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ADAPTING TO A VIRTUAL WORKPLACE

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Tips For Working From Home During the Coronavirus Pandemic

by Dave Osborn, Elisabeth George, Jennifer Brooks, Theresa Poole, Varun Verma, Philips





"Stuck inside these four walls…"

"Under Pressure"

Song lyrics. Earworms in my brain while quarantined and working from home. Regardless of having been a remote employee for the past 8 years, working from home during the pandemic is nothing like working from home ever was before.

My routine advice as a seasoned veteran is that remote working and working from home are not for everyone. In many cases, it can be amazingly productive. However, not everyone acclimates to what might be a substantially isolated environment. Your only office-mate might be the family pet and even though the coffee might be arguably more palatable—sipping it without exchanging office pleasantries—it does not offer the break it once did. There are the lovely aspects of a two-minute commute from the kitchen to the "office," the bonus of uninterrupted thought time, and yes I'll say it, working in your slippers. However, all of those benefits are quickly overshadowed when the decision to work from home was not your own. When faced with the reality that your employer is discouraging shared workspaces for "non-essential" employees and health authorities are recommending self-isolation, the perspective of your cozy home office may shift drastically. In addition, your home office may also have unintended "co-workers:" children, significant others, or in some cases extended family. (Interestingly, these new office-mates magically remain silent only when you are not actively speaking in a meeting.)

You are not alone. Many of your colleagues may also be dealing with the same challenges. These shared challenges create a community of understanding and often colorful background noise during calls. However, what may not immediately be apparent is the pandemic noise from remote work is not just physical; it includes mental noise, too. As a population, we share an unprecedented level of uncertainty. It may be incredibly difficult to focus on routine work, let alone sporadic challenges, while also attempting to manage abrupt interruptions in our daily routines and resolve concerns for the safety of our loved ones. We are grieving the loss of the world as we knew it and in some cases, the lives of people we held dear.

Productivity has been impacted. The amount of work and how that work is accomplished has created another stressor at a time when the last thing anyone needed was a new source. We are faced with increased volatility in the regulations, daily changes to what each country is doing to accommodate the critical needs of their populations, demands from our customers for more equipment or new ways of providing services. Business forecasting financials, managing suppliers, even just assessing the potential impacts is all now incredibly more complex.

Additional complexity means demand for more meetings. Social distancing dictates no more face-to-face meetings, which results in more virtual meetings. A whole day event, on any topic, now necessitates multiple 2-3 hour chunks spread out over days or even weeks. New methods of communication are being used. Without the advantage of sharing space with your participants to read non-verbal communication, more time is being taken documenting and facilitating discussions. Notes are being provided before, after, and sometimes even during meetings to ensure understanding. All of these additional activities take time and energy. What might once have been just tiring, has become exhausting. Travel bans have resulted in coordination with global colleagues, which means attending meetings as early as 4 AM or between 11 PM and 2 AM to accommodate many time zones. The flexibility and creativity demanded during this time becomes even more onerous when the world outside of work is also complex and demanding.

Luckily, human beings are proficient at adaptation. The evidence of adaptation is clear in the decreasing number of people who forget they are on mute or people forgetting *to* mute. The best practices on connecting efficiently are being shared amongst teams and organizations. I asked our team what they were doing to adapt. Following are some excerpts of what they shared.

We are learning to reserve time for ourselves as needed to make up for that night we sat on a call for 3 hours trying to stay alert.

» Ensuring periodic breaks of 5-10 minutes, taking a scheduled lunch break every day, and enjoying a quick walk or a bike ride to enjoy the weather have all helped as well;

» Having a designated office or office space and establishing to other members of the household that this is a work zone and I am not to be disturbed keeps me away from distractions;

» Forming a routine similar to the one I would have if I were going into work in-person: waking up early, showering, getting ready, having breakfast and being ready for work as if I were driving to the office and meeting co-workers face-to-face;

» Scheduling "out-of-office" time on the calendar (e.g.: workouts, walks) and turning on do-not-disturb on the phone from 11 PM to 5 AM;

» Setting an "out-of-office" message for standards meetings calls. Example: "Attending standards meetings on Singapore time all week; please be aware I may not be online during my normal business hours."

We are looking at the future of how we collaborate, defining those things that can be handled online over shared editing tools, and those that will be optimally served with a face-to-face meeting once it is safe again to travel.

» Regulatory Paradigm Shifts: All regulators created alternative pathways (e.g.; EUA's, Waivers) that required new ways of working while still focusing on normal pathways for the majority of products. This required significant education with internal stakeholders to ensure safety and effectiveness.

» I have concluded that the jet lag is easier to accommodate (and I never thought I would say that) for a long week of concentrated in-person meetings than a continual set of virtual ones. After a halfday or more per day of running virtual meetings I am completely drained. It is much harder mentally. I'll take the physical exhaustion of jet lag!

We are defining adaptations required to facilitate the new ways of working.

» Our peer check-in meetings have been great for staying in the loop with co-workers. They help cultivate relationships amongst coworkers and should be continued even if there is no pandemic, although maybe with reduced frequency.

» The geopolitical environment is shifting to a more local approach. Regulatory and standards work around design, manufacturing and labeling is increasing. Our teams are proactively evaluating multiple regional sites as potential manufacturing sites. While this is causing significant increase in regulatory activities including supplier qualification, manufacturing, product verification and validation, and submissions including labeling and conformity assessment, it allows our businesses to stay better informed of their choices moving forward.

Most importantly we are reaching out to each other, actively working to connect and maintain, or create, bonds with those we can no longer meet in-person.

