerful and e.g. in broadcast activities, game engines are taking over activities (today primarily in video, e.g. nVidia) that was previously handled by traditional processors.
		However, still an issue that only few people have experience with the obvious possibilities of using game engines for audio applications.
		Use applications: e.g. in audio walk, creating virtual exhibitions (e.g. Yann Copier), etc.
		DTU has activities in the area based on machine learning (Nikolas Borrel-Jensen, <a href="mailto:nibor@elektro.dtu.dk">nibor@elektro.dtu.dk</a> )
		'Den Danske Filmskole' (Rune) has launched activities this semester, but use is still in its infancy.
		May be the Microsoft soundscape 3D audio experience (Soundscape App for iPhone) that enriches a blind person's perception of surroundings when walking in a city) fits the theme, <a href="https://blogs.microsoft.com/accessibility/soundscape/">https://blogs.microsoft.com/accessibility/soundscape/</a>
		Is postponed until 2023. Awaits progress in this approach at 'Den Danske Filmskole'.
13	Dubbing challenges II	No progress was made in the meeting due to absence of key person in relation to the theme.
		Postponed for further discussion to the meeting in October 2022, Lars Nørretranders feedback is essential.
		Dubbing is undergoing radical changes in current years. For example, in broadcast DR is now focusing heavily on podcast production, i.e. simple and fast production of content. Many people producing podcasts have no strong sound engineering backgrounds, they just want to be able to produce podcast easily and with a minimum of technical skills in the sound technology.
		Efficient tools are available and the market for such tools develops fast in current years, supporting improvement of even poor-quality audio raw material.
		However, the entire scene of production is changing rapidly, and a webinar could focus on:
		The entire work process using new tools such as Adobe Premier, Avid Media Composer, Black Magic editing, etc.
		<ol><li>Trends in support tools: Getting inputs from major suppliers of tools on what the trends are in tool technology and what can we expect for the coming years from the suppliers.</li></ol>
		The first area could possibly be presented by people from e.g. DR or TV2 or podcast companies, since they are already in a process of change, have experience and can enlighten others on, what the changes in working processes mean.
		The second area is also for people in broadcasting and other audio generating industries, i.e. podcast producers, trying to understand trends, i.e. what the tool developers are likely to bring to market in the next few years (enlighten us on their 'crystal ball' visions).
		Future trends may also be aired by people from university, e.g. DTU (Nikolas Borrel-Jensen, nibor@elektro.dtu.dk) or others.
		The industry of traditional audio content suppliers faces significant changes in working processes, markets, and uses of tools. That is what the Webinar should try to address.
		Lars Nørretranders will provide names for area 2.



#	Subject	Background
14	Ethics in audio production	Ethics is becoming more and more important – also in relation to audio generation (risk of "deep fake" exists). Several cases of restricted sound exist. In general, if sound in relation to documentation is compromised through reconstruction, "hell breaks loose".
		One angle to the theme could be to involve do documentarists in radio/TV production.
		In a metaverse world, we might imagine a fully immersive, hyper-realistic virtual world that caters to all our senses. How is ethics playing into this?
		In a previous meeting, we outlined some possible contributors:
		ETHOS lab, ITU (Stina will check)
		Morten Holm, tonemester (sound in film in India)
		<ul> <li>Kyogu Lee, Professor, Principal Investigator, see also http://marg.snu.ac.kr/marg_people/</li> </ul>
		Thomas Damkjær Petersen, Chairman, IDA Member of SIRI commission)
		The meeting today did not produce major progress to the theme, and we need to discuss the issue in more depth and get better hold of the direction for a webinar in relation to the theme.
		In sound engineering education the theme does not yet serve a major role – as we understand the current situation.
15	Indoclimate	No discussion in the meeting. Awaits next meeting.
		DTU is submitting a Horizon 2022 application together with Royal Institute of Fine arts.
		The topic is indoclimate, which focuses on sound monitoring, ventilation, CO2, acoustics, etc.
		If the project receives funding, there may be content for a webinar.
16	Women in sound	No discussion in the meeting. Awaits next meeting.
		Additional focus on "Women in Sound", see also point 11. a.
		Stina will assess if we can focus on a different approach on the topic.
		In the UK there is an organization "WICE" (Women in sound) that may serve as an example (Morten Brandstrup), see also 11.a.
17	Jawbone headset technology	New theme.
		Major progress seems to take place in jawbone-based headset applications – not least in military and critical mission application.
		Also in more classical use of headsets, e.g. in TV & radio production, where people use headsets basically all-time during workdays, the technology is becoming more of interest. Even classic headset manufacturers like Jabra are seen to move into this domain.
		DSC should formulate a webinar addressing state of the art and progress in the area. Pedro Costa from the secretariat seems the right person to formulate details of an event.
		In general head related transfer function, HRTF, play into this and is a major theme in international conferences these years.



#### Ad 2.: Physical Events (H1 of 2022)

• Sound Day 2022
Will take place on:
November 9, 2022,
at DTU SkyLab, Centrifugevej 374, 2800 Kongens Lyngby

# Ad 3 Collaborative projects, update of proposals, indication of possible project consortia

The call for collaborative projects under DSC closing in August 2022 is under evaluation and projects will be started soon

New round of calls is not likely until January 2023.

#### Ad 4 4. Other ideas for Danish Sound Cluster activities

A proposal of creating a networking activity was tabled, where DSC assisted in serving as a focal point for spreading knowledge about European activities related to sound, but also sound in use related to augmented reality, visualization, digitalization, broadcast, and television technology.

Reference was given to the new Media City Odense, MCO, set-up, <a href="https://www.mediacityodense.dk/">https://www.mediacityodense.dk/</a>, that has recently been setup with support from TV2, SDU, TV2 Fyn, Jysk Fynske Medier, and other. MCO uses Media City Bergen, MCB, <a href="https://mediacitybergen.no/">https://mediacitybergen.no/</a>, as a role model. A project cooperation Future Media Hubs, <a href="https://www.futuremediahubs.com/">https://www.futuremediahubs.com/</a>, also aims at promoting the emerging technology improvements.

Which role DSC could play in all of this is still somewhat diffuse. However, as is sometimes stated: "Sound is half the picture". Without sound there will not be any video of significance. Despite this fact, sound is often neglected in the discussion of new technology, these days UHD-HDR, i.e. 4K formats and high-resolution images. Sound, however, remains to play an important role – also in UHD-HDR.

DSC could play a role in underlining the importance of sound – also in new video formats.

We need to discuss further in coming meetings, what role DSC could take – and what is realistic. How can we reach out beyond the classic audio community?

Another reference is a new activity in VEGA focusing on sound in an aftermath to COVID 19. New formats are created, and how can that be utilized in a large scale by artist, sound producers, and others?

#### **Next meeting**

Monday October 10th, 2022, 14:00 to 15:00



## **Appendix 1: Participants in the meeting**

Birger Schneider CHAMAJ Consult ApS Director/owner

Eddy Bøgh Brixen ebb-consult Consultant, owner

Morten Brandstrup TV2 Danmark A/S Head of News Technology

Lars Nørretranders DR District Manager

Stefania Serafin AAU-CPH Professor