» With my standards groups (where we all know each other well), we have been quite successful meeting for 3 hours with a 10 minute break about 90 minutes in. Typical meetings include between 20 to 30 participants in at least 10 time zones spread rather equally around the globe. With that spread of time zones, there is no slot where at least one person is not having to connect between midnight and 6 AM. It is tough, but we make it work.

» We utilize scheduled "check-in" time and set up regular intervals to have small talk, non-work chat, and even virtual friend time. By connecting for reassurance that all is still going well with each other personally, we are provided with small comfort that not everything is in chaos.

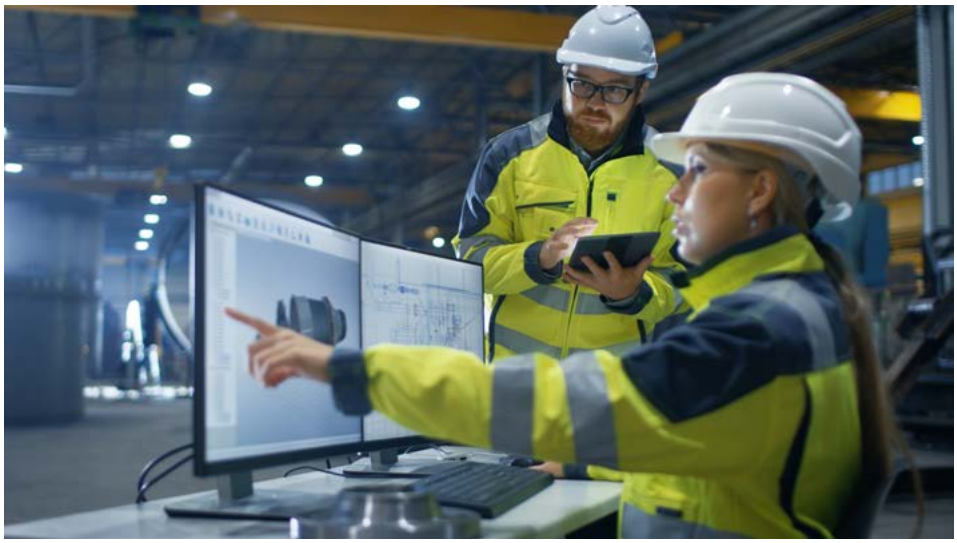
In the face of this brave new world, we may not have chosen to be remote, but we do choose to come together in creative new ways. Maybe, the lyrics squirming through my thoughts will shift and "I'll get by with a little help from my friends..."

Hazard-Based Safety Engineering: Learn about one of the key components and building blocks of safety science

by Joe Antony, Principal Engineer – Controls and Components at UL LLC

At UL, we prioritize science and safety. We develop principles that secure safety from potential hazards that can harm anyone or anything when products are being produced or when products are being used. This article will focus on a particular safety science that helps keep the world safe and that is hazard-based safety engineering (HBSE). HBSE can best be described as a key component and building block of safety science, consisting of two components: inherent safety and functional safety. Inherent safety is safety related to the inherent design of the product where the safeguards against potential hazards are not relied upon for the correct operation of embedded functions. Functional safety is related to safety resulting from a loss or malfunction of a function, either within the product or in the overall system. Both of these components are based on hazard-based safety principles that are discussed later in this article.

Unfortunately, safety science is not taught in engineering schools as part of an academic curriculum and



therefore it is not well understood in the field. As a result, implementation of reliable and robust safeguards in product designs, which prevent the risk of potential hazards especially with new and emerging technologies, are missed during the design stage of a product.

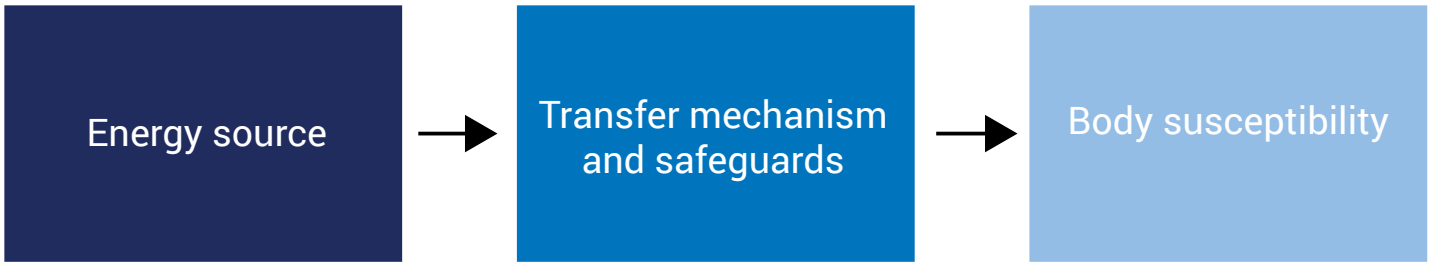
For a hazard to manifest, three events must take place. First, there should be an energy source capable of providing the hazardous energy continuously. Secondly, there should be a transfer mechanism that transfer the energy from the source to the output and lastly, the body susceptibility to the available level of energy. This is noted in the three-block hazard transfer model.

See Figure 1

This tool can be applied in product design, certification and development of safety standards. It involves a systematic and analytical approach to safety by identifying all hazardous sources and implementing measures to either reduce or mitigate energy transfer to the human body.

Figure 1

Three-block hazard transfer model



Outlined below is guidance on how one should proceed with this activity:

Identification of the energy source

» Determine if the energy source is hazardous or nonhazardous based on consensus standards of safety or industry norms,

» Determine the specific type of hazards, i.e., electric shock, fire, casualty injury, etc., that can occur from this energy source both in the intended operation and foreseeable misuse of the product,

» Determine the various paths that this energy can be transferred in the product.

Identification of the transfer mechanism and safeguards

» Determine event sequence leading to the hazardous events by applying hazard and risk analysis techniques such as fault tree analysis (FTA) and failure mode effect analysis (FMEA) to identify the transfer mechanism and possible safeguards,

» Examine each energy transfer mechanism to determine if the energy can be reduced or mitigated by using appropriate safeguards,

» Identify the protective measures/ safeguards,

» Determine the suitability of the safeguard with respect to the severity of the hazard,

» Evaluate the safeguard for its effectiveness, robustness and reliability to perform its intended safety function.

By implementing this thought process, product designers can design safety into their products even though the relevant safety standard may not address the anticipated hazards. Consensus standards lag behind technology and application, so the safety community should utilize HBSE techniques in their work.

For over three decades, UL has implemented these safety principles in the development of their standards, which, of course, provides the safeguards to reduce or mitigate anticipated hazards, and continues to do so, especially with the advancement of technology. With emerging technology and advanced connectivity of products, new faults emerge that must be addressed to maintain the safety level of the product. Consequently, UL plays a leadership role in technical committees, both international and domestic, involving the areas of functional safety and cybersecurity.

UL offers public and private seminars regarding the above topic, including the principles of functional safety and cybersecurity. For more information visit UL.com or email ApplianceInfo@ul.com to receive additional information and trainings.

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Augmented Reality (AR)–new gadget in power asset manager's toolkit?

by Ivan Jovanovic, G&W Electric

The Need

With convergence of digital technologies, asset managers in generation, transmission, and distribution of electrical power are looking into innovative ways for maintenance, field installation, and training of the personnel.

The need is real: aging power infrastructure in North America will require maintenance, refurbishment, and upgrades for years to come; in many cases skilled workforce has moved on or transitioned to retirement; integration of new equipment into the existing networks can be disruptive and field engineers and technicians need to retain old and acquire new skills to be able to navigate the landscape.

This all requires development and implementation of in-depth yet efficient training programs and a new set of tools to augment existing field installation and maintenance practices.

Additionally, the COVID-19 pandemic created unprecedented challenges and forced the industry to revisit current work practices and investigate performing tasks remotely, including remote field supervision, troubleshooting, and training of the workforce.

Augmented Reality (AR) emerged as one of the technologies that takes up the challenge.

The Technology

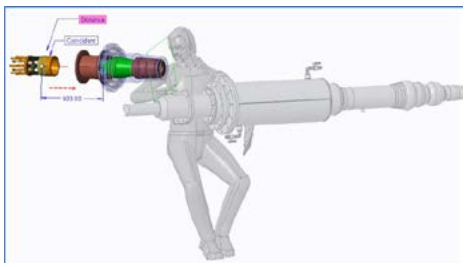
Since its introduction in 2000s, Augmented Reality (also known as Mixed Reality) has made its way into different aspects of everyday life.

AR superimposes digital image that resides on an AR portable device—like a tablet, smartphone or AR goggles (shown in the picture below)—on a user's view of the real world and provides an overlapping view of the two.

This opens world of possibilities.

In the case of power equipment, like switchgear and cable terminations and joints, engineering CAD models of the product can be uploaded into the AR device and "pulled" side by side to the real product in the field or training facility.

By designing a proper AR environment—complete with menus, commands, storylines—a user can use a virtual desktop, hand gestures, and voice commands to navigate through the digital world and in the same time operate in the physical space. An example of the virtual desktop is shown below:



While working on the product, engineers and technicians would be able to receive all relevant information (e.g. next installation step, caution message, quality checkpoint) in an interactive way, and simultaneously perform the tasks (e.g. using the tool,

operating the switch). This would make the training process more intuitive and interactive.

AR portable devices use its camera to map the space according to the changes. This process is called spatial mapping, and it updates the model accordingly. This allows for the digital model to always be in reference with the real physical object. Remote supervision of the field installation or remote troubleshooting would become a reality.

Pilot Project

With these possibilities in mind, our team started a pilot project that investigates different AR options and we developed demo AR applications for training and remote supervision of personnel.

The development process was scoped in several phases: identifying the need, interviewing and collaborating with different stakeholders from the end user's base—utility engineers and asset managers, safety officers, field engineers and technicians—and compiling a list of desirable features for AR applications.

In the next phase, our team looked at available AR portable devices and selected two different platforms: a tablet with iOS and one of the AR wearable goggles available on the market.

For those two devices we developed an AR environment with a set of menus, storylines, and options that we thought would work best for the task at hand. The task was to create installation instructions for HV cable terminations and joints and instructions for demonstration of different operation modes of MV reclosers.

As a result, our team developed two sets of applications, one for the tablet and one for the AR goggles.

To be able to "lock" the digital model to the physical object, our team developed AR codes that identify the object and its position in space. Once this code is printed and permanently positioned on the physical object (as shown in the picture to the right), it can be scanned by the AR device just like a common QR code, which provides the AR application with spatial reference of the physical object. In this way digital and physical objects are overlapped, which allows for number of functionalities to be developed.

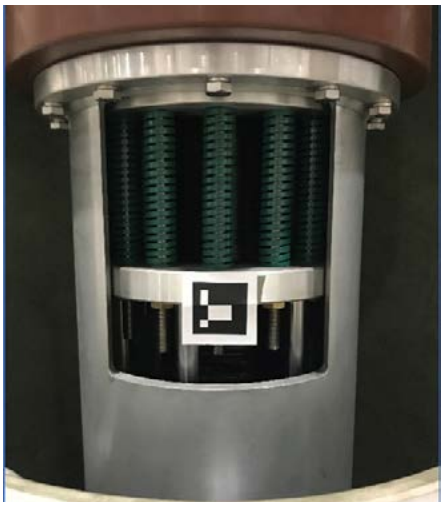
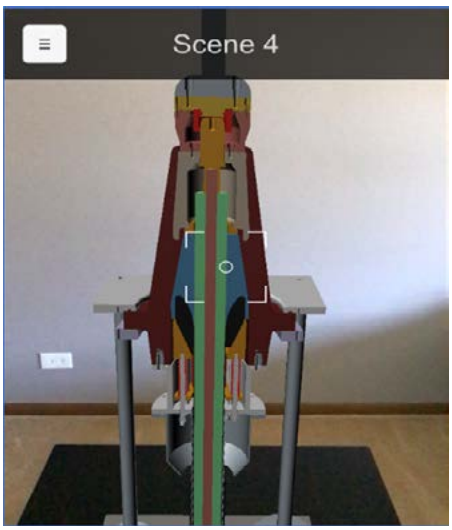
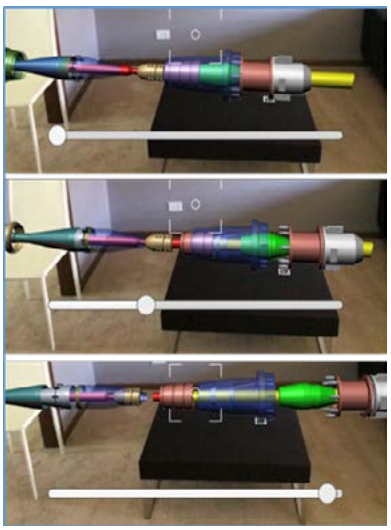


Figure 2 below shows cross-sectional, exploded and transparent views that were developed for the tablet's AR application.

Products that were modeled are a cable termination and a joint, and the digital model overlaps the physical one in 1:1 ratio. This allows for a user to "see" inside the cable termination and to enlarge the parts of the joint to see how they fit on the cable and how are they assembled relative to each other and the cable.

Figure 2





It is easy to see how this application can benefit field technicians or maintenance engineers during training or prior to assembly.

Applications for AR goggles are developed with a full set of installation instructions for cable joints, with all the steps, warning messages, and check sheets for field quality assurance.

Users wear the goggles while performing the training, and receive all steps, one by one, with dimensions, required tools, and procedures. This allows for a more realistic and intuitive training process, although it works best in controlled environment, such as a training facility. These specific goggles have some ergonomic shortcomings for field applications.

More functionalities that are developed for goggles include demonstration of manual opening or closing of a recloser. Users wear goggles and can "see" what happens when the handle on the recloser is manually operated: the main circuit closes, and the current path is animated, showing flow through the device.

All these applications allow for users to manipulate the model to his or her convenience: to move it around, reposition it in space, size it, go back in sequence and any other feature that end users thought would be required.

Lessons learned

Our team evaluated AR technology by running a pilot project and developing a set of AR applications for wearable AR goggles and tablets. Applications were tested on selected HV and MV products and demonstrated to asset managers with a set of goals in mind:

- Providing an option for remote supervision and troubleshooting in the field,
- Utilization as a product training tool for engineers and other personnel,
- Facilitating and ensuring proper installation,
- Creating digital Quality Assurance (QA) files,
- Improving safety,
- Reducing training time and costs.

Can AR deliver on its promise?

We believe it can. Our conclusion after this pilot project is very positive. More work lies ahead, and despite some of the noticed shortcomings (e.g. ergonomics of the goggles), the possibilities for improving training processes and adding a new powerful tool for field supervision and maintenance are significant.

Future work is planned for launching applications with more functionalities while improving on some of the shortcomings.

The ultimate goal for the industry should be to implement AR as a tool for maintenance, training, and supervision, as well as starting the standardization process that will steer this technology in the right direction and bring it to its full potential.

DECISION DEPOT

This column provides easy access to recent decisions that have been made regarding IEC and USNC policies and procedures that directly affect our members. Click the link below to access the recent decisions.

See the Decision List below for the decision at SMB 168, CB, and CAB 47 held on June 9, 2020 in Geneva, Switzerland.

SMB: SMB/7060/DL

CB: CB/1122/DL

CAB: CAB/1991/DL

Redefining the Standards Landscape in a Connected Future

by Muhammad Ali , HP Inc.

The global crisis caused by the COVID-19 pandemic has accelerated the digital transformation in nearly every industry sector. History shows that every major societal crisis often leads to long-lasting changes and has fundamentally redefined human beliefs, needs, and behaviors. There is now only going to be a road to a "new norm" in the standards world. We have witnessed Standards Developing Organizations (SDOs) creating new technical committees to write standards for COVID-19 tracing apps, trade associations expanding their efforts to publish new guidelines surrounding COVID-19 response, and companies increasing their participation in standards work. There is no doubt that the standards community has played a very important role in responding to this pandemic in a meaningful way by ensuring the health and safety of citizens around the world. Even during these difficult times, the standards landscape has demonstrated itself to be innovative, sustainable, and flexible.

While this pandemic has certainly disrupted everything—global communities, economies, healthcare and how we work—it has also taught everyone some very good lessons that would have otherwise taken us years to learn. The pandemic had little to no impact on standards professionals participating in committees. In fact, the number of meetings, webinars, workshops, and virtual conferences increased due to working remotely, no commute time, and no travel. There was also an increase in the number of participants due to virtual meetings, which essentially removed physical barriers to participation. All of us experienced the benefits of technology by meeting virtually, but we also felt the importance of those much needed coffee breaks, business relationship building, and collaborations. Many also experienced meeting overload. A good strategy I learned from my manager was to challenge Outlook calendar invites and schedule 50-minute meetings instead of the default one-hour meetings, allowing some time for people before starting their next meeting. Another good strategy is to schedule blocks of time each day for important projects to avoid delays and prioritizing the meetings. Having a good meeting facilitator and organizer who is also efficient in digital engagement is very important.

Last month, I attended the first virtual ISO/IEC JTC 1, Joint Technical committee of ISO and IEC for Information and Communication Technology (ICT) products Plenary meeting. It was scheduled for three hours each day over the duration of three days, which still allowed time to get other things done in-between. There weren't any worries of catching a flight, getting to a hotel, going into the meeting location the next day and adjusting to a new place. It was a very well-organized meeting with proper instructions given well in advance to connect virtually. While we were not exchanging business cards and trying to connect a face with a name, it was easy to identify the national committee and remember people attending the meeting by listening to them. The delegations were large in number as compared to those in-person, and were very well prepared considering not having a chance to meet in-person beforehand. Time management was excellent as everyone was on their laptops and

had all the relevant details in front of them. Achieving consensus was also easy due to good planning and facilitation. ISO/IEC JTC 1 also decided to revise JTC 1 SD 19, Meetings, to better address guidance for virtual and mixed-mode meetings considering recent documents from both ISO (ISO participation guidelines for virtual meetings) and IEC (IEC information related to meetings in the context of coronavirus). The guidance from both ISO, IEC, and JTC 1 have all been helpful in navigating the meetings virtually, attending them securely and using the collaboration tools effectively. These are the times where collaboration and communication between industry, government, and consumers become critical to achieve the best results.

As most of the workforce in US is potentially going to be working remotely for some time, it is also important that they do so securely. Cybersecurity and privacy have become critical in these times with similar effects being observed in both regulations and standards space. There are currently many efforts going on in US and internationally with respect to cybersecurity. Some of them include creating a cyberspace solarium commission to "develop a consensus on a strategic approach to defending the United States in cyberspace against cyber-attacks of significant consequences" and NIST releasing the final version of NISTIR 8259, Recommendations for IoT device Manufacturers: Foundational Activities, and NISTIR 8259A, Core Device Cybersecurity Capability Baseline. Additionally, ETSI has announced publication of EN 303 645 covering baseline cybersecurity requirements for consumer IoT products. The European Union (EU) has setup an ENISA Stakeholder Cybersecurity Certification Group (SCCG) in accordance with the EU Cybersecurity Act. SCCG will advise the European Commission on strategic issues regarding the European cybersecurity certification framework. In addition to this, ENISA AI, an ad hoc expert group, has also been set up to specifically focus on Cybersecurity for Artificial Intelligence to map an AI Threat Landscape (AI TL) using threat assessment, as well as identification and analysis of security measures to mitigate risks to AI based on the predefined threat analysis and attack scenarios.

Virtual Meeting or Virtual Experience? Navigating Event Planning in a COVID-19 World

by Veronica Lancaster, Consumer Technology Association

I am in my fourth month of working from home. This pandemic has changed how I work, shop, interact, and stay entertained in this very different world. Like lots of other families, mine is juggling the impact of schools and daycare being closed. We are working from home, completing school, keeping kids busy, competing for private home office time, shopping online, and streaming everything. Technology has made it possible to do all these things while we are at home.

Then there is travel, which was essential in the development of international standards at the IEC. For many of us in the U.S. National Committee of the IEC, we log frequent flier miles. We travel around the world to develop international standards with colleagues from other countries. We love to experience new countries and cultures while making new friends and, hopefully, moving technology forward. We now rely on this technology more than ever to connect us, since most international and domestic travel is limited to business essential. Even if you find yourself in a position to book that "business essential" trip, you may have to self-quarantine or travel in a safe and socially distant way.

Many Technical Committee and Subcommittee meetings have been changed to virtual meetings, making video platforms and virtual meeting software essential to staying connected. Like the IEC meetings held before 2020, CTA regularly held face-to-face meetings to gather technology engineers, CTOs, product planners, designers, executives, and others to discuss where the industry should be headed. These are important opportunities to connect and network with each other, building relationships that can change business. So we had to rethink how to create the same opportunities to connect in a virtual environment.

CTA held its first Spring Technology & Standards Virtual Forum May 11-14. We wanted to create the same excitement we had in a face-to-face environment—and not just another set of virtual meetings. We planned virtual sessions with industry experts to discuss the latest emerging trends important to CTA and its members, such as the role of artificial intelligence in health care solutions, the impact of COVID-19 on the business landscape, gesture control and its potential application across industry sectors, extended reality (XR) and more. Members who missed virtual sessions can go back and watch them. This provides a continued opportunity to market your event after it concludes.

Bringing thinkers together creates an environment that fosters solutions. Our virtual event was no exception and produced tangible results. New working groups were formed, new standards projects were developed, and new people were introduced to our work. But lessons were also learned. After completing our first virtual event, I would offer the following advice:

- Allow time for preparation, reminders, recording, editing, and meetings with your speakers and leaders.
- Plan your event timeline. Multiple days? Multiple time zones?

Keynote sessions? Open or closed meetings? Multiple disciplines? Technology themes? Try to align similar content to create theme days to help make better use of your members' time.

» To pre-record or not to pre-record? How confident are you in your meeting technology? Worried about timing or the usual virtual meeting distractions? How formal or informal is your event?

» Are you going to allow Q&A or free-flowing conversation? Decide a format based on your timeline.

» For CTA, our virtual Forum was a success but also a learning experience. We learned that we needed a way to get new attendees up to speed without sidetracking the main meeting.

» Video etiquette. Decide if you are going to have a video meeting, conference call with documentation or hybrid. Make your attendees aware of expectations. And always be understanding if someone does not want to be on video.

» Think twice before you schedule a four-hour virtual meeting on a single topic. You may have a full day of content but try to break it into digestible time blocks.

» Incorporate exciting content. Can you show video? Do you have a dynamic speaker? Is the content compelling? The more captivating, the better.

» Speaking of exciting content, figure out how to create pure networking opportunities. Can you host a virtual happy hour? How about trivia? Can you create a post-session meeting room where your members can ask presenters questions after the session?

» Create excitement! In addition to your traditional media strategy, create simple social media posts, emails to general members, targeted emails to industry segments, and blog posts and journal articles.

» Prepare for new attendees. Don't assume that everyone knows what you are doing. You could end up with many times your normal attendance, which is a great problem. Save getting into the weeds for the working groups. And save the working groups for another time.

» Consider a post-event survey and a staff debrief. Did you reach new people? Did they like your event? Would they attend again? Do they have an idea you didn't consider?

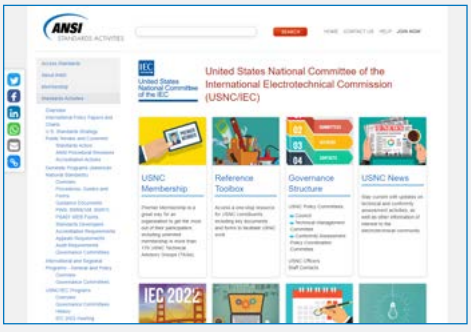
As I'm wrapping up another day working from home, I've been on two video meetings (one of which my dogs crashed), had a few conference calls, sent a few intra-office instant messages, got a few packages delivered, processed some contracts, and finished this article. I did all this while in my socks.

Technology is helping make things possible from your home in a COVID-19 world, including virtual events. By applying these lessons and insights, tech can help ensure your next meeting is productive, engaging and successful.

SEE THE UPDATED USNC WEBSITE!

The USNC has a fresh and new look to our website!

Go to www.ansi.org/usnc and check it out.



IEC's New Copyright Policy

by USNC Staff

For more than a decade, the IEC has realized that it needs to clarify its copyright rights in IEC International Standards and publications to assure that it has sufficient rights to license users of standards and protect IEC publications from copyright infringers. With its copyright statements scattered across numerous documents–from the Directives to the IEC Statutes and Rules of Procedure–and the incidence of copyright infringement increasing around the world, the need for clarity grew more urgent. By 2017, responsibility for developing a new policy shifted to the IEC Sales Advisory Group (SAG), which quickly identified the legal complexities involved in developing a policy that would accommodate the copyright laws, National Committee practices and employer/expert needs that are woven into every IEC international publication.

Earlier this year, as part of IEC's ongoing effort to clarify its ownership rights over contributions to IEC standards, the IEC Council Board invited the 10 National Committees represented in the IEC SAG to send a legal advisor to the newly-established Copyright and Database Rights Ad Hoc Group (CDAHG), which was charged with reviewing the latest draft policies and recommending to the IEC Council Board new IEC Copyright and Database Rights Policies and Implementation Guidelines. The CDAHG included the USNC and legal representatives from Australia, China, France, Germany, Italy, Japan, Russia, South Korea, Spain and the United Kingdom. Working in collaboration since February, the CDAHG reached consensus on a new proposed IEC Copyright Policy and Implementation Guidelines, which were both recommended to and approved by the Council Board in June. The CDAHG did not reach consensus on a database rights policy, and that has been left for future discussions.

The new proposed Copyright Policy defines two distinct categories of copyrightable contributions and specifies the rights IEC acquires in both externally-created, pre-existing copyright and IEC collaboratively-developed copyright. Historically, IEC has acquired these rights through either implied licenses and assignments or through a simple written statement issued on a case-by-case basis. Relying on these mostly implicit rights, the IEC currently claims that the copyright in all final IEC Standards and publications belongs to IEC.

The new proposal would make explicit the rights conveyed to IEC and seeks to clarify the boundary that exists between copyright owned by third-parties and licensed to IEC versus copyright owned by IEC. In this regard, the new policy expressly states that "IEC will respect copyright of third parties and, where necessary, license such third-party copyright for use in IEC publications."

The proposed Implementation Guidelines carefully define the two categories of copyright as "Pre-Existing Copyright Works," which were created and exist outside of the collaborative work of the IEC, and "Collaborative Copyright Works," which are created as part of an IEC Standard by an expert working in collaboration with other experts to develop such IEC Standard. The Implementation Guidelines anticipate that each expert will designate the appropriate classification of the content they contribute. In this regard, the guidelines require all experts to agree to certain terms as a

prerequisite to using the IEC IT tools. These terms:

- Require all experts to license expressly to the IEC copyright in Pre-Existing Copyright Works (1.6.1),
- Require all experts to transfer expressly to the IEC copyright in Collaborative Copyright Works (1.7.1),
- Put all experts on notice that if they have been appointed by an employer to participate in the work of the IEC, "the IEC will seek to affirm with the expert's employer that the employer accepts the terms" (1.6.2 & 1.7.2), with the exception that the IEC and the relevant National Committee will use commercially reasonable efforts to put in place alternative arrangements where an expert or the expert's employer cannot comply with 1.6 and/or 1.7 (1.8).

The scope of this last exception, which would function as a carve-out, was the subject of extensive deliberations among the legal advisors. The USNC, working with a subgroup of CDAHG members, sought a broad and flexible exception, albeit one that would neither accept the terms of the policy nor allow an inordinate number of requests for alternative arrangements. In the end, the CDAHG reached consensus and recommended that experts and/or their employers could seek an alternative arrangement where they were unable to comply with the licensing and ownership transfer outlined, respectively, in 1.6 and 1.7 because of: (a) a pre-existing arrangement between the expert or expert's employer and its National Committee; (b) national law; or (c) the existence of special circumstances that, in view of the relevant National Committee and the IEC, justify an exception.

As noted above, the IEC Council Board approved the IEC Copyright Policy and the IEC Copyright Policy Implementation Guidelines during the June 2020 meeting. Both drafts will be circulated to the IEC Council for final approval. In the meantime, the CDAHG members have been asked by Council Board to turn their attention to drafting two additional documents: a Notice to Experts and a Notice to Employers, both of which would be used by the IEC to effectuate the licensing and transfers envisioned by the Implementation Guidelines. The CDAHG is currently working on those drafts, with the goal of recommending a final draft of the forms to the Council Board in the near future.

The USNC would like to thank US Representative to CDAHG, Gail Matthews, Associate General Counsel at ANSI, for all her hard work, time, and extraordinary efforts as she worked (and continues to work) to protect the interests of the USNC and U.S. SDO's.

ANSI COVID-19 RESPONSE

ANSI is here for you during this difficult time. Get the latest updates and responses to the COVD-19 health crisis via the newly launched ANSI COVID-19 Resource Webpage, highlighting the standardization community's response efforts. Follow news at www.ansi.org/COVID-19.

USNC LINKEDIN

IEC United States National Committee of the IEC

LinkedIn

Would you like to stay updated with the news and events of the USNC? Join our LinkedIn Group to learn about and provide input on all issues electrotechnical that can affect your life, from your own home to the other side of the globe! If you have any information to share on LinkedIn, please contact Megan Pahl (mpahl@ansi.org).

Call for Action and Participation in Standards!

USNC Participants Needed For:

IEC MSB (Market Strategy Board)–Representative Needed

The MSB, which reports to the CB (Council Board), identifies the principal technological trends and market needs in the IEC's fields of activity.

Individuals who are interested in becoming a member of the MSB are invited to contact Ade Gladstein at agladstein@ansi.org as soon as possible.

Please see the scope for the MSB below.

Scope:

The MSB sets strategies to maximize input from primary markets and establishes priorities for the technical and conformity assessment work of the IEC, improving the Commission's response to the needs of innovative and fast-moving markets. It may establish SWGs (Special Working Groups) under the leadership of an MSB member to investigate certain subjects in depth or to develop a specialized document.

The MSB comprises a chairman, 15 top-level technology officers as members appointed from industry, and (ex officio) the IEC Officers. The MSB meets at least once a year.

Members Needed–New USNC TAGs to IEC/SC 8C & IEC/PC 128

The US National Committee agrees with the scope for these two new IEC Committees and wishes to register as a Participating Member. A Technical Advisory Group (TAG) Administrator was recently approved for both Committees. If the USNC is to become a P-Member, a TAG will need to be established for each group.

Individuals who are interested in joining the USNC TAG for IEC/SC 8C or IEC/PC 128 are invited to contact Ade Gladstein at agladstein@ansi.org as soon as possible.

Please see the scope for IEC/SC 8C – Network Management and below:

Scope

Standardization in the field of network management in interconnected electric power systems with different time horizons including design, planning, market integration, operation and control. SC 8C covers issues such as resilience, reliability, security, stability in transmission-level networks (generally with voltage 100kV or above) and also the impact of distribution level resources on the interconnected power system, e.g. conventional or aggregated Demand Side Resources (DSR) procured from markets.

SC 8C develops normative deliverables/guidelines/technical reports such as:

- Terms and definitions in area of network management;
- Guidelines for network design, planning, operation, control, and market integration;
- Contingency criteria, classification, countermeasures, and controller response, as a basis of technical requirements for reliability,

adequacy, security, stability and resilience analysis;

» Functional and technical requirements for network operation management systems, stability control systems, etc;

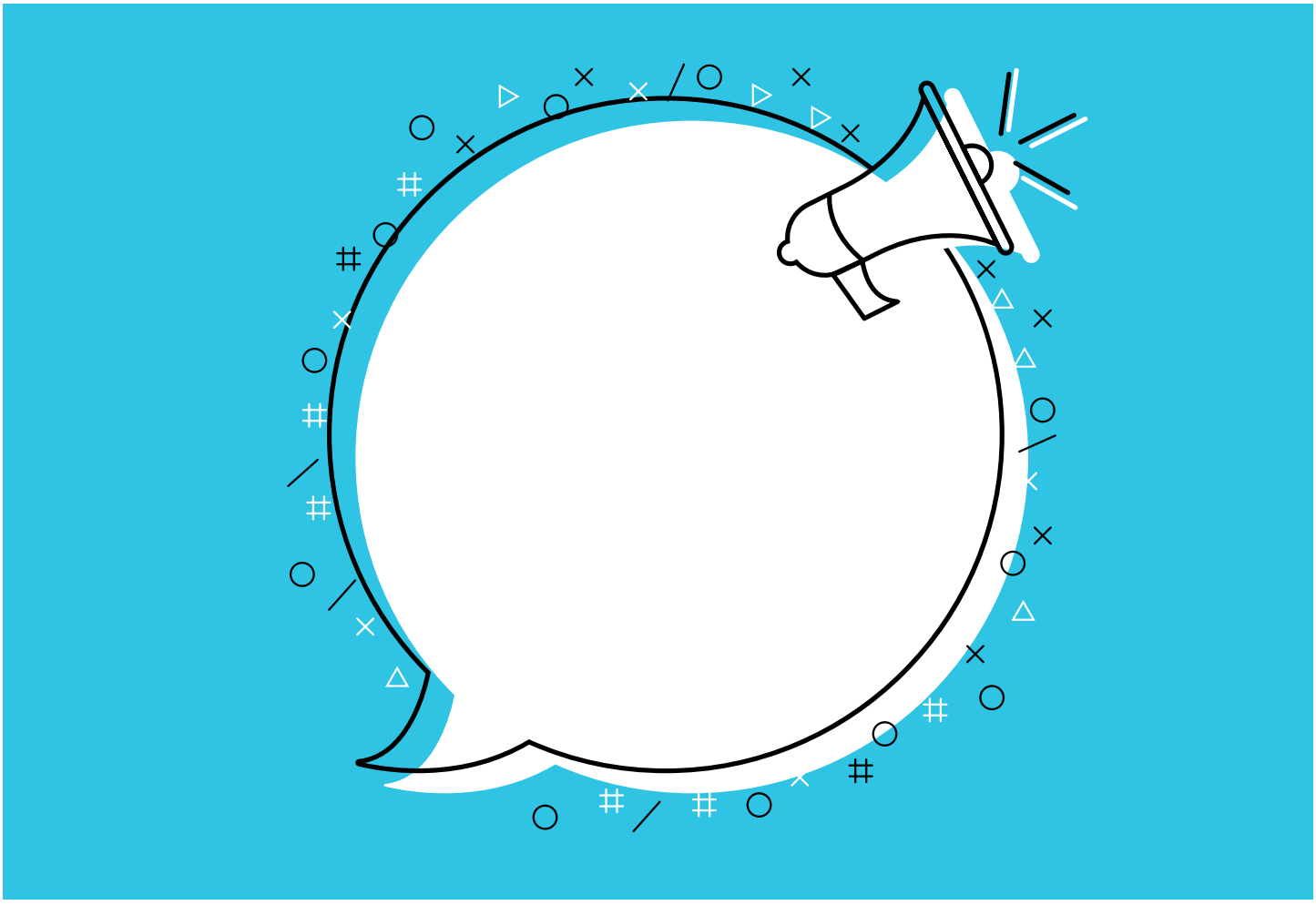
» Technical profiling of reserve products from DSRs for effective market integration;

» Technical requirements of wide-area operation, such as balancing reserve sharing, emergency power wheeling.

Please see the scope for IEC/PC 128– Operation of electrical installations below:

Scope

Standardization in the field of broad (general) principles of operation of electrical installations. These operating instructions are intended to ensure that all operation of and work activity on, with, or near electrical installations can be carried out safely. These are electrical installations operating at voltage levels from and including extra-low voltage up to and including high voltage. These electrical installations are designed for the generation, transmission, conversion, distribution and use of electrical power. Some of these electrical installations are permanent and fixed, such as a distribution installation in a factory or office complex, others are temporary, such as on construction sites and others are mobile or capable of being moved either whilst energised or whilst not energised nor charged.



IECEE Expected to Endorse USNC Member as next Chair of the IECEE

The USNC is thrilled to share that Mr. Steven Margis has been approved by the IEC System of Conformity Assessment Schemes for Electrotechnical Equipment and Components (IECEE) Certification Management Committee (CMC) to serve as IECEE Chair 2022-2024 (Chair Elect 2021). The election took place at the CMC meeting in early June 2020, where Mr. Margis was approved by the membership without opposition. A final endorsement by the CAB is required, and is expected to take place at the November 2020 IEC General Meeting. This marks the first time in nearly 20 years that the Americas have had a Chair in the IECEE. Mr. Frank Kitzanides was the last USNC member to hold this position; his term of office ended in 2003.

Mr. Margis bring over 30 years of professional organizational and leadership experience spanning technical, operational, educational, management and strategic responsibilities. He is an active contributor in the field of global conformity assessment activities including current leadership positions as IECEE Vice Chair, USNC/IECEE Vice Chair, and Convenor (IEC CAB Strategy and Policy, IECEE Maintenance of IECEE Rules and Operational Documents and USNC Subcommittee on Operating Procedures). He is designated in the IECEE as the US Senior Conformity Assessment Delegate on Policy and Strategy and is also involved in the activities of the TIC Council, an international association representing independent testing, inspection and certification companies.

Mr. Margis holds strong foundational beliefs in a strategic approach to global conformity assessment targeted at streamlining market access and acceptance as well as the concept of national treatment for conformity assessment service providers. Contributions across his career in the focused areas of strategy, policy, business development and innovation related to global conformity assessment have led to his recognition as a recipient of the American National Standards Institute (ANSI) Gerald H. Ritterbusch Conformity Assessment Medal, the IEC 1906 Award, and Distinguished Member of Technical Staff of the UL William Henry Merrill Society.

Please join us in congratulating and welcoming Mr. Steven Margis!

UPCOMING EVENTS

Oct 20 USNC Event: Establishing a National Young Professionals Program

Due to the ongoing health crisis, many upcoming events have been postponed or are being held remotely. Please check the website of the individual organization for up-to-date information.

Save the date!

IEC 2022 General Meeting, Host City: San Francisco

Sponsor the IEC 2022 General Meeting, hosted by the USNC

For only the seventh time since 1904, the United States is gearing up to host the IEC General Meeting, 31 October – 4 November, 2022, in San Francisco. Organizations with a stake in all areas of electrotechnology are invited to demonstrate their commitment to international standardization and conformity assessment through sponsorship of the 10-day event.

For more information, see the IEC 2022 Sponsorship Brochure or contact Adelana Gladstein at: agladstein@ansi.org or 212-642-4965.

Thank you to the organizations already on board as IEC 2022 sponsors!

ABOUT THIS PUBLICATION

The USNC Current newsletter is distributed to the constituency of the U.S. National Committee (USNC) of the International Electrotechnical Commission (IEC). It provides updates on technical activities and other information of interest to members of the electrotechnical community. Some articles are reprinted with permission from the IEC News log.

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HOW TO CONTRIBUTE

Contributions are gladly accepted for review and possible publication, subject to revision by the editors. Submit proposed news items to: Megan Pahl, mpahl@ansi.org.